Australian Government
Productivity Commission

Government Drought Support

Productivity Commission Inquiry Report

No. 46, 27 February 2009

ISSN 1447-1329
ISBN 978-1-74037-275-6

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An appropriate citation for this paper is:

Productivity Commission 2009, *Government Drought Support*, Report No. 46, Final Inquiry Report, Melbourne

JEL code: E31

The Productivity Commission

The Productivity Commission is the Australian Government's independent research and advisory body on a range of economic, social and environmental issues affecting the welfare of Australians. Its role, expressed most simply, is to help governments make better policies, in the long term interest of the Australian community.

The Commission's independence is underpinned by an Act of Parliament. Its processes and outputs are open to public scrutiny and are driven by concern for the wellbeing of the community as a whole.

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27 February 2009

The Honourable Chris Bowen MP
Assistant Treasurer
Parliament House
CANBERRA ACT 2600

Dear Assistant Treasurer

In accordance with Section 11 of the *Productivity Commission Act 1998*, we have pleasure in submitting to you the Commission's final report into Government Drought Support.

Yours sincerely

Mike Woods
Presiding Commissioner

Dr Neil Byron
Commissioner

Bob Granger
Associate Commissioner

Terms of reference

I, CHRIS BOWEN, Assistant Treasurer and Minister for Competition Policy and Consumer Affairs, pursuant to Parts 2 and 3 of the *Productivity Commission Act 1998*, hereby refer government assistance for drought events to the Commission for inquiry and report by the end of February 2009. The Commission is to hold hearings for the purpose of the inquiry and produce a draft report by the end of October 2008.

Background

Government assistance for drought events is guided by the current National Drought Policy (NDP). Under the NDP, drought assistance or support is intended to be a short term measure to help farmers prepare for, manage and recover from drought. The objectives of the NDP are to:

- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches for managing a changing climate;
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress; and
- ensure early recovery of agricultural and rural industries, consistent with long-term sustainable levels.

Although self-reliance is a key objective, the NDP also recognises that there are rare and severe events that are beyond the ability of even the most prudent farmer to manage. The Commonwealth Government provides support to farmers and rural communities under the Exceptional Circumstances (EC) arrangements and other drought programs. The states and territory governments also participate in the NDP and provide support measures of their own.

To be classified as an EC event, the event must be rare, that is, it must not have occurred more than once on average in every 20 to 25 years. Australia is experiencing a drought that has been unprecedented in its geographic extent, length and severity. Some areas have been drought declared for 13 of the last 16 years, leading to some recipients receiving EC assistance since 2002.

Climate change will bring with it significant challenges for Australian agriculture. Climate change is expected to increase the frequency, severity and length of drought periods in future.

Australian primary industries ministers have agreed that current approaches to drought and EC are no longer the most appropriate in the context of a changing climate. They agreed that drought policy must be improved to create an environment of self-reliance and preparedness, and encourage the adoption of appropriate climate change management practices.

To improve drought policy, ministers agreed to consider:

- relevant social dimensions and policy responses to drought and Exceptional Circumstances;
- the provision of accessible social welfare support, including eligibility criteria;
- the effectiveness of business support payments;
- the effectiveness of financial risk management strategies, including Farm Management Deposits;
- the effectiveness of preparedness policies; and
- cost-benefit analysis of state and federal drought assistance.

The Productivity Commission is requested to assess drought support provided to farmers, farm businesses and farm dependent rural small businesses.

This inquiry, as part of a review of drought policy, will be supported by:

- an expert panel's assessment of the social dimensions of the impacts of drought and the extent and range of current government and non-government social support services available to farm families and rural communities; and
- an assessment by the Bureau of Meteorology (BoM) and Commonwealth Scientific and Industrial Research Organisation's (CSIRO) of what a changing climate means for drought in Australia and the appropriateness of using the concept of exceptional climatic circumstances to trigger the availability of assistance measures.

Scope of the inquiry

The Commission is requested to:

1. Report on the appropriateness, effectiveness and efficiency of the Commonwealth, state and territory governments' business support and income support measures provided to help farmers, farm businesses and farm dependent rural small businesses manage drought. Support measures assessed will include, but not be limited to, EC Relief Payments, EC Interest Rate Subsidies, Exit Assistance, Farm Management Deposits, Professional Advice and Planning Grants, Irrigation Management Grants and rate rebate schemes.

   In undertaking this inquiry, the Commission is requested to report on the impact that the provision of support to farmers, farm businesses and farm dependent rural small businesses has on performance and productivity at the individual, business, industry, regional and state levels.

2. Identify impediments to farmers, farm businesses and farm dependent rural small businesses improving self-reliance and preparedness for periods of financial difficulty.

3. Identify the most appropriate, effective and efficient Commonwealth, state and territory government response to build farmers', farm businesses' and farm dependent rural small businesses' self-reliance and preparedness to manage drought.

   The Commission may draw lessons from the broad range of support measures that are or have been available to farmers, farm businesses and farm dependent rural small businesses, or which are more broadly available to the Australian community.

The Commission is to take into consideration the NDP objectives and the Commonwealth Government's Expenditure Review Principles. The identification of appropriate, effective and efficient government support should be consistent with these objectives and principles.

With reference to the findings of the expert panel and the BoM and CSIRO, the Commission should examine the interaction between current government social support services and business support and income support measures, and the impact of social support services on self-reliance, preparedness and performance.

The Government will consider the Commission's recommendations, and the Government's response will be announced as soon as possible after the receipt of the Commission's final report.

CHRIS BOWEN

20 June 2008

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Abbreviations and explanations

Abbreviations

ABARE	Australian Bureau of Agricultural and Resource Economics
ABS	Australian Bureau of Statistics
AFF	Australia's Farming Future
ATO	Australian Taxation Office
BRS	Bureau of Rural Sciences
BoM	Bureau of Meteorology
CCAP	Climate Change Adjustment Program
CRCs	Cooperative Research Centres
CSIRO	Commonwealth Scientific and Industrial Research Organisation
DAFF	Department of Agriculture, Fisheries and Forestry
EC	Exceptional Circumstances
ECIRS	Exceptional Circumstances Interest Rate Subsidy
ECRP	Exceptional Circumstances Relief Payment
FMD	Farm Management Deposits
ICL	Income contingent loan
IGA	Intergovernmental Agreement
GL	Gigalitre
MDB	Murray-Darling Basin
ML	Megalitre
NAMS	National Agricultural Monitoring System
NDRA	Natural Disaster Relief Arrangements
NDP	National Drought Policy
NFF	National Farmers' Federation
NRAC	National Rural Advisory Council
PAPG	Professional Advice and Planning Grant
PC	Productivity Commission

RAFS	Retirement Assistance for Farmers Scheme
RFCS	Rural Financial Counselling Service
RPL	Recognition of Prior Learning
RRDCs	Rural Research and Development Corporations
SBIS	Small Business Income Support
TIS	Transitional Income Support

Explanations

Recommendations	***Recommendations in the body of the report are highlighted using bold italics with an outside border, as this is.***

OVERVIEW

Key points

- Many Australian farmers and rural communities have been experiencing hardship from the latest severe and prolonged drought. While this is not new to dryland farming, 'irrigation drought' is uncharted territory.
- Australia has always had a variable climate, with drought being a recurring feature. Looking to the future, experts predict higher temperatures and, for some regions, more frequent periods of exceptionally low rainfall.
- Most farmers are sufficiently self-reliant to manage climate variability.
  - In 2007-08, 23 per cent of Australia's 143 000 farms received drought assistance, totalling over $1 billion, with some on income support continuously since 2002.
  - In drought declared areas, most farmers manage without assistance. From 2002-03 to 2007-08, on average, about 70 per cent of dairy and broadacre farms in drought areas received no drought assistance.
- The National Drought Policy's (NDP) Exceptional Circumstance (EC) declarations and related drought assistance programs do not help farmers improve their self-reliance, preparedness and climate change management.
  - EC interest rate subsidies and state-based transactions subsidies are ineffective, can perversely encourage poor management practices and should be terminated.
  - EC household relief payments are limited to those in drought-declared areas, ignoring hardship elsewhere or for other reasons. They should be replaced.
  - The EC declaration process is inequitable and unnecessary. It should not be extended to new areas. Current declarations should lapse as soon as practicable.
- Governments need to commit to a long term reform path that recognises that the primary responsibility for managing risks, including from climate variability and change, rests with farmers. To this end:
  - research, development, extension, professional advice and training to improve farmers' business management skills and build self-reliance warrant significant government funding where they deliver a demonstrable community benefit.
  - Farm Management Deposits, notwithstanding their use for tax management, have encouraged farmers to save and to be more self-reliant, and should be retained.
  - policies relating to water, natural resource management and climate change, which all impact on farm businesses and local communities, are often at cross-purposes and need to be better coordinated and integrated.
  - all farm households in hardship — regardless of cause or location — should have access to an income support scheme that is designed for farming circumstances.
- Similar recommendations from the previous reviews of the NDP have not been adopted. To ensure that this new policy direction is credible and enduring:
  - the NDP should be replaced with extended objectives for Australia's Farming Future.
  - an intergovernmental agreement with independent monitoring and financial incentives for complying with agreed commitments should be established.

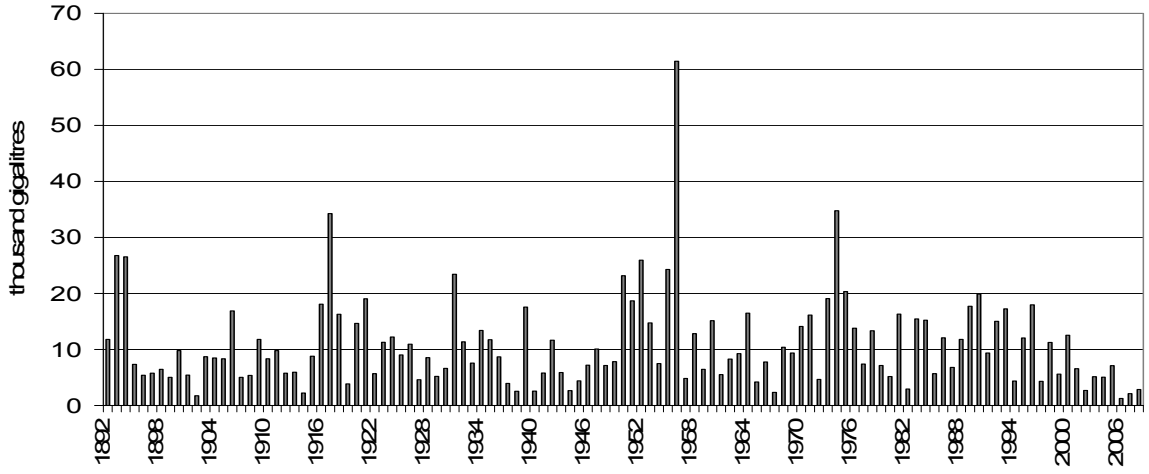
Overview

Droughts can have devastating social and financial impacts on farmers and their communities, as well as adverse environmental effects. Australia has one of the most variable climates in the world, with wet years, and even wet decades such as the 1950s, contrasting with dry periods. In terms of rainfall in south-western, southern and eastern Australia, the latest drought has been severe and prolonged, and has been compared with the Federation drought and the drought of the 1940s. One difference this time is that it has been hotter — by about one degree Celsius.

Another significant feature of the latest drought is its impact on many irrigators, especially in the Murray-Darling Basin. Severely reduced water allocations that have occurred in the last three years represent uncharted territory as low rainfall has interacted with policy failure. The river system is grossly over allocated.

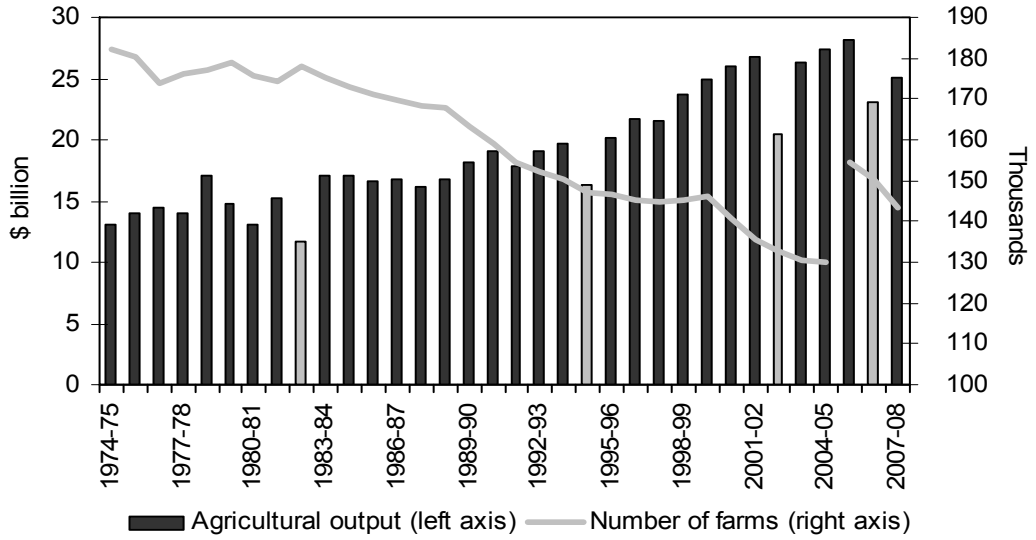
The variability of Australia's climate, and the frequency of droughts, is reflected in Murray system inflows over the last century (figure 1).

Figure 1 **Murray system inflows (including Darling), 1892 to 2008**



Given the frequency of drought, it is easy to overlook that the Australian agriculture sector is highly successful. It leads domestic productivity growth, is an innovative adopter of technologies, and has proved resilient to myriad forces of change. For example, despite facing long-term pressure on commodity prices and rising input costs, sectoral output continues to increase — with more than half of that exported.

Figure 2 **Agricultural output and farm numbers, 1974-75 to 2007-08**



Agricultural output is value added in 2006-07 prices. Comparable time series data on farm numbers are not available after 2004-05, and so Australian Taxation Office business numbers are used. Light shaded bars indicate drought years.

The rural sector has always adjusted to changing circumstances, including drought which is one of many risks inherent in farming. In the main, this adjustment occurs autonomously through the independent decisions of farmers and others. Resilience to the impacts of the droughts of 1982, 1994, 2002 and 2006 is demonstrated by agricultural output (figure 2). Indeed, although 2002 to 2007 is regarded by many as one long drought, it includes three of the four highest ever years for total agricultural output. Moreover, notwithstanding the severity of the latest extended dry period, in 2007-08 only about 23 per cent of farms received drought assistance.

This sectoral success masks a complex story of diversity and contrasting fortunes:

- in 2005-06, the largest 30 per cent of farms generated 82 per cent of the value of agricultural operations, whereas the smallest 50 per cent generated 7 per cent
- as a group, the bottom 25 per cent of broadacre farms has not recorded a profit in any year from 1988-89 to 2007-08.

Farm performance is strongly correlated to vulnerability to drought. Apart from local climatic circumstances, how drought affects farming families and farm businesses depends on farm management practices, the degree of income diversification and the store of capital that farmers can draw on — the natural and physical capital of their farm, their financial and human capital and that embodied in their social networks.

The National Drought Policy

Governments' responses to droughts are guided by the National Drought Policy (NDP). Adopted in 1992, the NDP is based on a recognition that drought is a recurring feature of the climate. Its objectives, which correspond to phases associated with farming in a variable climate — preparedness before drought, managing and coping during drought, and recovering after drought — are to:

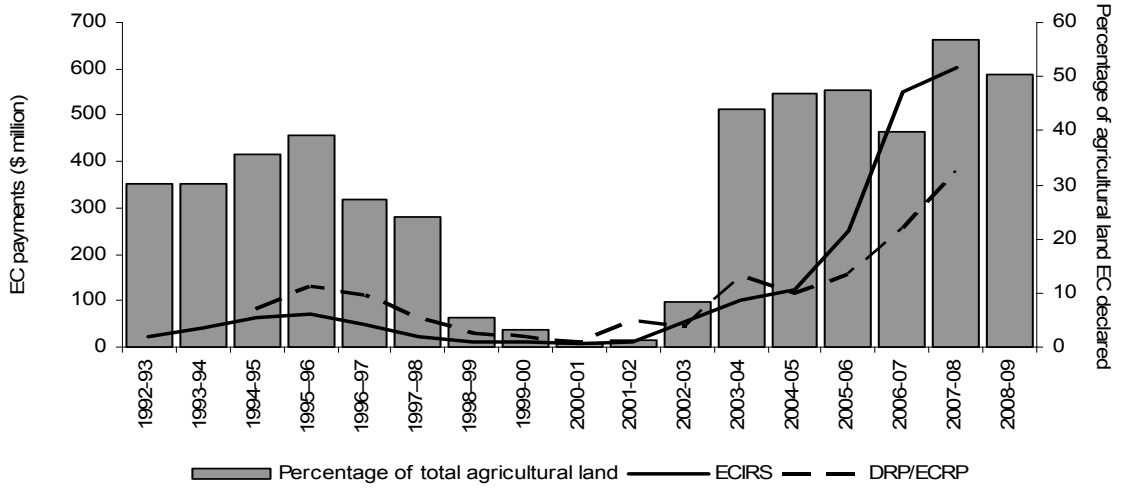
- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches to managing for climatic variability
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress
- ensure early recovery of agricultural and rural industries, consistent with long-term sustainable levels. (Crean, Minister for Primary Industries and Energy 1992)

In contrast to its objectives, the NDP's programs focus on providing relief primarily to farm households and farm businesses suffering hardship during severe drought.

To be eligible for assistance, a farm must be in an area declared as being in Exceptional Circumstances (EC) — the 'trigger' — and satisfy the eligibility criteria of the individual programs:

- The *EC Relief Payment* (ECRP) provides up to $405 per fortnight each for the farmer and partner. While the payment is equivalent to that provided to unemployed people in hardship under Newstart, the ECRP's assets and income thresholds are more generous. In 2007-08, around 29 000 farm families received payments at a cost of approximately $380 million (figure 3) — by the start of 2009, this had fallen to around 20 000 families.
- *EC Interest Rate Subsidies* (ECIRS) are provided to farm businesses and farm dependent rural small businesses that are in financial difficulty but deemed viable in the long-term. A subsidy of up to 50 per cent of the interest payable on loans (excluding recent property purchases) is provided in the first year and up to 80 per cent in subsequent years. Recipients' payments are capped at $500 000 over five years. Total ECIRS payments have grown substantially to around $604 million in 2007-08 (figure 3). In that year, average payments of around $37 000 were made to about 16 000 recipients.
- The *EC Exit Package* is available for farm businesses whose owners are willing to leave the industry. This little used package (around $10 million has been paid since 2007) consists of an Exit Grant, which provides a taxable one-off payment of up to $150 000, an Advice and Retraining Grant, and a Relocation Grant.
- Other EC programs include a *Professional Advice and Planning Grant* scheme and a *Small Business Income Support* scheme.

Figure 3 **EC declared area and total EC support payments, 1992-93 to 2008-09**



DRP/ECRP includes payments to farm households made through the former Drought Relief Payment (DRP).

Review of drought policy

There is a mismatch between the NDP's policy objectives and its programs. From its inception, policy has ostensibly centred on helping farmers build their self-reliance to manage climate variability and preparedness for droughts. Program expenditures, however, have not been directed to this end but have mainly flowed as emergency payments to a minority of farmers in hardship and to stressed farm businesses. The National Farmers' Federation submitted that:

> Committing to a long-term drought policy is vital to securing an agricultural base that is resilient to a changing climate … one of the dangers of the government's current Exceptional Circumstances policy package is that it includes policies which, while bearing an impact on drought management, primarily target other objectives. (sub. 51)

Ministers with responsibility for primary industries consider that the current approaches to drought are no longer the most appropriate. They have concluded that policy must be improved to create an environment of self-reliance, preparedness and adoption of climate change management practices. These views are echoed in governments' submissions (box 1).

Given these concerns, Ministers' asked for three reports. The first two — from Bureau of Meteorology–CSIRO and from the Expert Social Panel — were completed in 2008 (box 2). The Commission's report completes the series and:

- reports on the appropriateness, effectiveness and efficiency of governments' business and income support measures to help manage drought

- identifies impediments to improving self-reliance and preparedness for periods of financial difficulty
- identifies the most appropriate, effective and efficient responses by governments to build self-reliance and preparedness to manage drought.

Box 1 **Governments' views on the NDP and self-reliance**

Victorian Government

> While the objective of the NDP is to promote self-reliance in farm risk management by (appropriately) shifting more of the risk burden of drought events from taxpayers onto farmers, there are questions whether the EC provisions and associated government payments have been undermining farmer's incentives to do this. (sub. 110)

Western Australian Government

> Collectively the money spent, over the past decade on Exceptional Circumstances … could have, arguably, been better spent on bolstering public sector research and development, and building farm business and financial management capacity … (sub. DR186)

South Australian Government

> While the current suite of national drought support programs has assisted many businesses and families in need, they will not facilitate the level of reform required to meet these new and emerging challenges [of climate change]. A new approach is required. (sub. 91)

Tasmanian Department of Primary Industries and Water

> The current assistance programs are proving to be disincentives for self reliance and drought preparedness strategies because safety nets are there to help farming businesses through difficult periods. (sub. 85)

Most farmers manage without EC assistance

The concept of EC was developed for droughts of such severity that they would be 'beyond the ability of even the most prudent farmer to manage'. And yet, during 2007-08, nearly half of Australia's dairy and broadacre farms in drought-declared areas did manage without EC assistance. Over the six years to 2007-08, on average nearly 70 per cent of these farms managed without EC assistance (table 1).

Overall, of the 143 000 farms in Australia (with an estimated value of agricultural operations of $5000 or more), only 23 per cent received EC support in 2007-08. Farmers in EC declared areas who did not receive support were generating higher farm net cash incomes, had higher off-farm investment income to draw on and were earning more off-farm wage and salary income (figure 4).

The analysis of farm liquidity and debt tells the same story. Unassisted farmers in drought areas had higher liquid assets than those on EC support in the same areas, and had the lowest debt levels (and interest payment obligations) of all groups of farmers.

Box 2 **Climate science and the social impacts of drought**

The BoM-CSIRO report

The joint assessment by the Bureau of Meteorology (BoM) and CSIRO reports:

- the extent and frequency of exceptionally hot years have been increasing and this is projected to continue, with exceptionally hot years likely to occur every one to two years, on average, over the period 2010–2040
- while trends in rainfall are highly dependent on the period of analysis due to large inter-decadal variability, exceptionally low rainfall years are projected to become more frequent in southwest Western Australia, the South Australian agricultural region, Victoria and Tasmania
- exceptionally low soil moisture is projected to become more frequent in line with the projected increase in exceptionally low rainfall years.

The Expert Social Panel report

The Expert Social Panel consulted widely across the country and found:

- there is widespread distress in drought-affected rural communities and too many farm decisions are made under stress
- while it is hard to separate the social impacts of drought from long-term trends contributing to decline in some rural populations, drought adversely impinges on the wellbeing of farm families and communities
- policy needs to address the social needs of farm families, rural businesses and communities in ways that do not inhibit the efficiency of agricultural industries
- the connection between the farm as a place of work, residence and family tradition has important implications for the effectiveness of institutional support.

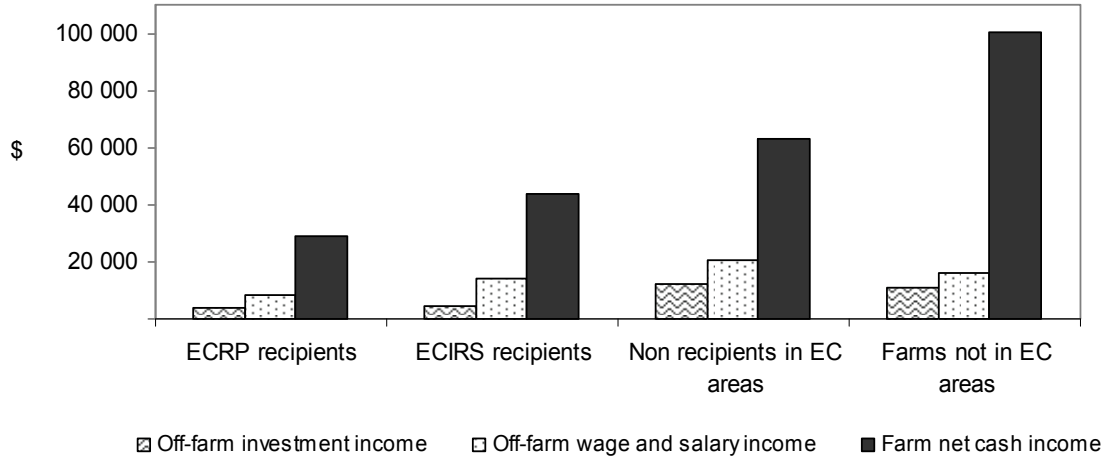
Table 1 **Drought assistance recipients, 2002-03 to 2007-08**

	2002-03	*2003-04*	*2004-05*	*2005-06*	*2006-07*	*2007-08*	*Annual average 2003-08*
Farms on ECRP and/or ECIRS	9 094	12 508	11 143	19 243	21 791	25 517	16 549 (32%)
Farms in EC areas not on EC payments	46 696	41 980	34 971	28 597	25 378	31 438	34 843 (68%)

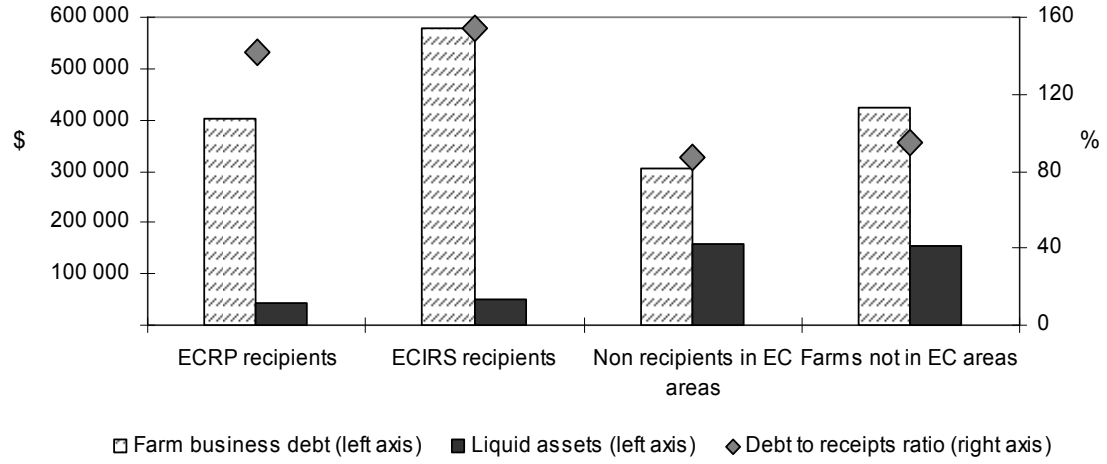
Estimated number of broadacre and dairy farms. Horticultural and other farms are not included in totals.

Figure 4 **Income levels, liquidity and debt**

Income levels



Liquidity and debt



This high level of preparedness reflects an accumulated understanding of Australia's climate variability. Many farmers have rainfall records going back 120 years and, depending on where their farms are situated, can readily point out the Federation drought and the long dry spell in the 1940s. Most were farming through the droughts of 1982 and 1994.

The impact of climate change

The BoM-CSIRO report presents projections for changes in temperature, rainfall and soil moisture. The meteorological evidence is that the geographic extent and frequency of exceptionally hot years has been increasing rapidly over recent decades. The report predicts that temperatures will keep rising.

Rainfall in most regions is expected to remain highly variable. While periods of exceptionally low rainfall are projected to increase in the southwest of the country (including southwest Western Australia and the South Australian agricultural region) and Victoria and Tasmania, BoM-CSIRO caution that these projections are less reliable than the temperature outlook. The pattern of exceptionally low soil moisture years is projected to be similar to, though more pronounced than, that for rainfall.

Given the implications of this outlook for agriculture, it is even less appropriate to continue with programs that target those least prepared to manage climate variability, and to do so after droughts have arisen.

Assessment of current programs

Exceptional Circumstances declarations

The institutional arrangements underlying the EC application process provide strong incentives for applications to be submitted. Local communities initiate an application and are the beneficiaries of the subsequent programs. State and territory governments assessing and endorsing such a declaration are acknowledged by the local communities as understanding their plight, yet are responsible for only 10 per cent of the cost of business assistance. The Commonwealth Government contributes all of the household relief funding and 90 per cent of the business assistance, leaving it with the fiscal and political consequences of accepting or rejecting an application.

There is no formal requirement for transparency of the advice to the Commonwealth Minister from the National Rural Advisory Council and others on which the decision was based. To illustrate, in September 2007, the then Commonwealth Government declared 14 interim assistance areas (encompassing 46 per cent of agricultural land in Western Australia and 51 per cent of Tasmania), thus triggering a round of non-recoverable interim assistance for additional areas. None of the communities in those areas subsequently applied for formal EC status — in refusing to do so, the Tasmanian Minister for Primary Industries and Water described the interim EC declaration as ‘an election stunt’.

Despite the NDP’s one in 20 to 25 year criterion for an area to be EC declared, it has been common for 30 per cent or more of Australia to be declared (figure 3). In June 2008, more than half of the country was declared and some areas have been declared for 14 of the past 17 years. It appears that a generous interpretation of the criteria, rather than protracted low rainfall, is mainly responsible for this.

Looking ahead, the BoM–CSIRO report concludes:

> The current EC trigger, based on historical records, has already resulted in many areas of Australia being drought declared in more than 5% of years, and the frequency and severity are likely to increase. The principal implication … is that the existing trigger is not appropriate under a changing climate. (Hennessy et al. 2008)

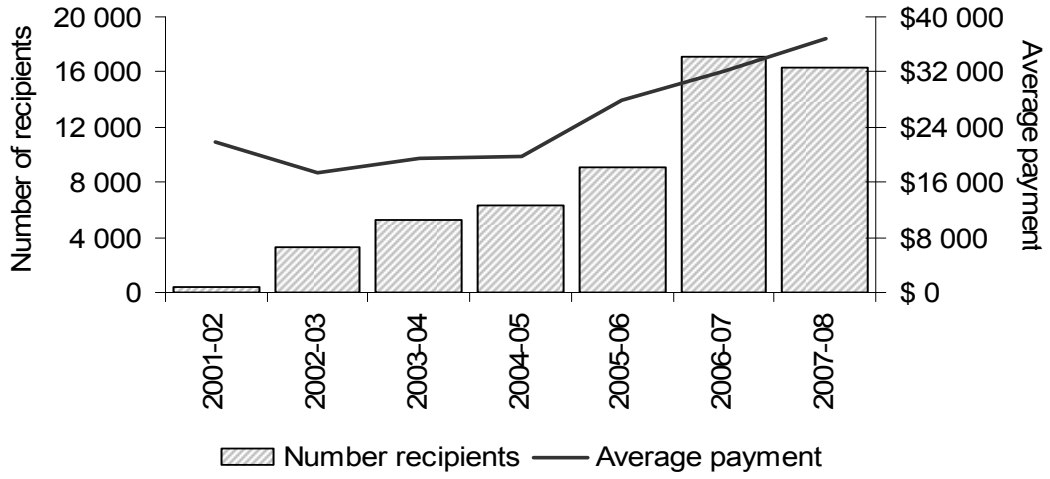
Several participants indicated that EC declaration has intrinsic psychological value in that it sends a message to the wider community that farmers in a declared area are facing difficult times because of drought. Against this, declaration raises significant equity issues inherent in any approach that relies on delineating specific areas ('lines on maps'). Farmers who are experiencing largely the same drought circumstances but are on the other side of a boundary road are ineligible for assistance and are seen as not being in drought.

It is evident that attempts to declare areas according to the severity of drought is inappropriate, ineffective and inequitable.

EC Interest Rate Subsidies

The ECIRS scheme directs assistance only to those in debt. Average payments and the number of recipients increased rapidly over the three years to 2007-08 even though the extent of EC declared land remained fairly constant (figure 5).

Figure 5 **EC interest rate subsidy recipients and average payment, 2001-02 to 2007-08**



Much of the expenditure increase appears to have been driven by changes in scheme criteria. For example, in late 2006 the maximum subsidy payable over five years was increased from $300 000 to $500 000. A year later, in September 2007, the

off-farm asset threshold was lifted from $500 000 to $750 000. (A similar trend is evident with the relaxation of the off-farm income test for ECRP.)

The ECIRS has proved highly divisive in rural communities. Those who have benefited endorse the program as a means to address a short-term liquidity crisis. Non-recipients are highly critical of this measure. Box 3 presents a range of views from broadacre farmers, graziers and orchardists.

Box 3 **Farmers' views on drought assistance**

Farmers in favour of drought assistance

The support we have received with Interest Subsidy was vital in assisting us. With this assistance we have utilised the drought as an opportunity … For without the Interest Subsidy assistance this knowledge gained would not have happened. (D. and T. Allen)

… interest subsidy is useful and practical. It is helpful the way it is because much debt is because of farm-build-up to remain viable … (Crocker Farming Co.)

The existing interest subsidy and household support have been very useful in getting through the difficult time, with our business ready to produce again when it rains. (Belalie Pastoral Company)

Farmers not in favour of drought assistance

The same producers are queuing every time assistance is offered which proves there is no adapting to seasonal variability. … Those of us who have embraced new technology and diversification are excluded from assistance as [we] are self-sufficient. (G. Schmidt)

It is disconcerting to see a number of 'inefficient' graziers … receiving drought assistance when they have done little to plan and manage the risks of drought … (J. Cooper)

… the current exceptional circumstances assistance system does not encourage the efficient operation of farm businesses through economies of scale, in fact they encourage the opposite. (L. Mann)

Efficient farmers who save and invest off farm are penalised, whilst farmers who waste money [and] spend everything get more help. (H. Clark)

A farmer who has diversified risk, managed borrowings conservatively, kept operating costs low and planned a financially secure retirement is less likely to qualify … (P. Wallace)

While the ECIRS aims to assist otherwise viable farmers who are experiencing liquidity problems, the evidence shows that the average recipient has an equity level of over 80 per cent of the total farm asset value. Any rationale for a scheme that rests on farmers' inability to access carry-on finance requires evidence that capital markets are unwilling to extend credit in the face of such balance sheet strength. To this end, the Australian Bankers' Association submitted that, in times of drought, viable farmers should be able to access carry-on finance, have loans restructured to

reduce repayments or defer payment without cost. The Commission found no evidence that farmers' access to capital differed in any significant way from that faced by other small businesses, even with changes in economic cycles.

Contrary to the objectives of the NDP, there are no requirements on recipients of ECIRS to demonstrate that they are improving their farm management practices or, in other ways, increasing their self-reliance. Indeed, the ECIRS generates perverse incentives in that it can lead to:

- some farm businesses failing to adopt self-reliant strategies, such as earning off-farm income or building financial reserves as a hedge against drought risks, in the belief that governments will support them during droughts:

  > If we had not carried out farm contracting during the 2007 year it is quite possible we would have received the maximum interest subsidy of $100 000 … other farmers … made more money from receiving interest subsidy than we netted from farm contracting. (S. and A. Boardman, sub. 43)

- recipients being less responsive to drought conditions and being financially assisted to continue business-as-usual;

  > [EC interest rate subsidies] promote 'worst practice' farming i.e. To overgraze and overspend in good times, knowing the criteria for subsidy will be met in the drought (D. and M. Geldard and T. Reid, sub. 46).

Interest rate subsidies were criticised strongly in the reports to government of the Drought Policy Taskforce (1997), the Mid-Term Review of the Rural Adjustment Scheme (1997), the Drought Review Panel (2004), and the Agriculture and Food Policy Reference Group (2006). On the evidence provided to this inquiry, and its own analysis, the Commission agrees with the findings of these reviews.

Exceptional Circumstances interest rate subsidies should be terminated, subject to transition arrangements.

Transactions subsidies

New South Wales, Queensland and the Northern Territory provide subsidies for the transport of fodder, water and livestock for farmers in drought-declared areas. This is despite previously agreeing to end such subsidies in the face of evidence of perverse consequences and the potential for misuse, including:

- exacerbating environmental damage from retaining excessive stock for the prevailing conditions. As one participant noted 'one can see adjacent properties that have been subjected to very different land management regimes, one with many starving cattle picking at round bales brought in by subsidised freight, next door to a few fat unsubsidised cattle' (P. Morris, sub. 23)

- bidding up the price of fodder in regions where there is no subsidy, thereby increasing costs for other users, particularly the intensive livestock sector.

Fixed water rates and municipal rates are legitimate and known business costs that should be budgeted for, yet some states also provide rebates and waivers on these. Where there are concerns about hardship, deferred payment models would be preferable to shifting the burden onto other ratepayers and/or the wider community.

States and territories should, as previously agreed, terminate transactions-based subsidies.

EC Exit packages

At December 2008, around 100 applicants had received an EC exit package from nearly 500 processed claims. One reason for the low uptake of the package is the grant's strict eligibility requirements. The program also fails to address the non-monetary reasons why many farmers remain on the farm — the lack of formal recognition and portability of the skills learned during farming and the reluctance to move away from the family home and local community. (The Australia's Farming Future initiative includes a similar package badged as Re-establishment Grants.)

The Exceptional Circumstances exit package should be terminated, subject to transition arrangements. The Re-establishment grants that are provided under the Australia's Farming Future initiative should similarly end.

Recently the Australian Government announced a program for small irrigators in the Murray-Darling Basin involving purchase of their water entitlements, assistance to remove permanent plantings, training services and an exit grant. Recipients can remain in the family home on their farms. As many of these 'blockies' are located near settlements where alternative employment may be available, the scheme addresses some of the failings of the EC exit grant. The Commission considers that this scheme, which is intended to run for a short period, should be evaluated.

The appropriateness, effectiveness and efficiency of the Small Block Irrigators Exit Grant package should be evaluated following its conclusion.

Irrigation Management Grant

The Irrigation Management Grant program provides up to $20 000 to Murray-Darling Basin irrigators. At December 2008, around 9 500 irrigators had accessed the program, which is scheduled to end on 30 June 2009. By any measure the grants are generous and largely unrestricted in eligibility and use.

There are no obvious constraints that prevent irrigators from undertaking infrastructure improvements. The grants assist farmers to increase returns from their water allocations and they appropriate the benefits. The evidence for any broader environmental benefit is ambiguous at best. The grants support businesses in their current location and reward irrigators who have not updated their infrastructure. It can also lead farmers to delay their decisions to leave the industry and/or to sell water entitlements, thereby increasing the costs of eventual adjustment.

The Murray-Darling Basin Irrigation Management Grants program should conclude, as scheduled, on 30 June 2009.

EC Relief Payments

The ECRP scheme treats farmers in EC areas very favourably relative to others in hardship in the community. Owners of other businesses that fail (other than farm dependent rural small businesses) and others in the labour market who have no significant income, are not entitled to support unless they meet the standard safety net criteria. To receive income support under Newstart, an unemployed couple must seek work, have assets valued at less than $243 500 (excluding their own home) and can only jointly earn $62 per week before their benefit reduces.

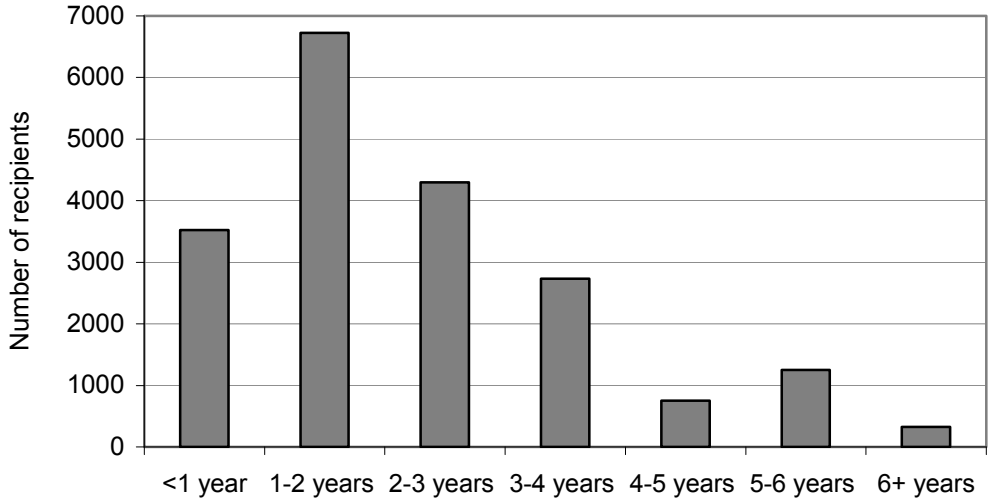
Under ECRP, a farming couple is not required to seek alternative employment, partly in recognition that in drought, farmers still need to manage their land and stock and maintain the underlying viability of their farms. The value of a farming couple's farm is not assessed for eligibility purposes, they also can own up to $243 500 in off-farm assets and can earn over $400 per week in off-farm income before incurring any loss of benefit. While almost half of ECRP beneficiaries have received support for one to two years, around half have been supported for longer, with almost ten per cent having received payments continuously since 2003 (figure 6).

Long-term government support encourages dependency that is inimical to self-reliance and preparedness, perpetuates many social problems identified by the Expert Social Panel and generally impedes adjustment.

Exceptional Circumstances relief payments should be replaced, subject to transition arrangements.

Figure 6 **Length of time in continuous receipt of ECRP**

Recipients current at 9 January 2009



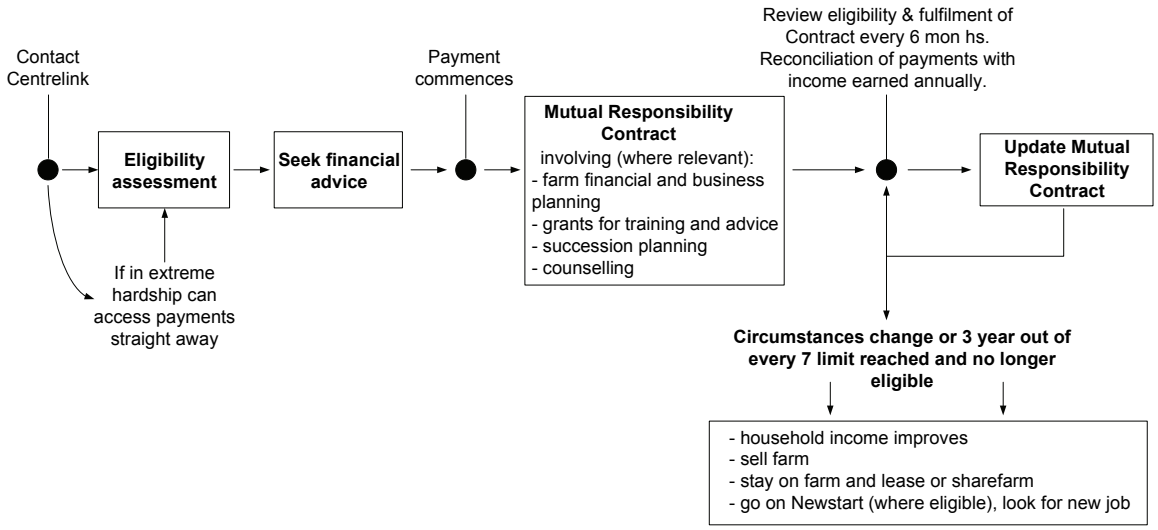
The Commission proposes that the ECRP scheme be replaced by a Farming Family Income Support scheme that aims to achieve a balance between four objectives:

- equity — by enabling all farming families in hardship to access income support, not just those within administratively-determined drought boundaries
- recognition of farm viability — by setting the asset threshold at a higher level than Newstart
- avoidance of welfare dependence — by limiting the duration of income support and assisting farmers to undertake farm planning or training suited to earning off-farm income
- helping recipients determine their future in farming — by providing support for viability assessments, counselling and succession planning.

The expression of these aims underpins the recommended scheme (figure 7).

The Commission considers that, on equity grounds, farming families experiencing hardship should apply for assistance like other Australians and be subject to the same income test — with support starting to taper after a household earns $62 per week (where both adults receive assistance) from other sources.

Figure 7 **Farming Family Income Support scheme**



The assets test under Newstart, however, does not sit easily in the farm sector. Given the usually high level of farm assets, Newstart's asset threshold of $243 500 (not including the house) would render most farm households ineligible for support. Running down the capital value of the farm to that threshold could jeopardise future farm viability. In recognition of this, and that hardship may be only temporary (about half of all ECRP recipients receive support for one to two years), the scheme should depart from Newstart's asset threshold.

The net asset threshold under the Transitional Income Support (TIS) scheme, which is scheduled to end in June 2009, is $1.5 million. The Commission considers, however, that a net asset threshold of $2 million, tapering out at $3 million, would best meet the objectives of its proposed scheme. A liquid asset sub-cap of $20 000, the same as for TIS, recognises that farms require more working capital than, say, urban households, but also requires that funds in excess of $20 000 (including Farm Management Deposits) be drawn down before taxpayer support is provided.

Unlike the unconditional ECRP scheme, the Commission's recommended scheme would involve mutual responsibility. Many farmers and the National Farmers' Federation supported some form of mutual conditions. Others were of a similar view. For example, the ACT Department of Territory and Municipal Services said:

> Encouraging self reliance may be enhanced by a mutual obligation approach to future drought assistance e.g. assistance measures will be dependent on the implementation of a business plan incorporating risk management strategies. (sub. 101)

Income support beneficiaries would have to develop a 'Mutual Responsibility Contract' specifying the actions that are to be taken to improve self-reliance. For most, the contract would require a household financial plan and/or a farm financial and business plan to, at least, indicate the sustainable earning potential of the farm business. For viable farmers this requirement would not be particularly onerous — most would have such plans already.

The contract would make allowance for particular farmers' circumstances and preferences. Hence, it could involve commitments to gain skills suited to earning off-farm income or participation in programs such as Landcare or those conducted by Catchment Management Authorities. To help farmers determine their future, assistance would be available to assess farm viability, for counselling, and to encourage the preparation of succession plans.

Assistance would be re-assessed every six months on the basis of compliance with conditions — including actions set out in the contract. Acquittal of payments against income earned would occur annually. To ensure that assistance did not become entrenched, assistance would be limited to three years out of every seven for a farm household. After that period, members of the household would no longer be eligible for assistance until they met the income, assets and activity requirements of other generally available income support programs.

The regular assessment of the farm's financial position in tandem with the time limit on the more generous asset threshold would encourage the owners of non-viable farms to investigate alternative management arrangements, such as leasing or sharefarming, or exiting the industry. For farmers wishing to leave the industry, access to counselling, training and advice would be available in conjunction with income support.

All farmers facing hardship should have access to a Farming Family Income Support scheme designed for farming circumstances. It would provide payments and have income eligibility thresholds at Newstart levels, subject to:

- ***an overall net asset cap, inclusive of the value of the farm house, beginning at $2 million with a taper to $3 million***
- ***a liquid asset sub-cap of $20 000 inclusive of bank balances and Farm Management Deposits balances.***

While the scheme should operate at the farm household level, eligibility and payments should be on an individual basis and conditional on:

- ***meeting the definition of a farmer, based on a similar test to that used currently for the Transitional Income Support scheme***

- ***seeking independent financial advice on the viability of the farming business***
- ***developing and carrying out a plan of action to improve household self-reliance***
- ***eligibility being reviewed, mutual responsibilities being met and plans updated every six months.***

The scheme should be limited to a maximum claim per farm household for three years out of every seven. The seven year period should commence from the date of receiving the first income support payment. Payments should be acquitted annually.

The Farming Family Income Support scheme should commence on 1 July 2009 in conjunction with programs to provide counselling, the recognition of prior learning and grants for training and professional advice.

Small Business Income Support

At present, agriculture-dependent small business operators based within or outside EC declared areas can apply for small business income support. The scheme was introduced with little justification in late 2006 and expanded in September 2007 to allow non-agriculture-dependent business operators to apply. It is scheduled to end in June 2009. Across Australia, other small businesses are not afforded such treatment — as evidenced by bankruptcies in any given year.

The scheme is intended to assist with living expenses, rather than business operating expenses. However, small business operators do not generally face the same constraints as farmers in accessing broader income support measures — they generally do not have such lumpy non-divisible assets; do not face the same difficulties in diversifying income; and are usually located in towns and so would be more able to meet program obligations, such as those that are required of Newstart recipients. Preferential access to income support for these small businesses is not justified.

Exceptional Circumstances small business income support should be terminated, subject to transition arrangements.

What about regional communities?

Some participants proposed that a rationale for drought assistance is that the injection of funds into regional areas helps communities retain a critical mass of

population and preserve their social fabric. Clearly, droughts can add to pressure for change, but the underlying long-term economic and social forces appear inexorable.

Over the last 100 years, small rural towns have felt the impact of bigger and better machinery, farm amalgamations and the reduced need for on-farm labour (see figure 2). Better roads and vehicles have made it easier for farmers to conduct their commerce in larger regional centres. Reliance on agriculture is falling in many rural areas relative to other economic activities. Growth from 'sea change' and 'tree change' is altering some rural profiles. Adding to this, climate projections indicate that current agricultural practices in some regions may not be sustainable.

Economic activity and industry fortunes will continue to wax and wane and the pattern of settlement will change regardless of intermittent funding tied to climatic events. Against this backdrop, the efficacy of using temporary drought relief as a regional development tool is most unlikely.

If governments are committed to supporting small towns per se, then more enduring regional development initiatives and policy consideration would be needed. In the short term, the Expert Social Panel cautioned:

> … state and territory governments must consider the unintended consequences of withdrawing services and infrastructure during periods of stress, such as dryness. The Panel is supportive of any Australian Government initiatives which will provide incentives to consider the social impact of decisions regarding the provision of rural services and infrastructure (for example, schools, school bus services and local hospitals). (Kenny et al. 2008)

Governments' attempts to achieve equitable access to a wide range of services can entail them devoting more resources to certain groups in the community. For example, governments often spend more per person on delivering equivalent services to people in rural and regional areas than people in major cities. While this can be appropriate, it is also important to consider the opportunity costs of maintaining services in the face of changing patterns of settlement.

Terminating the EC process and transition of current declared areas

The Commission's analysis concludes that an EC trigger is not an essential element of any future programs. When coupled with the inherent flaws in the declaration process itself, the Commission considers that the EC trigger should be dispensed with. In transitioning from the current arrangements to the new approach, however, there should be no sudden change to the arrangements in currently EC declared areas.

Under the Commission's recommendations, farm families in hardship could access income support, regardless of drought events, from 1 July 2009. But for areas still under declaration, ECRP recipients would continue to access assistance under much more favourable conditions than those available to the rest of the community. Similarly, current recipients of the ECIRS would continue to access unconditional funds, whereas farm businesses in non-declared areas could not. To mitigate the inequities that would inevitably arise between EC areas and non-declared areas, a dual stream regime should not run in parallel for longer than absolutely necessary.

However, given the high level of benefits flowing to some producers in EC areas, the pressure placed on assessments to extend EC status would be amplified. That process has been shown to lack transparency and to have been subject to manipulation. This also needs to be addressed.

The Exceptional Circumstances (EC) declaration process should be terminated. No new areas, full or interim, should be declared. Currently declared areas could have their EC status extended where they meet the criteria. To mitigate the inequities and costs of running two regimes in parallel:

- ***assessments and advice made by the National Rural Advisory Council on extension or revocation of EC declarations and the Minister's reasons for the subsequent decision should be made public***
- ***in areas that remain declared, only active recipients of EC assistance measures should be eligible to reapply, but enrolments for EC relief payments should cease once the Farming Family Income Support scheme commences***
- ***continuing recipients of EC interest rate subsidies should be subject to rigorous assessment including demonstration of appropriate financial and business management plans***
- ***continuing recipients of EC relief payments should be subject to similar case-management arrangements as those applying to recipients of the Farming Family Income Support scheme***
- ***an end date for all EC arrangements that provides sufficient time for a transition to the new arrangements should be pre-announced.***

Drought triggers — whether attempted to be defined as 'exceptional', 'extreme' or any other such variation — have proven to be a failure. They are not relevant to the formulation of programs aimed at developing self-reliance, preparedness and sustainability and there is no place for them in any future policy architecture.

The future policy framework

The Commission has argued for the termination of the EC declaration process and the various programs that it triggers. Yet, the rationale underlying most of the NDP's objectives are sound. Accordingly, the Commission considers that there is a case for extending the Commonwealth Government's Australia's Farming Future initiative to embrace risk management and climate variability more broadly.

The objectives of the Australia's Farming Future initiative should be revised and extended to the following:

- ***assist primary producers to adapt and adjust to the impacts of climate variability and climate change***
- ***encourage primary producers to adopt self-reliant approaches to managing risks***
- ***assist primary producers to manage greenhouse gas emissions and other adverse impacts on the environment***
- ***ensure that farming families in hardship have temporary access to an income support scheme that recognises the special circumstances of farmers.***

Measures to facilitate self-reliance and preparedness

Farmers in drought-declared areas who cope without support from EC programs generally have stronger natural and physical capital on their farms and greater financial and human capital to draw on. Governments have a role where market failures impede farmers building that capital, or where policy settings and programs inhibit its growth.

Research, development and extension

There are sound rationales for governments to assist farmers to build their capacity through funding for research, development and extension services. While governance structures of the Rural Research and Development Corporations (RRDCs) are reasonably sound, improvements to ensure that researchers, businesses and governments come together and disseminate information can improve outcomes further.

Given the projected climate outlook, sufficient funding needs to be directed to agricultural research, seasonal forecasting, and development and extension activities designed to improve risk management for climate variation and change.

Agricultural extension services and their delivery have changed markedly from the era of linear, top-down advice on how to improve yields and apply fertiliser and pesticides. There is now more private sector delivery, use of fees for service and more emphasis on information flows and stakeholder participation. Whatever the format, there need to be effective two-way links between researchers and farmers.

Public investment in agricultural R&D to manage climate variability and climate change should be pursued such that:

- programs are subject to monitoring and evaluation to ensure funds are expended where there are net public benefits — where research provides private benefits, contributions from beneficiaries should be required
- excessive use of short-term funding arrangements is avoided because it hinders effective relationships developing between researchers and primary producers
- there is integration with extension services to ensure researchers are aware of farmers' priorities and farmers are able to appropriately adopt new practices
- funding is channelled through a few well functioning institutions (such as several of the RRDCs and Co-operative Research Centres rather than having multiple funding pools.

Significant public funding should be directed to research, development and extension to assist farmers prepare for, manage, and recover from the impacts of climate variability and change.

Information and advice

With the increasing complexity of farming, farmers need more than public advice, information and extension services. Indeed, the largest 30 per cent of farms that generate most of Australia's output 'buy in', often multiple, forms of advice — agronomic, business, financial and marketing. At the other end of the spectrum, however, many small and middle tier farmers do not seek much outside advice.

The Rural Financial Counselling Service (RFCS) can meet a need for objective information in some areas. For its clients, the RFCS provides information, acts as a referral point for other services and helps clients unable to pay for financial and other advice services.

The largely private benefits from financial counselling suggest that the rationale for government provision is weak. The Expert Social Panel recommended that the role played by the rural financial counsellors be reviewed 'as soon as practical'. The Commission concurs, but acknowledges that the RFCS is moving to a new case management approach with funding to 2011.

The Rural Financial Counselling Service program should be reviewed prior to the end of its current funding. The review should assess whether the program delivers net benefits to the community and, in doing so, examine:

- ***the extent to which alternative sources of information are lacking in certain areas***
- ***whether counsellors refer their clients to relevant services in a timely and effective manner***
- ***the future role of the service in view of the wide ranging case management options under the Farming Family Income Support scheme.***

Professional Advice and Planning Grants of up to $5500 allow farm businesses to obtain professional advice for drought management and recovery. The grants, which are only available in EC declared areas, have helped some farmers manage for, and recover from, drought. Nevertheless, there are better ways to meet educational and training needs than through reactive support based on drought boundaries.

Exceptional Circumstances professional advice and planning grants should be terminated, subject to transition arrangements.

Education and training

The FarmReady (and former FarmBis) programs provide financial assistance to primary producers and rural land managers to undertake business and natural resource management training and education activities. FarmBis was strongly endorsed across the agricultural community on the basis that the financial and business training had led to improved drought preparedness.

Grants for business training and professional advice that are well targeted and have an educational outcome are likely to provide private and broader community benefits. A continuous learning program for farmers can provide a mix of public and private benefits. The more specific the training is to a particular farmer's circumstances, the more likely it is that they would choose to undertake the training without government funding. In these circumstances, a co-contribution would mean that recipients would have a greater stake in the outcomes of education and training activities and would be more likely to ensure that training met their needs. The most successful elements of FarmBis should be brought within FarmReady in a strengthened program.

Significant public funding should be directed to a continuous learning program, incorporating the successful elements of the former FarmBis within an enhanced FarmReady platform. The revised program should encompass advice and training

for managing climate variability and for farm business management. Funding should be provided in the form of a subsidy which covers a proportion of the cost of training, with the recipient contributing the balance.

Farm Management Deposits

The Farm Management Deposits (FMD) scheme enables individual farmers to deposit up to $400 000 of pre-tax income into an FMD for later withdrawal. The scheme plays a positive role in encouraging self-reliance and preparedness.

Some of the criticisms of FMDs revolve around their evident use for tax deferral and tax saving, particularly given that an income tax averaging scheme for farmers already exists. Nonetheless, FMDs may contribute to tax equity, especially for the minority of farmers who do not practise tax averaging.

More importantly, evidence points to FMDs encouraging farmers to save for periods of low income (such as drought) and for recovery (such as replanting and restocking). While the aggregate level of FMD holdings could suggest that they are not being drawn down in drought periods, the sectoral data indicate that the pattern of deposits and withdrawals is generally consistent with preparedness for, and recovery after, drought events.

FMDs do not generate the perverse incentives and outcomes for resource use decisions that are characteristic of other government business assistance (such as interest rate and transport subsidies). FMDs are therefore likely to be a more efficient means of encouraging financial self-reliance than some other measures.

Some participants called for an increase in the cap on funds that could be held in an FMD and/or submitted that other forms of farm structures should have access to the scheme. The Commission found no compelling case for either of these proposals.

The Farm Management Deposits scheme should be retained with its current cap of $400 000 and no widening of its eligibility criteria.

Making the transition

The Commission's recommendations are consistent with the findings and recommendations of previous reports to government on drought. That such recommendations have not been adopted, or followed only briefly, highlights that the potential benefits of the recommended policy approach will be realised only if there is confidence that it will be consistently applied. Progress will be undermined

if there is an expectation that governments will revert to providing reactive support when droughts recur. To date, such expectations have proved well-founded.

Following reaction to the draft report, the Commission has come to the view that there is a strong case for an intergovernmental agreement (IGA) that embodies a systematic assessment of compliance. The principle arguments for this are: the benefits on offer from reform; the adverse consequences of reverting to past policy stances; and the benefits from policy coordination between Commonwealth, state and territory governments.

The Commonwealth, state and territory governments should enter into an intergovernmental agreement linking Commonwealth funding to the states and territories to a range of commitments. These commitments should include:

- ***ensuring policies and instruments are compatible with the extended objectives of the Australia's Farming Future initiative***
- ***avoiding the use of reactive business assistance measures such as interest rate subsidies and other transactions-based subsidies, including waivers for legitimate business expenses***
- ***ensuring that if assistance is provided to farm businesses rather than farm households, it is conditional on an assessment of whether the farm will be self-supporting in the longer term and be directed to reinforcing longer term capacity building.***

The disbursement of funds linked to an intergovernmental agreement should be dependent on an arms-length evaluation of the extent to which the parties have met their agreed commitments. The agreement should be established, and independent monitoring and assessments undertaken, at the Council of Australian Governments level.

The quantum of funds that should be linked to any IGA is properly a function of governments to determine, taking into account commitments entered into and the relative roles and responsibilities ascribed to the Commonwealth, state and territory governments.

A further new pool of dedicated incentive payments for an IGA would not be required. Conditional commitments could be tied to the funds identified as necessary to meet the specified objectives of the new suite of programs aimed at improving farmers' self-reliance and preparedness. Past expenditures — especially the peak expenditures of recent years — are not a relevant basis for ascertaining future funding needs for refocused programs. State and territory governments also provide significant drought-related expenditures, some of which are inconsistent with the new policy framework. Terminating such programs would liberate state

funds that could be used for more appropriate programs. This is part of the overall funding calculus and leaves open the possibility of an IGA with some matching funding components.

The Commission's recommendations refocus drought policy on the broader issue of climate variability and change. Within this revised framework, the Commission has proposed removing impediments to self-reliance and preparedness and providing support to better equip farmers to deal with climate and other risks. The removal of reactive drought-triggered measures (such as the ECIRS) which impede the development of private arrangements for risk sharing will encourage alternative forms of farm business activity — such as sharefarming or leasing. More generally, it will improve the self-reliance and preparedness of the current population of farmers. Those who are unwilling or unable to accept these risks may be more likely to exit and, importantly, less likely to enter farming in the first place.

In terms of building financial capital, FMDs will become more attractive in this changed risk management environment. Further, incorporating the most successful elements of FarmBis into an enhanced FarmReady scheme will improve the human capital of the lower to middle tiers of farmers. The linkages between continuous learning and agricultural research and development will be enhanced by significant funding initiatives. These measures focus on the achievement of the policy objectives proposed for the Australia's Farming Future initiative. Figure 8 summarises the nature and timing of the proposed changes.

The broader policy context

Agricultural policy must be developed and managed within the context of economy-wide policy frameworks (figure 9). The new objectives that the Commission has proposed for Australia's Farming Future focus on the centre ring of the figure. But, as many participants properly pointed out, there are concerns about the uncoordinated impacts of other government policy 'silos'.

While it would not be appropriate to redefine other policies in the context of this inquiry, the Commission notes that disparate policy areas including water, natural resource management and climate change all impact on the agricultural sector.

Irrigators, in particular, stressed the interactions between water and other policies — from state water trading rules to local land use and zoning regulations — and drought policy. For example, water trading has presented some farmers with greater financial and production options during drought, while allowing water to move to higher value uses. Yet these options can be constrained by barriers to water trades, the imposition of exit fees and the time taken to process interstate trades. EC

programs have also supported some farmers who may otherwise have exited, allowing them to retain water for irrigation or to purchase more water than they otherwise would have. And, where governments subsidise preparedness measures, such as farm dams, this can benefit one farmer at the expense of others where on-farm water capture reduces run-off.

Figure 8 **Current and proposed arrangements**

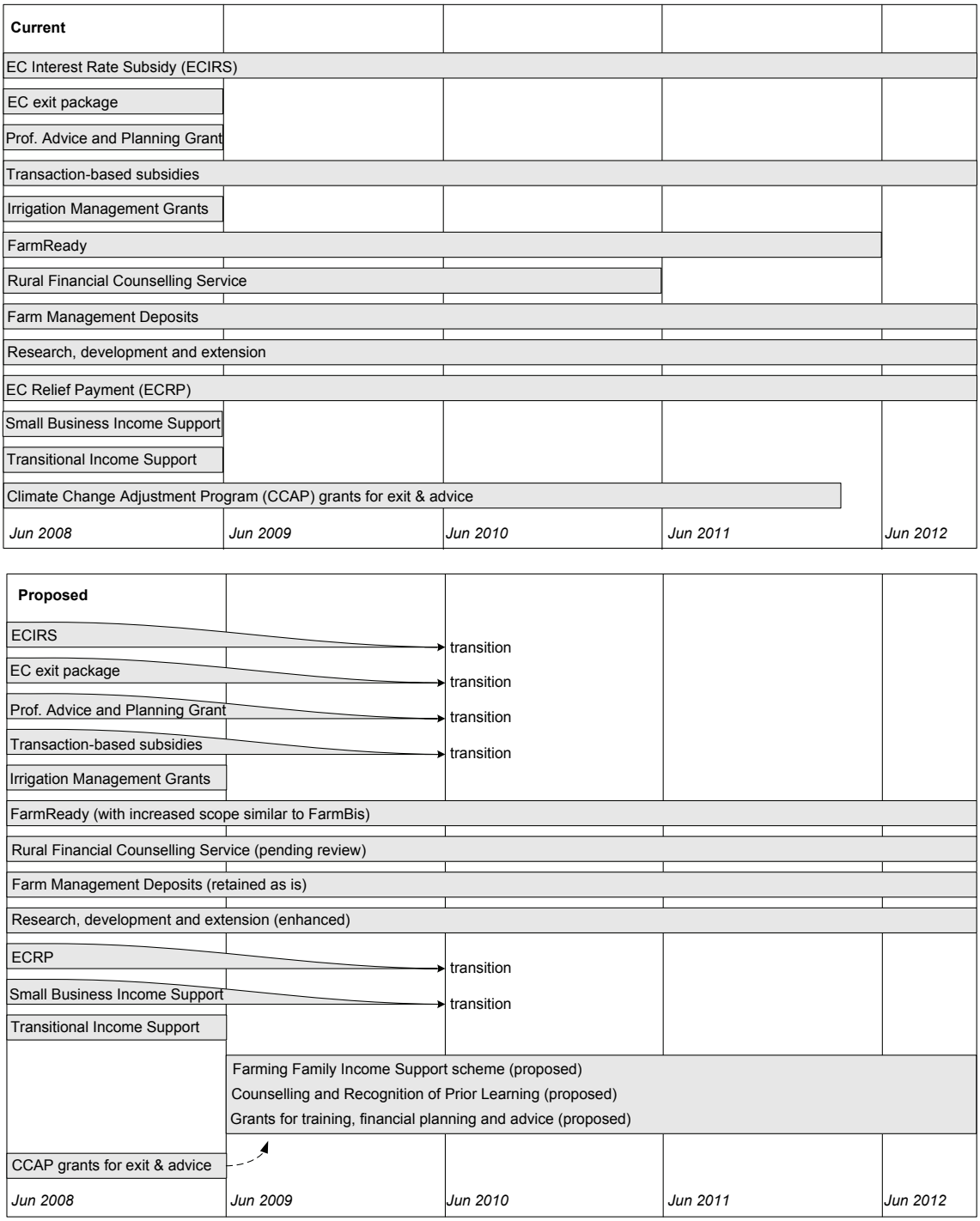
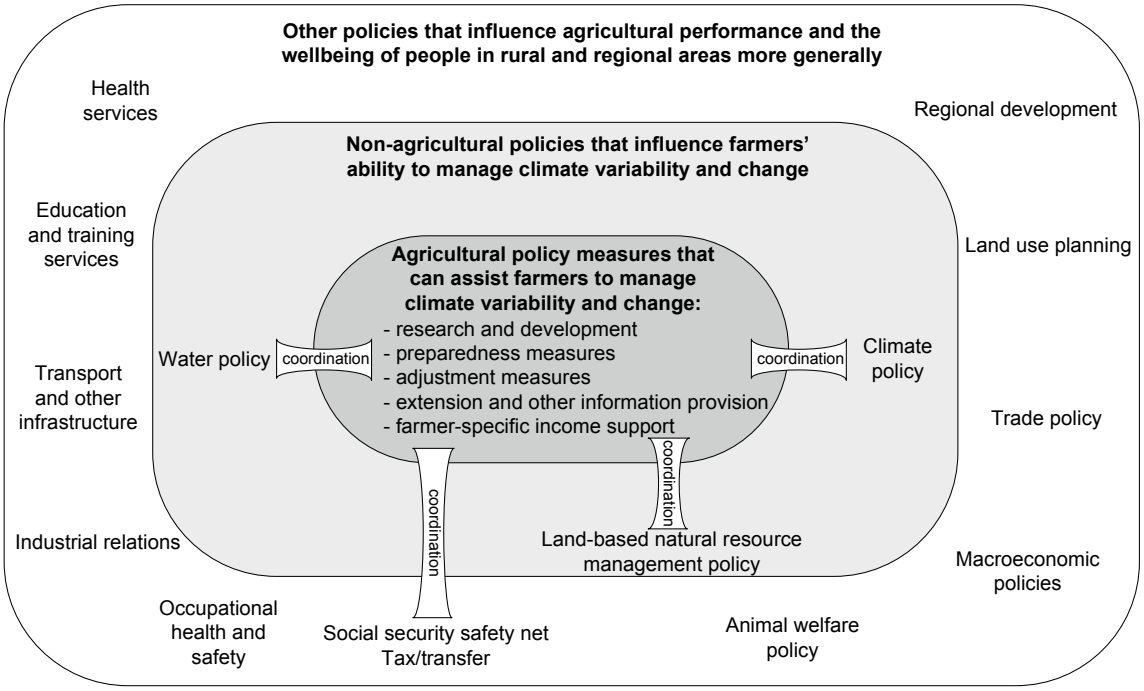


Figure 9 **Policy elements of a new approach**



Natural resource management policies is another area that can either ameliorate or exacerbate environmental damage from drought. To this policy mix must be added the potential impacts on farmers of the impending Carbon Pollution Reduction scheme.

A self-reliant and prepared farming sector that is well placed to manage risks will benefit farmers, farm businesses and rural communities. Achieving this outcome, however, will require a degree of policy coordination that is not yet evident. Currently, different polices are providing signals and incentives that are potentially conflicting, or worse still, clearly at cross-purposes. Jurisdictional variations add another layer of complexity to this. Better communication, coordination and in some cases integration, between policy areas is needed.

Recommendations

Drought-triggered programs for farm businesses

RECOMMENDATION 6.3

Exceptional Circumstances interest rate subsidies should be terminated, subject to transition arrangements.

RECOMMENDATION 6.4

The Exceptional Circumstances exit package should be terminated, subject to transition arrangements. The Re-establishment grants that are provided under the Australia's Farming Future initiative should similarly end.

RECOMMENDATION 6.5

The appropriateness, effectiveness and efficiency of the Small Block Irrigators Exit Grant package should be evaluated following its conclusion.

RECOMMENDATION 6.6

States and territories should, as previously agreed, terminate transactions-based subsidies.

RECOMMENDATION 6.8

The Murray-Darling Basin Irrigation Management Grants program should conclude, as scheduled, on 30 June 2009.

Income support for farm and farm-related households

RECOMMENDATION 6.1

Exceptional Circumstances relief payments should be replaced, subject to transition arrangements.

RECOMMENDATION 6.2

Exceptional Circumstances small business income support should be terminated, subject to transition arrangements.

RECOMMENDATION 9.1

All farmers facing hardship should have access to a Farming Family Income Support scheme designed for farming circumstances. It would provide payments and have income eligibility thresholds at Newstart levels, subject to:

- ***an overall net asset cap, inclusive of the value of the farm house, beginning at $2 million with a taper to $3 million***
- ***a liquid asset sub-cap of $20 000 inclusive of bank balances and Farm Management Deposits balances.***

While the scheme should operate at the farm household level, eligibility and payments should be on an individual basis and conditional on:

- ***meeting the definition of a farmer, based on a similar test to that used currently for the Transitional Income Support scheme***
- ***seeking independent financial advice on the viability of the farming business***
- ***developing and carrying out a plan of action to improve household self-reliance***
- ***eligibility being reviewed, mutual responsibilities being met and plans updated every six months.***

The scheme should be limited to a maximum claim per farm household for three years out of every seven. The seven year period should commence from the date of receiving the first income support payment. Payments should be acquitted annually.

The Farming Family Income Support scheme should commence on 1 July 2009 in conjunction with programs to provide counselling, the recognition of prior learning and grants for training and professional advice.

Transition from the drought-triggered framework

RECOMMENDATION 11.1

The Exceptional Circumstances (EC) declaration process should be terminated. No new areas, full or interim, should be declared. Currently declared areas could have their EC status extended where they meet the criteria. To mitigate the inequities and costs of running two regimes in parallel:

- ***assessments and advice made by the National Rural Advisory Council on extension or revocation of EC declarations and the Minister's reasons for the subsequent decision should be made public***
- ***in areas that remain declared, only active recipients of EC assistance measures should be eligible to reapply, but enrolments for EC relief payments should cease once the Farming Family Income Support scheme commences***
- ***continuing recipients of EC interest rate subsidies should be subject to rigorous assessment including demonstration of appropriate financial and business management plans***
- ***continuing recipients of EC relief payments should be subject to similar case-management arrangements as those applying to recipients of the Farming Family Income Support scheme***
- ***an end date for all EC arrangements that provides sufficient time for a transition to the new arrangements should be pre-announced.***

New policy framework for self-reliance and preparedness

RECOMMENDATION 7.1

The objectives of the Australia's Farming Future initiative should be revised and extended to the following:

- ***assist primary producers to adapt and adjust to the impacts of climate variability and climate change***
- ***encourage primary producers to adopt self-reliant approaches to managing risks***
- ***assist primary producers to manage greenhouse gas emissions and other adverse impacts on the environment***
- ***ensure that farming families in hardship have temporary access to an income support scheme that recognises the special circumstances of farmers.***

RECOMMENDATION 8.1

Significant public funding should be directed to research, development and extension to assist farmers prepare for, manage, and recover from the impacts of climate variability and change.

RECOMMENDATION 8.2

The Rural Financial Counselling Service program should be reviewed prior to the end of its current funding. The review should assess whether the program delivers net benefits to the community and, in doing so, examine:

- ***the extent to which alternative sources of information are lacking in certain areas***
- ***whether counsellors refer their clients to relevant services in a timely and effective manner***
- ***the future role of the service in view of the wide ranging case management options under the Farming Family Income Support scheme.***

RECOMMENDATION 6.7

Exceptional Circumstances professional advice and planning grants should be terminated, subject to transition arrangements.

RECOMMENDATION 8.3

Significant public funding should be directed to a continuous learning program, incorporating the successful elements of the former FarmBis within an enhanced FarmReady platform. The revised program should encompass advice and training for managing climate variability and for farm business management. Funding should be provided in the form of a subsidy which covers a proportion of the cost of training, with the recipient contributing the balance.

RECOMMENDATION 8.4

The Farm Management Deposits scheme should be retained with its current cap of $400 000 and no widening of its eligibility criteria.

Intergovernmental cooperation

RECOMMENDATION 11.2

The Commonwealth, state and territory governments should enter into an intergovernmental agreement linking Commonwealth funding to the states and territories to a range of commitments. These commitments should include:

- ***ensuring policies and instruments are compatible with the extended objectives of the Australia's Farming Future initiative***
- ***avoiding the use of reactive business assistance measures such as interest rate subsidies and other transactions-based subsidies, including waivers for legitimate business expenses***
- ***ensuring that if assistance is provided to farm businesses rather than farm households, it is conditional on an assessment of whether the farm will be self-supporting in the longer term and be directed to reinforcing longer term capacity building.***

The disbursement of funds linked to an intergovernmental agreement should be dependent on an arms-length evaluation of the extent to which the parties have met their agreed commitments. The agreement should be established, and independent monitoring and assessments undertaken, at the Council of Australian Governments level.

1 Introduction

Key points

- The latest drought has been severe and prolonged in many parts of Australia but such events are not new in the history of dryland farming. In contrast, the irrigation drought over the last three years in the Murray Darling Basin has been unprecedented. In the future, most expert predictions are that agricultural regions will experience increased temperatures and, for some, more frequent periods of very low rainfall.
- Drought policy has shifted from natural disaster management to a recognition that drought is a normal feature of Australia's climatic variability.
- Australian ministers for primary industries consider that current policy settings are no longer the most appropriate in the context of a changing climate. There are concerns about the extent of areas declared as being in exceptional circumstances and the duration of declarations in the latest drought period, and about the effectiveness and efficiency of current government programs in response.
- This inquiry is one of three studies contributing to a review of drought policy. The other two are a scientific assessment of the changing climate and its relevance to drought policy, and a report on the social and community impacts of drought by an expert panel.
- The Commission's report draws on the findings of these other two studies and addresses:
  - current business and income support measures
  - impediments to improving self-reliance and preparedness
  - the role that should be played by governments.

1.1 Drought policy — a continuing evolution

What constitutes a drought may seem readily apparent. But in fact it is difficult to disentangle a confluence of factors — for example: the quantity, location and timing of rainfall and runoff; temperature, evaporation and soil moisture; water storages and allocations; commodity prices and input costs; land values and equity levels; off-farm diversification and so on.

Drought is a recurring feature of Australia's variable climate. However, the latest drought has been one of the three most severe and prolonged in the last one hundred

years. For example, in relation to the Murray Darling Basin (MDB) the Bureau of Meteorology (BoM) considers that in terms of rainfall, 'the post 2001 period, the 1937–1946 period and the 1895–1903 period (the "Federation Drought") are essentially indistinguishable in broad terms' (BoM 2008, p. 2).

Early last century, government drought policy centred on the construction of irrigation infrastructure in an attempt to 'drought proof' farms. Subsequently, a policy approach developed that saw drought treated as a natural disaster and in 1971, drought was incorporated under joint Commonwealth-State Natural Disaster Relief Arrangements (NDRA). In 1989, however, the Commonwealth decided to remove drought from the NDRA and commissioned a review of drought policy that found that drought support was poorly targeted and worked against farmers becoming self-reliant. The review recommended that a new national drought policy be developed (McInnes et al. 1990).

The National Drought Policy (NDP), announced in 1992, was based on the recognition of the recurrence of droughts in Australia. Farmers were expected to assume responsibility for managing drought risks, with the role of government being to provide an environment conducive to promoting self-reliance. Nevertheless, provision was made to assist those farmers with sound prospects who were temporarily experiencing financial difficulty during abnormally severe droughts. That is, the NDP made a distinction between normal droughts and 'exceptional circumstances' (EC) — rare events that do not occur more than once on average in every 20 to 25 years. That policy framework continues today (box 1.1).

However, subsequent policy reviews (*Review of the National Drought Policy* (Matthews et al. 1997), *Rural Adjustment – Managing Change* (McColl et al. 1997), *Consultations on National Drought Policy* (Drought Review Panel 2004), and *Creating our Future: Agriculture and Food Policy for the Next Generation* (Agriculture and Food Policy Reference Group 2006)) have all found that the actual drought assistance programs implemented by governments have been incompatible with the NDP objective of promoting farmers' self-reliance.

Despite endeavours to establish a stable and credible foundation for drought policy, prolonged dry conditions have prompted various ad hoc changes to the design of the programs. For example, in response to the latest drought, new initiatives and modifications to existing measures have been introduced — including interim assistance arrangements, EC buffer zones, new forms of grants and transport subsidies. Some of these measures are only tenuously related to the agreed NDP objectives and others revisit approaches previously found wanting, such as the distortionary subsidies for the transport of fodder and livestock.

Box 1.1 **The NDP and 'exceptional circumstances'**

The objectives of the NDP are to:

- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches to managing for climatic variability
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress
- ensure early recovery of agricultural and rural industries, consistent with long-term sustainable levels. (Crean 1992)

While self-reliance is a key objective, the NDP allows for short term drought assistance where there are rare and severe drought events — exceptional circumstances (EC) — that are beyond the ability of even the most prudent farmer to manage.

To be classified as an EC event, the event:

- must be ***rare***, that is, it must not have occurred more than once on average in every 20 to 25 years
- must result in a ***rare*** and ***severe*** downturn in farm income over a prolonged period of time (e.g. greater than 12 months), and
- must be a discrete event that is not part of long-term structural adjustment processes or normal fluctuations in commodity prices. (DAFF 2008e)

As the New South Wales Government submitted:

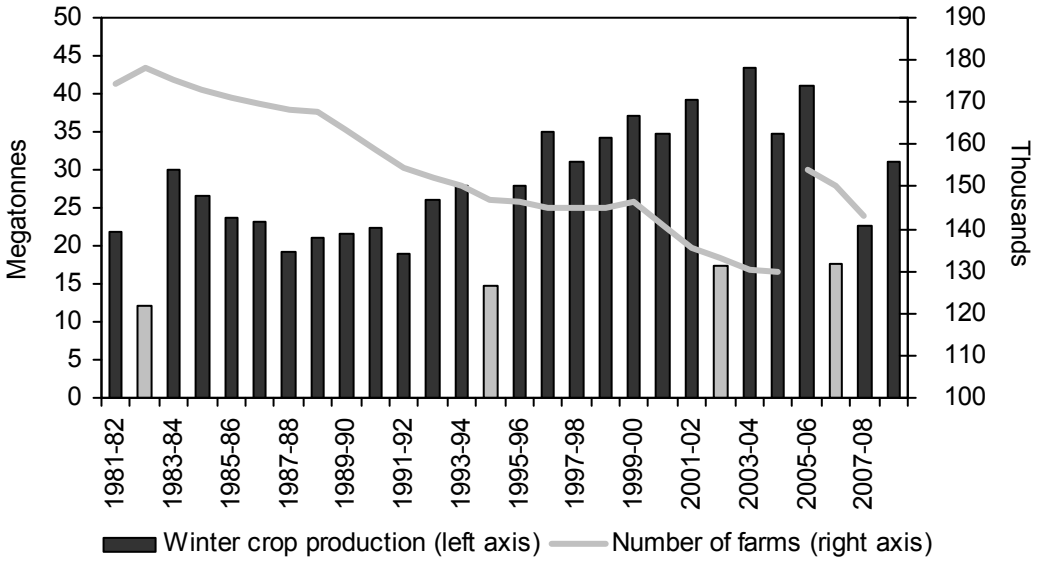
> The NDP approached drought as a foreseeable business risk for Australian farmers, and focused on helping farmers to assess, manage and mitigate this risk. Since then, both Commonwealth and State drought programs have been modified by increasing the availability of welfare to drought-affected farmers, loosening eligibility criteria for assistance, and continuing or reinstating State transaction-based farmer subsidies that had previously been ceased. These changes may have slowed the NDP's drive towards a preparedness and risk management approach to drought. (sub. 90, p. 1)

This inquiry provides another opportunity to address the uneasy nexus between policy intent and governments' reactions when droughts occur. It also enables an examination of the relationship between drought policy, rural adjustment, and greater productivity in agriculture.

The impact of the more recent droughts of 1982-83, 1994-95, 2002-03 and 2006-07 on winter crop production are demonstrated in figure 1.1. But that figure also shows an increasing, but variable, winter crop output over time (as influenced by natural climate variability and improving farm productivity) and continuing adjustment (declining farm numbers). How government drought policies impinge on long term adjustment across the range of agricultural industries is a critical issue.

Figure 1.1 **Drought policy and adjustment in agriculture, 1981-82 to 2008-09[ab]**

Broadacre production



[a] Comparable time series data on farm numbers are not available after 2004-05. See chapter 2 for details. [b] 2008-09 is an ABARE forecast.

Data sources: ABARE (2008a); ABARE (2008d); ABS (*Principle Agricultural Commodities, Australia, Preliminary, 2007-08*, Cat. no. 7111.0).

Inherent climate variability and climate change

As noted in box 1.1, the NDP allows for the provision of assistance in circumstances of 'exceptional' events. In practice, in recent years, a significant proportion of Australia has been declared as experiencing EC. As at January 2009, some areas had been declared as experiencing EC for 14 of the past 17 years.

This is the first time, however, that Australia has experienced a widespread 'irrigation drought'. There had been an expectation that most irrigation districts were drought proof, but the substantially lower inflows into the MDB, coupled with a significant over-allocation of water resources and reduced runoff, have resulted in severely reduced water allocations for many producers.

The climate change outlook prepared by BoM and CSIRO (Hennessy et al. 2008) reports that:

- the extent and frequency of exceptionally hot years have been increasing and are projected to continue, with exceptionally hot years likely to occur every 1-2 years, on average, over the period 2010–2040

- while trends in rainfall are highly dependent on the period of analysis due to large inter-decadal variability, exceptionally low rainfall years are projected to become more frequent in southwest Western Australia, the South Australian agricultural region, Victoria and Tasmania
- exceptionally low soil moisture is projected to become more frequent in line with the projected increase in exceptionally low rainfall years.

Given this outlook for agriculture, the need for government programs to encourage and assist self-reliance and preparedness is accentuated.

1.2 The national review of drought policy

The Primary Industries Ministerial Forum in February 2008 (PIMF 2008a) and the subsequent meeting of the Primary Industries Ministerial Council in April 2008 (PIMC 2008) identified the need to reform drought policy. Australian primary industries ministers agreed that current approaches to drought and EC are no longer the most appropriate and that drought policy must be improved to create an environment of self-reliance and preparedness and encourage the adoption of appropriate climate change management practices.

Subsequently, the Minister for Agriculture, Fisheries and Forestry stated that:

> The band of climate variation is shifting … confirmed by a growing body of credible science … Against this background, the government believes that it is time for Australia's farming community and rural policy makers to reconsider the meaning of EC for the future.
>
> By undertaking reform to drought policy now, we can help farmers to adapt and respond to climate change, as well as develop closer links between the objectives of drought policy and the challenges of climate change. (Burke 2008c, pp. 4–5)

The Commission's public inquiry into government arrangements for drought support is one of three studies that constitute the Commonwealth Government's national review of drought policy, with the other two comprising:

- the assessment by the BoM–CSIRO of what a changing climate means for drought in Australia (Hennessy et al. 2008)
- an expert panel's assessment of the impacts associated with drought (Kenny et al. 2008).

This report draws on the results of these two studies, together with the Commission's own analysis of the material presented to it, to provide a comprehensive assessment of the economic, social and environmental dimensions of rural self-reliance and preparedness.

What the Commission is tasked with

In relation to farmers, farm businesses and farm dependent rural small businesses, the terms of reference request the Commission to:

- report on the appropriateness, effectiveness and efficiency of governments' business and income support measures to help manage drought
- identify impediments to improving self-reliance and preparedness for periods of financial difficulty
- identify the most appropriate, effective and efficient responses by governments to build self-reliance and preparedness to manage drought.

In undertaking the inquiry the Commission is to:

- report on the impact that the provision of drought support has on performance and productivity at the individual, business, industry, regional and state levels
- draw lessons from the range of support measures that are broadly available to the Australian community
- take into consideration the objectives of the NDP and the Commonwealth Government's Expenditure Review Principles.

The terms of reference (TOR) are at the front of this report.

1.3 Contextual matters

The TOR refer to three classes of recipients (farmers, farm businesses and farm dependent rural small businesses), at least eight policy measures (EC relief payments, EC interest rate subsidies, exit assistance, farm management deposits, professional advice and planning grants, irrigation management grants and rate rebate schemes) and three assessment criteria (appropriateness, effectiveness and efficiency). Further, the TOR request the Commission to report on the impact of drought support on 'performance and productivity' at five levels (individual, business, industry, region and state).

A systematic matrix-based approach to the TOR would involve 72 permutations for the five levels. Such a formalised analysis would be infeasible in the allotted time and unnecessarily complex in presentation. Accordingly, while the Commission has examined all of the identified matters throughout this report, it has focused primarily on:

- drought support measures in relation to their:
  - welfare impacts on farmers and farm households
  - economic impacts on farm (and farm-related) businesses

- impediments to the rural sector improving self-reliance and preparedness for times of financial difficulty
- the role that governments should play in facilitating that improvement.

This focus is also consistent with the Commission's economy-wide remit as specified in its enabling legislation. Among other matters, the Commission must have regard to improving the overall performance of the economy in order to achieve higher living standards for all members of the Australian community.

The following sub-sections discuss key terms and concepts specified in the TOR.

Appropriateness, effectiveness and efficiency

Appropriateness, effectiveness and efficiency appear in the TOR in relation to current and future drought support measures.

In simple terms, policy measures and initiatives should be:

- appropriate — based on sound economic and/or social rationales
- effective — achieve the government's (ideally, appropriate) objectives without unintended consequences
- efficient — provide targeted support that achieves the greatest positive net benefit.

It is self-evident that policy objectives should be appropriate, albeit that an inappropriate objective could still be met effectively. However, appropriate objectives will not be met if the measures chosen to pursue them are ineffective, or will be met at a higher cost than necessary if the measures are inefficient.

Self-reliance and preparedness

Governments place a high priority on farmers and their communities achieving self-reliance over the long term and preparedness for periods of financial difficulty. These terms are often used interchangeably. For example, having sources of off-farm income as a diversification strategy could be regarded as: increasing self-reliance; increasing preparedness for drought; a risk-management strategy; or even a reactive response once a drought event has commenced. While the latter response may not constitute ex ante preparedness, it could reflect a management approach of devoting resources to on-farm activities until it is necessary to do otherwise.

An expression of self-reliance was presented in the 1990 drought policy review which emphasised the respective roles for agricultural producers and governments:

> … self-reliance recognises the primary responsibility of individual producers for the commercial performance of their enterprises and for ensuring agricultural activity is carried out in an economically and environmentally responsible manner.
>
> This concept also recognises that governments should not intervene to distort market prices or outputs. Government policy must work within the confines of the marketplace, by removing distortions or disincentives to appropriate activities, and by providing positive incentives where markets fail to provide sufficient inducements to act in the community interest. (McInnes et. al. 1990, vol. 1, p. 9)

Typically, preparedness is understood as the ability of farmers and farm businesses to develop strategies to enable them to prepare for, manage, and recover from, drought. This includes building a strong capital base in terms of the farm's natural resources and infrastructure, and the business' balance sheet in good years, to be able to withstand poor years, as well as enhancing the farmer's skills.

A common element of both self-reliance and preparedness is risk management. Business risks can arise on several fronts — shifts in farmers' terms of trade, changes by competitors, climate variability and natural disasters. Such risks are fundamental aspects of the business of farming. Risk management is a systematic process of identifying and evaluating risks, what can be done to prevent them eventuating and how to deal with them if they arise.

As noted by the McColl review:

> A range of mechanisms are available to handle many aspects of risk. These include on-farm practices such as changing production mixes and the use of meteorological forecasting instruments, and off-farm measures such as price hedging, fixing, capping or collaring interest rates, use of insurance and employing instruments to smooth income …
>
> There are impediments to the uptake of some of these approaches both on- and off-farm. Many of them add to the complexity of the management task. Furthermore, government intervention in the past, particularly in marketing and adjustment, has limited the development of risk management instruments and raised expectations that assistance would be available from governments in times of difficulty. (McColl et al. 1997, p. 12)

Improved risk management strategies can enhance the capability of farm businesses to withstand adverse shocks, thereby increasing self-reliance.

Expenditure review principles

The terms of reference require the Commission to take into consideration the Commonwealth Government's Expenditure Review Principles. There is no public enunciation of those principles.

Policy interfaces

Several participants in this inquiry have raised concerns about the multiple and sometimes uncoordinated impacts of government policy 'silos'. Irrigators, in particular, stressed the need to be cognisant of the interactions and potential tensions between water policy and drought policy.

There are several policy areas that interact with drought policy, including:

- water reform — for example, rules governing water allocation and trading, or investment in infrastructure improvement
- climate change — for example, adaptation and mitigation (such as the proposed carbon pollution reduction scheme)
- natural resource management — for example, land clearing, soil erosion, salinity, native vegetation and feral pest control
- taxation — for example, fuel excise, income tax averaging, and managed investment schemes
- innovation — for example, the provision of public funding for research and development and extension services
- animal welfare — for example, the condition of livestock when water and feed are scarce and during transport
- social policies — for example, the provision of mental health resources
- regional development — for example, population distribution, horizontal fiscal equalisation and the provision of services in regional areas.

Many of these policy interfaces are raised throughout this report, but it would be inappropriate to attempt to redefine any of the above policies solely on the findings of this review.

1.4 The draft report process

The Commission released its draft report into Government Drought Support (PC 2008a) for public comment on 30 October 2008. To prepare the draft report, the Commission consulted widely with government departments, agricultural producer

organisations, individual farmers, regional councils, agribusinesses, small business owners, and social and community groups (appendix A). Roundtables were held throughout rural Australia and visits and consultations covered cropping, sheep, beef, dairy, pork, horticulture, viticulture and mixed farming operations spanning reliable and marginal regions (rainfall dependent and irrigated) operating on both freehold and leasehold land. The scale of operations ranges from vast pastoral properties to extensive broadacre operations in the Western Australian wheatbelt and down to smaller scale 'blockies' in the Riverland. In all, the Commission held meetings in 31 towns and cities around Australia and received 107 submissions prior to releasing the draft report.

In the draft report, the Commission found that, when measured against policy objectives relating to self-reliance, preparedness and climate change management, current government-funded drought support programs have many shortcomings. To address these shortcomings, the Commission made many proposals. The two key directions proposed were that:

- governments should refocus their farm business support programs to help farmers through research, development, extension, professional advice and business management training, all of which can help build self-reliance and preparedness
- all farm families facing hardship, not just those in EC areas, should have access to temporary income support through a scheme designed for farming circumstances.

Responses to the draft report

Ministers with responsibility for primary industries met in Canberra on 12 November 2008 to discuss options for improving drought policy. They considered the BoM-CSIRO climate outlook, the Expert Panel's report on the social impacts of drought and the Commission's draft report.

The Ministers noted that all three assessments indicated that governments need to refocus drought programs to support early investment in preparing for the social, environmental and economic impacts of drought and climate change. Accordingly, the Ministers agreed to the following principles for the further development of drought reforms:

- There should no longer be Exceptional Circumstances (EC) declarations or 'lines on maps'. Instead, governments should focus on addressing the specific needs of farming families, farming businesses and farming communities.
- Future farm family welfare assistance should require a level of mutual responsibility.

- Government farm business support should assist farming businesses plan and prepare for the future. Farm business support will be based on a willingness by those businesses to prepare for the impacts of drought and climate change.
- For access to the income support system, farming families should have a temporary period of exemption from the normal assets tests for farm assets but otherwise receive the same access rights as the wider community.
- Government policies and programs should support farming communities to prepare for drought and enhance their long term sustainability and resilience.
- Acknowledgement that drought is just one of a number of hardships that can adversely impact farmers.
- Recognition of the important role of farmers as the nation's food producers. (PIMF 2008b)

At that meeting, Ministers also reaffirmed that the EC rules will not change for those producers currently receiving assistance in existing EC-declared areas.

The Commission sought public input on all aspects of its draft report. To this end, it conducted an extensive range of regional roundtables and public hearings to directly elicit individual and organisational responses to its draft proposals (appendix A). In addition to the 107 submissions received prior releasing the draft report, a further 81 submissions responded to the draft report (appendix A).

All of the evidence taken at the public hearings and regional roundtables, together with the submissions, have been taken into account in the preparation of this final report.

1.5 Outline of the report

This report comprises three parts: the background (chapters 1–3); the Commission's analysis of current drought support programs (chapters 4–6); and the future policy direction (chapters 7–11).

Background

To evaluate drought support measures, it is necessary to understand drought policy against the backdrop of longer term influences impacting on rural and regional Australia. Changes to the agricultural sector, the composition of rural and regional Australia and non-policy related influences on farmers' self-reliance and preparedness are discussed in chapter 2. What constitutes drought is addressed in chapter 3, which explores how the economic and social implications of drought are

manifested. Environmental aspects of drought and the implications of the prognosis for climate change are also considered.

Analysis of current drought support policies and programs

The evolution of drought policy and the respective roles of the Commonwealth and state and territory governments is described in chapter 4. The chapter also outlines the suite of assistance measures — from EC-triggered programs to Farm Management Deposits and other government programs. Chapter 5 analyses EC declarations, considering issues such as the inequities that arise from placing 'lines on maps' and process matters — criteria, timeliness and costs. Chapter 6 evaluates current drought support measures individually, as well as addressing many cross-program issues.

Self-reliance and preparedness

How the current system can be improved is explored in chapter 7. Chapter 8 focuses on a policy framework for encouraging farmers' and farm businesses' capacity to prepare for and manage drought. The role of government in providing a social safety net for all Australian households, including farm households in hardship, is then discussed in chapter 9. That chapter explores appropriate income support measures and their implications for ongoing rural adjustment. Chapter 10 discusses policy areas related to drought, such as water, natural resource management and climate policy, and considers the influence of these policies on drought-related outcomes. The final chapter addresses transitional and implementation issues (chapter 11). It concludes with the outlook for agriculture and rural communities under the Commission's recommendations.

2 Agriculture and adjustment

Key points

- The agricultural sector is continually adjusting to the many forces of change.
  - Agricultural output is increasing, but the sector's share of GDP has declined.
  - Approximately 60 per cent of agricultural output is exported.
  - Agriculture remains important to much of rural and regional Australia.
  - Farmers' terms of trade have been declining, but agriculture continues to exhibit strong long-term productivity growth.
  - The contribution to output of wool activity has declined, while other activities, such as beef, sheep meat and horticulture, have expanded.
- Farm numbers and land used in agricultural production have fallen, but there has been an increase in average farm size.
  - In 2005-06, the largest 30 per cent of farms generated 82 per cent of the total value of agricultural operations, while the smallest 50 per cent of farms generated 7 per cent.
  - As a group, the bottom 25 per cent of broadacre farms have not made a profit in any year from 1988-89 to 2007-08.
- The most vulnerable farmers are not necessarily those facing the greatest climate variability.
  - Factors such as small farm scale, land degradation, low liquidity, and lack of diversified income sources are more likely to increase the vulnerability of farms to adverse shocks.
- Many larger inland centres ('sponge cities') are growing at the expense of smaller outlying towns. This process has been underway since at least the early 1900s.
  - Governments can, at the margin, influence the demographic, economic and social patterns of activity and settlement across Australia. This, however, is not best achieved by way of temporary payments to farmers for drought relief.

2.1 Introduction

To evaluate drought support measures, it is necessary to appreciate the changes that have occurred in the agricultural sector and its links to rural communities. The extent of change — on farms, in regional communities and at the sectoral level — from long and short term influences has been marked.

Farm adjustments can manifest as simply changing the mix of crops in response to shifts in commodity prices, taking up outside employment to supplement farm income or enlarging a farm by buying out a neighbour. Musgrave (1990, p. 249) noted 'structural change is the aggregate response, at the regional, industry and national levels, to the myriad of adjustment decisions made at the firm and individual level.'

This mainly descriptive chapter canvasses:

- agriculture's place within the Australian economy — its share of output, its export orientation and prominence in state, territory and regional economies
- how the sector has adjusted over time — for example, changes in the area of land used, numbers of farms, and composition of output
- the non-policy impediments to farmers' self-reliance and preparedness
- the importance of agriculture to rural and regional communities.

The chapter addresses how the changing profiles of agriculture and rural and regional Australia might bear on farmers' capacity to build up their capital base and thereby achieve greater self-reliance and preparedness (box 2.1). The chapter concludes with commentary on whether drought policy should (or can) play a role in maintaining the fabric of rural and regional communities.

Box 2.1 **Forms of capital and their implications for self-reliance**

A taxonomy of the capital bases that condition how farm businesses adapt to shocks — such as drought or sudden shifts in farmers' terms of trade — can be drawn from Ellis (2000). The forms of capital are:

- natural: the natural resource base on which farm production depends
- physical: the infrastructure on farms that is used in production
- financial: farm profitability, cash reserves, investments and non-farm income
- human: levels of education, skills and experience of individuals
- social: the ties between households within a community that affect support and information sharing — a focus of the Expert Social Panel (Kenny et al. 2008).

Governments can play a role in addressing policy-relevant impediments to the accumulation of capital. This is discussed in chapter 7.

2.2 Profile of agriculture in the Australian economy

The output of the agricultural sector has increased over time. By 2007-08, (real) output was almost double its 1974-75 level (figure 2.1). Several major droughts, indicated by shaded years, have caused only temporary downturns, indicating a high level of resilience at the broad sectoral level.

Figure 2.1 **Agricultural output, 1974-75 to 2007-08[a]**
Valued-added (2006-07 prices)

[a] Throughout this publication, shaded years on graphs indicate major droughts.

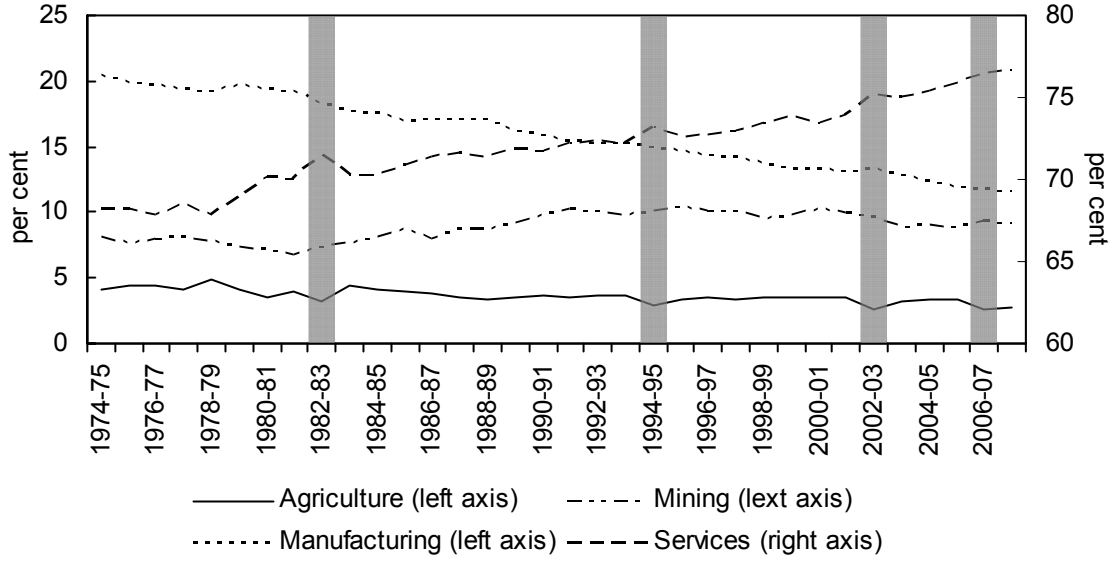
Data source: ABS (*Australian National Accounts: National Income, Expenditure and Product*, Cat. no. 5206.0).

Despite this growth in output, agriculture's importance to the national economy has waned. In the mid 1970s, its share of industry gross value added was approximately 4 per cent, falling to less than 3 per cent today (figure 2.2). Such trends are evident in all developed nations and reflect the relative growth of the services sector.

Agriculture's significance to exports of goods and services has also declined. In 1974-75, agriculture accounted for around 24 per cent of all exports, but by 2007-08, this had fallen to around 13 per cent (figure 2.3). Manufacturing and other merchandise goods, resources and services increased their share of exports over the period. Nevertheless, agriculture is a highly export-oriented industry, with around 61 per cent of all agricultural output exported. Wool production in particular, is highly export-oriented, as are, albeit to a lesser extent, wheat, beef, wine grapes and dairy products (table 2.1).

Figure 2.2 **Share of industry production, 1974-75 to 2007-08**

Proportion of gross value added (chain volume)[ab]

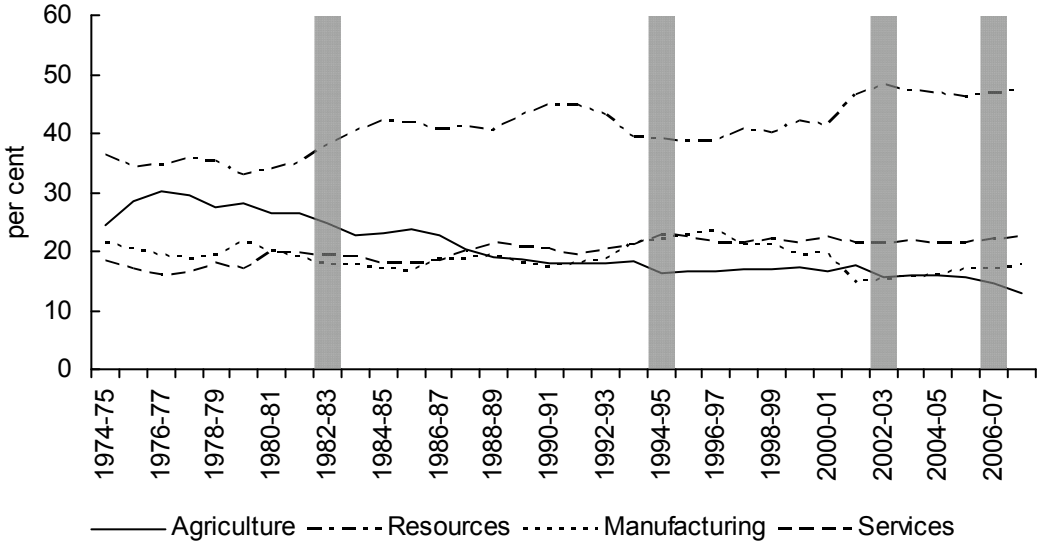


[a] Gross value added is defined as gross domestic product minus statistical discrepancy and minus taxes less subsidies on production. [b] Excluding dwellings owned by persons.

Data source: ABS (*Australian National Accounts: National Income, Expenditure and Product*, Cat. no. 5206.0).

Figure 2.3 **Composition of exports, 1974-75 to 2007-08**

Industry share of total exports[a] (chain volume)



[a] Manufacturing includes other (assorted) merchandise goods.

Data source: ABARE (2008a).

Table 2.1 **Share of agricultural production exported[a]**
Per cent, average over 2004-05 to 2006-07

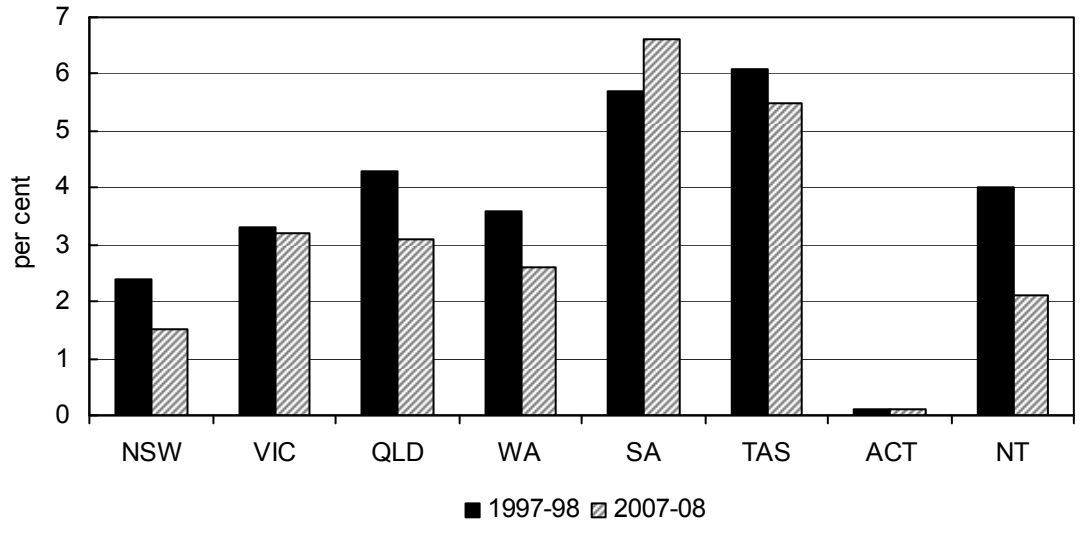
Commodity group	*Production share exported*
Wool	95
Wheat	73
Beef	64
Wine grapes	60
Dairy products	51
Fruit	9
Vegetables	7
Total agriculture	61

a Proportion of gross value of production, 2007-08 dollars.

Source: ABARE (2008b).

Agriculture's contribution to state and territory output has followed the national trend. In each state and territory, with the exception of South Australia and Tasmania, the sector accounts for less than 4 per cent of total industry gross value added. Between 1997-98 and 2007-08, agriculture's share of output increased only in South Australia (figure 2.4).

Figure 2.4 **Share of agriculture by state and territory, 1997-98 and 2007-08[a]**
Proportion of industry gross value added (chain volume)

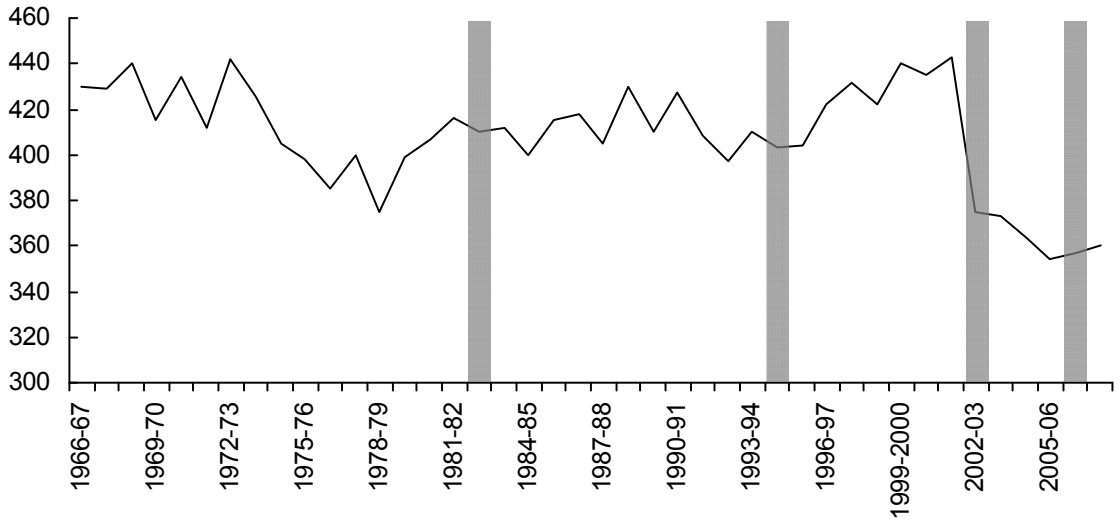


a Excluding dwellings owned by persons.

Data source: ABS (*Australian National Accounts, State Accounts*, Cat. no. 5220.0).

The number of people directly employed in the agriculture sector has also declined from about 430 000 in 1966-67 to about 360 000 in 2007-08 (figure 2.5). This represented around 9 per cent of total employment in the economy in 1966-67 and approximately 3 per cent in 2007-08. Agricultural employment is highly variable in response to short-term factors (for example, drought conditions), while longer-term factors (for example, a rising real price of labour and the associated capital substitution for on-farm labour) are responsible for the downward trend. There was a significant decline in employment following the 2002-03 drought, in contrast to the droughts in 1982-83 and 1994-95, and this has become entrenched in response to the prolonged nature of the current drought event, and the competition for labour elsewhere in the economy.

Figure 2.5 **Employment in agriculture, 1966-67 to 2007-08[a]**
Thousands of persons



Data source: ABS (*Labour Force, Australia, Quarterly*; Cat. no. 6291.0.55.003); RBA from Econdata.

Being somewhat location-specific, agriculture's importance to rural and regional areas remains high (box 2.2). Drought conditions have coexisted with labour shortages in many regional areas, often reflecting the strong performance of the resources sector. Farming families in Western Australia and Queensland in particular have been able to avail themselves of 'fly in fly out' employment opportunities in mining areas. In some cases, mining companies have worked with rural communities to obtain labour outside peak periods in the farming calendar. The resulting diversification of farmers' income has enhanced their self-reliance and capacity to withstand drought.

Box 2.2 **Agricultural employment and rural Australia**

Agriculture's importance to rural and regional areas is borne out by employment data showing sectoral employment by varying degrees of remoteness.

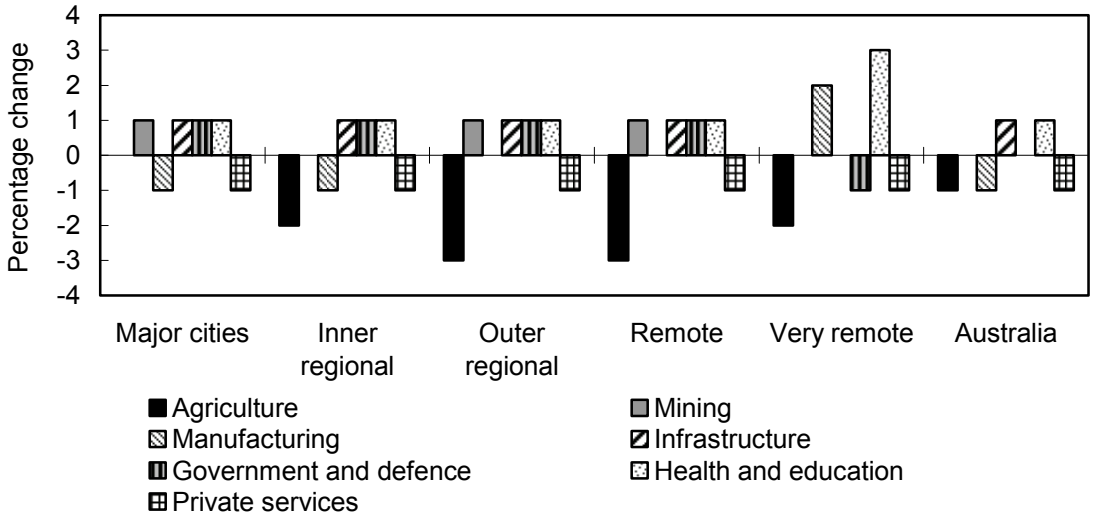
Employment by industry and remoteness class (per cent of total employment, 2006)

	Major cities	*Inner regional*	*Outer regional*	*Remote*	*Very remote*	*Australia*
Agriculture	1	6	14	18	14	3
Mining	1	1	3	9	10	1
Manufacturing	12	11	9	5	5	11
Other[a]	87	81	74	68	73	84

[a] Other includes: infrastructure, government and defence, health and education, and private services.

Between 2001 and 2006, agricultural jobs were lost in all rural and regional areas, particularly in the outer regional and remote areas. In very remote areas, the relative importance of manufacturing (mainly mineral processing) and health and education increased.

Change in the share of employment by industry and remoteness class, 2001–2006



Source: BITRE (2008).

There has been a long-term trend of input prices for farmers rising more rapidly than output prices. This is reflected in the 'farmers' terms of trade' (figure 2.6), defined as the ratio of the index of prices received by farmers, to the index of prices paid by farmers. While the terms of trade can have large short-term movements (for example, a year of high commodity prices, or of rapidly escalating fertiliser prices) the long-term trend is evident and is expected to continue.

Figure 2.6 **Australian farmers' terms of trade, 1966-67 to 2007-08[a]**

a Index base 1997–98 = 100.

Data Source: ABARE (2008a).

The farm sector as a whole has managed declining terms of trade through a combination of increases in farm size (including through farm amalgamations), improvements in productivity and by redirecting resources to take advantage of changing relative prices within agriculture.

Average multifactor productivity growth[1] for the agricultural sector (figure 2.7) grew at 2.1 per cent a year from 1974-75 to 2007-08. By comparison, the average multifactor productivity growth rate for the market sector[2] over the same period was around half of that for agriculture, at just 1.1 per cent a year.

These data suggest that, despite the challenges facing agriculture, the sector has been able to respond and adapt to changing conditions. The correlation between dips in productivity growth and drought is apparent, as is the relatively rapid recovery following drought (with the exception of 2007-08).

1 Multifactor productivity is a measure of the efficiency with which inputs are used to produce output. An increase in multifactor productivity allows more output to be produced with a given quantity of inputs, and vice-versa.

2 Includes: agriculture, fisheries and forestry, mining, manufacturing, electricity, gas and water supply, construction, wholesale trade, retail trade, accommodation, cafes and restaurants, transport and storage, communication services, finance and insurance and cultural and recreational services. The estimate of average multifactor productivity for the market sector has been modified by removing the agriculture, fisheries and forestry category.

Figure 2.7 **Productivity in agriculture, 1974-75 to 2007-08[a]**

[a] Index base: 2006-07 = 100.

Data Source: Productivity Commission estimates.

2.3 Adjustment in agriculture

The composition of output is changing

Traditionally, Australian agriculture was dominated by extensive pastoral and cropping activities, including wheat, beef cattle and sheep (for wool and meat products). However, over time, the contribution of wool to agricultural output has decreased, while that of wheat has remained roughly unchanged (table 2.2). There has been a marked increase in the significance of the production of other crops (such as fruit and nuts and vegetables) to agricultural output, with their contribution rising from approximately 25 per cent in 1960-61 to 44 per cent by 2007-08. The relative significance of beef and sheep production has also increased over time. Intensive livestock (pigs and poultry) contributed around 3 per cent to the value of agricultural output in 1960-61, rising to nearly 6 per cent by 2007-08 (ABS 2009).

Although cotton and rice production have increased since the 1960s, production of these crops in recent years has been relatively low compared to levels achieved in the late 1990s and early 2000s, reflecting the scarcity of irrigation water. Accordingly, their share in the value of agricultural production in recent years

(0.7 per cent and close to 0.02 per cent respectively in 2007-08[3] (ABS 2009)) has been lower than the levels achieved in the mid and late 1990s.

Table 2.2 **Contribution of agricultural activities to the value of agricultural output[a]**

Per cent

Commodity group	*1960-61*	*2007-08*
Wool	25	5
Wheat	14	12
Beef and sheep	16	22
Dairy	12	10
Other crops	25	44
Other	8	7

a 2007-08 data are preliminary and may be subject to change.

Source: ABS (*Value of Primary Production, 1971-72*, Ref. no. 10.27); (*Value of Agricultural Commodities Produced, Australia*, *Preliminary 2007-08*, Cat. no. 7501.0).

Farm numbers are declining, but farms are getting bigger

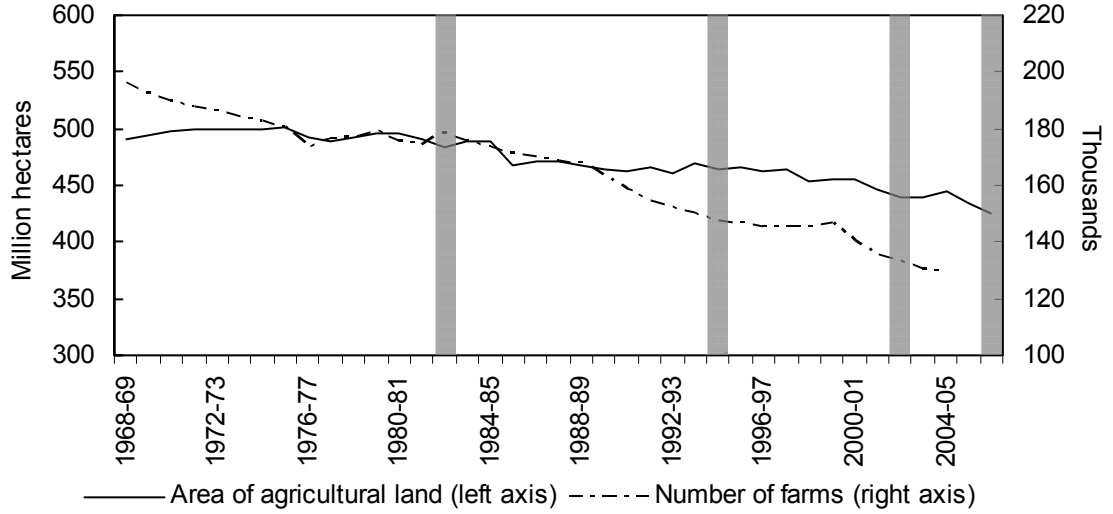
There has been a long-term decline in the number of farm businesses, falling from about 196 000 in 1968-69 to about 130 000 in 2004-05 (figure 2.8). Since 2004-05, ABS data on farm numbers have been based on a register of agricultural businesses sourced from the ATO's Australian Business Register. This created a discontinuity in the series, and led to a large increase in the number of farm businesses recorded in 2005-06 and 2006-07 (approximately 154 000 and 150 000 respectively; not shown in figure 2.8).

The area of land used for agricultural production has also declined in recent decades, and is now at around 1950s levels. Over the 1968-69 to 2006-07 period, the total area of land devoted to agricultural uses peaked at around 500 million hectares in 1975-76, but subsequently fell to around 425 million hectares in 2006-07.

Farm numbers have fallen at a faster rate than the reductions in the area of agricultural land, as average farm size has increased. In 1968-69, the average farm size was around 2500 hectares and this increased to about 3400 hectares in 2004-05. These national averages however, do not reveal the large differences in farm size between farming industries and regions (for example, horticultural farms typically operate on much smaller plots than broadacre farms).

3 These estimates have a relatively high standard error and should be used with caution.

Figure 2.8 **Farm numbers and area of agricultural land 1968-69 to 2006-07[ab]**



a Farm numbers refer to business establishments in productive agricultural activities, typically at one physical location. **b** Until 1985-86, farm numbers included agricultural establishments with an estimated value of agricultural operations (EVAO) of $2500 or more. In 1986-87, the EVAO threshold was raised to $20 000, and was raised again in 1991-92 to $22 500, before being reduced to $5000 from 1993-94 onwards. Therefore, estimates of the number of farm establishments are not strictly comparable between periods with differing EVAO thresholds.

Data Source: ABARE (2008a).

Output concentration

Farm output in Australia is highly concentrated, with the largest farms (in terms of the estimated value of operations, or EVAO) accounting for large shares of agricultural output. Analysis of the distribution of farms by EVAO over time reveals a general trend towards a greater degree of output concentration by farms with a high EVAO. For example, the Productivity Commission (PC 2005b) found that, while only 3 per cent of farms had an EVAO greater than $500 000 in 1982-83[4], by 2002-03, this proportion had risen to 11 per cent. Similarly, 13 per cent of farms had an EVAO of $200 000 to $500 000 in 1982-83, but by 2002-03, this had risen to 22 per cent.

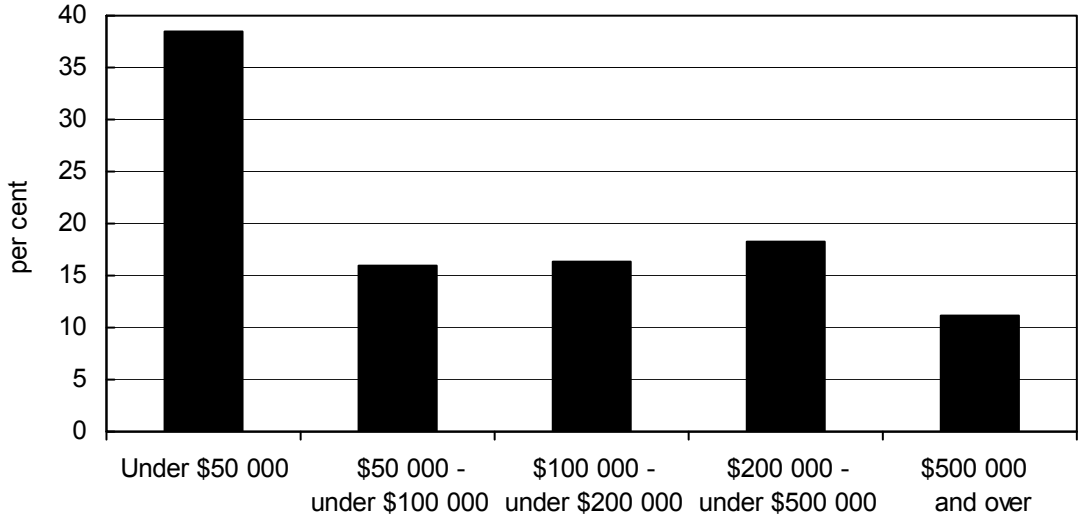
More recent data also show that a small, but significant, proportion of farms have a relatively high EVAO. In 2005-06, approximately 11 per cent of farms had an EVAO over $500 000[5], representing approximately 17 000 farms, while 18 per cent (approximately 28 000 farms) had an EVAO between $200 000 and $500 000.

4 In constant 2004 prices.

5 In 2005-06 prices.

Conversely, approximately 38 per cent of farms (around 59 000 farms) had an EVAO below $50 000 in 2005-06 (figure 2.9).

Figure 2.9 **Distribution of farms by EVAO, 2005-06**



Data source: ABS (*Agricultural Commodities, Australia, 2005-06*, Cat. no. 7121.0).

The degree of output concentration differs among agricultural industries. Those industries that had a relatively high proportion of farms with an EVAO over $1 000 000 in 2005-06 included: cotton growing (53 per cent of farms), mushroom growing (37 per cent of farms), and poultry farming for meat (29 per cent of farms) (ABS 2008a).

At the other end of the spectrum, those industries with a relatively high proportion of farms with an EVAO of under $50 000 were: grape growing (51 per cent of farms), beef cattle farming (42 per cent), and sheep farming (38 per cent) (ABS 2008a). Farms with an EVAO of this magnitude are likely to include many whose owners live and work in town but farm on weekends or who live on a farm and have some occasional work in town but are not engaged in full-time farming activity. By choice or necessity, many owners of farms of this scale earn off-farm income.

As further evidence of the extent of output concentration across agriculture, it is estimated that the largest farms (in terms of EVAO) generate the bulk of agricultural output, while those with smaller EVAO levels generate only a small share of total output (table 2.3).

Table 2.3 **Output concentration in agriculture**[a]

Per cent, share of total value of agricultural operations

	1996-97	*2005-06*
Largest 30 per cent	76.5	82.0
Smallest 50 per cent	9.8	7.2

[a] Farms with an EVAO greater than $5000 (in 2007-08 dollars).

Source: ABARE (2008 unpublished).

This picture is replicated for specific types of agricultural activities. For instance, the Australian Bureau of Statistics and Productivity Commission (ABS and PC 2006) examined the gross value of irrigated production (GVIP) in 2003-04, finding:

- for irrigated horticulture — 73 per cent of GVIP was attributable to the largest 20 per cent of farms, with the smallest 20 per cent contributing 1 per cent
- for irrigated broadacre crops — 69 per cent of GVIP was generated by the largest 20 per cent of farms, while the smallest 20 per cent of farms generated 2 per cent
- for irrigated pastures — 57 per cent of GVIP was attributable to the largest 20 per cent of farms, and the smallest 20 per cent produced about 2 per cent.

Other agricultural activities also display a concentration of output amongst larger farms (table 2.4). For example, in the beef industry in 2003–04, the top 30 per cent of farms (in terms of the value of output) produced more than 80 per cent of industry output, while in the dairy industry, the top 30 per cent produced about 60 per cent of industry output. The consistent trend over the 20 years for all of the sectors is one of increasing concentration of output.

Table 2.4 **Share of industry output by the largest 30 per cent of producers**[ab]

Per cent

	1983-84	*2003-04*
Beef specialists	77	81
Sheep specialists	67	70
Grain businesses	59	62
Dairy specialists	54	59

[a] Ranked by value of output. [b] Sheep specialists includes both sheep meat and wool specialists.

Source: DAFF (2005).

In addition to changes in the distribution of the value of agricultural output, there have been gradual changes in farm ownership. Large agribusinesses with corporate structures have emerged that are integrated across supply chains — including farming, seed supply, agrichemicals, farm machinery, wholesale and distribution, processing, marketing and retail sales.

Some of the recent growth in corporate investment has been encouraged by managed investment schemes (MIS). According to the Australian Agribusiness Group, non-forestry MIS contributions almost tripled between 2004 and 2007 (Department of the Treasury 2008, p. 1). Traditionally, olives and wine grapes were the preferred crops of MIS but, as noted by the Department of the Treasury (2008), almonds and livestock have also become popular in recent years. The growth in non-forestry MIS contributions may, in part, have been driven by the ability of investors to claim upfront deductions for amounts contributed to such schemes.

At the other end of the spectrum, there has been growth in 'hobby farming', typically on small lots. The typical characteristics of 'hobby farmers' were described earlier in this section.

Despite changes in the composition of farm ownership, farming families[6], continue to play a prominent role in the agricultural sector. In 1986, there were approximately 145 000 farming families in Australia, although there was a significant decline by 1991, when the number of farming families fell to around 120 000 (a decline of approximately 17 per cent) (ABS 2003). Throughout the 1990s, the decline in the number of farming families was less marked, with numbers falling to 115 000 by 1996 and approximately 113 000 in 2001. There was however, a larger decline between 2001 and 2006, when the number of farming families fell by around 10 000, to 102 616 in 2006 (ABS 2008c). The exit of some families from agriculture has provided those remaining with greater opportunities to expand their operations and increase their viability.

Farm entries and exits

Understanding farm entries and exits is important for developing policies to build capacity for self-reliance and preparedness, and to assist less viable farmers to either improve viability or leave the industry. For example, exit assistance may not necessarily achieve its desired outcomes if new entrants purchase sub-economic farms. Information on entries and exits for 2003-04 to 2006-07 — a period corresponding with drought conditions in most rural and regional areas — is provided in table 2.5.

6 Defined as a family where the reference person and/or spouse/partner reported that their main occupation was a farmer/farm manager.

Table 2.5 **Business entries and exits**

	Agriculture entries	*Agriculture exits*	*Agriculture entry rate*	*Agriculture exit rate*	*Industry average entry rate*[a]	*Industry average exit rate*[a]
	No.	No.	%	%	%	%
2003-04	23 024	22 364	10.9	10.6	19.4	16.8
2004-05	23 552	22 985	11.1	10.8	18.6	17.0
2005-06	30 029	28 400	14.1	13.3	17.8	16.2
2006-07	24 532	24 616	11.4	11.5	18.0	15.7

[a] Computed as the average yearly entry/exit rate for the following industries: mining, manufacturing, electricity, gas and water supply, construction, wholesale trade, retail trade, accommodation, cafes and restaurants, transport and storage, communication services, finance and insurance, property and business services, education, health and community services, cultural and recreational services, and personal and other services.

Source: ABS (*Counts of Australian Businesses, Including Entries and Exits, June 2003 to June 2007*, Cat. no. 8165.0).

Entry and exit rates from 2003-04 to 2006-07 were generally constant, with the exception of 2005-06, when there was a surge in new entries. A view expressed to this inquiry is that many seeking to leave farming intend to wait until the condition of properties improves after rains arrive or after a year of high production. For example, the Rural Financial Counselling Service New South Wales-Central West submitted:

> Many farmers live in hope – like gamblers – for the 'big year' and believe that if only one good year, we might be able to make enough to be able to get out with more. (sub. 73, p. 10)

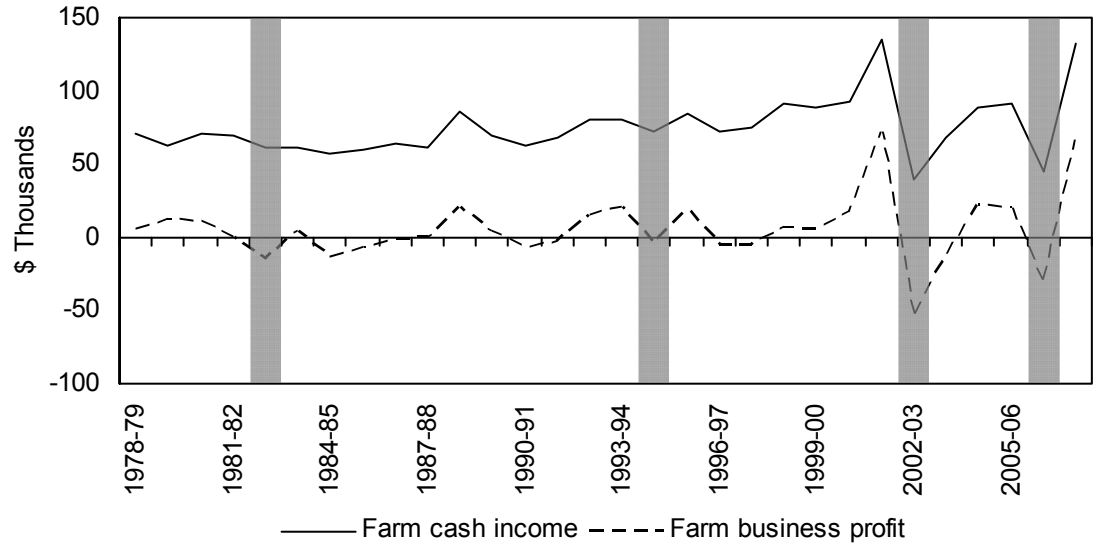
If, as the above view suggests, farmers wait until better conditions occur to leave farming, exit rates may not necessarily increase sharply during drought periods. Notably, exit and entry rates in agriculture in each year from 2003-04 to 2006-07 were lower than the corresponding exit and entry rates across other industries in the same years (table 2.5). Regardless of seasonal conditions, exit and entry rates in agriculture seem to be lower than in many other industries.

Managing farm income and returns in a variable climate

Farm income and profit have always been volatile in Australia. As illustrative examples, data on farm cash income and farm business profit[7] are provided for dairy farms (figure 2.10) and for broadacre farms[8] (figures 2.11 and 2.12).

Fluctuations in broadacre and dairy farm income and profits share some common elements. Both peaked in 2001-02, to very high levels, followed by declines during the 2002-03 and 2006-07 droughts. Recovery after those droughts occurred relatively quickly, implying strong sectoral level resilience.

Figure 2.10 **Dairy farm performance, 1978-79 to 2007-08**
2007-08 dollars



Data source: ABARE (2008e).

The top 25 per cent of broadacre farms demonstrate a consistently robust financial performance (figures 2.11 and 2.12), generating positive farm cash incomes and farm business profits in all years since 1988-89.[9] During the 2006-07 drought, the farm cash incomes of this group were flat, but strongly rebounded in 2007-08, to be around $9000 higher in real terms than the previous peak in 2001-02. However, the

7 Farm cash income is defined as total revenues received by the farm during the financial year, less payments made by the farm business for materials and services and for permanent and casual hired labour (excluding owner, manager, partner, and family labour). Farm business profit is defined as farm cash income plus changes in trading stock, less depreciation and imputed labour costs. Capital gains on land are excluded.

8 Classified on the basis of rate of return (excluding capital appreciation) to total capital.

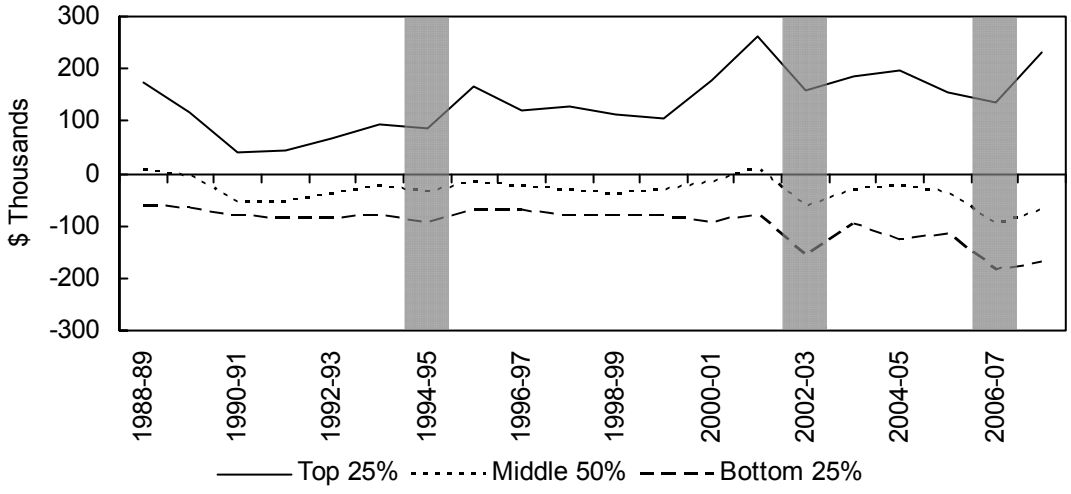
9 The identity of farms in each performance class can change from year to year.

bottom 25 per cent of farms have not recorded a positive farm cash income since 1994-95 and have not achieved a positive profit in any year in the period 1988-89 to 2007-08.

Figure 2.11 **Broadacre farm cash income, 1988-89 to 2007-08**
2007-08 dollars

Data source: ABARE (2009 unpublished).

Figure 2.12 **Broadacre farm business profit, 1988-89 to 2007-08**
2007-08 dollars

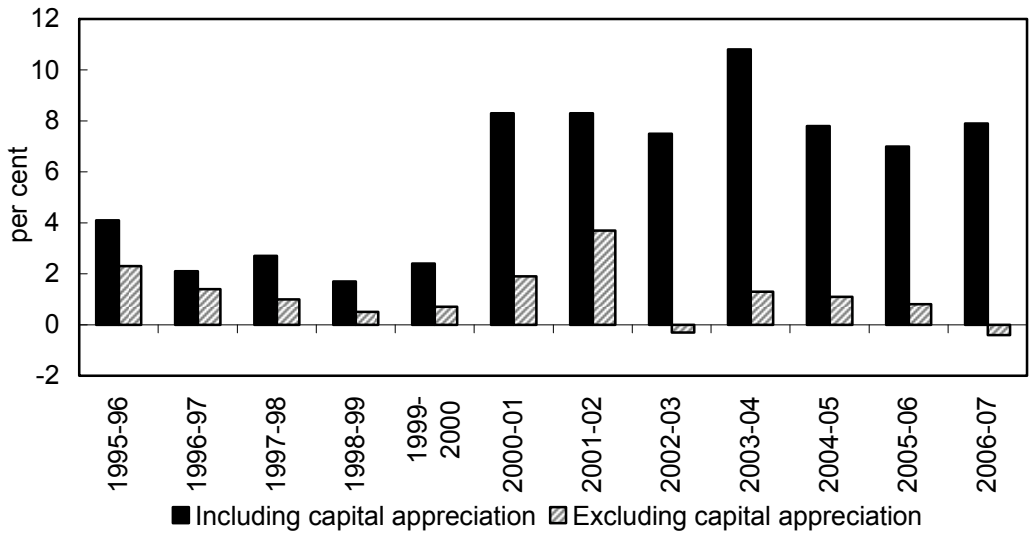


Data source: ABARE (2009 unpublished).

Despite prolonged drought, the rates of return[10] to total farm capital (including capital appreciation) have been high since 2000-01 (figure 2.13). Strong demand for rural land has resulted in a sharp increase in land values in many regions (discussed further in chapter 3), underpinning these high rates of return.

If capital appreciation is excluded however, farm rates of return are much lower, reflecting, in part, several years of poor profitability from below average seasonal conditions, including negative average levels of profitability during the droughts of 2002-03 and 2006-07.

Figure 2.13 **Farm rate of return, 1995-96 to 2006-07**
Average per farm, broadacre industries



Source: ABARE (2008e).

It should be noted that the taxation treatment of agriculture is also a relevant consideration to aspects of this inquiry (box 2.3). More detail on agricultural taxation, including the tax-linked financial tool, Farm Management Deposits (FMDs), can be found in chapter 4, chapter 8 and appendix D.

10 Measures the return to all capital used, computed by expressing farm business profit at full equity as a percentage of the total opening capital (at the beginning of the financial year) of the business.

Box 2.3 **Agricultural activities and taxation**

Agricultural interests in Australia tend to pay relatively low levels of tax. Almost 54 000 individuals in the agriculture, forestry and fishing sector declared business losses on their tax return in 2005-06 — the highest number for any industry. This represented about 12 per cent of the total number of individuals that declared losses. Individuals in agriculture, forestry and fishing comprised around 1 per cent of all individual taxpayers in 2005-06 (ATO 2008b).

In addition, there were about 11 000 non-taxed companies in the sector in 2005-06 (that is, those with net tax less than or equal to $0). This represented about 64 per cent of companies in the sector that filed a tax return for that year (ATO 2008b).

Furthermore, the Department of the Treasury (2006) estimated that, in 2005-06, about $475 million in tax expenditures (defined as concessions, benefits, and incentives delivered to taxpayers via the taxation system) was afforded to agriculture, forestry and fishing.

Off-farm income diversification

Off-farm incomes — including off-farm wages and salaries, investment dividends, rents and other business income, and government social support payments — assist farmers to manage the numerous risks they may face.

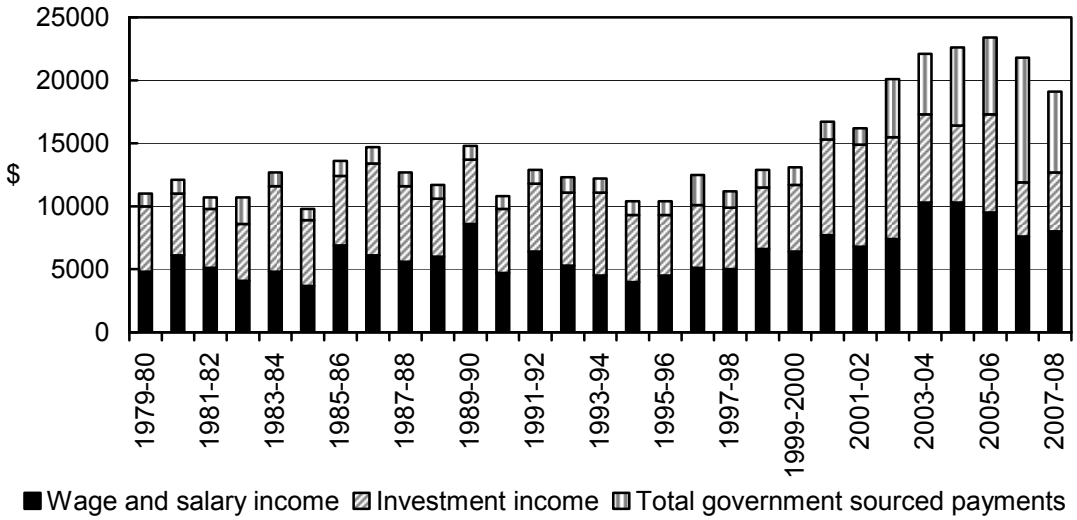
Off-farm income[11], primarily in the form of off-farm wage and salary income and investment income, but also including government sourced payments, has increased in real terms (in 2007-08 dollars) since the late 1970s for both dairy and broadacre farmers (figures 2.14 and 2.15). Although the trend is less pronounced for dairy farmers than broadacre farmers, the increase in off-farm income suggests that a movement towards a greater degree of income diversification has occurred.

While the level of off-farm income received by dairy farmers has risen since 1979-80 (figure 2.14), most of this increase has taken place since 2000-01. The peak amount of wage and salary income received by dairy farmers (in terms of the average amount per farm operator-manager's household) was $5300 in the three years to 1981-82, $10 300 in 2003-04 and 2004-05, and approximately $8400 in the three years to 2007-08. Hence, there has been a movement towards higher receipt of wage and salary income by dairy farmers over time. There has not however, been a movement of a similar magnitude in the receipt of investment income, with an average of $5600 received in the three years to 2007-08, compared with $4900 in

11 Collected from ABARE surveys and referring to the farm operator-manager's household. That is, the off-farm income of the principal operator and their spouse.

the three years to 1981-82. The level of government sourced payments received by dairy farmers has increased markedly over time. Dairy farm households have been significant recipients of the Exceptional Circumstances Relief Payment in the past few years — the average dairy farm operator-manager's household received $7100 in 2006-07 and $5000 in 2007-08.

Figure 2.14 **Off-farm income sources of dairy farmers, 1979-80 to 2007-08[a]**
2007-08 dollars



[a] Government sourced payments includes payments to families, allowances and pensions, and taxable payments considered to be part of farm business income, but excludes fuel rebates and dairy structural adjustment payments.

Data source: ABARE (2009 unpublished).

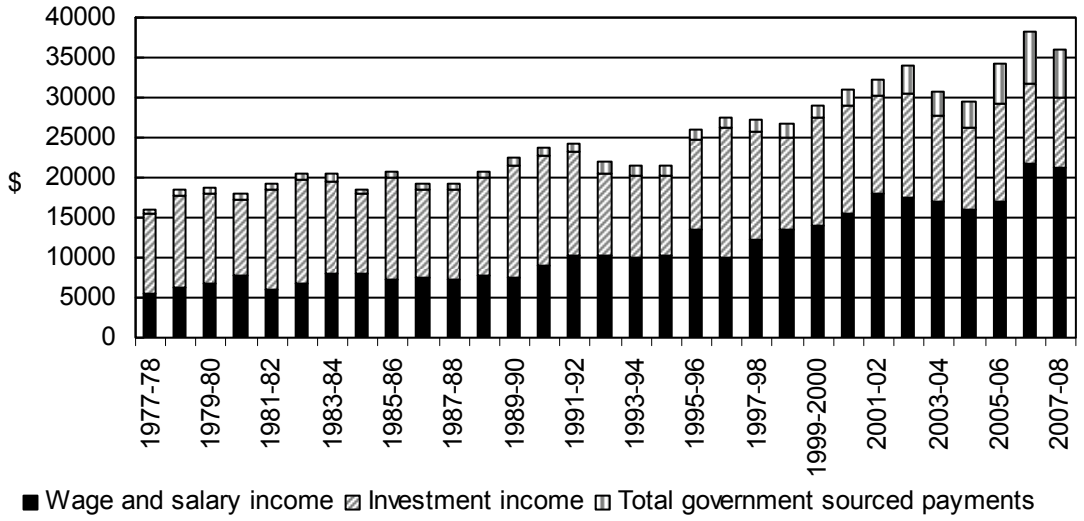
The amount of wage and salary income received by broadacre farmers has increased over time (figure 2.15). For instance, the average amount (per farm operator-manager's household) of wage and salary income in the three years to 2007-08 was $20 000, compared with around $6200 in the three years to 1979-80. Although investment income is a significant source of off-farm income for broadacre farmers, the amount received has changed very little over time, with an average of approximately $12 000 received per annum over the period 1977-78 to 2007-08. Government sourced payments however, have increased steadily since the early 2000s, reaching relatively high levels in 2006-07 and 2007-08.

The data generally indicate that a trend in broadacre farming, and to a lesser extent, dairy farming, has emerged, whereby fewer farmers are wholly reliant on the farm business to generate all of their income. This is demonstrated by the fact that the percentage of broadacre farmers with off-farm wages increased from 25 per cent in 1977-78 to 45 per cent in 2007-08) (see figure 9.3). For dairy farmers, wage and salary income has become more important since the late 1990s, and the percentage

of dairy farmers receiving off-farm wages has also increased moderately, from 26 per cent in 1977-78 to 35 per cent in 2007-08. While some view the receipt of off-farm income as an indictment of Australian agriculture, it is in fact a rational response by many to the risks of farming, including Australia's highly variable climate — it is thus a sound risk management strategy, where it can be readily undertaken.

Figure 2.15 **Off-farm income sources of broadacre farmers 1977-78 to 2007-08[a]**

2007-08 dollars



[a] Government sourced payments includes payments to families, allowances and pensions, and taxable payments considered to be part of farm business income, but excludes fuel rebates.

Data source: ABARE (2009 unpublished).

Capital accumulation

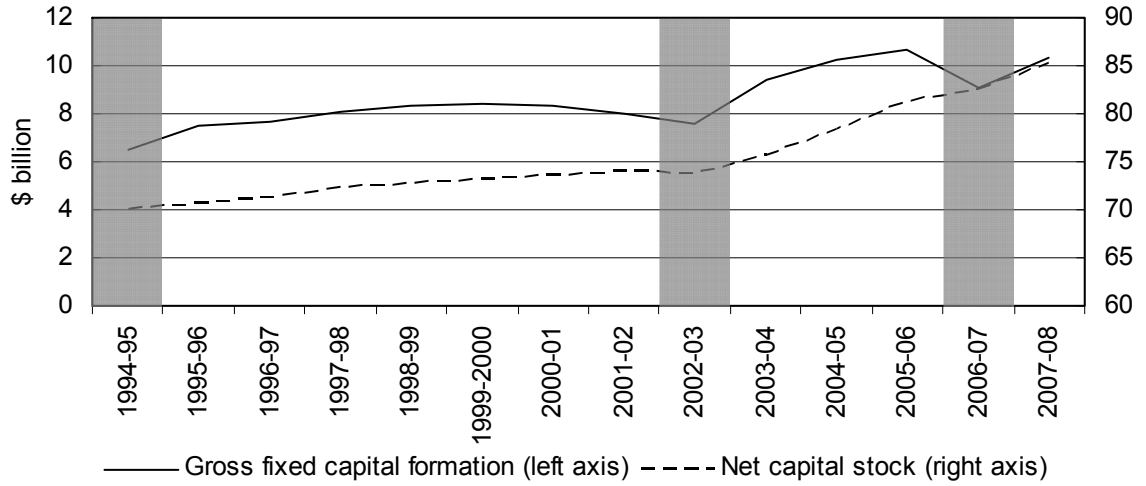
The quantity of capital utilised by the agricultural sector as an input into production has continually increased over time. The net capital stock[12] (in real terms) in agriculture rose from around $70 billion in 1994-95 to $85 billion in 2007-08, representing an increase of approximately 21 per cent over that period for an average annual growth rate of 1.4 per cent per annum (figure 2.16).

Despite the upward trend of agriculture's capital stock, gross fixed capital formation (the value of acquisitions less disposals of fixed assets) displays a degree of variability during the droughts of 2002–03 and 2006–07 (discussed further in chapter 3).

12 The net capital stock represents the net present value of the future capital services provided by assets.

Figure 2.16 **Net capital stock and gross fixed capital formation, 1994-95 to 2007-08**

Chain volume (2006-07 prices)



Data source: ABS (*Australian System of National Accounts*, Cat. no. 5204.0).

Water availability

In 2004-05, about 65 per cent — or approximately 12 200 gigalitres (GL) — of Australian water consumption was used for agriculture.[13] However, agricultural water use has fallen in recent years, to 11 689 GL in 2005-06 and to 8 521 GL in 2006-07. Approximately 90 per cent of this water was used for the irrigation of pastures and crops, with the remainder used for purposes such as stock watering and cleaning livestock facilities[14] (ABS 2008f).

Most agricultural businesses that irrigated in 2006-07, used water on pastures for grazing. This group also irrigated the largest area in addition to having the greatest water use (table 2.6). Sugar cane, cotton, cereal crops and pasture for hay also used significant amounts of water in 2006-07. Although cotton and rice used significant quantities of water in 2005-06, their use declined markedly in 2006-07.

[13] It is estimated that about 11 per cent of water consumption in 2004-05 was used by households and about 12 per cent by industrial users, with the remainder being used by water supply services, for example, for the purposes of sewerage and drainage services (ABS 2006b).

[14] These data pertain to water sources on or under the ground. This includes water sourced from government and irrigation schemes and surface water, mainly sourced from rainfall and run-off, or from bores tapping groundwater.

Table 2.6 **Pastures and crops irrigated, 2005-06 and 2006-07**

	Businesses irrigating (no.)		*Area irrigated ('000 hectares)*		*Volume applied (GL)*	
	2005-06	*2006-07*	*2005-06*	*2006-07*	*2005-06*	*2006-07*
Pasture for grazing	14 229	12 818	814	567	2 888	2 008
Sugar cane	2 145	1 991	210	202	1 057	978
Cotton	715	555	270	134	1 735	868
Cereal crops	4 488	3 887	375	311	894	825
Pasture harvested for hay	7 116	5 791	256	200	939	795
Fruit and nut trees, plantation or berry fruits	7 823	8 080	139	141	630	648
Grapevines	8 277	7 736	183	178	633	639
Vegetables	6 439	6 355	114	105	431	414
Rice	1 056	311	102	20	1 253	239
Other broadacre crops	901	588	55	37	167	109
Nurseries, cutflowers, cultivated turf	3 645	3 198	15	15	82	72

Source: ABS (*Water use on Australian farms*, Cat. no. 4618.0).

The largest amount of agricultural water use in 2006-07 occurred in New South Wales, which accounted for approximately 32 per cent of total national usage. Victoria and Queensland were also significant users, accounting for around 25 per cent and 20 per cent of total usage respectively. Irrigated agriculture in the Murray-Darling Basin (MDB) in 2006-07, accounted for around 58 per cent (4458 GL) of all water used for irrigation nationally. Nevertheless, between 2005-06 and 2006-07, the area of land irrigated in the MDB fell by 553 000 hectares (a decline of around 33 per cent) and was associated with a decline in irrigation water volumes of nearly 40 per cent (ABS 2008f).

Policies relating to water access entitlements and water allocations have significant effects on agricultural water use (box 2.4). The National Water Initiative, signed by all governments, aims to facilitate the operation of water markets and the trading of water between and within jurisdictions. The ability to trade annual allocations and permanent entitlements has led to premiums for water which are above utility charges. As a consequence of trading, prices vary in response to supply and demand, so that water is typically more expensive during dry conditions.

Box 2.4 **Water reforms**

Water access entitlements give users exclusive access to a share of water from a specified consumptive pool. Water allocations reflect the specific volume of water allocated to entitlements in a given season. Historically, while water rights differed between states, they generally provided a right to take and use water, rather than a property right over water per se. These arrangements led to many overallocated systems with potential extractions by entitlement holders exceeding sustainable levels. This prompted reforms including a cap on diversions from the MDB in 1995, the separation of the water right from land title and the ability to trade annual water allocations and the underlying long-term entitlement.

In 2004-05, the total allocated volumes of water in New South Wales and Victoria were substantially less than the nominal entitlement (see table), and have continued to be less than 100 per cent in many areas of these states in more recent years. For example, Goulburn-Murray Water in Victoria had all of its systems on less than full seasonal allocations in 2006-07 and 2007-08 (see chapter 3).

Water access entitlements and allocations, 2004-05

	Entitlements	*Entitlement volume*	*Allocated volume*
	No.	GL	GL
NSW	118 110	13 302	9 799
VIC	25 514	6 680	4 734
QLD	48 591	4 397	na
WA	17 513	2 547	2 547
SA	10 399	1 661	1 661
TAS	3 110	1 038	1 038
ACT	153	66	66
NT	166	140	140

na Not available.

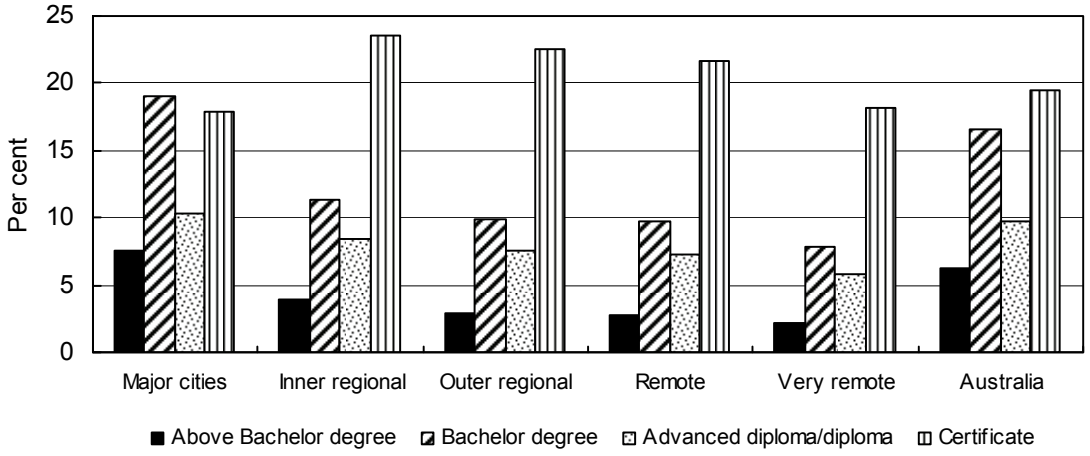
Sources: ABS (2006b); Roberts et al. (2006) and NWC (2008a).

The ability of irrigators to trade allocations has important ramifications across agriculture. For instance, in a dry year, farmers involved in cropping who hold water entitlements may sell their water allocation, rather than use it for cropping, if they believe the net benefit of doing so exceeds the net benefit of producing a crop. The ability to sell entitlements provides more adjustment options, including opportunities for farm exit.

Education and training

Education and training build human capital which enables people to adjust to changing circumstances and take advantage of new opportunities. In terms of post-secondary education, rural and regional areas generally had higher proportions of people with vocational education certificates compared with major cities (figure 2.17). Conversely, about 27 per cent of working age people in major cities had a bachelor degree or higher qualification, compared to 15 per cent in inner regional areas and even lower rates in more remote rural areas.

Figure 2.17 **Level of highest non-school qualification among people aged 25-64 years, by remoteness class 2006[ab]**



[a] Above bachelor degree category includes people with postgraduate degrees or graduate diplomas/certificates. [b] Includes those in migratory Australia and those who had no usual address. Migratory Australia comprises Collection Districts, which contain people who are enumerated on an overnight journey by train or bus.

Source: ABS (*Australian Social Trends, 2008*, Cat. no. 4102.0).

In all age categories, certificates are the most prevalent form of non-school qualifications possessed by farmers. However, the relative significance of advanced diplomas and diplomas versus bachelor degrees and above varies slightly by age class (table 2.7). Among younger farmers (those aged 20-29 and 30-39), bachelor degrees and above are more prevalent than advanced diplomas and diplomas as forms of non-school education. However, among the middle-aged groups and older groups (those aged 40-49, 50-59 and 60-69), advanced diplomas and diplomas are marginally more prevalent than bachelor degrees and above.

Table 2.7 **Highest level of non-school qualification of farmers in farming families by age group, 2006[a]**

Per cent

Qualification level	*15-19*	*20-29*	*30-39*	*40-49*	*50-59*	*60-69*	*70-79*	*80 and over*
Certificate	100	63	55	56	47	42	40	40
Advanced diploma/diploma	0	16	20	21	25	27	25	26
Bachelor degree or above	0	19	23	19	24	26	29	26

a Persons who inadequately described their non-school education were included in the calculation of percentages, which may not sum to 100.

Source: ABS (*Agriculture in Focus: Farming Families, Australia, 2006*, Cat. no. 7104.0.55.001).

While experience is important, the age structure of the farming population also has implications for the future of farm adjustments (box 2.5). (Chapter 9 examines the inordinately large number of farmers of pension age who are still working.)

Box 2.5 **The age of farmers**

Ageing of the farm population has been evident over the past two decades (Barr 2004) and has implications for the number of exits and retirements from farming that occur, in addition to succession and entry into farming by younger persons. In 1981, the median age of farmers was 44, rising to 51 by 2001, and increasing marginally in 2006 to 52 (ABS 2008c). This reflects, in part, a decline in the rate of entry of young people into farming. Barr et al. observed:

> The declining entry of young persons into agriculture is both a response to pressures for agricultural restructuring that encourage some young persons not to begin a career in farming, and the attraction of competing opportunities available for the young elsewhere in society and the economy. (Barr et al. 2005, p. 1)

Associated with this trend is a deferral of retirement, possibly because farmers are continuing on in the absence of a family successor (Barr 2004). The ageing of the farm population tends to be more evident in regions where small farms dominate, such as the high rainfall grazing districts along the Great Dividing Range and along the coastal fringe. Their location in high amenity regions and high land prices can limit options for increasing scale and for younger people to enter agriculture (Barr 2004).

2.4 Building a secure capital base

The vulnerability of farm businesses to shocks, such as drought is in part dependent on the size and composition of the capital base that has been built (outlined in box 2.1).

The stock of natural capital built up on a farm is an important contribution to preparedness for droughts. Further, the earlier that measures are taken to maintain the natural resource base during a drought (such as early destocking), the lower the damage to the environment and the better the position a farm is in for the recovery phase.

Self-reliance can be enhanced by building and maintaining financial reserves and by diversifying income sources (for example, by obtaining off-farm income). Vulnerability to shocks may also be reduced by improving the stock of physical capital; by diversifying farm enterprises and by adopting new technologies. The Rangelands Drought Taskforce observed:

> Those businesses that prior to the drought were able to implement diversification strategies as part of their business plans appear to be in a much better position to survive the drought … Diversification of businesses is the key to pastoral businesses surviving drought. (sub. 60, pp. 2–5)

The data presented in the previous section suggests there is scope for the level of human capital in rural and regional areas to be developed further. By enhancing their skills and knowledge, farmers have the potential to increase the efficiency with which they operate their farms, expand their range of employment opportunities and increase their lifetime earning potential.

Social capital, as a measure of the quality of relationships within a community, can be built up via means such as strengthened family, school, and club relationships, and by organisations, such as businesses, church-based groups and other voluntary bodies. Social capital ensures that a degree of social support is available to individuals affected by adverse circumstances, thus strengthening community self-reliance.

There is no uniform optimal combination of the various types of capital that should be developed and held by all farmers and farm businesses. The relative importance of each varies — for example, a limited amount of physical farm capital may be offset by a greater store of financial capital.

Nelson et al. (2005) constructed a composite index combining the five types of capital in order to assess the vulnerability of farm households to external events. Selected indicators were used to represent each of the five types of capital, and weighted evenly to determine a composite index.

These index results were mapped to illustrate areas where farmers were most vulnerable to stress events such as drought (figure 2.18a). Results indicate that farmers in areas such as western New South Wales, central Queensland, and parts of the east coast were more likely to be vulnerable than farmers in other areas. The key variables leading to greater vulnerability varied by regions. However, land

degradation, a small area scale of operations, low average incomes and lack of off-farm income were important indicators of vulnerability (Nelson et al. 2005).

Figure 2.18 **Vulnerability to risks** [ab]

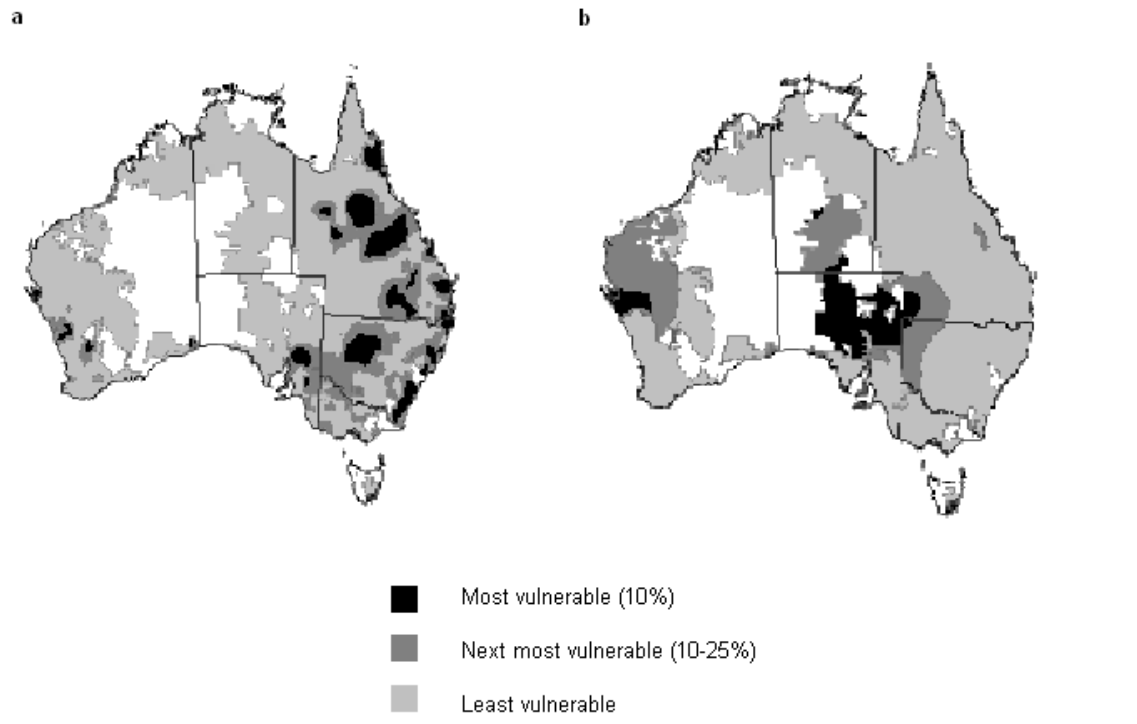


Figure a: Vulnerability of Australian broadacre farms using combined index
Figure b: Exposure of Australian broadacre farms to climate risk

[a] Climate risk represented in terms of extreme pasture growth. [b] Variables used in the index include: average income, income risk and off-farm income (financial capital), diversity of income sources and area operated (physical capital), degradation and Pasture Growth Index extreme (natural capital), operator education and spouse education (human capital), partnerships, internet use, and landcare membership (social capital).

Data source: Nelson et al. (2005).

Climate risk, as modelled by an extreme pasture growth index, was not a substantial driver of overall vulnerability (figure 2.18b). Although some areas, such as central Australia, are exposed to climate risk, overall farm vulnerability does not necessarily coincide with the areas of greatest climate variability. Nelson et al. (2005) concluded that the risks of operating in areas of low and variable rainfall could be offset by other factors, such as scale, and that biophysical indicators of vulnerability (such as rainfall and soil type) are poor indicators of the vulnerability of farm households.

2.5 Rural-urban drift, sponge cities and small towns

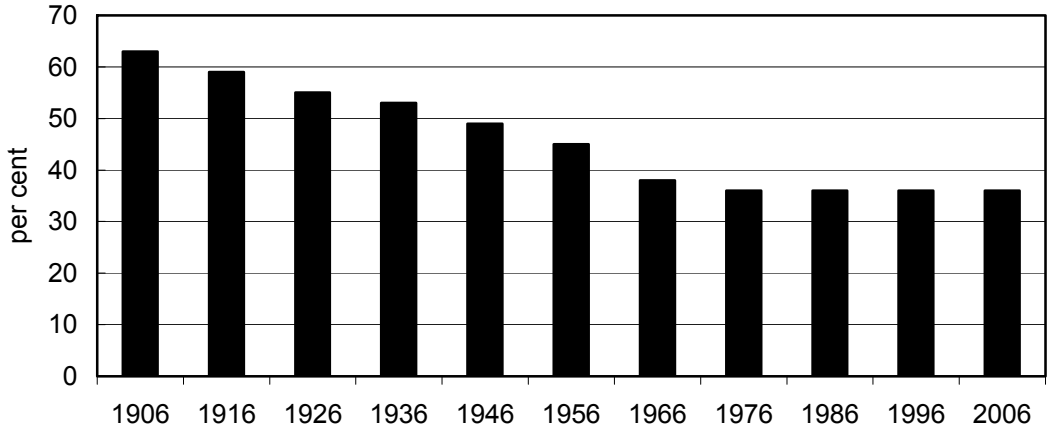
Many participants to this inquiry consider that drought assistance has a role to play in retaining resources in inland Australia. For example, a local Wimmera grain company owner stated:

> The government does need to acknowledge the need to keep regional Australia well populated. We cannot have a country where 90 per cent of our population is along the coastal strip. (Grimble 2008, p. 5)

In assessing the role of drought policy in this context, it is important to first understand that forces, often beyond the influence of governments, have shaped and will continue to drive the settlement patterns of rural Australia.

Australia has steadily become more urbanised over time. In 1906, around 63 per cent of the population lived outside the capital cities, falling to about 36 per cent in the 1970s. Contrary to common perception, this feature of rural-urban drift has since stabilised at that level (figure 2.19), but there is still change within this overall metro-rural split. Between 2001 and 2006, for example, capital cities, some coastal regions, provincial centres and mining towns experienced population growth, whereas the population in many remote areas declined (figure 2.20).

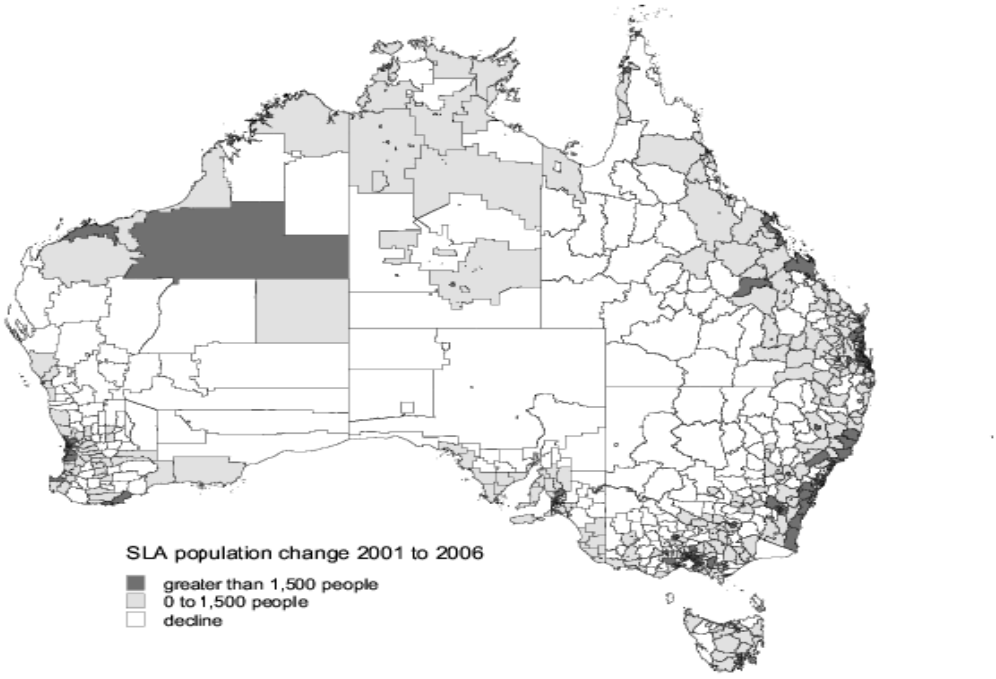
Figure 2.19 **Proportion of population living outside capital cities, 1906-2006[a]**



[a] Excludes the Northern Territory and ACT in 1906 and 1916, and the Northern Territory from 1926 to 1946.

Source: ABS (*Australian Historical Population Statistics*, Cat. no. 3105.0.65.001).

Figure 2.20 **Population change, 2001 to 2006**



Note: SLAs refer to Statistical Local Areas.

Source: ABS (*Regional Population Growth, Australia, 1996 to 2006*, Cat. no. 3218.0).

The ABS (2006a) noted that, in 2004-05, the largest population growth outside capital cities occurred in coastal areas, most of which resulted from internal migration, as people from inland areas and cities moved towards the coast — a reflection of the so-called 'sea-change' phenomenon. Some of the coastal areas with high rates of population growth during the period 2000-05 included Hervey Bay, the Sunshine Coast, and the Gold Coast-Tweed region (ABS 2006a, p. 80). Some inland regional areas, including major provincial centres and towns around the periphery of capital cities have also experienced significant population growth, as have 'tree change' areas. For example, between 2001 and 2006, inland regional areas such as Maitland in New South Wales, Greater Bendigo in Victoria, and Mount Barker in South Australia, all experienced strong population growth (ABS 2007). These population movements are likely to reflect factors such as the relocation of retirees, individuals seeking a change of lifestyle, high city house prices, and the development of technologies that enable people to 'telecommute'.

A number of regional towns have had strong population growth because of the growing demand for labour by the mining industry. The population in high growth mining towns expanded by between 2.2 per cent per annum (Roxby Downs) and 8 per cent per annum (Dysart) between 2001 and 2006 (ABS 2008e).

Some small towns have benefited from the inflows of people to selected coastal and inland areas, while others have declined due, in part, to the greater availability of commercial and other services in the larger towns and to the long-term decline of some rural industries. Prolonged drought may have exacerbated these trends. Over the 1996–2006 period, although remote and very remote areas experienced negative population growth rates, the population growth rate for inner regional areas (as well as major cities) was positive (table 2.8).

Table 2.8 **Population change by area**
Per cent, average annual growth rate

	1996–2001	*2001–2006*	*1996–2006*
Major cities	1.8	1.4	1.6
Inner regional	0.3	1.4	0.8
Outer regional	-0.7	0.8	0.0
Remote	-0.7	0.0	-0.4
Very remote	-0.5	-0.2	-0.3
Australia	1.2	1.3	1.2

Source: ABS (*Australian Social Trends, 2008,* Cat. no. 4102.0).

A notable feature of these data is that the population growth rate for remote areas was negative in the 1996–2001 period (a non-drought period), but was zero in the 2001–2006 period (which included the 2002-03 drought). Additionally, the rate of population decline for very remote areas was faster over 1996–2001 than that over 2001–2006. Overall, the data suggest that major cities and inner regional areas have grown at the expense of remote and very remote areas, but that this phenomenon is a broad trend, and that drought is only one of the many factors at play. Indeed, the New South Wales Farmers Association observed:

> … Tamworth and Orange and Wagga, those centres are doing particularly well. They are sort of the sponge centres, they're dragging and sucking the lifeblood out of a lot of smaller towns, we know that. But the second-tier towns are all towns that have very, very strong, vibrant communities; probably won't expand much but they are strong, vibrant communities. What the drought has done to those communities is it is dragging them down to the level where whether they can be sustained or not is a problem … those towns that have been struggling even in the good times are probably going to continue and the government needs to make a decision about how they're going to address those issues. (trans., pp. 592-3)

The agglomeration benefits of urbanisation are attractive to people and businesses alike (Bradley and Gans 1998). Larger centres have greater product variety, higher order health services, a greater range of leisure activities and economies of scale. They offer better access to a skilled workforce, transport cost savings and inter-firm knowledge spillovers. Improved roads and cars make it is easier for farmers and

other local residents to travel to these centres. This, in turn, adds to the adjustment pressures felt by many small towns, as noted by Budge:

> Agricultural production levels, which were once an indicator of the performance of an area, are now not necessarily an indicator of growth. Financially successful farmers may reside in areas with population loss, declining labour markets and loss of services in the towns and rural areas in which they operate. The reality is that the functions of many country towns that once performed the role of rural service centres may no longer have much economic and social relationship with those people and properties comprising the agricultural base of the area … (Budge 2005, p. 6)

The changing distribution of non-metropolitan populations can have consequences regarding the impact of drought on regional areas, which is explored further in chapter 3.

Regional policy and drought support

The Expert Social Panel (Kenny et al. 2008) observed that drought can hit rural communities particularly hard. Inquiry participants made similar observations to the Commission. For example, Centroc (Central New South Wales Councils) pointed to the impact of drought on less resilient regional economies:

> The decimating of communities will only lead to less and less services within rural communities including medical services having a multiplying downward spiralling impact for rural and regional Australia. (sub. 105, p. 1)

Similarly, the Victorian Farmers Federation argued:

> … it is a lot easier for urban communities to weather business shocks that can cause impacts similar to the impact of drought on regional economies. (sub. 74, p. 5)

The view that drought assistance is needed to underpin rural economies is typically supported by two arguments:

- the circulation of support payments through farmers to businesses is said to keep local agriculture-dependent communities 'ticking over', thereby offsetting the incentive for town residents to seek (often permanently) alternative employment elsewhere
- drought policy — and any other injection of funds or differential treatment that favours regional areas — is necessary to retain a critical mass of population and preserve the social fabric of local communities.

The first argument reflects an incidental outcome from providing cash to farmers who, by nature of occupation, generally reside, and make some of their purchases, in non-metropolitan locations. The second implicitly promotes drought assistance as a tool of regional development policy. The efficacy of using temporary drought

relief as a regional development tool is highly questionable given that it would, at best, be an intermittent and partial palliative for the broader long-term forces identified in this chapter.

Specific regional development policies have been implemented by governments over time. One example is soldier settlement schemes (box 2.6).

Box 2.6 **Soldier settlement farms**

Following both world wars, governments introduced soldier settlement schemes which encouraged returned servicemen to take up plots of agricultural land as a form of repatriation and compensation.

After World War I, more than 37 000 returned servicemen settled on small blocks of land provided by the states, with low interest loans sponsored by the Australian Government. The small blocks, many of them irrigation farms, were often situated on land not well suited to agriculture (Shaw 1982), which, when coupled with the lack of agricultural experience of many returned servicemen, made successful farming difficult. Consequently, many settlers left their blocks during the 1920s and 1930s.

Another, smaller, soldier settlement scheme (the War Service Land Settlement Scheme) was introduced at the end of World War II. Unlike its predecessor scheme, application criteria were more stringent, requiring, for example, that returned servicemen demonstrate their eligibility, suitability and qualifications for settlement and detail their prior agricultural experience. The size of holdings offered to returned servicemen were also larger than in the previous scheme, and adequate guidance and technical advice were made available via extension services. Based on its objectives, this scheme was more successful than its predecessor. However, part of this may be attributable to the improvement in commodity prices that occurred during its early years of operation (Campbell 1982). Australia's soldier settlement initiatives are still seen as a source of structural adjustment problems (Stephens and McGuckian 1995, Watson 2008).

The experience of soldier settlement farming suggests there are lessons that can be drawn from some earlier policies that aimed to influence the regional distribution of population. The merits or otherwise of broader, longer term approaches to regional development — whether through decentralisation, infrastructure investment, greater provision of services, horizontal fiscal equalisation, taxation zone rebates or payroll tax concessions — however, is outside the scope of this inquiry. As discussed in chapter 11, there are a number of state and territory policies that mix the objective of regional development with drought assistance — such overlaps need to be considered and addressed when devising future policies.

3 Climate variability and drought

Key points

- Droughts are a recurrent and frequent feature of Australia's climate.
  - Severe droughts bring sharp reductions in agricultural output and farm incomes.
  - Drought tends to exacerbate social problems.
- There have been three particularly severe and prolonged dry periods in Australia since 1900, including the period 2002 to 2007 (through to 2008 in some regions).
- Although the period 2002 to 2007 is regarded by many as one long drought, it includes three of the four highest ever years for Australia's overall agricultural output.
- Expert projections for Australia's climate make it clear that farmers and other Australians should be prepared for a hotter future. The outlook for rainfall is for continued variability, and for some regions, more frequent periods of extremely low rainfall. There is, however, large uncertainty surrounding the rainfall projections.
- Inflows to the Murray-Darling Basin in recent years have been the lowest on record, contributing to dramatic declines in annual allocations to irrigators.
  - In future there is likely to be substantially less water available for irrigation and its supply may become more variable. The consequences for irrigators, however, depend not only on the climate but, to a large extent, on water policy.

3.1 Drought and climate variability in Australia

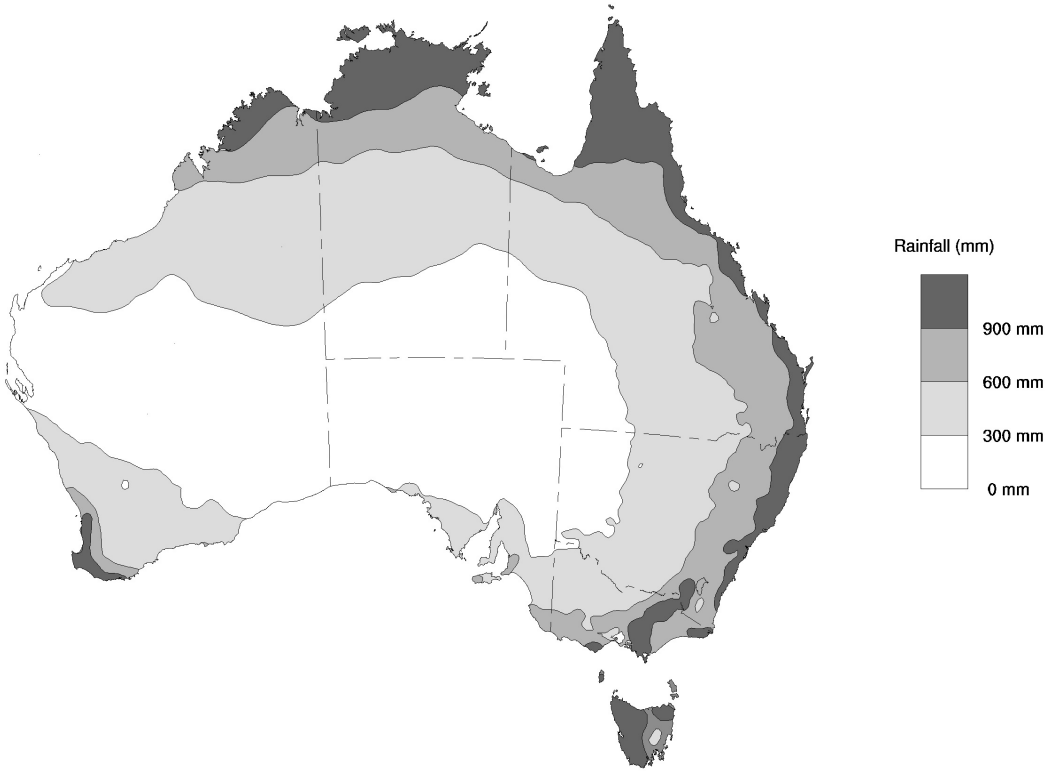
This chapter discusses Australia's experience of climate variability and drought from meteorological, economic, social and environmental perspectives. In doing so it draws on the reports by the Bureau of Meteorology–CSIRO and the Expert Social Panel that form part of the review of drought policy.

Australia's climate

Average annual rainfall is relatively high along the eastern coastal fringe (from northern Queensland to Victoria and western Tasmania), parts of northern Australia and a small part of the southwest of Western Australia. Large areas of Australia's

interior have an average annual rainfall of less then 300 mm (figure 3.1). There is a general gradient from warmer conditions in the tropical north to cooler conditions in the south, although topography also influences temperature.

Figure 3.1 **Average annual rainfall[a]**



a Averaged over the period 1900 to 2007.

Source: BoM (2008 unpublished).

There is some degree of seasonality of rainfall almost everywhere in Australia (Lindesay 2005). There is a bias towards summer rainfall in northern Australia. This is most extreme in tropical areas that experience monsoonal rain. There is generally a winter bias in rainfall for more southerly latitudes.

Climate, including rainfall, varies from year to year. Indeed, Australia has one of the most variable climates in the world (Hennessy et al. 2008). Various factors, such as the El Niño–Southern Oscillation (ENSO) and the Indian Ocean Dipole, drive this variability on a range of timescales. These relate to interannual fluctuations in the ocean-atmosphere system. For example, during the El Niño extreme of ENSO, tropical convection and moist easterly onshore airflow diminishes over Australia, and parts of eastern Australia become generally sunnier, drier and warmer. El Niño events recur on average every three to six years, but this varies. The other extreme, La Niña, typically brings wetter than average conditions in eastern Australia.

Defining drought

Drought is a part of Australia's climate variability. Drawing on international meteorological literature, Hennessy et al. (2008) refer to four types of drought.

- *Meteorological drought*: a period of months to years when atmospheric conditions result in low rainfall. This can be exacerbated by high temperatures and high evaporation, low humidity and desiccating winds.
- *Agricultural drought*: short-term dryness in the surface soil layers (root-zone) at a critical time in the growing season. The start and end may lag that of a meteorological drought, depending on the preceding soil moisture status.
- *Hydrological drought*: prolonged moisture deficits that affect surface or subsurface water supply, thereby reducing streamflow, groundwater, dam and lake levels. This may persist long after a meteorological drought has ended.
- *Socioeconomic drought*: the effect of elements of the above droughts on supply and demand of economic goods and human wellbeing.

Meteorological drought and agricultural drought are of primary importance to dryland agriculture. Hydrological drought is of particular relevance to irrigated agriculture. In relation to 'socioeconomic drought', it should be understood that neighbouring wheat farms that receive the same low rainfall have experienced the same severity of drought, even if the socioeconomic effects of this are much more pronounced on one farm than the other due to factors such as relative management skills or capital bases. As argued by the Australian Land Management Group, there is a need to 'distinguish between cause (a meteorological event) and effect (stress of various forms)' (sub. 24, p. 3).

For simplicity, this report uses the term 'drought' to refer to the first three types above. When hydrological drought is being specifically discussed, reference is made to its:

- primary cause — low inflows to water bodies
- main consequence for agriculture — low water allocations to irrigators.

History of major droughts

Droughts are a natural, recurrent and frequent feature of Australia's climate. Droughts vary in their intensity, duration, geographic extent and proximity to the preceding drought. Box 3.1 briefly describes the major periods of drought since the mid 1800s.

Box 3.1	**Major periods of drought and their effects**
1864-66	All states affected except Tasmania.
1880-86	Southern and eastern states affected.
1895-1903	The Federation Drought. Several years of generally below-average rainfall were followed immediately by one or two years of exceptionally low rainfall. Sheep numbers halved and more than 40 per cent of cattle were lost. Most devastating drought in terms of stock losses.
1911-16	Loss of 19 million sheep and 2 million cattle. The national wheat crop failed completely in 1914.
1918-20	Only parts of Western Australia free from drought.
1939-45	The Forties Drought. Loss of nearly 30 million sheep between 1942 and 1945. 1940 was one of the driest years on record across southern Australia.
1963-68	Widespread drought, the last two years of which saw a 40 per cent drop in wheat harvest, a loss of 20 million sheep, and a decrease in farm income of $300-500 million.
1972-73	Mainly in eastern Australia.
1982-83	One of the most intense and widespread droughts on record. Total loss estimated in excess of $3 billion.
1991-95	Particularly dry in parts of Queensland, northern New South Wales and parts of central Australia. Average production by rural industries fell about 10 per cent, resulting in possible $5 billion cost to the Australian economy. There was particularly low rainfall across large parts of Australia in 1994.
2002-07	Winter crop production declined sharply in 2002-03 and, after recovering, declined again in 2006-07. Inflows to the Murray-Darling Basin were the lowest on record, severely impacting irrigated agriculture.

Sources: BoM (nd); Lindesay (2005).

Many participants regard the period from 2002 to at least 2007 as being one long drought (Macquarie River Food and Fibre, sub. 36; Queensland Farmers' Federation, sub. 82; NSW Farmers' Association, sub. 98). The National Farmers' Federation stated:

> The last seven years have been a challenging period for Australian farmers with widespread and prolonged drought leading to a severe reduction in farm production … (sub. DR176, p. 17)

The final section of this chapter places this recent period in the context of the historic record and likely future climate.

3.2 Effects on agricultural systems

Drought is but one of the climatic risks farmers face. Too much rain, very heavy rain, or rain at the wrong time of year, can damage crops and hamper harvesting. Floods can kill livestock and cause damage to farm infrastructure. Frosts, hail and extreme winds can also affect farm production and income.

Drought, however, differs from these other climate risks in at least two important ways. First, drought can affect a much greater proportion of farms at any one time. Second, drought usually has a slow onset, can last for several years, and its end can be highly uncertain. Other climate risks are usually discrete events.

The effects of drought on different types of agricultural systems are outlined below. These effects can be reduced or ameliorated through farm management practices, as discussed later.

Broadacre grazing

Drought generally reduces pasture growth, which translates to lower meat or wool production. In addition, the carrying capacity of the land decreases and so either some livestock must be sold, feed bought in, or animals agisted where feed is available. If livestock are sold early due to drought, the farmer's income will be reduced and brought forward. Providing supplementary feed drives up costs, and so reduces farm profit, but can assist in retaining core breeding stock. Drought can also make it more difficult and expensive to provide water for livestock.

Dryland cropping

Dryland cropping yields are highly dependent on the quantity and timing of rain prior to and during the growing season. Much of Australia's cropping is on land that receives insufficient rain to yield a profitable crop fairly frequently, with some crops failing altogether. There are, however, some higher rainfall areas, particularly in Western Australia, that tend to produce higher wheat yields in relatively dry years (Land and Water Australia 2006).

Meteorological conditions are often judged in terms of the number of good seasons experienced over a five or ten year period. The likelihood of poor seasons occurring influences land prices and this can mean that some land is profitable for opportunistic cropping even if very good seasons only occur once or twice in five years.

Irrigated cropping

The availability and price of water to an irrigated property depends on water policy and water markets, as well as on the inflows to rivers and groundwater sources. Irrigators generally experience relatively little disruption during a short drought. However, when inflows have been low for an extended period, holders of water entitlements may only receive a small proportion of their usual annual allocation and sometimes zero allocations occur. Farmers can maintain production by buying water on the temporary market, but prices tend to increase substantially during dry periods. When water prices are high, some irrigators choose not to plant and so have no crop to sell at the end of the season (although they may have some income from selling that year's water allocation). Others temporarily switch to dryland forms of agriculture, while the remainder buy water to grow an irrigated crop. For those who do put in an irrigated crop, the quantity of rainfall on the property can also be important as this influences how much water needs to be purchased.

Horticulture

Horticulture in Australia is intensive and generally irrigated. In many cases, horticulture involves perennial plantings such as fruit trees and grape vines. Trees and vines generally require some irrigation water to survive and even more if they are to produce a good harvest. During periods with low inflows, when water allocations are low and water prices high, the choice can be between allowing plantings to die (which can lead to expensive reestablishment followed by a period of several years before full production is restored) or facing a water bill that is so high as to make the farm unprofitable in that year. Severe pruning to minimise water use is another strategy that is sometimes adopted and this can also be costly.

Dairy farming

About half of Australian dairy farms are irrigated to some degree (Australian Dairy Industry Council, sub. 58), which largely explains why 'pasture for grazing' is the single largest use of irrigation water in Australia (table 2.6). These farms can experience problems associated with the low water allocations and high water prices described above. Often, irrigated and dryland dairy farms buy in feed during droughts. As explained by the Australian Dairy Industry Council:

> … income production from milking cows is tied to fixed infrastructure (the milking shed), meaning feed has to be brought to a milking herd. Buying, transporting and feeding out large quantities of high quality feed is an expensive operation. To be agisted elsewhere, milking cows would have to be dried off and consequently do not produce income. (sub. 58, p. 2)

Intensive livestock

Intensive livestock production, such as that undertaken by pork, chicken and some beef producers, relies on purchasing feed all of the time, not just during drought. The main impact of drought on these producers is that it tends to increase their delivered feed costs. Australian Pork Ltd reported:

> … in general feed cost amounts to almost 60 per cent of cost of production for a pig, and approximately 80 per cent of total feed costs are related to the costs of grains. (sub. 95, p. 13)

While drought in Australian grain growing areas tends to push up feed costs, other factors, such as international grain prices, can also be important.

3.3 Market impacts

Drought has varying effects on the agricultural sector, regional economies, and the national economy.

Impacts on agriculture

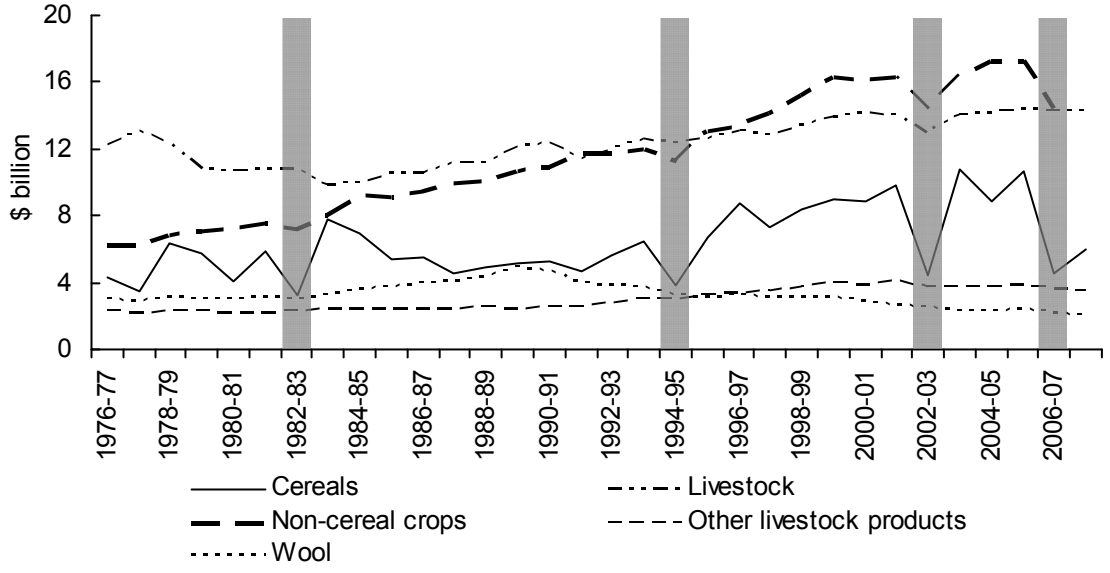
Agricultural output

As noted in chapter 2 (figure 2.1), the four most recent widespread drought years (1982-83, 1994-95, 2002-03 and 2006-07) have all been associated with a sharp reduction in agricultural output. For example, agricultural output decreased by approximately 19 per cent between 2005-06 and 2006-07. Despite recurring droughts, agricultural output has continued to increase over the longer-term. Indeed, three of the four highest output years in Australia's history occurred in the three years between 2002-03 and 2006-07.

Drought has different effects on the various types of agricultural operations (figure 3.2). The output of cereal and non-cereal crops declines sharply in drought years, but tends to rebound strongly in the following year.[1] Drought generally causes a reduction in livestock production and this impact may be spread over a number of years.

[1] It is common for above average rainfall years to follow drought years and this often contributes to the increases in crop production.

Figure 3.2 **Agricultural output by industry, 1976-77 to 2007-08[a]**
Chain volume (2005-06 prices)



a Other livestock products includes milk, eggs and honey.

Data sources: ABS Australian National Accounts; Agricultural Production (2008 unpublished).

Farm incomes

Drought generally decreases farm incomes because it reduces output and can increase costs. However, as discussed in the previous section, drought has differing effects on various types of agricultural activities.

Other economic variables, and decisions that farmers make in response to them, also affect farm incomes. For example, in recent years many dairy farmers have purchased fodder to maintain production during drought and this has increased their costs. However, the prices received by farmers for milk increased between 2002-03 and 2007-08, with a large increase of approximately 50 per cent between 2006-07 and 2007-08 (ABARE 2008c, p. 744). Although the farm cash income and farm business profit of dairy farms was adversely affected by 2006-07 drought, its impact was at least partially offset by higher milk prices. More recently, world milk prices have declined, and consequently Australian farm-gate milk prices were forecast (in December 2008) to fall by approximately 5 per cent in 2008-09 compared to 2007-08 levels (ABARE 2008c).

The drought preparedness strategies undertaken by farmers will also influence the extent to which a drought event affects their output and incomes. For example, a livestock producer who has stored substantial quantities of fodder to feed stock is likely to suffer a less severe drought-induced decline in output and income than one who has taken fewer such measures.

The data presented in chapter 2 generally show that each of the major droughts that have occurred in the past 25 years has been associated with a reduction in the cash incomes of broadacre and dairy farms. Incomes for both have recovered after droughts, although the magnitude of recovery differs with each drought episode.

In contrast with the volume of agricultural output, which as noted, continues to increase despite periodic droughts, farm incomes do not display a similar upward trend. This is because of the confluence of factors affecting farm incomes, most notably the long-term decline in the farm terms of trade.

Asset values

Land is the main asset for most farm businesses[2]. A major influence on the value of farm land is the future return expected from owning it. Often this relates to future agricultural production, but may also relate to the conversion of the land to other uses, such as residential use. The occurrence of drought in a particular year does not generally lower expectations about returns for future seasons and so would not be expected to have a major influence on the value of farming land. An exception to this might occur if the drought resulted in a sharp increase in the number of properties coming on to the market in a region where there are few potential buyers.

The evidence is consistent with this hypothesis. Rates of return to farming have been relatively high (see chapter 2), including during the 2002 to 2007 period, in large part due to continued increases in farm land values (figure 3.3). ABARE (2008e) stated that the phenomenon of continually increasing farm land values reflected factors such as changes in population growth, urban and peri-urban development and economic growth in regions strongly influenced by mining. Further reasons for the continued increase in farm land values may include:

- the positive attitude of banks towards agriculture
- new and more intensive farming systems
- competition for limited land with neighbours and new managed investment schemes (O'Callaghan 2006).

2 Extensive pastoral leases across northern Australia are a significant exception.

The Australian Bankers' Association argued that increases in land values reflected expectations that future commodity prices would be strong:

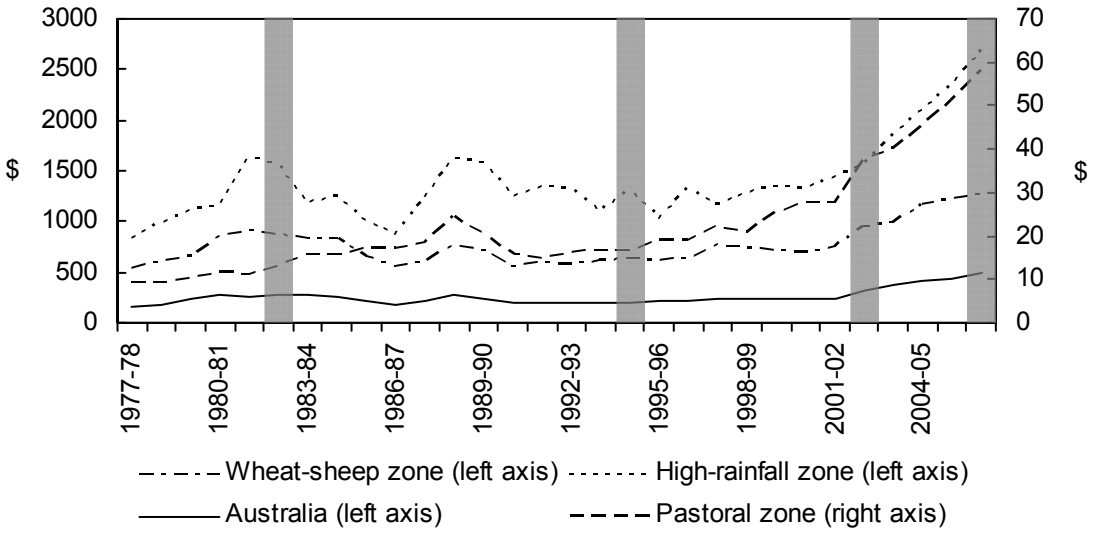
> That phenomenon of increasing land prices during this drought has been an extraordinary event … prices are reflecting the expected demand for soft commodities, going forward … those prices are now looking a little bit high, but over the long-term, the expectations are there that there will be pressure on commodity prices that are expected to enable those property prices to be sustained. (trans., pp. 470-1)

Another possible reason why farm land values have increased in recent years is due to investment interests from abroad. Compared to other countries (especially those where land is much more expensive and those with weaker systems of property rights and institutional structures) investment in agricultural land in Australia seems to represent a quite attractive investment opportunity.

It is also possible that the provision of government drought support, particularly interest rate subsidies, has been capitalised into farm land values, making land prices higher than they would otherwise be. The National Farmers' Federation submitted:

> It is important to note that farm land value has been intrinsically tied to drought policy in the recent decade. Interest-rate subsidies, EC support, and other assistance measures have buffeted and placed a 'floor' under land value. (sub. DR176, p. 21)

Figure 3.3 **Broadacre land values per hectare, 1977-78 to 2006-07**
Average per farm (2007-08 dollars)



Data source: ABARE (2008 unpublished).

There appears to be little evidence of a clear relationship between land values and drought for various types of broadacre land. Indeed, over the period 2002-03 to 2006-07, (real) average land values per hectare for broadacre farms in exceptional circumstances (EC) declared areas (as of 30 June 2007) increased at a faster rate than those for non-EC declared areas (ABARE 2008 unpublished).

Investment in other farm assets, such as machinery and equipment, may be affected by drought. Constrained cash flows caused by drought can reduce the ability of farmers to invest in new assets and undertake the maintenance of existing assets, reducing their productive value. Figure 2.16 shows that gross fixed capital formation decreased during the 2002-03 and 2006-07 droughts. After the 2002-03 drought, gross fixed capital formation recovered, suggesting that drought may postpone investment decisions taken by farmers rather than prevent new investment altogether.

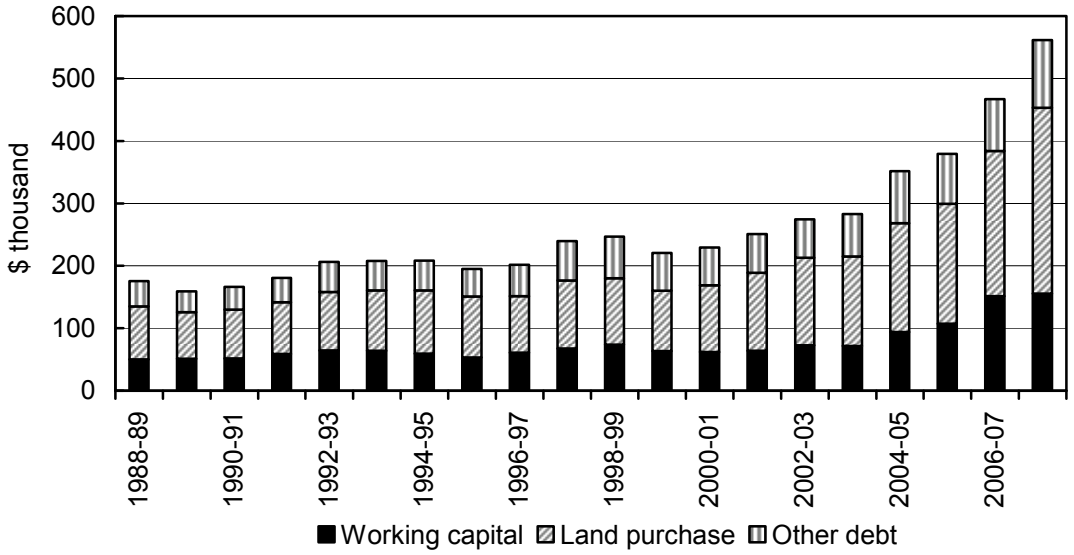
Farm debt

During the late 1990s and early 2000s, average (broadacre and dairy) farm debt increased (figure 3.4), primarily as a result of the financing of new investments associated with a rising proportion of farms purchasing additional farm land (ABARE 2008e). Since the 2002-03 drought however, there has been an increase in farm working capital debt. High land prices have allowed many farmers to maintain high equity positions despite increases in their debt. As noted by the Australian Bureau of Agricultural and Resource Economics (ABARE), farmers with low equity tend to have greater difficulty accessing working capital debt facilities, and therefore need to rely more heavily on surplus cash flows generated by their farm businesses to provide funds for working capital and drought recovery (ABARE 2008e, p. 12).

Agricultural adjustment

Drought can exacerbate existing adjustment pressures facing farmers. The combination of factors such as declining farm terms of trade, technological change, and the trend towards larger farm sizes are all long-term adjustment issues in agriculture, and are more likely to induce changes in farm numbers than the recurrent phenomenon of drought. Nevertheless, the occurrence of drought may induce some farmers facing adjustment pressures to leave the industry, though often not until after the drought has ended. However, young farmers who have bought their properties, or farmers who have made large investments (such as buying more land to become more viable), just before drought may suffer particularly adverse financial effects due to unfortunate timing.

Figure 3.4 **Broadacre and dairy farm business debt, 1988-89 to 2007-08**
Average per farm (2007-08 dollars)



Data source: ABARE (2008 unpublished).

Regional impacts

The direct decline in agricultural activity that arises from drought can also have effects on agriculture-dependent businesses, such as farm machinery and equipment suppliers, fertiliser and seed suppliers and harvesting contractors. During drought, farmers are less likely to require the goods and services of such firms, leading to a decline in their production levels. The decrease in output of agriculture and agriculture-dependent business also reduces the output of other regional industries due to reduced final expenditures on the goods and services they produce.

With lower levels of production, primary producers and agriculture-dependent businesses often reduce the number of hours worked by existing workers and/or reduce the number of workers they employ. This also applies to other regional industries affected by reduced expenditure on the goods and services they produce. The financial and employment effects of drought on a particular region are dependent on a range of factors. This includes the severity and duration of drought, the types of agricultural output produced in the region and their linkages with downstream industries, and the relative importance of agriculture to the region (Stayner 1996).

As an example of how drought severity may differ between regions, Adams et al. (2002) observed that, during the 2002-03 drought, some grain growers around Adelaide, south east South Australia and south-western Victoria realised near average harvests. However, other areas, such as the eastern Eyre Peninsula (in South Australia), north-western Victoria and northern New South Wales, suffered extreme or total crop failure. On a state basis, New South Wales suffered the largest decline in agricultural output in 2002-03 (32 per cent), while large falls also occurred in Western Australia (28 per cent), South Australia (26 per cent) and Victoria (21 per cent) (ABS 2008d).

The extent to which a region is affected by drought is in part dependent on the types of agriculture practised. Regions with a high proportion of broadacre cropping may be more vulnerable to a rainfall drought than a region that has a high proportion of irrigated dairy farming. In broadacre livestock areas affected by drought, farmers can agist stock, which can increase activity in regional transport industries, or reduce stock numbers, potentially increasing activity in local abattoirs and associated industries.

The effects of drought on a given region may also be ameliorated if there is a significant increase in the proportion of farm household members who obtain off-farm income, especially if it is not agriculture related or weather-dependent. Expenditure of such income in the region can partially offset drought-related reductions in final expenditures, regional output and employment. There may, however, be some changes in the composition of regional output, as income obtained is likely to be spent on maintaining consumption levels, rather than on-farm inputs. Furthermore, nonfarm businesses can reduce the flow-on effects of drought they experience by reducing their inventories, and depending on their degree of mobility, seeking productive opportunities in other localities (Stayner 1996).

As discussed in chapter 2, the relative significance of agriculture has declined over time, and a number of factors have favoured the growth of larger regional centres over smaller rural towns. For example, Stayner observed:

> Farmers now have more reasons for visiting town, and it is efficient to tend to them all in the same place. Because it is now necessary to go to town to do the banking, buy chemicals, and pick up a replacement part, and since the increasing complexity of these inputs makes it desirable to shop around for price, service and information, there are 'agglomeration' economies which favour the larger places offering such services and choice. (Stayner 1996, p. 4)

Moreover, with better and cheaper transport, the relative costs of going further, to a larger town, have declined while the benefits have increased.

Levantis (2001) found that, although the economies of many small towns (defined as those with less than 1000 people) were highly dependent on (broadacre) farm expenditure, most farm expenditure took place in larger towns. However, in larger towns, farm household expenditure per town resident (used as an indication of the relative importance of agriculture to the local economy) was lower than in small towns. Therefore, although small towns are still highly dependent upon expenditure from agriculture, larger towns are less so. Indeed, chapter 2 (box 2.2) showed that agriculture accounts for only a relatively small share of inner regional employment. Agriculture is more important to employment in outer regional, remote and very remote areas. However, private services are more important than agriculture in all of these areas, and other industries, such as health and education, and infrastructure, also account for a large share of total employment (BITRE 2008).

The growth of regional centres and declining significance of agriculture in these centres also means that alternative employment opportunities available to individuals outside agriculture are changing. Given the industrial diversification of regional centres, they typically provide a fairly wide range of employment options. However, as activity has moved away from smaller rural towns, the employment options they offer have generally reduced. Nevertheless, the wider the range of alternative employment choices available to individuals, the less severe the impacts of drought on employment are likely to be. For example, in its submission to this inquiry, the Rangelands Drought Taskforce South Australia stated:

> The mining boom and high demand for employment in the region has masked many of the negative impacts of the drought (sub. 60, p. 2).

In summary, while droughts have negative effects on economic activity and employment at the regional level, the growth of regional centres and the declining significance of agriculture in these centres means that these effects have gradually become less pronounced than in the past.

National impacts

Although agriculture now accounts for only a small share of Australia's national economic output, drought can still have a significant influence on measured gross domestic product (GDP). For example, the ABS estimated that the 2002-03 drought reduced farm GDP by around 28.5 per cent, which subtracted around 1 percentage point from Australia's aggregate GDP growth (ABS 2004). The latter estimate reflects only the direct effects of drought (that is, those that result only from the direct decline in farm GDP).

Droughts also have flow-on effects, which occur due to reductions in the output of agriculture-dependent industries and decreased final expenditures in other

industries. These effects are more difficult to quantify than the direct effects of drought, but one way to do so is to use a Computable General Equilibrium model. Horridge et al. (2005) used such a model to analyse the effects of the 2002-03 drought on a range of economic variables. They estimated that the 2002-03 drought led to a reduction in Australia's GDP growth of 1.6 percentage points. Of this, 1 percentage point reflected the direct decline in agricultural production, and the remaining 0.6 of a percentage point reflected negative flow-on effects. More recently, the Reserve Bank of Australia (RBA) forecast that the fall in farm output in 2006-07 would reduce GDP growth by around one half of a percentage point (RBA 2006).

In Australia, droughts have reduced GDP growth in the years in which they occur, but have not slowed growth in the long run. When the agricultural sector recovers from drought, farm GDP increases, and this causes aggregate GDP to rise. For example, the RBA estimated that:

- the 1982-83 drought reduced Australia's GDP growth by around 1-1.5 percentage points, but the subsequent recovery added approximately the same amount to GDP growth
- the 1991-95 drought period also subtracted around 1-1.5 percentage points from GDP growth, while the recovery added approximately 0.75 percentage points to GDP growth (RBA 2002).

The effect of drought on the GDP growth rate is essentially transitory because in the long-run, GDP growth depends on the growth rates of labour and capital accumulation and total factor productivity growth (that is, increases in output that occur for a given quantity of inputs), not temporary movements in the level of farm GDP.

Although drought can have significant ramifications for farm and other regional employment, it does not necessarily have the same effect on aggregate (nationwide) employment:

> Whilst the [2002–03] drought had a devastating impact on agricultural employment, the strength of the broader domestic economy saw above trend growth in total employment. … at an aggregate level, employment declines related to drought were offset by the strong growth in other sectors. (Lu and Hedley 2004, p. 34)

Despite the decline in agricultural employment arising from the 2002–03 drought (see figure 2.5), total economywide employment increased in that year. Therefore, although drought may result in a decline in employment in rural areas, it does not necessarily mean that aggregate levels of employment will decline. Growth in non-agriculture industries provides individuals with the opportunity to find alternative sources of employment, although not always in the same region.

The effect of droughts on inflation are generally relatively small, although there can be significant price effects on certain food items in the short term. For example, the prices of foods that rely on wheat as an input typically rise after the onset of drought, whereas meat prices initially fall as slaughter rates increase. The RBA (2008) made the observation that, during the droughts which occurred in 1982-83, 1994-95 and 2002-03, average food prices increased at approximately the same rate as the overall Consumer Price Index. The RBA stated that the reasons for the historically muted effects of drought on consumer prices are because:

- the contribution of commodity prices to final retail food prices is often small
- the contribution of drought-affected food prices to the Consumer Price Index is relatively small
- the increase in cereal prices is partially offset by lower meat prices
- many food items can be imported if shortfalls in domestic production occur
- some food manufacturers who use drought-affected inputs have some scope to use substitute ingredients.

In contrast to previous droughts, the 2006-07 drought did result in food prices increasing at a faster rate than the overall Consumer Price Index. The reason for this, according to the RBA, was because a broader range of food items were affected than in previous droughts. In particular, the RBA noted that because the decline in stored water levels led to reductions in dairy and vegetable production, the prices of these items rose more markedly than in previous droughts (RBA 2008, p. 11).

3.4 Social impacts

As stated by the Tasmanian Farmers and Graziers Association:

> Drought is … not just about the mechanics and business of farming, but about people, about health and wellbeing, about education, community welfare, social cohesion, rural living, and about all the aspects of life that humans are involved in. (sub. 69, p. 7).

The Expert Social Panel's report on the social dimensions of drought was presented to the Commonwealth Government at the end of September 2008. The Commission is in broad agreement with the panel on many of their conclusions on the social impacts of drought. For example, the following quote from the panel's report is consistent with the Commission's assessment:

> At times the Panel found it difficult to separate the social impacts of dryness from the longer term socio-demographic trends contributing to a decline of some rural populations. However, it was clear from the Panel's assessment that drought has an

impact on the wellbeing of farm families, rural businesses and communities. (Kenny et al. 2008, p. 1)

The intention here is not to cover in detail all of the social impacts discussed in the Expert Social Panel's report, but rather to outline the Commission's understanding of some of the main issues. This understanding informs the policy recommendations made later in this report. This section also makes use of the results of the Australian Institute of Family Studies' Rural and Regional Families Survey, as this appears to be the largest and most comprehensive survey of the impacts of drought on people living in regional and rural Australia (box 3.2).

Box 3.2 **Australian Institute of Family Studies' Rural and Regional Families Survey — methodology**

The Rural and Regional Families Survey is a population-based study of 8000 people living in areas of Australia in which at least 10 per cent of the population were employed in agriculture or a related service industry. The interviews were conducted over September to December 2007 with people living in over 400 postcodes. Four groups of 2000 people were interviewed. The groups (based on rainfall deficits in the area in the last three years compared to the last 100 years) were:

- severe drought (0 to 5th percentile)
- drought (6 to 10th percentile)
- below-average rainfall (11 to 49th percentile)
- above-average rainfall (50 to 100th percentile).

Data on respondents' perceptions of drought were also obtained. The categories derived according to this social definition of drought were:

- currently in drought
- in drought in the last year but not currently in drought
- in drought in the last 3 years but not in the last year
- not in drought in the last 3 years.

The effects of drought were estimated using multivariate statistical modelling (regression analysis), which allows for the effects of drought after taking into account other differences between families and geographic areas.

Source: AIFS (sub. 92).

Financial hardship

Often the market impacts of drought, discussed in the previous section, have social consequences. For example, reduced farm incomes can lead to financial hardship

for households that are unable to adequately supplement their income through off-farm employment, or through drawing down savings, extending their borrowing, or accessing drought assistance or other government income support payments. An applicant for drought assistance in Tasmania reported:

> We have had to sell three-quarters of our stock and also hand feeding grain to the rest so there is no money left for living expenses which puts a lot of strain on the family. (cited in Country Women's Association in Tasmania, sub. 17, p. 3).

Financial hardship affects people in a range of ways. Some farmers told the Commission and the Expert Social Panel that difficulty in finding money to meet the educational needs of their children because of drought was something they felt particularly keenly. The Expert Social Panel reported hearing that 'some children and young adults are being denied educational … opportunities because of household financial limitations' (Kenny et al. 2008, p. 7). However, this could be said of any household facing financial difficulties anywhere in Australia — it is not a problem unique to drought-affected farmers.

The Australian Institute of Family Studies (AIFS) survey quantified the reduction in income arising from drought. It found that (using a rainfall definition of drought) farmers in severely drought-affected areas had, on average, annual household incomes of around $34 600 compared to $38 600 for their counterparts in above average rainfall areas (sub. 92). This is a surprisingly small differential — the average income for those with above average rainfall was only 12 per cent higher than that of farmers in severely drought-affected areas.

The survey provides additional data on financial hardship. As explained by the AIFS:

> Respondents were asked, 'In the last 12 months, did any of the following happen to your family because of a shortage of money? Could not pay electricity or the telephone bills on time; could not pay the mortgage or rent on time; pawned or sold something; went without meals; asked for financial help from friends or family; asked for help from welfare/community organisations'. The experience of one or more of these events was considered to be indicative of financial hardship. (sub. 92, p. 13)

Table 3.1 shows that the proportion of farmers experiencing financial hardship was high relative to farm workers and other people employed in rural areas. This may be related to the risks, capital exposure and infrequency of income faced by farmers. The table also shows that 35 per cent of farmers in areas with above average rainfall experienced financial hardship and this rose to 45 per cent in areas affected by drought. This suggests that in a drought-affected area, the drought results in a further one in ten farmers experiencing financial hardship. In other words, most cases of financial hardship suffered by farmers were due to factors other than drought.

The increase in financial hardship in drought-affected areas was more pronounced for farm workers than for farmers, and there was a marked difference, for those workers, between drought and severe drought. For people living in rural areas and employed outside agriculture, the prevalence of financial hardship was essentially the same irrespective of drought status (table 3.1).

Table 3.1 **Experience of financial hardship, by drought status (rainfall definition) and type of employment [a]**

Per cent of each employment group

	Drought status			
Employment group	Severe drought	Drought	Below average rainfall	Above average rainfall
Farmer	45	45	41	35
Farm worker	36	25	28	23
Employed but not in agriculture	23	24	22	22

a Estimates derived from logistic regression.

Source: AIFS (sub. 92, p. 15).

The AIFS also presented data based on a social definition of drought. These data show a larger increase in financial hardship for those in drought compared to those not in drought, relative to the data based on the rainfall definition (although the drought status categories are somewhat different) (AIFS, sub. 92). Asking people about the drought status of their area would seem to be less reliable than using rainfall records to make this assessment and so this report focuses on the results based on the rainfall definition.

Family relationships

Financial difficulties, concerns over the future of the farm, and other concerns caused or exacerbated by drought can put a strain on family relationships. The Expert Social Panel report on the impact of drought on families found:

> … the present dryness has had an impact on the functioning of rural families, through enforced long-term separation of family members, psychological impacts on toddlers and school age children, an increased burden of responsibility on women and the divisive issue of succession planning in tightened economic circumstances.
>
> The Panel formed the view that while many farmers will say they are coping, their coping mechanisms are creating greater pressure on their families. (Kenny et al. 2008, p. 34)

The Expert Social Panel noted that its findings were contrary to that of the AIFS. From its survey the AIFS found:

> … no evidence that drought had a negative impact upon family relationships, as measured by separation, quality of the couple relationship, family functioning and family conflict. (sub. 92, p. 5)

Whereas the AIFS survey did not find empirical evidence to support the relationship between drought and deteriorating family relationships, the Expert Social Panel drew on a wider range of qualitative evidence.

Mental health

The Expert Social Panel reported:

> It is clear to the Panel that extended dryness has a significant negative impact on the mental health of farm families and others within rural communities. In particular, the Panel heard repeatedly during the public forums and in written submissions that the pressures of drought were leading to an increase in the incidence of depression, anxiety and stress in rural and remote areas. (Kenny et al. 2008, p. 60)

The AIFS survey also found considerably higher rates of mental health problems among people who regarded their area as being in drought (sub. 92). The survey, however, showed very little difference in the prevalence of mental health problems between areas with different drought status, as defined by rainfall (table 3.2). The main exception to this was that a greater proportion of farm workers in severely drought-affected areas had a mental health problem compared to other farm workers, although the AIFS reported that this was not a statistically significant result.

Table 3.2 **Reports of mental health problems, by drought status (rainfall definition) and type of employment[a]**

Per cent of each employment group

	Drought status			
Employment group	Severe drought	Drought	Below average rainfall	Above average rainfall
Farmer	16	17	14	17
Farm worker	13	5	9	8
Employed but not in agriculture	9	9	7	10

a Estimates derived from logistic regression.

Source: AIFS (sub. 92, p. 25).

A smaller study commissioned by the Birchip Cropping Group involving interviews with farm families in northwest Victoria during drought conditions found:

> Serious depression is not common but is present and many reported a loss of enjoyment and confidence in farming. (Rickards 2007, p. 4)

The Expert Social Panel identified a link between suicide and drought:

> Recent studies examining trends in Australian suicide rates have consistently demonstrated male rates are higher in rural and remote areas than in major cities. Further, there is evidence linking suicide to drought in New South Wales, with an 8 per cent rise in the long-term mean suicide rate being associated with a decrease in precipitation of about 300 millimetres. (Kenny et al. 2008, p. 59)

Community stability and cohesion

As discussed in chapter 2, a range of factors has led to the long-term decline of many small towns in Australia as people and economic activity move to larger centres. Many people living in or close to these small towns are negatively affected by these changes, which can be exacerbated by drought, particularly where they result in a loss of local services or social interaction.

The Expert Social Panel found:

> When family farms are struggling with events such as dryness, the communities in which people normally spend their money and participate also suffer. Dryness negatively impacts on the ability of members of a rural community to work together for the benefit of the whole community, eroding the capacity of people to engage in community projects or do the voluntary work that keeps rural communities alive. (Kenny et al. 2008, p. 3)

Based on survey results the AIFS concluded:

> Drought was … associated with a higher rate of closure of key services and more people reporting low levels of community social cohesion. However, drought was also associated with higher rates of membership of community organisations. …
>
> The effects of drought on residential mobility are quite hard to estimate. However, our analysis seems to indicate that households were adjusting to adverse circumstances in drought-affected areas, with some members of households probably moving (temporarily or otherwise) towards areas with greater economic opportunity. (sub. 92, p. 5)

The Birchip Cropping Group study found:

> Besides accelerating rural decline, the drought has had positive and negative social effects on communities. (Rickards, 2007, p. 5)

Overall, the evidence suggests that when it comes to matters such as financial hardship, mental health and community cohesion, drought is a factor but is not the dominant influence. The evidence also suggests that there is a higher prevalence of some social problems among farmers compared to the general population, regardless of drought status.

3.5 Environmental impacts

The Department of the Environment, Water, Heritage and the Arts reported:

> … the recent drought has impacted on environmental issues including impact on soil condition, damage to exclusion areas, protection of fragile areas such as remnant vegetation and erodible creek lines and irreparable damage to groundwater. (sub. 107, p. 4)

Some of the environmental impacts of drought, such as pasture and soil degradation, threaten the natural asset base of the farm. As a consequence, farmers have an incentive to ameliorate these impacts by changing management practices, such as adopting single or no-till cultivation systems or destocking to retain vegetation cover. Other on-farm impacts, such as damage to remnant native vegetation, can threaten environmental values that are important to the wider community as well as to the farmer.

The environmental consequences of drought are influenced by farm management practices. One inquiry participant argued:

> Reducing bare ground will always reduce environmental damage during droughts, and the most crucial part of the recovery is when plant populations are attempting to re-establish themselves. (P. Morris, sub. 23, p. 4)

Wind erosion and dust storms tend to be more prevalent during droughts. Measurements of airborne dust indicate that there was a generally high level of dust storm activity during the 1960s, with peaks in the drier years (Australian State of the Environment Committee 2006). Since then dust storms have become generally less prevalent, with drought years, such as 1994, 2002 and 2003, being exceptions to this. The general lessening in dust storms since the 1960s may be at least partly due to improved farm management practices.

Drought can also lead to a greater spread of weeds from one farm to other farms or into public land. This can occur either because the bio-physical conditions resulting from drought allow weeds to spread more easily, or because drought-affected farmers do not have the time or resources to undertake normal weed control work. While regulations and collective interests among farmers exert pressure for weed and pest control activities to continue, these may be less effective during drought.

A major environmental impact of hydrological drought is that it reduces flows in water courses, which can threaten the health of valley and river systems. The Department of the Environment, Water, Heritage and the Arts stated:

> … a recent assessment of the ecosystem health of the 23 valley systems in the Murray-Darling Basin showed that 13 were in very poor condition, seven were in poor condition, two were assessed as moderate and just one was in good condition. (sub. 107, p. 4)

The Wentworth Group reported on the state of the Coorong, near the mouth of the Murray River:

> Salinity levels in the southern Coorong now exceed the maximum levels tolerated by the plants and animals that underpin the international status of these wetlands, and acid sulphate soils lie ready to be exposed and release acid into the water if lake levels were to continue to fall. (Wentworth Group 2008, p. ii)

The ecosystem health of valley systems is influenced at least as much by water policy as it is by variations in climate, and in particular, decisions on how much of the available water is allocated to environmental flows. These allocation decisions can become particularly contentious during droughts because of the increased scarcity of water for irrigation, industry, domestic use and the environment.

Projections (discussed later in this chapter) for increased temperature and, for some areas more frequent periods of extremely low rainfall, have implications for future environmental impacts. The Australian Conservation Foundation stated:

> Many Australian plant and animal communities are already substantially degraded as a result of habitat conversion, overallocation of water for human use, overgrazing, invasive species, salinisation and so on … Increasing drought frequency, intensity and extent are likely to have dire consequences for Australia's biodiversity conservation efforts. While many Australian native species are adapted to high climate variability, the marked speed and depth of climate change underway is likely to cause a further contraction in the range of many plants and animals, and, ultimately, many extinctions, local and global. (sub. 106, p. 11)

As noted earlier, one of the objectives of the National Drought Policy (NDP) relates to maintaining and protecting Australia's environmental resource base (chapter 1). The Department of the Environment, Water, Heritage and the Arts reported that there are 'no measures within the current suite of drought support initiatives that explicitly address' this objective (sub. 107, p. 2). Indeed, the department was concerned that NDP measures may actually make environmental outcomes worse:

> There is potential … for the existing drought support policy to have unintended, or perverse, consequences that encourage land managers to manage terrestrial and aquatic resources unsustainably. (sub. 107, p. 2)

Later chapters and appendices analyse this issue further.

3.6 Recent experience and future outlook

This section explores recent climate variability and droughts, and the future outlook, drawing heavily on projections made by the Bureau of Meteorology and CSIRO (Hennessy et al. 2008). Three periods are examined:

- 1993 to 2008, which equates roughly to the period that EC declarations have been made.
- 2002 to 2007, which is widely regarded as one long drought for large parts of Australia.
- 2010 to 2040, which is the period for which the projections were made.

There is no universally accepted way of comparing droughts, or climate more generally, for different periods. The main measures used here are the prevalence of exceptionally low rainfall, average rainfall over a given period, the prevalence of exceptionally low soil moisture and inflows to water bodies that supply water for irrigation (box 3.3). Data are presented for seven regions (figure 3.5).

Box 3.3 **Indicators of the severity of drought**

The following indicators of drought severity are used in this report. The first three relate to meteorological and agricultural drought, the fourth relates to hydrological drought.

Exceptionally low rainfall

Hennessy et al. (2008) define exceptional events as occurring, on average, once every 20 years. The dataset they used for rainfall was for the period 1900 to 2007 and, for any one area, the six lowest rainfall years in this period were classified as having exceptionally low rainfall. They determined the percentage area of each region that had exceptionally low rainfall in each year and then averaged these percentages over various periods.

The prevalence of exceptionally low rainfall years is a useful, but not perfect, indicator of the severity of meteorological drought. Perhaps its main imperfection is that it can be misleading in comparing multi-year periods. For example, a five year period that included one exceptionally low rainfall year and four years of very much below average rainfall would probably be considered more severely drought affected than a five year period that included two exceptionally low rainfall years and three average years.

Average annual rainfall

Data on average annual rainfall is used to complement the data on exceptionally low rainfall. If, for a particular region, a period has both a higher prevalence of exceptionally low rainfall years and lower average annual rainfall than another period it can be said to be 'drier', and highly likely to be more severely drought affected.

(Continued on next page)

Box 3.3 **(continued)**

Examination of the historic record also reveals the combination of exceptionally low rainfall years and average annual rainfall to be a good proxy for agricultural drought. For example, there is generally close concordance between these measures and the major drought periods identified in box 3.1.

Exceptionally low soil moisture

Hennessy et al. (2008) generated data on exceptionally low soil moisture in a similar way as for exceptionally low rainfall. The differences are that the soil moisture data was generated using a computer model (the model was driven by daily rainfall and potential evaporation data) and that only the period 1957 to 2006 could be covered due to data constraints.

Soil moisture is potentially a better indicator of drought than rainfall alone as it incorporates the influence of temperature and other factors on evaporation (and therefore on the moisture available for uptake by plants). Hennessy et al. (2008) used data on soil moisture in preference to other possible indicators, such as the Palmer Drought Severity Index. Exceptionally low soil moisture is, however, limited in its usefulness in making historical comparisons because data are only available from 1957.

None of the indicators used in this report fully capture the severity of agricultural drought as they are not sensitive to within year variations in rainfall such as at the time of seed germination or other crucial periods of the growing cycle.

Inflows to water sources used for irrigation

The annual volume of inflows to water sources used for irrigation is used as an indicator of the severity of hydrological drought in this report. As the Murray-Darling Basin supplies most of Australia's irrigation water, most attention is given to inflows to this system.

How does recent rainfall and soil moisture compare to the historic record?

Overall rainfall and incidence of exceptionally low rainfall varies considerably between decades:

> In Australia, the twentieth century was characterised by frequent droughts around 1900 and again in the 1930s and 1940s, with wet conditions becoming widespread in the 1950s and 1970s. (Hennessy et al. 2008, p. 8)

Because of this variability, comparisons of recent periods to longer term averages can be sensitive to how far back the longer term averages go. This report compares more recent years to the period 1900 to 2008.

Figure 3.5 **Regions used for climate comparisons**

Source: Hennessy et al. (2008).

From 1993 to 2008

For most regions, the last 16 years had either a fairly average or below average occurrence of severe drought. For Queensland, Northwest Australia and Southwest Australia exceptionally low rainfall years were less prevalent for the period 1993 to 2008 than for 1900 to 2008, and average rainfall was higher. For New South Wales and the Murray-Darling Basin exceptionally low rainfall years were also less prevalent for the period 1993 to 2008 than for 1900 to 2008, but average rainfall was slightly lower (by 2.1 and 1.9 per cent respectively) (tables 3.3 and 3.4).

For many people in these regions the idea that rainfall over the last 16 years was about average may conflict with their perceptions. There are at least three possible reasons for this. First, some people's perception of average rainfall may relate more closely to the last 40 years ('living memory' for many people) than the longer historic record that includes the Federation Drought and the Forties Drought. Second, the Bureau of Meteorology and CSIRO data cited above are averages for what are mostly very large geographic regions and trends for smaller areas within

them can be quite different. Data in the annex for this chapter shows that some districts in these regions had significantly below average rainfall over the last 16 years. Third, the most recent period, since the very dry year of 2002 may register most strongly in people's memory — this period is examined later.

In contrast to the above, the Victoria and Tasmania region and southwest Western Australia had more prevalent exceptionally low rainfall years for the period 1993 to 2008 than for 1900 to 2008, and average rainfall was lower (by 4.9 per cent and 7.9 per cent respectively) (tables 3.3 and 3.4). The extended dry period being experienced in these regions (and parts of South Australia) was commented on by the Bureau of Meteorology:

> In the south-west of Western Australia, and in parts of south-eastern Australia (principally central and western Victoria and south-eastern South Australia, together with northern and eastern Tasmania), long-term rainfall deficits extend back beyond 2000. In both regions, the most recent year in which there was widespread above-average rain was 1996. At some locations, such as Melbourne, there have been eleven consecutive years with below-average rainfall from 1997 to 2007, with 2008 highly likely to become the twelfth. (BoM 2008, p. 2)

Table 3.3 **Average percentage area having exceptionally low rainfall, selected periods by region**

Per cent of total area in region

	1900-2008	*1993-2008*	*2002-2007*
Queensland	5.5	3.9	7.5
New South Wales	5.5	5.0	10.7
Victoria & Tasmania	5.5	7.0	14.1
Southwest Australia	5.5	3.4	5.4
Northwest Australia[a]	5.6	2.4	5.6
Murray-Darling Basin	5.5	4.8	11.4
Southwest WA	5.5	9.0	10.6
Australia	5.5	3.1	5.1

[a] Based on financial rather than calendar years, so as to capture the complete wet season.

Sources: Hennessy et al. (2008); BoM (2009 unpublished).

From 2002 to 2007

The period 2002 to 2007 was chosen for analysis because, for large parts of Australia, it included two very low rainfall years and there was a general absence of wet years. For most parts of Victoria, Tasmania and South Australia, 2008 was also a low rainfall year, but the majority of Queensland, northern New South Wales and Western Australia's agricultural land received close to average or above average rainfall. This brought relief from rainfall drought, although the timing of rainfall adversely affected grain quality in some areas.

It can be seen from tables 3.3 and 3.4 that the period 2002 to 2007 had a higher prevalence of severe drought than the historic record for all regions except for Northwest Australia[3] and Southwest Australia. A relevant question to ask is: How exceptional is the dry period from 2002 to 2007 in the context of Australia's agricultural history?

Table 3.4 **Average annual rainfall, selected periods by region**
Millimetres

	1900-2008	*1993-2008*	*2002-2007*
Queensland	615	618	552
New South Wales	523	512	452
Victoria & Tasmania	741	705	672
Southwest Australia	261	281	252
Northwest Australia	458	572	536
Murray-Darling Basin	476	467	406
Southwest WA	658	606	591
Australia	457	500	457

Sources: Hennessy et al. (2008); BoM (2009 unpublished).

Table 3.5 shows that there have been previous six year periods that have a higher prevalence of exceptionally low rainfall years and lower average rainfall than 2002 to 2007 for all regions except southwest Western Australia. For example, on average 19.2 per cent of New South Wales experienced exceptionally low rainfall each year during the period 1940 to 1945, compared to 10.7 per cent for 2002 to 2007. Also in this state, average annual rainfall was 417 mm for 1940 to 1945, compared to 451 mm for 2002 to 2007. While the period 2002 to 2007 was not the driest six year period since 1900 in Victoria and Tasmania, it was close to being so.

Data for soil moisture were only available for the period 1957 to 2006, meaning that it was not possible to make the same comparisons for this measure. However, the limited comparisons able to be made show a higher prevalence of exceptionally low soil moisture in earlier periods than for 2002 to 2006 for all regions except southwest Western Australia (table 3.5).

3 The Bureau of Meteorology (2008, p. 1) report 'much of northern Australia continues to experience well above average rainfall, with record high rainfall widespread about the Top End, Kimberly and parts of Cape York Peninsula over the 3 to 10 year timeframe'.

Table 3.5 **Period 2002–2007 compared to driest six year period since 1900**

	Exceptionally low rainfall			*Average annual rainfall*			*Exceptionally low soil moisture*		
	2002-2007	*Highest since 1900*		*2002-2007*	*Lowest since 1900*		*2002-2006*	*Highest since 1957*	
	% area	Period	% area	mm	Period	mm	% area	Period	% area
Qld	7.5	1900-05	24.7	552	1900-05	483	9.0	1966-70	18.7
NSW	10.7	1940-45	19.2	452	1940-45	417	11.4	1966-70	15.7
Vic&Tas	14.1	1967-72	15.7	672	1940-45	643	6.2	1966-70	12.0
SW	5.4	1940-45	15.1	252	1935-40	213	6.6	1977-81	13.8
NW	5.6	1961-66	13.5	536	1933-38	372	1.6	1991-95	10.4
MDB	11.4	1940-45	16.5	406	1940-45	387	10.9	1966-70	16.1
SW WA	10.6	1967-72	25.8	591	2001-06	577	11.7	2002-06	11.7
Australia	5.1	1924-29	13.0	457	1935-40	396	na	na	na

na Not available.

Sources: Hennessy et al. (2008); BoM (2009 unpublished).

As mentioned above, the Bureau of Meteorology and CSIRO data cited above are averages for large regions and as such are likely to mask trends for smaller areas. The annex to this chapter shows that this is indeed the case. For example, there are rainfall districts in Queensland and elsewhere, that have experienced their driest six year period since 1900 within the last decade.

Another issue in comparing recent years with past drought periods is that in some areas drought is continuing:

> In south-eastern Australia (especially Victoria and Tasmania) the situation has worsened during 2008, with three-year rainfalls now at record low levels in numerous locations, including many areas critical for inflows into the Murray-Darling system. (BoM 2008, p. 1)

Overall, the data presented in this report confirm that the period from 2002 to 2007 ranks with the Federation Drought and the Forties Drought as one of the three most severe, widespread and prolonged dry periods since 1900.

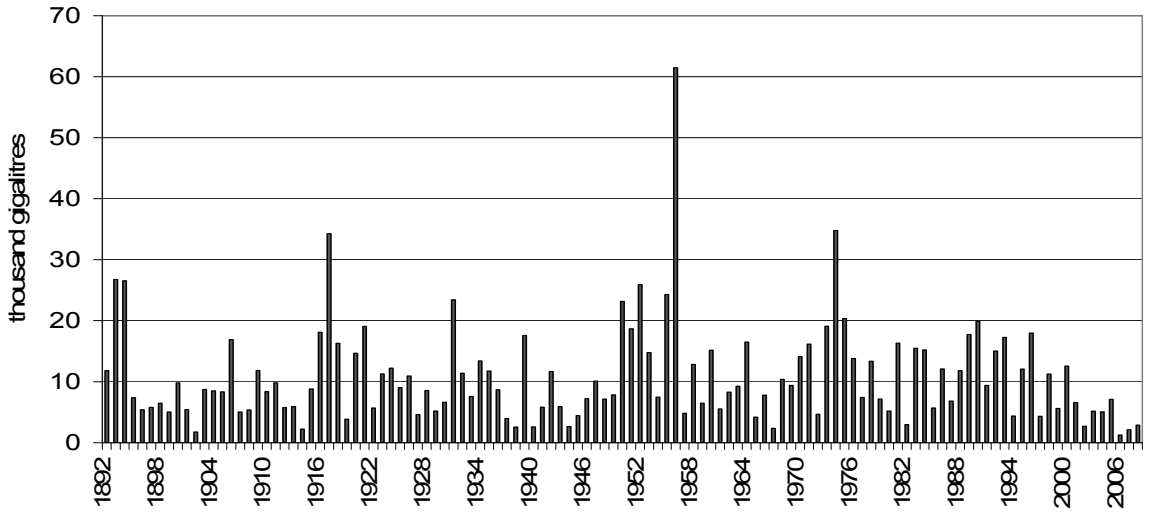
How does the current hydrological drought compare to the past?

Rainfall over the Murray-Darling Basin from 2002 is close to the lowest on record:

> Averaged over the Murray-Darling Basin as a whole, seven-year rainfalls [October 2001 to September 2008] are slightly higher than the driest seven year totals recorded during the 1937-46 period. When comparing rainfall deficits in the Murray-Darling Basin on timescales of five-to-ten years, the post-2001 period, the 1937-46 period and the 1895-1903 period (the 'Federation Drought') are essentially indistinguishable in broad terms. (BoM 2008, p. 2)

The run-off and inflows over this period are, however, easily the lowest on record. Inflows to the Murray system for the period 2002 to 2007 averaged 3986 gigalitres per year. The previous lowest six year average inflows were 5501 for 1940 to 1945 and 5707 for 1897 to 1902 (figure 3.6).

Figure 3.6 **Murray system inflows (including Darling), 1892 to 2008**



a Excludes any Snowy Scheme releases into the Murray. The data is generally modelled on current conditions, produced from tributary models running at the current level of development. The models are steady state (with no increased regulation or extraction through time). Where modelled data are unavailable (post 2000) observed data are used.

Data source: Murray Darling Basin Commission (2008 unpublished).

With respect to the last ten years, Manton states:

> In the southern part of the Murray-Darling Basin, a mean rainfall reduction of 13 per cent over the last decade has led to a mean runoff reduction of 39 per cent. During the similar drought period of 1937-1946, a rainfall reduction of 14 per cent was associated with only a 22 per cent runoff reduction. (Manton 2008, p. 11)

It is normal for a given reduction in rainfall to cause a greater reduction in run-off and inflows into rivers, due to evaporation and retention of water in the soil. It is apparent, however, that the quantity of inflows resulting from a given amount of rainfall has been particularly low over the last ten years. Manton (2008) identifies changes in the seasonality of rainfall and increased temperatures as contributors to this change. Changes in land-use and agricultural practices may also have contributed to the very low inflows of recent years.

While much of Australia's agricultural land received close to average or above average rainfall in 2008, the hydrological drought in the Murray-Darling Basin has become worse. Murray system inflows in the autumn of 2008 were not much higher than the record lows seen in 2007 (MDBC 2008).

For dryland cropping, farmers rely solely on rainfall. For irrigated agriculture, however, there is not such a direct relationship between inflows to water systems and water used. What matters most to irrigation farmers is the annual allocation they receive on their entitlement, together with the price of traded water (particularly when allocations are low).

Water entitlements vary in their degree of security — irrigators most commonly hold either 'general security' or 'high security' entitlements. The NSW Irrigators Council reported:

> In current circumstances, irrigators on the NSW Murray River with General Security entitlement are facing a third consecutive year of zero allocations. (sub. 62, p. 4)

Table 3.6 shows that allocations for high security entitlements have also declined dramatically in recent years for irrigators serviced by Goulburn-Murray Water in Victoria.

Table 3.7 shows a different pattern for major irrigation schemes in Queensland (many of which are not in the Murray-Darling Basin), with less severe shortfalls in the availability of irrigation water in the last two years, but a somewhat greater prevalence of shortfalls in the earlier years of this decade. It should be noted that irrigators in Queensland do not generally hold high security entitlements.

Horticulture Australia Council stated:

> In the past one/two seasons, significant numbers of growers have been struggling — for the first time ever — with insufficient water to produce a crop. (sub. 66, p. 1)

This and other evidence demonstrates the unprecedented severity of the hydrological drought in the Murray-Darling Basin in recent years and that this has translated to record low allocations to irrigators. This outcome for irrigators is a result of both low rainfall and inflows, and deficiencies in water policy, as discussed in chapter 10.

Table 3.6 **Goulburn-Murray Water, Victoria: announced allocations by river system, 1992-93 to 2007-08**

Per cent of entitlements[a]

	Murray	*Broken*	*Goulburn*	*Campaspe*	*Loddon*	*Bullarook Creek*
1992-93	200+	–	200+	200+	–	–
1993-94	200+	–	200+	200+	–	–
1994-95	220	–	200	180	–	–
1995-96	200	–	150	200	–	–
1996-97	200	–	200	220	–	–
1997-98	130	170	120	190	–	190
1998-99	200	170	100	100	–	190
1999-00	190	170	100	100	–	190
2000-01	200	170	100	220	–	190
2001-02	200	170	100	180	–	190
2002-03	129	100	57	100	–	170
2003-04	100	170	100	100	67	177
2004-05	100	170	100	39	100	190
2005-06	144	170	100	31	100	190
2006-07	95	77	29	0	0	36
2007-08	43	71	57	18	5	0

[a] Percentage of water right until 2006-07, then percentage of high-reliability water shares.

Source: Goulburn-Murray Water (2008).

Table 3.7 **SunWater, Queensland: announced allocations by scheme, 2000-01 to 2007-08[ab]**

Per cent of irrigation customer allocations[c]

	Burdekin-Haughton	*Bundaberg*[d]	*Nogoa-Mackenzie*	*Mareeba-Dimbulah*	*St George*	*Dawson Valley*[e] *Upper*	*Lower*
2000-01	98	76	100	100	114	80	80
2001-02	100	37	100	100	100	100	100
2002-03	100	100	100	100	100	100	100
2003-04	100	100	100	100	100	100	100
2004-05	100	100	100	100	80	88	100
2005-06	100	100	100	100	85	86	100
2006-07	100	46	80	100	89	48	49
2007-08	100	81	100	100	96	100	82

[a] The six largest SunWater schemes (based on customer allocations) are included and these are listed from largest to smallest. [b] The data for 2000-01 and 2001-02 are as reported in SunWater annual reports. The data for later years are the highest announced allocations for each year, as reported on SunWater's website. [c] The term 'customer allocation' as used in Queensland is equivalent to the term 'entitlement' as used in Victoria. [d] Excludes 'Burnett Water'. [e] Separate data for the Upper and Lower sub-schemes were not available for 2000-01 and 2001-02 and so the overall scheme allocation percentages have been used for these years.

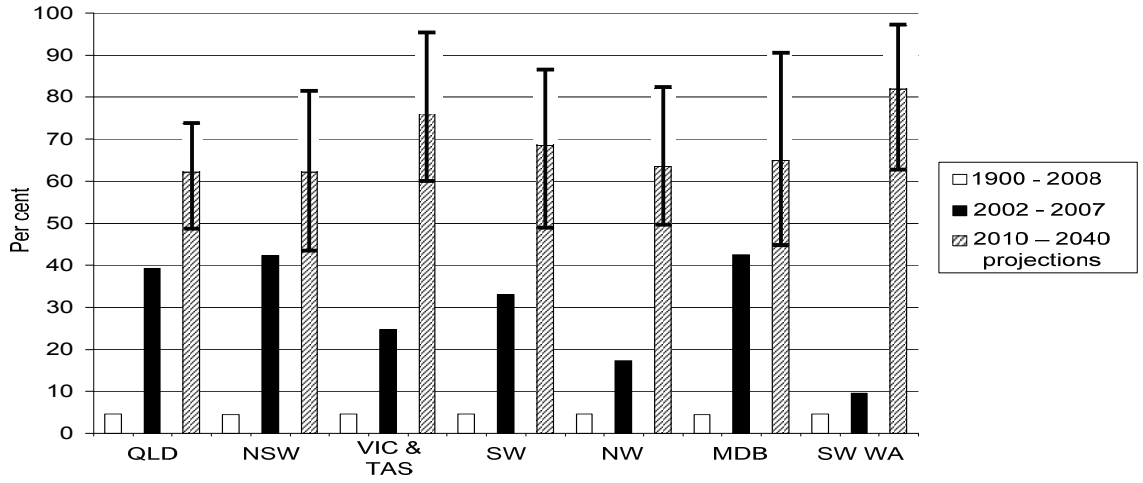
Sources: SunWater (2001, 2002 and 2009).

What is projected for the future?

Hennessy et al. (2008) used climate models that incorporate the influence of emissions of greenhouse gases to project likely changes in exceptional climatic events through to 2040. Figure 3.7 shows that even their 'low' projections would see exceptionally hot years occurring far more frequently over the period 2010 to 2040, than has been experienced in the past. They concluded:

> … the analysis clearly shows that the areal extent and frequency of exceptionally hot years have been increasing rapidly over recent decades and this trend is expected to continue in future. (Hennessy et al. 2008, p. 13)

Figure 3.7 **Simulated percentage area having exceptionally hot years[a]**

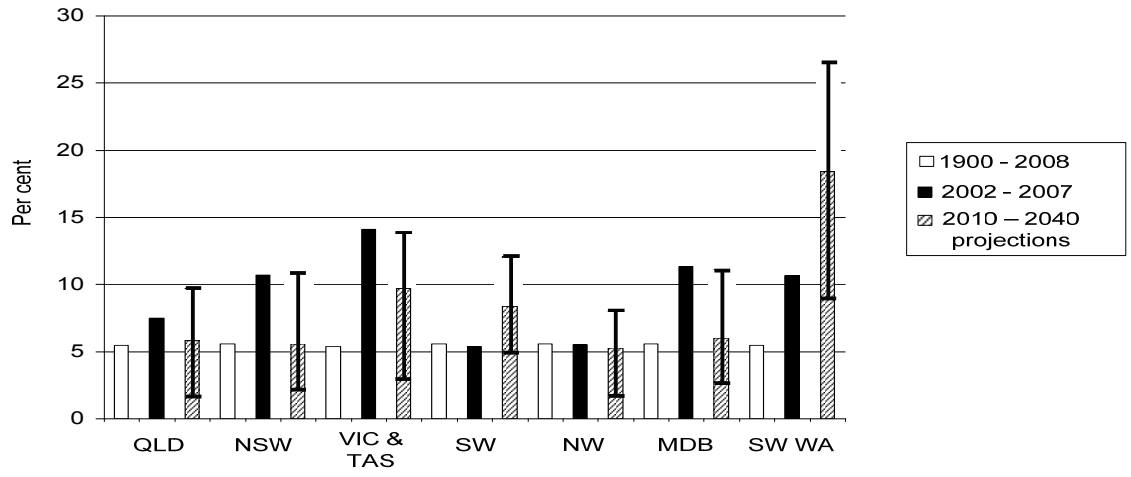


a The tops and bottoms of the error bars shown for the 2010–40 projections represent the highest and lowest ten per cent of the model results respectively.

Data sources: Hennessy et al. (2008); BoM (2009 unpublished).

The projections for exceptionally low rainfall show a much less clear difference between what has been experienced in the past and what can be expected in the future (figure 3.8). The mean projections are for exceptionally low rainfall years to occur with roughly the same frequency for 2010–40 as for 1900–2008 in Queensland, New South Wales, Northwest Australia and the Murray-Darling Basin but with substantially greater frequency in Victoria and Tasmania, Southwest Australia and the southwest of Western Australia. The difference between the 'high' and 'low' projections are, however, very large. For most regions the available science leaves open the possibility that severe drought over the next thirty years could either be more prevalent or less prevalent than in the past.

Figure 3.8 **Simulated percentage area having exceptionally low annual rainfall[a]**



a The tops and bottoms of the error bars shown for the 2010–40 projections represent the highest and lowest ten per cent of the model results respectively.

Data sources: Hennessy et al. (2008); BoM (2009 unpublished).

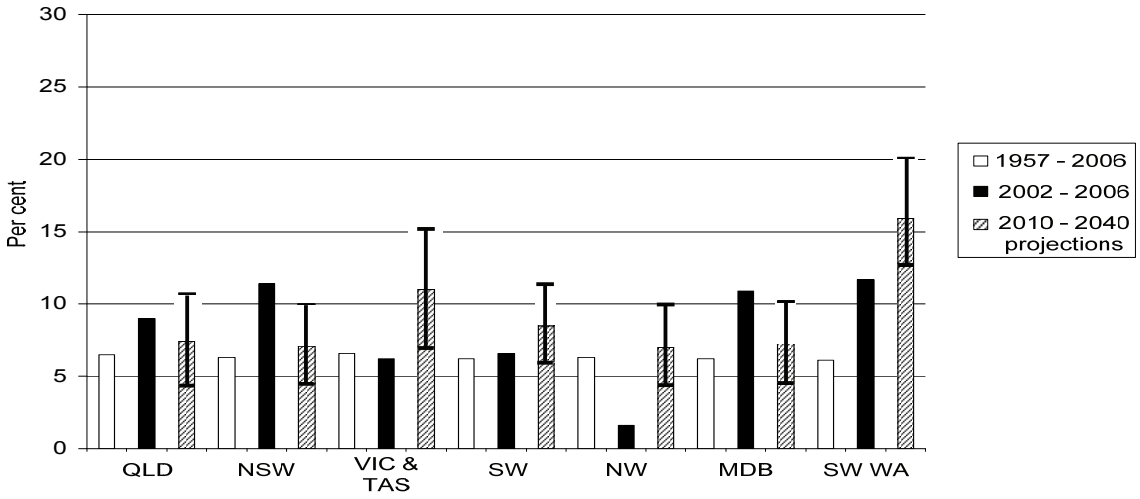
The projections for exceptionally low soil moisture are fairly similar to those for exceptionally low rainfall, except that on the soil moisture measure the chance that the future will be drier than the past is generally somewhat higher (figure 3.9). The reason for this is that both rainfall and evaporation influence soil moisture and projected temperature increases are expected to increase evaporation.

The projections for Australia's climate through to 2040 make it clear that farmers and other Australians should be prepared for a hotter future. The outlook for rainfall is less certain, but for some areas there is a likelihood of lower rainfall. Accordingly, whether a dryland farm business is prepared for, and able to be self-reliant through the droughts that have occurred in Australia's past remains a relevant minimum benchmark. As discussed in chapter 8, resources should be (and are being) devoted to climate science and modelling to try to give greater clarity to the outlook for regional climate futures.

The outlook for inflows to the Murray-Darling system, and other water systems used for irrigation, is more negative than the outlook for rainfall. This is because of a range of factors that may lead to a continuation of the trend toward lower proportions of rainfall ending up as inflows. These factors include:

- higher temperatures due to climate change leading to increased evaporation
- increased use of farm dams that intercept water that would otherwise have become inflows

Figure 3.9 **Percentage area having exceptionally low annual average soil moisture, historic and simulated future[a]**



a The tops and bottoms of the error bars shown for the 2010–40 projections represent the highest and lowest ten per cent of the model results respectively.

Data sources: Hennessy et al. (2008); BoM (2009 unpublished).

- conversion of grazing land to plantation forests that generally use more water
- increasing water use by native forests that regenerated following recent bushfires[4]
- increasing on-farm physical water-use efficiency, which reduces the volume of water that leaves the farm in the form of surface flows or groundwater recharge (van Dijk et al. 2006; PC 2006).

In addition, community expectations and government policy support an increase in the proportion of water resources allocated to environmental flows, further reducing the amount of water for irrigation.

The outlook for the future, therefore, is that there is likely to be substantially less water available for irrigation and its supply may become more variable. The consequences for irrigators depends in large part on water policy, as discussed in chapter 10.

The expected impacts of climate change on agriculture extend beyond changes in the severity and frequency of drought. These other impacts are in some cases likely to increase agricultural output (for example, higher atmospheric carbon dioxide concentrations). A paper commissioned for the Garnaut Climate Review estimated

4 Very young forests use relatively little water, but as they grow, water use increases substantially. Water use declines somewhat as forests reach maturity.

that wheat yields in many parts of Australia were likely to increase as a result of climate change through to 2030, despite some of the regions concerned being expected to have reduced rainfall (box 3.4).

Box 3.4 **Impacts of climate change on agriculture**

A considerable amount of research is being conducted in Australia on the likely impacts of climate change on agriculture. The following examples illustrate that changes in the frequency and severity of droughts is only one of a number of expected changes to the climate that may impact on agriculture over the next few decades.

Wheat yields

The Garnaut Climate Change Review presented estimates of changes to wheat yields resulting from human-induced climate change for ten sites across Australia's wheat growing areas (Garnaut 2008). The estimates, which draw on Crimp et al. (2008), take into account likely changes in temperature, rainfall and carbon dioxide concentrations. It is assumed that farmers will adapt to the changing climate, for example, by changing planting times and wheat cultivars to make use of longer growing seasons.

The estimates suggest that climate change up to the year 2030 is likely to be a net positive for wheat yields for at least nine of the ten sites examined, regardless of whether global mitigation action is taken to reduce greenhouse gas emissions. The estimates are for increases ranging from 1.6 per cent to 20.6 per cent, relative to 1990 yields. For the tenth site, Minnipa in South Australia, the estimates are for a 0.8 per cent increase with no mitigation and a decrease of up to 7.4 per cent with mitigation.

Value of irrigated agricultural production

The Garnaut Review also presented estimates of changes in the value of irrigated agricultural production in the Murray-Darling Basin resulting from human-induced climate change, based on Quiggin et al. (2008). The estimates take into account likely changes in river system inflows, but not yield responses to increases in temperature or carbon dioxide concentrations. It is assumed that farmers optimally adapt to changing conditions but that existing institutional arrangements are retained.

It is estimated that the value of irrigated agricultural production in the Murray-Darling Basin will decline relative to a world with no human-induced climate change. In 2030 declines of between 3 and 12 per cent are estimated, depending on the strength of global mitigation. With no mitigation the value of agricultural production declines sharply after 2030.

(Continued on next page)

Box 3.4 **(continued)**

Overall assessment

ABARE has used general equilibrium models to analyse the impacts of climate change on Australian agriculture (Gunasekera et al. 2007 and 2008). Its approach takes into account both the impacts of climate change on the productivity of Australian agriculture and international impacts that influence demand for Australia's agricultural exports (such as the global impacts of climate change on agricultural production and economic activity). Assumptions include no mitigation and no planned adaptation to climate change.

ABARE's illustrative modelling results are that Australian agricultural output will be around 38 per cent higher in 2030 than in 2006, whereas it would be around 48 per cent higher in 2030 in a world without climate change. In other words, a decline of 6.8 per cent (((1.48-1.38)/1.48)*100 = 6.8) relative to what would have occurred without climate change (rising to 11.5 per cent in 2050) (Gunasekera et al. 2008).

Annex: Rainfall by district

Rainfall averages for large regions, such as those reported on in Hennessy et al. (2008) and in the body of this chapter, are likely to mask trends for smaller areas. To explore this, a range of rainfall statistics was compiled for 33 of the 110 Australian Rainfall Districts used by the Bureau of Meteorology (table 3.8). The selections were made such that each of ABARE's 33 regions are at least partially represented. ABARE's regions tend to be smaller in areas of Australia that are most important for agriculture and so selecting rainfall districts in this way gives greater representation to important agricultural areas.

Table 3.8 shows there are areas that have experienced trends in the severity of drought that are quite different to those for the larger region that they are part of. For example, while for Queensland as a whole rainfall for the period 2002 to 2007 was 14 per cent higher than for 1900 to 1905 (table 3.5), for the Central Highlands district, 2002 to 2007 had the lowest rainfall for any six year period since 1900.

Table 3.8 **Rainfall statistics for selected Australian Rainfall Districts[a]**

	Exceptionally low rainfall (% incidence)			*Average annual rainfall (mm)*		
Rainfall district (name and number)	*1900-2008*	*1993-2008*	*2002-2007*	*1900-2008*	*1993-2008*	*2002-2007*
Queensland						
North Peninsula (27)	5.5	–	–	1344	1465	1378
Upper Carpentaria (30)	5.5	–	–	634	640	597
Barron North Coast (31)	5.5	6.3	16.7	1455	1545	1399
Central Highlands (35)[d]	5.5	6.3	16.7	612	559	506
Central Lowlands (36)	5.5	6.3	16.7	480	465	406
Lower Western (37)	5.5	6.3	16.7	228	234	189
Moreton (40)[d]	5.5	6.3	16.7	957	856	788
East Darling Downs (41)	5.5	–	–	650	618	562
New South Wales (including ACT)						
Western (Far NW) (46)[b]	5.5	12.5	16.7	231	222	185
Central Western Plains (50)	5.5	6.3	16.7	480	469	401
Northwest Plains (E) (53)	5.5	6.3	16.7	609	641	578
Central Tablelands (S) (63)	5.5	6.3	16.7	805	749	694
Illawarra (68)	5.5	–	–	1077	930	918
Goulburn-Monaro (70)	5.5	6.3	16.7	702	640	594
Riverina (E) (74)	5.5	6.3	16.7	466	439	388

(Continued on next page)

Table 3.8 (continued)

Rainfall district (name and number)	Exceptionally low rainfall (% incidence) 1900-2008	1993-2008	2002-2007	Average annual rainfall (mm) 1900-2008	1993-2008	2002-2007
Victoria						
South Mallee (77)[b]	5.5	6.3	16.7	370	344	320
South Wimmera (79)[c]	5.5	6.3	16.7	548	488	463
Upper North (80)[b]	5.5	6.3	16.7	535	493	438
West Gippsland (85)	5.5	12.5	16.7	847	785	761
Tasmania						
Midlands (93)[be]	5.5	12.5	16.7	611	541	518
South Australia						
Western Agricultural (18)	5.5	6.3	–	278	276	269
Far North (17)	5.5	6.3	–	160	164	127
Lower Murray Valley (24B)	5.5	–	–	391	380	374
Lower Southeast (25B)	5.5	6.3	16.7	620	562	552
Western Australia						
East Kimberley (2)	5.5	–	–	575	759	708
Fortescue (5)	5.5	–	–	313	385	316
North Coast (8)[c]	5.5	6.3	16.7	379	356	304
South Coast (9A)[d]	5.5	12.5	16.7	774	725	710
South Central (10A)	6.4	12.5	16.7	425	400	384
Northern Territory						
Darwin-Daly (14GA)	5.5	–	–	1183	1386	1351
Victoria (14F)	5.5	–	–	571	726	702
Barkly (15A)	5.5	–	–	428	506	493
Alice Springs (15B)	6.4	6.3	–	278	315	275

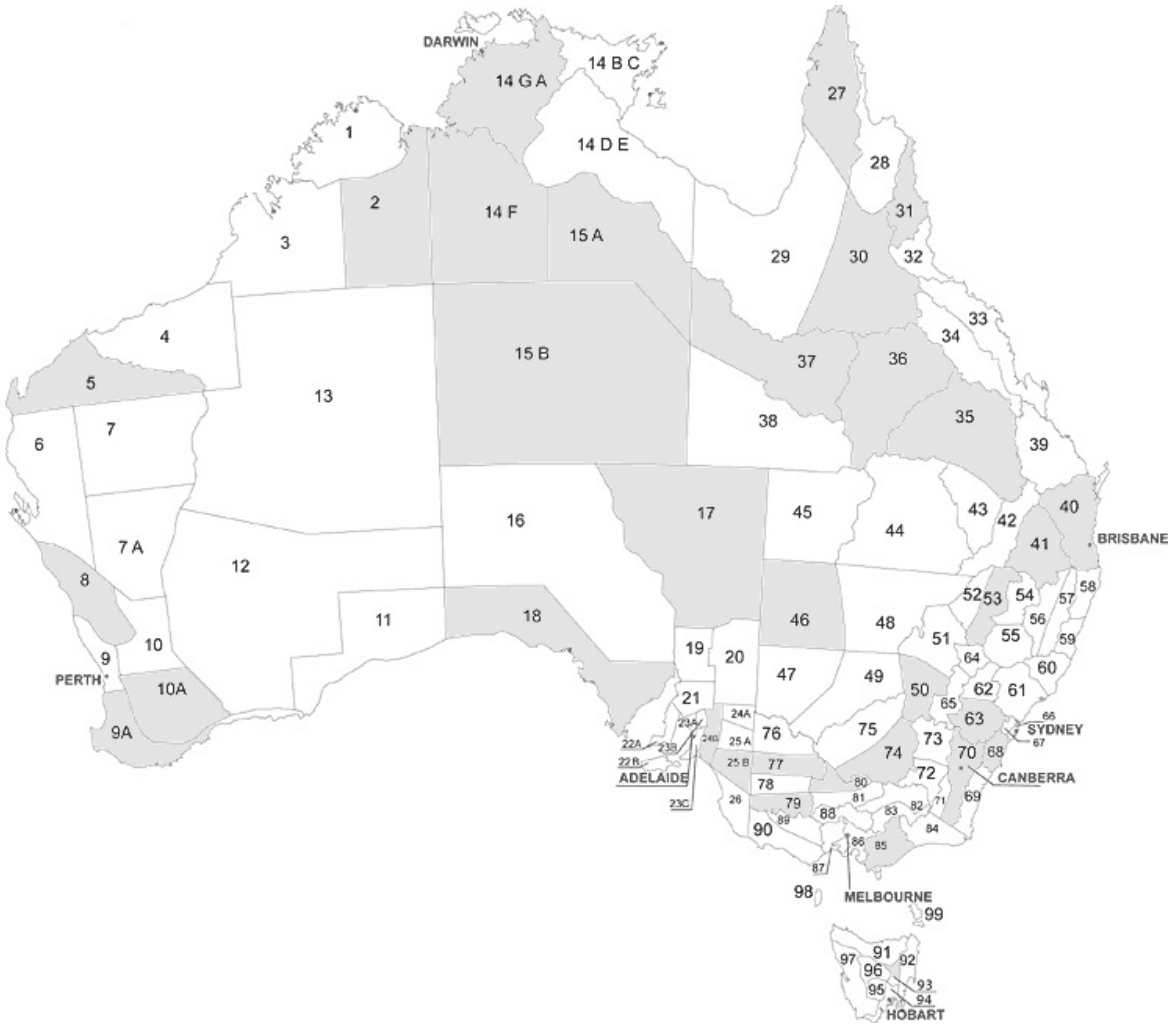
[a] Annual rainfall data averaged across each district was used for this table. Accordingly, each year either is, or is not, an exceptionally low rainfall year. Therefore, the incidence of exceptionally low rainfall (that is, the proportion of years within the period that fit this criteria) is reported, in contrast to the earlier tables, which report the areal extent of exceptionally low rainfall (the percentage of the region that fits this criteria each year, averaged over the period). [b] Incidence of exceptionally low rainfall for 2002-07 is matched but not exceeded by other six year periods since 1900. [c] Average annual rainfall for 2002-07 is the lowest for any six year period since 1900. [d] Average annual rainfall for 2001-06 is the lowest for any six year period since 1900. e Average annual rainfall for 2003-08 is the lowest for any six year period since 1900. **–** Nil or rounded to zero.

Data source: BoM (2009 unpublished).

Seven of the 33 districts (18 per cent) experienced the six year period with the lowest rainfall since 1900 sometime during the period 1998 to 2008. This is exceeded only by the period 1935 to 1945, during which nine of these districts experienced the six year period with the lowest rainfall.

The locations of the selected rainfall districts are shown in figure 3.10.

Figure 3.10 **Australian rainfall districts**[a]



a Shaded districts are those included in table 3.8.

Source: Bureau of Meteorology (2004).

4 Drought policy in Australia

Key points

- The 1990 Drought Policy Review Task Force concluded that any attempt to classify drought by severity would be completely arbitrary and inappropriate.
- Australia's current National Drought Policy (NDP) was introduced in 1992. It established the exceptional circumstances (EC) approach to triggering interest rate subsidies for businesses and income support for households.
- The four significant reviews that covered the NDP have all recommended the abolition of interest rate and transport subsidies. Despite this, the subsidies have been retained and expanded.
- Current measures aimed at improving preparedness, such as farm management deposits and training grants, were recommended by the earlier reviews.
- Income support during hardship has been a consistent feature of the NDP and the recommendations of its reviews.
- Other programs delivered under the NDP include planning and support measures.
  - This includes rural financial counselling, which, while not drought specific, is utilised by farmers suffering from the effects of drought.

4.1 The evolution of drought policy

The provision of drought assistance by government has a long history. In 1866, Henry Parkes, the then Colonial Secretary of New South Wales, offered loans of seed wheat to farmers affected by drought (Burdon 1995). Early drought policy focused on attempts to 'drought proof' agriculture through building dams and encouraging the adoption of irrigation. For example, between 1939 and 1945, during one of the most severe and prolonged droughts in a century, the total area of irrigated land in Australia increased from 814 000 to 1 406 000 acres, and by 1967, had reached 3 200 000 acres (Davidson 1969). The current National Drought Policy (NDP) has evolved as a consequence of a series of reviews held in 1989-90, 1997, 2004 and 2006 (see table 4.1).

Table 4.1 **Drought policy reviews**

Review	*Key Recommendations/Findings*
1990 — Drought Policy Review Task Force *Final Report*	• Drought separate from natural disaster relief • Governments should implement a National Drought Policy • Against the use of transaction-based subsidies/rebates • State/territory assistance for drought purposes be provided through general concessional loans • Provision of grants or interest free loans be limited to extreme situations
1997 — Drought Policy Task Force *Review of the National Drought Policy*	• Transaction-based subsidies and interest rate subsidies be phased out • Improve farm financial and land resource planning via education and training programs • Encourage farmers to build cash reserves during good seasons to prepare for downturns • Research and development on the effects of prolonged drought • Introduce a Farm Family Re-Start Scheme, targeted at farmers unable to access payments from other sources • Counselling services be managed by state governments and provided at an early stage of drought • Amend and combine Income Equalisation Deposits and Farm Management Bonds
1997 — McColl et al. *Mid-term review of the 1992 Rural Adjustment Scheme* (RAS 92)	• Remove interest rate subsidies and grants to farm businesses for productivity improvement or for EC support • Replace RAS 92 with an improved scheme addressing the issues of management skills, farmer re-establishment, and savings and welfare • Introduce FarmBIS and the Farm Re-establishment Scheme • Introduce a single instrument combining IEDs and FMBs • Higher priority should be accorded to research on climate change, climate variability and climate prediction
2004 — Drought Review Panel *Consultations on National Drought Policy*	• Most stakeholders would support a shift in government focus towards drought preparedness measures at the expense of business support • ECRP was valued highly and regarded as being necessary during drought • Stakeholders less in favour of business support (ECIRS and fodder/transport subsidies) — overall, stakeholders thought such assistance encouraged debt and supported the less prepared • Transaction-based fodder and freight subsidies seen to have a detrimental effect on farmers in other states (most stakeholders considered these subsidies should cease) • EC process as a whole seen as too demanding, complex and confusing • Off-farm income and assets limits for accessing EC assistance seen as restrictive • Criticism by stakeholders about perceived differences in administration of ECIRS between states • FMD and FarmBis schemes strongly supported • Rural Financial Counselling service regarded highly
2006 — Agriculture and Food Policy Reference Group *Creating our Future*	• Phasing out of interest and other transaction-based subsidies by the end of 2010 • Maintain FMDs

Drought policy arrangements prior to 1989

Between 1971 and 1989, drought was treated as a natural disaster, with drought support delivered as part of the Natural Disaster Relief Arrangements (NDRA). Because of constitutional responsibilities, state governments had primary responsibility for disaster relief — including drought — under the NDRA and were required to contribute a base amount of assistance funding which then triggered a Commonwealth Government contribution.

Under these arrangements, the Commonwealth Government generally did not provide financial assistance specifically for drought, the exception being in 1982-83 (McInnes et al. 1990). During this drought, fodder, interest, and agistment subsidies were provided.

In addition to the NDRA, throughout this period, state and territory governments also implemented their own drought assistance policies. Policies included concessional interest loans for carry-on purposes (such as for harvesting crops and for the purchase of fodder), along with a range of subsidies and rebates (such as transport subsidies for stock, fodder and water cartage).

The 1990 drought policy review

In April 1989, the Commonwealth Government decided to remove drought from the NDRA, driven by concerns that temporary relief during drought was not appropriate. As stated by the then Minister for Primary Industries and Energy:

> There is widespread recognition that drought policy needs to be considered in a wider context than that of temporary relief. (Kerin, cited in McInnes et al. 1989, p. 73)

There were also concerns that drought declarations were being made too hastily and that funds were being misused for political purposes (Botterill 2003). In response, the Commonwealth Government established an independent Drought Policy Review Task Force to:

- identify policy options to encourage primary producers and other segments of rural Australia to adopt self-reliant approaches to the management of drought
- consider the integration of drought policy with other relevant policies including structural adjustment, social welfare, land management, conservation of breeding stock and animal welfare.

The Task Force handed down its final report in May 1990. It proposed a national drought policy that focused on the roles of producers and governments in implementing self-reliant risk management approaches to drought (table 4.1).

The basis of its recommendations rested on the view that drought risks were 'on a par with the other main risks of farming' (McInnes et al. 1990, vol. 1, p. 3). Drought was considered a recurring, natural condition and not a rare climatic aberration. The Task Force concluded that it was not possible to develop an objective, scientific, and universally accepted definition of drought and rejected the notion of being able to identify the severity of a drought. It concluded that:

> Any distinction between lesser and extreme droughts in this context would be completely arbitrary and inappropriate. (McInnes et al. 1990, vol. 2, p. 20)

Furthermore, the Task Force perceived that drought represented instances where existing agricultural production was in disequilibrium with prevailing seasonal conditions. The implication of this is that agriculture needs to alter its production systems when drought occurs, rather than producers and governments seeking to maintain standard agricultural practices at all times, irrespective of prevailing weather conditions.

If assistance was to be provided, the Task Force supported the use of general concessional loans, and suggested that transaction-based and other specific subsidies be removed (McInnes et al. 1990). It considered such subsidies to be:

> … inappropriate, misdirected, inequitable and, as an incentive measure, too late in any case. (McInnes et al. 1990, vol. 2, p. 163)

Where subsidies were provided, the Task Force suggested they contain specific performance criteria. In addition, it recommended support be limited to the provision of grants or interest-free loans and that any assistance be based on the prospects of each individual farmer, to ensure that the onus for managing drought remained on that farmer. Overall, it concluded that the existence of certain climatic or production conditions did not provide sufficient justification for government assistance (McInnes et al. 1990).

Government responses to the 1990 review

In November 1991, the Senate Standing Committee on Rural and Regional Affairs was requested to report on the Task Force's recommendations. That Committee reiterated the importance of introducing a national drought policy based on the principles of self-reliance and risk management, but drew a distinction between severe droughts and lesser droughts — against the recommendations of the review. The Committee argued that there were limits to the self-reliance of farmers in relation to severe drought and that even a farmer with sound management and planning would find it difficult to cope with the effects of the most severe drought. While not providing a definition of severe droughts, the Committee proposed that the Commonwealth Government provide additional assistance during such times, to

be activated by an appropriate trigger mechanism which would include (Senate Standing Committee on Rural and Regional Affairs 1992):

- an application for severe drought status, presumably emanating from the shire concerned
- use of an objective measure of severe drought
- an overriding subjective assessment by a tripartite drought committee or structure involving the Commonwealth, states and producers, and drawing upon local knowledge and expertise.

National drought policy 1992

In response to the 1990 review and Senate response, the NDP was announced in July 1992. The policy was based on the principles of self-reliance and risk management, recognising that drought is one of a number of sources of uncertainty facing farmers and a part of their normal operating environment. As recommended by the Drought Policy Review Task Force, the explicit objectives of the NDP are to:

- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches to managing for climatic variability
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress
- ensure early recovery of agricultural and rural industries, consistent with long-term sustainable levels.

The NDP states that the responsibility for managing drought risk lies with farmers, with the role of government being limited to creating an environment conducive to risk-management. However, the NDP also makes provision for assistance to be provided in times of 'exceptional downturn' to those with sound prospects who are temporarily facing financial difficulty.

In legislation, the concept of 'exceptional drought' was incorporated under 'exceptional circumstances' (EC) provisions added to the existing rural adjustment scheme (RAS 92). The triggering of EC provisions allowed for a maximum subsidy of 100 per cent of the interest payable on new and existing loans when received alongside the interest rate subsidy paid for productivity improvements under the RAS 92. Eligible farm enterprises were those that were considered to be temporarily in severe financial difficulties due to the event, but remained viable in the long-term.

Under the NDP, state governments could provide additional drought assistance programs. However, where offered, they are not supposed to compromise the overall direction of the NDP. Accordingly, transaction-based and other similar subsidies should be provided by the states only as a transitional measure, to be phased out as soon as practicable (Burdon 1995).

Also in 1992, the Farm Household Support Scheme was established (coming into operation in March 1993). This scheme was directed at non viable farmers, and provided household support at a rate equivalent to the Jobsearch allowance. To be considered eligible, farmers had to be unable to obtain commercial finance and have difficulty in meeting living expenses. In addition, the Drought Relief Payment was introduced in October 1994 to provide income support to both viable and non-viable farmers in EC areas (paid at a rate equivalent to the Jobsearch allowance). Payments continued for six months afterwards, to recognise that farm recovery may be slow. Those eligible for the payment were also given access to the Health Care Card and Youth Allowance and Austudy means test concessions.

The Farm Management Bond (FMB) scheme was also introduced, to be incorporated into the Income Equalisation Deposits (IED) scheme — an income smoothing scheme that allowed farmers to deposit pre-tax income for use in later years. In addition to the IED provisions, the FMB scheme allowed farmers earning non-farm income (up to $50 000) to use the scheme.

The evolution of the exceptional circumstances approach

The first enactments of the EC provisions relating to drought were based on subjective assessments (Botterill 2003). As these assessments lacked objective criteria, the Standing Committee on Agriculture and Resource Management (in October 1994) determined six core criteria to be taken into consideration by the Commonwealth Government and the state and territory governments. These included an assessment of the scale of meteorological, agronomic and stock effects, water supplies and other environmental impacts, and the impact on farm incomes. The meteorological assessment was given the most weight in the determination of an EC declaration.

The role assigned to the states was to make initial assessments in accordance with the six criteria. In this way, the states determined whether an EC event existed, and if so, they applied to the Commonwealth Government for declaration. The application for assistance would then be considered by the Rural Adjustment Scheme Advisory Council, and if deemed valid, it would be referred to the Commonwealth Government. Finally, an area would be EC declared once approved by Cabinet and an announcement and public explanation of the decision with clear

reference to the six criteria would be made (Burdon 1995). EC events were defined as those that occurred on average, once every 20 to 25 years. This criterion was based on the notion that such an event was something for which not even the most prudent farm manager could be expected to manage.

In March 1999, the Agriculture and Resource Management Council of Australia and New Zealand decided on a new set of EC criteria. The criteria stated that the event:

- must be rare, in that it must not have occurred more than once on average every 20 to 25 years
- must result in a rare and severe downturn in farm income over a prolonged period of time (for example, greater than 12 months)
- cannot be planned for or managed as part of farmers' normal risk management strategies
- must be a discrete event that is not part of a long-term structural adjustment process or of normal fluctuations in commodity prices.

The meteorological criterion was downgraded in its primacy, and replaced by income, which became the key measure to determine the impact of an EC event, and whether assistance should be provided. These criteria are still in place.

The policy reviews of 1997

Two relevant policy reviews reported their findings in 1997: the review of the NDP by the Drought Policy Task Force; and the mid-term review of RAS 92. The latter dealt with rural adjustment in a broader context, but nevertheless made significant mention of drought policy.

Drought Policy Task Force Review

The Drought Policy Task Force (Matthews et al. 1997) was asked to examine the impact and appropriateness of existing drought programs in meeting the NDP objectives. In short, the Task Force concluded that the objectives of the NDP were appropriate, but that government drought programs were not consistent with the objective of self-reliance objective. The Task Force recommended that the NDP objectives be broadened to:

- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches to managing for climatic variability
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climatic stress

- ensure farm families are provided with adequate welfare support commensurate with that available to other Australians
- ensure that the elements of the NDP do not impede structural adjustment
- have a high level of awareness and understanding of drought and drought policy.

The Task Force recommended the removal of transaction-based subsidies (as had past reviews) and interest rate subsidies. Rather, funding should be directed to preparedness measures. They also noted that if resources were redirected towards drought preparedness measures, the need for exceptional circumstances declaration and revocation processes would be eliminated.

The two income smoothing schemes, IEDs and FMBs, were perceived to be too complex, with unnecessarily restrictive deposit requirements. The Task Force believed that one of the reasons for the under-utilisation of IEDs and FMBs was due to farmers not generally accepting the self-reliance principle of the NDP. This, the Task Force argued, was based on expectations of support in times of difficulty, as had occurred in previous droughts, which decreased the attractiveness of accumulating financial reserves. The Task Force recommended combining IEDs and FMBs, setting a higher maximum deposit limit for the scheme and embarking on a publicity campaign to promote the benefits.

Although the Task Force believed that access to welfare payments for farmers should be equitable with all other groups in the community, it did not regard the Drought Relief Payment as being entirely effective for this purpose. The Task Force argued that farmers with a high level of net assets would have access to commercial finance which would support their businesses and provide funds for personal drawings. For those farmers that had low levels of net assets and difficulty in maintaining income levels during drought and other downturns, the Task Force recommended they leave farming or seek off-farm employment, thus enabling them to access generally available welfare arrangements.

Despite this, the Task Force considered that a rationale for providing income support on an interim basis existed. The proposed Farm Family Restart Scheme was to be targeted at farmers who were unable to access finance from any other sources, and would not be restricted to specific geographic areas or industry-wide criteria. Important features of the proposed scheme included:

- after nine months receipt of benefits, a decision would be triggered as to whether the individual wished to remain in farming, or exit
- for those unable to return to viability, an enhanced re-establishment package would be available

- for those choosing to remain in farming, payments would cease, as would the opportunity to access the enhanced re-establishment grant
- recipients would be required to participate in financial counselling.

Mid-term Review of the Rural Adjustment Scheme

RAS 92 was intended to be reviewed after four years, and to cease after eight years. The Mid-term review of RAS 92 reported in May 1997. It recommended that RAS 92 be abolished and replaced with an improved program that addressed the issues of management skills, farmer re-establishment, and savings and welfare. The rationale for this recommendation was that RAS 92 had:

> … not had a significant positive impact on the adjustment process and has not met the goal of fostering the development of a profitable and competitive farm sector. (McColl et al 1997, p. xi)

One of the main criticisms made was the use of interest rate subsidies, including their inconsistency with the NDP objectives and debt being a poor indicator of farm performance and profitability and thus not a sound basis for targeting assistance.

As a result, the review recommended that:

> … future government programs to address rural adjustment should no longer use interest rate subsidies or grants to farm businesses for productivity improvement or for exceptional circumstances support. (McColl et al. 1997, p. 119)

Instead, a new package of policies was suggested, including a Farm Business Improvement Scheme (FarmBIS), a Farm Re-establishment Scheme (to promote structural adjustment), improved farm savings mechanisms (combining IEDs and FMBs), and more responsive welfare arrangements (McColl et al. 1997).

FarmBIS was to operate through grants to farmers and farm groups for training, business advice, planning, benchmarking, and analysis. No viability test would be required and any funds provided under the scheme could not be used for normal and ongoing business advice. The focus of FarmBIS was to be on fostering continuous skills improvements, for the purpose of promoting a more profitable and sustainable farm sector (McColl et al. 1997).

Government responses to the 1997 reviews

As a response to the Drought Policy Task Force review of the NDP and the Mid-term Review of the RAS 92, the Commonwealth Government introduced Agriculture — Advancing Australia (AAA), replacing the RAS 92.

For the NDP, the Commonwealth Government decided to retain the EC system and EC Interest Rate Subsidies (ECIRS) (of 50 per cent) against the recommendations of the review. It also established the EC Relief Payment (ECRP), adapted from the former Drought Relief Payment. Interest rate subsidies offered for the purpose of productivity improvements were terminated, reducing the potential interest rate subsidy in times of drought to 50 per cent. The NSW government also announced it would remove its transport-based subsidies.

The advice of both reviews to combine elements of the existing IEDs and FMBs into a single scheme was adopted. The two existing schemes were merged into the Farm Management Deposits (FMDs) scheme, which was established in April 1999. FMDs retained the income-smoothing intention of the two predecessor schemes, and are part of a broad rural assistance framework.

A FarmBis program was also introduced to:

- increase farmer participation in learning activities with the objective of enhancing the profitability, sustainability and competitiveness of their business
- develop greater acceptance of the benefits of continuous learning and skills development, and its relevance to changing management needs of a competitive farm sector
- enhance farmers capacity to identify and access appropriate learning activities.

FarmBis was jointly administered by the Commonwealth Government and the state and territory governments. FarmBis covered a range of topics relevant to the management of farm businesses such as techniques to improve on-farm production, tax and financial management, and succession planning.

The Farm Family Restart Scheme was also established and replaced the Farm Household Support Scheme. But in contrast to the Farm Household Support Scheme, payments made under the Farm Family Restart Scheme were in the form of a grant, rather than a loan.

Policy changes between 1997 and 2004

A number of policy changes occurred between 1997 and 2004, despite there being no formal reviews.

In November 2001, the Farm Family Restart Scheme was replaced by Farm Help. Farm Help retained the intention of the preceding scheme — to provide short-term income support to farmers experiencing difficulties meeting living expenses who could not obtain access to commercial sources of finance. Farm Help offered a

combination of income support, an advice and training grant, and a re-establishment grant for those farmers wishing to exit the industry. Applicants were required to attend an initial advice session, which would assist in determining how the financial prospects of the farm could be improved, or what options were available to the farmer in terms of off-farm sources of employment (DAFF 2008g).

The drought in 2002 and subsequent EC declarations raised concerns over 'lines on maps', leading to the development of EC 'buffer zones' (DAFF 2008b). These zones allowed farmers located on the periphery of EC areas to apply for assistance provided they could demonstrate that they had also been affected by the EC event. To increase the expediency of payments, those who qualified for household support could access payment prior to a full declaration (if a *prima facie* case for declaration was found) — termed interim income support (DAFF 2008b). Interim income support did not have to be repaid if the EC application was subsequently declined.

In December 2002, the Commonwealth Government further expanded the range of programs delivered under the NDP. Again, the focus of the programs was on interest rate subsidies. An interest rate subsidy on commercial loans for stock support and drought recovery was made available to farmers receiving drought income support, which was provided in addition to EC business support (Howard 2002). Another notable additional assistance measure was the Small Business Interest Rate Relief Program. This program provided interest rate subsidies on new and existing loans to small businesses in EC areas. However, only a small number of applications for the program were received (despite the eligibility criteria being relaxed in July 2003), and a relatively low proportion of those were approved (Australian National Audit Office 2005). Consequently, the program was terminated in August 2004.

The 2004 Drought Review Panel

In October 2003, the Commonwealth Government formed an independent panel to conduct another review of Australia's drought policy. The Panel reported in March 2004. The review's objectives were to canvass the views of stakeholders on the appropriateness of drought assistance measures provided by all levels of government, the key elements of future drought policy, and the adequacy of research on climate variability and its effects on agriculture.

The overall appropriateness of the EC system was criticised by producers. Most found the EC declaration process:

> … inequitable, untimely, complex, and subject to political point scoring and different treatment in different jurisdictions. (Drought Review Panel 2004, p. 29)

The Panel found that a majority of producers preferred gearing assistance towards encouraging greater drought preparedness, rather than providing relief during a drought:

> Most stakeholders consider that proactive policies should decrease the reliance on Government ad hoc measures and short-term assistance for rural communities and the agricultural sector, such as that provided under the EC policy. (Drought Review Panel 2004, p. 29)

The Panel also noted farmers' views that the use of 'lines on maps' to deliver assistance fostered divisiveness within communities and created confusion.

The Panel received a number of suggestions for reforming the system. One of these entailed relaxing, or removing completely, the regional assessment and declaration. Provision of assistance would then be dependent on individuals demonstrating their need for assistance. Other suggestions for improving the EC system related to streamlining the process, for example, by reducing the number of organisations involved in the application and declaration process.

While the Panel supported ECRP, it received differing views on the appropriateness of ECIRS as a drought assistance mechanism. On balance, the Panel believed that it was analogous to low interest loans and stated that:

> … there is no strong case for the provision of such assistance [long-term low interest loans] by Government. The Panel considers that any involvement of the Australian and State/Territory Governments in providing long-term low interest loans would require consideration of whether there is a problem in the commercial finance sector, of possible effects on the future operation of commercial finance sources, and the possible distortion of markets by such measures. (Drought Review Panel 2004, p. 69)

Again, other input subsidies provided by the states (such as transport subsidies) were criticised, with the Panel suggesting these be abolished as originally intended.

On the other hand, a significant number of stakeholders regarded FarmBis as a valuable program (Drought Review Panel 2004). Criticisms revolved around some courses offered not being appropriate for the needs of the sector and the program's lack of funding, and uncertainty over future funding. Given these concerns, the Panel recommended that governments maintain, if not increase, their commitment to FarmBis.

The 2006 review of agriculture and food policy

Drought assistance was revamped in 2005, which included an increase in the ECIRS from 50 per cent to 80 per cent in the second and subsequent years of an EC event and an expanded role for rural financial counsellors (Howard 2005). A reference

group (the Agriculture and Food Policy Reference Group) was subsequently commissioned to report on future government policies and programs affecting the agriculture and food sector (the 'Corish Report'). It was tasked with developing recommendations to 'improve the profitability, competitiveness and sustainability of the Australian agricultural and food sector.' (Agriculture and Food Policy Reference Group 2006, p. 198).

The Reference Group's comments on drought policy were generally consistent with those of the previous reviews. It was critical of ECIRS and transaction-based subsidies, and recommended that these be phased out by 2010, on the basis that such measures were not effective or appropriate. The Reference Group noted that many farmers saw ECIRS as rewarding poor management and propping up farmers who take imprudent risks, in addition to keeping otherwise unviable farms in production. The Reference Group also found that interest rate subsidies were contrary to the objectives of the NDP:

> This form of government assistance should be phased out and replaced with more positive initiatives that encourage greater self-reliance and preparedness. (Agriculture and Food Policy Reference Group 2006, p. 30)

The Reference Group suggested improved training and education and greater use of FMDs to encourage risk management and self-reliance.

Government responses and subsequent changes in programs

Despite the recommendations of this and other reviews, ECIRS (and ECRP) was not only retained, but extended to small businesses deemed to be affected by EC events. In addition, transactions-based subsidies remained in place in New South Wales, Queensland and the Northern Territory.

Further changes to EC programs were made in September 2007. Criteria applicable to small business were modified, to incorporate two distinct categories of drought-affected small business, and a drought assistance program for schools was introduced. In addition, an exit package was announced, comprising an exit grant, an advice and retraining grant, and a relocation grant.

Although unrelated to the 2006 review, significant changes to drought policy occurred in 2008. In particular, the AAA program, including its FarmBis and Farm Help components was terminated. However, some elements, including the Rural Financial Counselling Service program and FMDs were continued as stand-alone policies. To replace the AAA program, the Commonwealth Government commenced a staged roll-out, beginning on 1 July 2008, of various components of Australia's Farming Future (AFF), a package primarily focused on assisting the

agricultural sector adjust to climate change. It consists of three distinct elements — a Climate Change Research program, FarmReady, and a Climate Change Adjustment program (DAFF 2008a).

4.2 Current programs

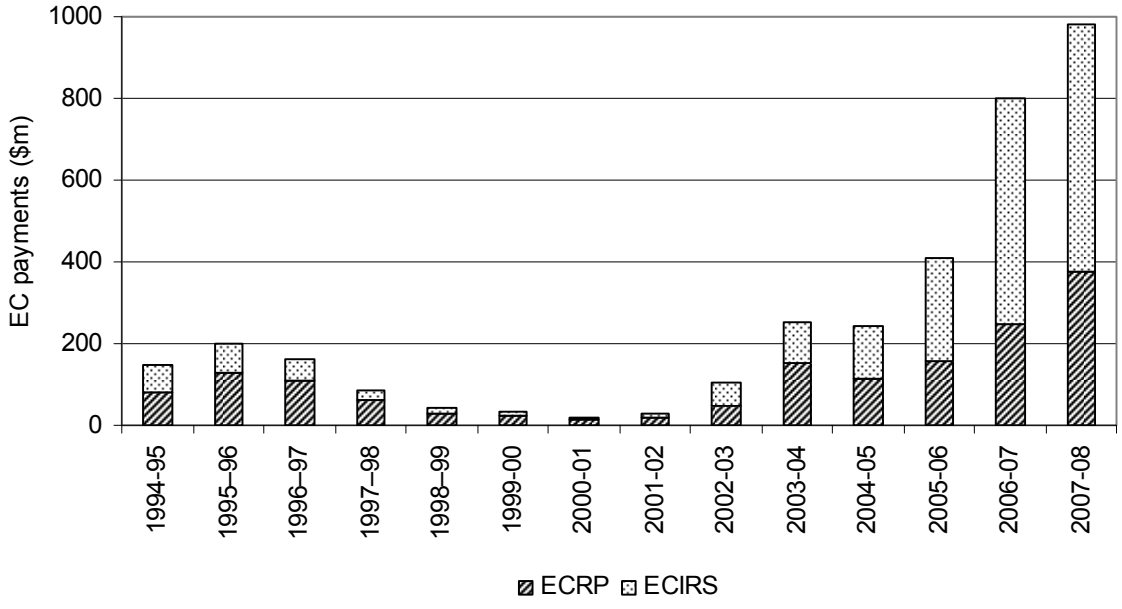
There is a broad range of government programs currently available to farmers in drought, and these are provided on an ongoing basis. These programs were introduced under a number of policy frameworks, including the NDP, the AAA program and its successor, the new climate change focused AFF (table 4.2).

Table 4.2 **Current drought and ongoing support programs**

Policy framework	*Household programs*	*Business programs*
NDP	EC relief payments	EC interest rate subsidies - farmers
	Interim income support for farmers & small businesses	EC interest rate subsidies - small businesses
	Small business income support	Professional advice and planning grant
		EC exit grants
AAA	Farm Help income support	FarmBis (concluded program)
		Farm help re-development grant
		Farm help advice and training grant
		Farm management deposits
AFF	Transitional income support	Climate change adjustment program advice and training grants
		FarmReady
		Re-establishment grants
Other	CWA emergency drought aid (concluded program)	Transport subsidies
		MDB Irrigation management grant
		Rural financial counselling service
		Small block irrigators exit package

While there are many drought support programs, most government expenditure is on just two — ECRP and ECIRS. Expenditure on these programs increased substantially in recent years and in 2007-08, the Commonwealth Government spent just over $1 billion on EC support through the two programs (figure 4.1). These programs, together with the other key drought-specific and ongoing support programs are briefly described below and are discussed in more detail in chapter 6 and appendices B, C, D, and E.

Figure 4.1 **EC support payments, 1994-95 to 2007-08**



Data source: DAFF (2008 unpublished).

Social support

ECRP is an income support measure available to farmers affected by drought in EC declared areas and is paid at a rate equivalent to the Newstart Allowance. Health Care Cards and Youth Allowance and Austudy are also offered to recipients on a means tested basis. In 2007-08, $377 million was paid to 28 887 recipients, an average of around $13 000 each. By early 2009, the number of recipients of ECRP was around 20 000.

Interim Income Support, which is similar to ECRP, is available in areas that have established a prima facie case for EC or are declared as interim assistance areas. In 2007-08, a total of $7.6 million in interim income support was paid to around 1900 farmers.

Small business income support was introduced in late 2006. It is available to farm dependent businesses and other small businesses within small towns of less than 10 000 people, who are based within an EC area, or who source the majority of their income from an EC area. Around 1500 businesses have accessed a total of $27 million in small business income support since its inception.

There is also a range of other social support programs including:

- measures aimed at assisting the unemployed in rural areas, including: Drought Force, Early Access to Intensive Support, and access to Job Search Support for redundant rural workers in drought affected areas
- community-level drought assistance programs such as assistance for schools in communities affected by drought
- family welfare and mental health programs including a Family Relationship Services Program, as well as a mental health telephone service and mental health printed material
- ad hoc income support payments provided by some states beyond that provided by the Commonwealth Government
- the Commonwealth Government also provided funding to the Country Women's Association to establish an emergency drought aid fund. Under the program, rural families could apply for up to $2000 for one-off emergency payments covering non-farm expenses (ceased June 2008).

There have also been income support payments available to farm families in need that have not been specifically drought related. The most significant of these are the Farm Help program (for which applications have now closed) and its successor, the Transitional Income Support (TIS) program. TIS assists farm families to manage the impacts of climate change on their farm business, by providing short term income support, as well as advice and training opportunities. As at December 2008, there were 96 farmers in receipt of the payment.

Business support

The most substantial farm and small business drought support measure is ECIRS. ECIRS is provided to support farm and farm dependent small businesses that are viable in the long term, but are currently experiencing financial difficultly due to an EC event. In 2007-08, total payments of $604.1 million were made to about 16 000 recipients. Eligible farms and other businesses can receive up to $500 000 over a five year period.

Other assistance measures are also available:

- EC Exit Package — this consists of an Exit Grant of up to $150 000, as well as an Advice and Retraining Grant and a Relocation Grant. To receive the full amount, recipients can only hold $350 000 in net assets after the sale of the farm. As of December 2008, only 98 applicants had received the EC exit package.

- Transaction-based subsidies — transport subsidies are provided for various activities in New South Wales, Queensland and the Northern Territory. In 2007-08, almost $30 million was paid out in transport subsidies.
- Declared Drought Area Incentives — payments to primary producers in EC areas to offer skills development and employment to apprentices.
- Taxation concessions — assistance for those affected by drought including allowing more time for the lodging of tax documents and provisions for forced livestock disposal.
- Concessional loans and additional interest rate subsidies are also offered in some states.

Risk management and preparedness measures

While most risk management and preparedness assistance measures are not drought specific, their use is affected by drought. Some of those measures are listed below:

- Farm Management Deposits (FMDs) — one of the primary risk management measures, which allow farmers to deposit primary production income into a bank account during good years for use during poor years. When the funds are deposited, they are not included in that year's taxable income, but rather are included when the money is withdrawn. In June 2008, there were around 41 000 deposit holders, with an average balance of almost $70 000.
- Professional Advice and Planning Grants — grants of up to $5500 to allow farm businesses affected by drought to obtain professional advice for drought management and recovery.
- Rural Financial Counselling Service — this service is heavily used in times of drought, including for assistance in accessing EC support payments. In 2007-08, over 14 000 people used this service.
- Irrigation Management Grants — provide sums of up to $20 000 for Murray-Darling Basin irrigators to implement water management strategies. As at December 2008, 9497 irrigators had accessed this grant.

There are also a number of stated-based research programs (see appendix E). For instance, Queensland has a Drought Preparedness program, which provides research, planning and development information to farmers and South Australia has research-based programs focused on activities such as enhancing the drought resistance of permanent horticulture.

5 Exceptional Circumstances declarations

Key points

- The Exceptional Circumstances (EC) declaration, which is used to trigger the availability of assistance for drought, relies on both climatic and economic factors.
- The application of EC criteria has failed to distinguish between droughts defined as those that would be expected to be managed, and those which are beyond the ability of even the most prudent farmer to manage.
- To the extent that climate becomes more variable over time and between regions in the future, any definition of EC areas will be of little relevance in scoping the extreme nature of drought impacts.
- The EC declaration process lacks transparency and accountability. Recommendations about declarations are not made public and farmers and organisations involved in preparing applications receive no feedback other than the final decision.
- Placing lines on maps for EC boundaries is divisive within and between communities and can result in farmers in similar circumstances being treated differently in terms of eligibility for assistance.
- While EC declarations are generally made in a reasonably timely manner, determining the end of declarations is problematic.

5.1 Introduction

When the 1992 NDP was developed, Commonwealth, state and territory governments agreed that drought should be viewed in the context of a risk that could be managed by primary producers. The focus of drought policy was intended to be on how governments could aid producers to be prepared for and become self reliant during drought events. The NDP states:

> The role of government is … to assist farmers enhance their skills in key areas of risk management, business planning and natural resource management. (DAFF 2008e, p. 5)

As noted in Chapter 4, the 1990 Drought Policy Review Task Force recommended that farmers should manage all forms of drought as it was not possible to make an adequate distinction between severe and lesser drought.

But despite the recommendation of the Drought Policy Review Task Force, policy makers sought to make a distinction between 'normal' and 'severe' droughts. The Senate Standing Committee on Rural and Regional Affairs, when asked to assess appropriate government responses to the recommendations of the Drought Policy Review Taskforce initially stated that:

> The Committee is of the view that individual landholders within rural industries should be responsible for preparing and managing variable climatic and seasonal conditions. However, it considers that there are limits to the self-reliance of farmers to cope with severe drought. Invariably, as drought worsens, self-reliance will diminish. Therefore, even with sound management and planning, it may be difficult for a primary producer to withstand the effects of the most severe drought.
>
> The Committee considers that the Commonwealth Government has a responsibility to provide additional assistance in severe drought, as it is in the national interest for the Commonwealth Government to protect and maintain Australia's agricultural base and productive capacity, particularly Australia's breeding herd and flock. (Senate Standing Committee on Rural and Regional Affairs 1992, pp. xv-xvi)

This led to a distinction between manageable normal and unmanageable severe drought events within Australia's drought policy. Severe droughts were initially thought of as those years in which rainfall over three months or more was in the lowest 5 per cent of historical records. Such droughts are thought to have occurred approximately every 18 years. However, the time between these events over the past 150 years has varied from 4 to 38 years (BoM 2003).

The distinction between normal droughts and severe droughts meant there was a need to assess drought events against a criterion that would allow for severe droughts to be recognised. The rationale behind declaring an area as experiencing an EC event is to recognise circumstances which 'are rare and severe and beyond the ability of even the most prudent farmer to manage'. If a severe drought was declared, it would then represent a trigger for assistance. In recognition that no one standard definition of drought was appropriate, the criteria used to evaluate drought events incorporated both climatic and economic factors. EC events are characterised by the NDP as events which:

- are rare, in the sense that they do not occur more than once on average over a 20 to 25 year period
- result in a rare and severe downturn in farm income over a prolonged period of time (12 months or more)
- cannot be planned for or managed as part of a farmer's normal risk management strategies.

Further to this, the economic effects of an EC event must be discrete and not form part of any long term structural adjustment processes or normal fluctuations in commodity prices (DAFF 2008e). Also, events that are insurable, covered under the National Disaster Relief and Recovery Arrangements, or by existing Commonwealth, state or territory measures, are excluded from consideration.

Applying the EC criteria

The process for applying for an area to be declared as experiencing an EC event involves community and industry organisations, state and territory governments and the Commonwealth. Community and industry organisations and state and territory governments are required to put together a 'justifiable application' (box 5.1).

There are two key steps:

- concerns by community or industry bodies about an event are to be raised initially with the relevant state or territory government
- following the notification of concerns, and provided that the relevant state or territory government believes an application is justifiable, it will work in conjunction with the community or industry body to develop an application to the Commonwealth Government (declarations can be regional and/or industry based).

The onus is on the community or industry body, along with the relevant state or territory government, to provide the necessary objective evidence to support an EC application and to set appropriate boundaries for the application area (DAFF 2008e — see box 5.2 for examples of recent applications).

Box 5.1 **Criteria for a justifiable application**

State and territory governments are required to assess local conditions based on the EC criteria. Applications must demonstrate that the event is rare and severe, has resulted in a rare and severe downturn in farm income over a prolonged period, and that the event was not predictable or part of a process of structural adjustment. Applications are then assessed by the Commonwealth Government using data from the National Agricultural Monitoring System (NAMS), the Australian Bureau of Agricultural and Resource Economics (ABARE) and through on-ground inspections by the National Rural Advisory Council (NRAC).

Rare and severe event

A rare event is one which is believed to occur only once on average every 20 to 25 years. A rare event is believed to be severe if it is of a significant scale — affects a significant proportion of farm businesses in the application area. Applications for EC must demonstrate that multiple factors combined to form the event being assessed (for example, drought combined with severe or abnormal frosts).

Applications put forward by state and territory governments must include information supporting the event being classified as rare and severe (meteorological, agronomic and environmental), the location of the affected area, the timing and duration, the occurrence of a sustained adverse impact on incomes of producers, and the impact on crop and livestock production and farm viability across different industries.

Rare and severe downturn in farm income

For an event to have a rare and severe impact on farm incomes the event must adversely affect incomes over a period longer than 12 months. Evidence in support of this should include information to provide an historical comparison (production and yield levels along with average cash incomes), actual and forecast effects of the event on production and yield levels along with average cash incomes and average debt levels.

Not predicable or part of a process of structural adjustment

The provision of EC support is not intended to interfere with the process of structural adjustment brought about by current pressures (such as declining terms of trade) or any foreseeable changes (such as policy changes that may have been known about for some time). Applications must provide information to provide evidence that the current downturn in farm incomes is due to the discrete event under consideration.

Source: DAFF (2008e).

Box 5.2 **Recent EC declarations**

Some recent examples of successful EC area applications are the Western Australian application for the Northern Wheatbelt and Northern Areas of the Eastern Wheatbelt and the South Australian Yorke Peninsula application.

Northern Wheatbelt and Northern Areas of the Eastern Wheatbelt, Western Australia

The EC application was based on climatic events during 2006 and 2007. These two years represented the two driest successive years on record within the region, and as a result led to 50 per cent fall in crop production. Characteristics of these years that were reported as exceptional were:

- in 2006, late summer rainfalls meant significant costs were incurred by producers to control summer weeds and, due to rainfall timing, left little residual soil moisture for the growing season. During the growing season rainfall was significantly below average for the entire region
- in 2007, with low summer rainfall and little stored soil moisture, the growing season that followed had similar rainfall patterns and amounts to 2006. Low rainfall was exacerbated by high temperatures and strong wind events during autumn and winter. There was also a reported low prospect for spring rain.

Yorke Peninsula South Australia

This EC application was based on climatic and production conditions over the five year period between 2002 and 2006. The events which led to the declaration were:

- in 2002 there was significantly below average rainfall, poor yields, high fodder prices.
- in 2003 there was average to below average rainfall, poor yields, poor grain quality, with producers unable to replenish fodder reserves due to high prices in 2002.
- in 2004 there was a late break to the growing season and good winter rains. But hot October winds impacted yields, grain quality and available fodder. The pasture growing season was significantly shortened requiring producers to feed livestock.
- in 2005 there was average to above average seasonal conditions and good yields but poor commodity prices. Pests such as black tip were a problem, with hay spoilage and snail impact experienced in some areas due to late season rains. Some farmers had to supplementary feed livestock for third consecutive season.
- in 2006 there was good start to the grain and pasture season but many areas finished with decile one rainfall resulting in poor yields and little or no feed. Frosts and snails were also experienced by some which affected germination of crops and pastures.

Source: DAFF (2008 unpublished).

Once an application is received by the Commonwealth Government a prima facie assessment is conducted by the Department of Agriculture, Fisheries and Forestry. This process involves a desk-based assessment of the application supported by information from the Bureau of Rural Sciences (BRS) through the National Agricultural Monitoring System (NAMS) (box 5.3) and economic data supplied by ABARE. If a prima facie case for declaration is established, access to the EC support payments is available (through the interim support payments) and the application is forwarded to the National Rural Advisory Council (NRAC) for formal assessment.

Box 5.3 National Agricultural Monitoring System

NAMS is a web based tool that was designed to streamline the EC application process for producer and community groups and for state and territory governments. NAMS has been in place since July 2006 and provides historical data and predictions on both broadacre dryland and irrigated agricultural industries. Data are available at a spatial scale allowing for individual regions to be analysed.

Development of NAMS was instigated by Primary Industries Ministerial Council, and the project is funded by the Commonwealth, state and territory governments. The objectives of the project are to:

- provide relevant and comprehensive data from a system that is user friendly and client focused
- provide a centralised access point for those data
- provide quicker and cheaper access to data than pre-existing sources
- enhance the timely identification of an emerging EC event
- allow users to apply data to areas equivalent to local government areas
- identify other uses, for example more objective state drought declarations and improved approaches to risk management.

An independent review of the system concluded that NAMS had successfully met its objectives and found NAMS to be a highly valued information system. It has reduced the time and resources required in preparing applications. For assessors, NAMS has ensured standardised content that is consistent for all users. An internal assessment by BRS also found that NAMS led to a significant productivity improvement with staffing levels considerably reduced despite the volume of reports and the amount of information provided to NRAC increasing four-fold.

Sources: Wickles and Windle (2007); BRS (2008 unpublished); NAMS (2008)

NRAC comprises representatives of the Commonwealth, state and territory governments along with a representative from the National Farmers' Federation and experts in the areas of economics, financial administration, banking, sustainable agriculture and farm management. (NRAC has a number of roles outside the EC process, including providing information to government on rural adjustment, regional issues and education and training, but in recent years the majority of their workload has been EC related (NRAC 2006).) NRAC tours an affected area consulting with local producers and businesses. Assisted by information provided by BRS and ABARE it then makes a recommendation to the Minister for Agriculture, Fisheries and Forestry in relation to the EC application. Drawing on this advice, the Minister decides whether or not an area should be declared an EC region.

Once an area has been declared, farmers, farm businesses and farm dependent rural small businesses can apply to access the EC support programs. To be eligible for income support, farmers and farm dependent rural small businesses owners must first acquire an EC certificate from Centrelink, which identifies them as being located within an EC area.

There is no set duration for EC assistance once an EC event is declared. Each event is assessed separately and therefore the length of time assistance is available varies. Despite this, the duration of available assistance is generally based on one year of experiencing the event and one year of recovery. Timelines may be altered with respect to the production systems affected (for example, expiry of an EC declaration might be altered from two years to the time when producers receive incomes from crops harvested in the recovery year). If the event is believed to have not ended on expiry of the declaration period, the EC declaration will only be extended if a new application is received from state or territory governments.

5.2 Assessing the EC declaration system

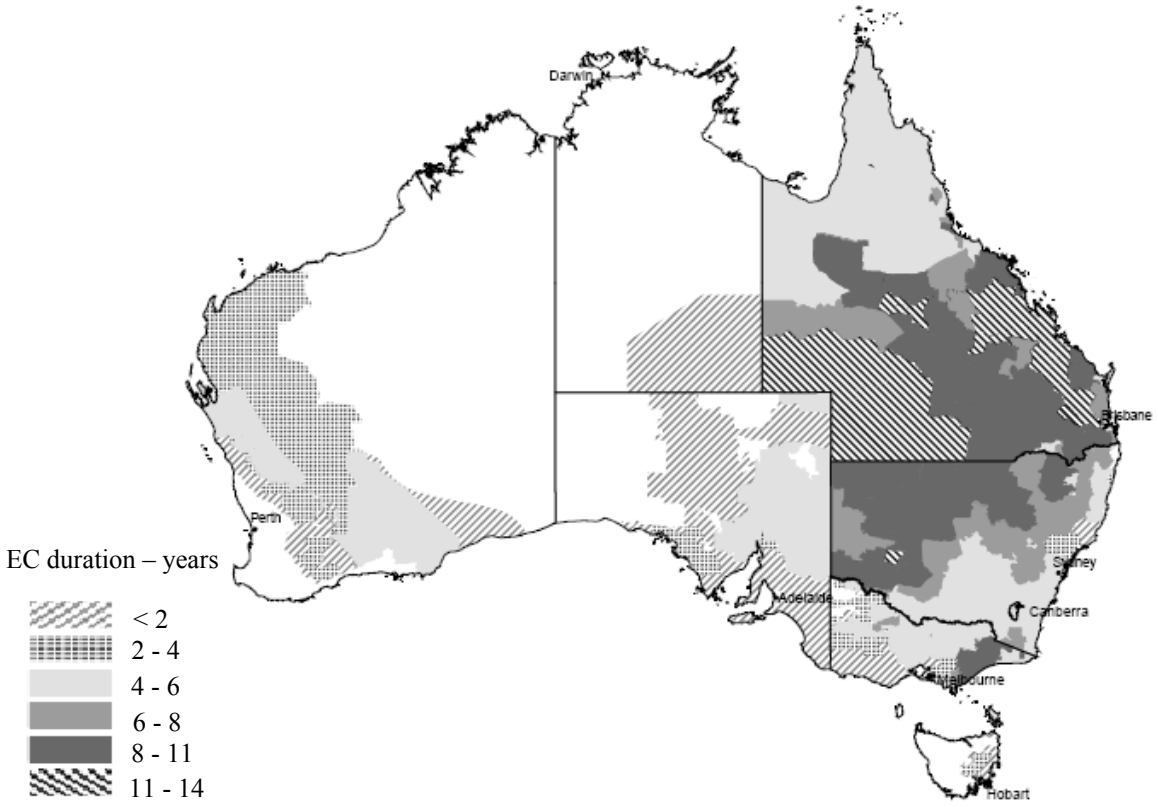
This section assesses issues relating to the effectiveness and efficiency of the process of identifying exceptional circumstances.

Frequency of EC declarations

The EC criteria are not solely based on climatic conditions. For an area to be considered to have experienced an exceptional event, a climate based event must occur in combination with another event (need not be climate related), and must be rare in the sense that it occurs on average only once every 20 to 25 years. Despite this, many areas have been declared as experiencing exceptional circumstances with

a significantly greater frequency, even after allowing for the period given for recovery (figure 5.1). Indeed, over the 17 year history of the NDP some areas have been EC declared for 14 years. Many of Australia's agricultural producing regions in Queensland, New South Wales and Victoria have been under an EC declaration for at least 8 years during this period.

Figure 5.1 **Duration of EC declarations, 1992–2008[a]**



a Includes only declarations based on a drought event (irrespective of industry).

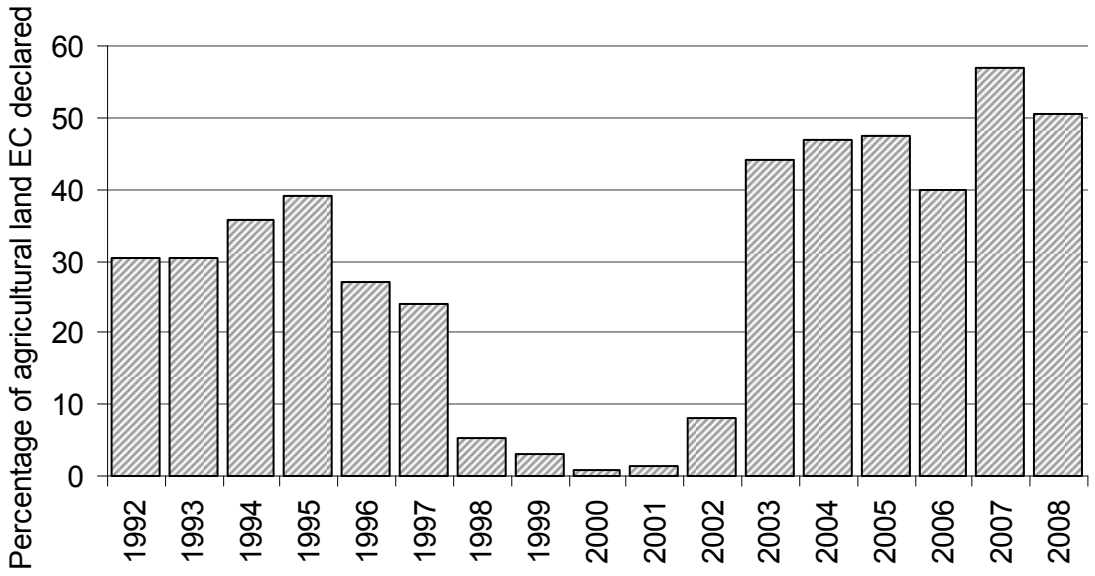
Data source: BRS (2009 unpublished).

Between 2003 and 2008, there was a significant increase in the proportion of agricultural land declared as experiencing an EC event (figure 5.2). Over this period close to 50 per cent of all agricultural land was under an EC declaration compared with an average of close to 30 per cent for the early years of the NDP (1992 to 1997) and close to 5 per cent between 1998 and 2002.

There are a number of reasons why declarations may have occurred more frequently than expected (in addition to the latest drought's severe and prolonged nature progressively exacerbating regional conditions) including:

- inappropriate criteria used for evaluation and too broad a focus for the definition of a rare and severe event — the combination of two or more random events
- poor implementation
- incentives within the system which lead to a bias in favour of declaration.

Figure 5.2 **Percentage of agricultural land EC declared, 1992–2008**



Data source: BRS (2008 unpublished).

The EC criteria

An EC declaration is based on the occurrence of two or more events in combination, at least one of which must be related to climate. Given the relatively short history of climate records, the potential for two or more events to have occurred in combination over the historical record is low, making such events more likely to be viewed as a 1 in 20 to 25 year occurrence (and thus declarations more probable). Indeed, declarations have been made in more than 5 per cent of the 17 year operation period in many areas. Further, in declared areas the majority of producers have managed without EC support, and there has been no evidence of a significant increase in departures from farming (chapter 2). This suggests that, while the policy was designed to delineate between severe droughts that not even the most prudent farmer could manage and lesser droughts, the criteria as applied have been unable to do so.

Rainfall and soil moisture data for Australia highlight the inability of the EC process to effectively identify exceptional droughts (it should be noted that such data do not directly reflect hydrological drought conditions). Measured as rainfall and soil moisture levels that are in the bottom 5th percentile based on historical records, around 3 per cent of Australia on average experienced exceptionally low rainfall over the NDP period 1993-2008, rising to just over 5 per cent for the period 2002-2007. On average, up to 12 per cent of some regions experienced exceptionally low soil moisture levels over the drought period 2002-2006 (table 5.1 — for regions see chapter 3).

Table 5.1 **Average area experiencing exceptionally low rainfall and soil moisture**

Selected years

	Exceptionally low rainfall		*Exceptionally low soil moisture*	
Region	*1993–2008*	*2002–2007*	*1993–2006*	*2002–2006*
	%	%	%	%
Queensland	3.9	7.5	6.5	9.0
New South Wales	5.0	10.7	5.7	11.4
Victoria & Tasmania	7.0	14.1	4.5	6.2
Southwest Australia	3.4	5.4	3.3	6.6
Northwest Australia	2.4	5.6	3.4	1.6
Murray-Darling Basin	4.8	11.4	5.2	10.9
Southwest WA	9.0	10.6	4.6	11.7
Australia	3.1	5.1	–	–

Source: Hennessy et al. (2008).

Despite this, over the same period, vastly more of Australia's agricultural land has been declared as experiencing an EC event (table 5.2). Average agricultural area declared as experiencing an EC event from 1993 to 2008 was 29 per cent, well above the average area experiencing exceptionally low soil moisture and rainfall. New South Wales, for example, had an average agricultural area of 50 per cent under an EC declaration for the 15 year period, rising to 88 per cent for the period 2002-2007. Yet only an average of 11 per cent of the state had exceptionally low rainfall for the same period, with 11 per cent also experiencing exceptionally low soil moisture (2002-2006).

Table 5.2 **Average agricultural area EC declared**
Selected years

State	*1993–2008*	*2002–2007*
	%	%
New South Wales	50	88
Victoria	29	51
Queensland	49	48
South Australia	20	38
Western Australia	11	25
Tasmania	11	8
Northern Territory	3	4
Australian Capital Territory	31	67
Australia	29	41

Source: BRS (2008 unpublished).

Given predictions of a changing climate, the use of an historical record to measure rare events is problematic and creates a risk that any trigger based on this record could be activated more often than intended within the policy framework (Hennessy et al. 2008). With rising temperatures and mixed forecasts for rainfall, the risk of rare drought alone (defined where rainfall is in the lowest 5th percentile on the historical record) is likely to increase. According to BoM-CSIRO, attempts to incorporate climate trends are believed to provide no useful improvement. As stated by BoM-CSIRO:

> … this approach has already been modelled (based on 20, 30 and 40 year moving 'training windows') and shown to result in no useful improvement. This is partly due to the lags in responses, since operationally the 'training windows' have to be historic. (Hennessy et al. 2008, p. 19)

Such an approach has the added disadvantage of arbitrarily specifying what time horizon should be used in the record — for example, should it include the wet decade of the 1950s and extend further back to the drought of the 1940s. Also, alternatives to using historical data, such as analysis on the basis of future predictions, are open to significant uncertainty over the accuracy of predictions and the need for continual updating of the record as new modelling techniques and climate predictions become available.

Implementation

The EC declaration process has a number of checks which aim to support the integrity of the process. Data on climatic conditions within drought affected regions are supplied by BRS through NAMS, with economic information supplied by ABARE. However, due to the coarse scale of much of the information (for example,

in some regions rainfall data are only available from somewhat scattered weather stations that may not provide a good representation of local conditions), NRAC undertakes tours of affected areas to 'ground truth' the information provided. This involves committee members holding consultations with a wide range of local producers.

Despite this consultative process, recommendations made by NRAC regarding the appropriateness of a declaration are not made public. Instead, the recommendations are provided directly to the Minister for Agriculture, Fisheries and Forestry, who then makes the declaration decision. In addition, the applications for EC declaration by state and territory governments in conjunction with local groups are not made available for public scrutiny, and little feedback is provided to these groups apart from the final decision (NSW Farmers' Association, sub. DR182).

This lack of transparency in the declaration process provides scope for all parties to act strategically.

Incentives within the system

Farmers, their lobby groups and local communities along with state, territory and Commonwealth governments face different payoffs from an EC declaration and thus have differing incentives to bring about a declaration. Combined with the lack of transparency, these strategic behaviours have the potential to create a number of inefficiencies.

The participants in the EC declaration process act sequentially. Farmers and their lobby groups are the first to engage in the process by alerting state and territory governments to the perceived severity of the drought they are experiencing. After contact from these groups, state and territory governments decide whether to work with them and submit an application to the Commonwealth.

For farmers (along with some small businesses), a declaration provides the trigger to be able to apply for EC payments along with other support payments made available from state and territory governments (although some states have their own drought triggers). Given this, there is likely to be little incentive for farmers, their lobby groups and local communities to not proceed with an application when they believe there is some chance of a declaration. However, this is likely to be tempered as some farmers may not wish to be involved in the declaration process if they feel a reluctance to be seen to be asking for government support (Wahlquist 2003). There are also costs incurred in preparing applications.

For state and territory governments, declarations enable farmers and related businesses to access support programs for which the costs are mainly incurred by the Commonwealth. State and territory governments are also seen to be responding to the needs of their electorate. By supporting an application, they avoid any political costs associated with a lack of action. As suggested by the Murray Lands Regional Development Board Inc:

> It would be reasonable to claim that [the] State Government would support applications for EC declaration as it assists them in shifting a part of the financial burden that falls upon the state. (sub. 68, p. 3)

In addition, Botterill and Chapman proposed that:

> … the funding arrangements have reduced incentives for State governments to act as effective gatekeepers for dubious applications for EC declarations. (sub. 52, p. 3)

For the Commonwealth, a declaration also allows the government and individual ministers to be seen as responding to the needs of the community. In 2007 the Minister for Agriculture, Fisheries and Forestry extended the expiry date of 38 EC areas, stating:

> The extension of 38 EC areas to September 2008, will give farmers greater security as they continue to battle through this cruel drought. (McGauran 2007a, p. 1)

Another example of the Commonwealth Government's response, when faced with groups under stress, is that a number of interim assistance areas were declared by the government in September 2007. None of the communities subsequently attempted to build a case for EC status. The Tasmanian Minister for Primary Industries and Water, D. Llewellyn, indicated that:

> The Tasmanian Government does not support an extension of the interim declaration. The North West Coast, King Island, parts of the North East and other regions not in full EC declaration simply do not meet the criteria … But the ending of the interim declaration next month does not affect relief to the drought-afflicted full EC regions of Tasmania. These are distinct matters. One was an election stunt. The other is a proper evidence-based relief arrangement. (Llewellyn 2008, p. 1)

The absence of a transparent assessment process together with uniform end dates (which suggests that individual regional characteristics and production cycles were not taken into account) and the lack of subsequent EC applications provides some indication of how governments react to potential pressure.

Given the incentives facing each of the participants in the declaration process, it is probable that an EC event would be declared more often than would be expected given the stated criteria. It can also create an expectation of government support, altering the behaviour of some farmers who may see the availability of EC declaration as a form of fallback insurance against drought (Ha et al. 2007).

Placing lines on the map

A regularly reported criticism of the EC declaration process is the need to define boundaries around affected regions. Such boundaries necessitate lines being placed on maps in order to delineate those who can and those who cannot receive assistance.

Placing lines on maps allows for assistance to be limited to those who have been affected by a declared drought event. It also excludes those in other areas who may meet the specific eligibility criteria for relief payments or interest rate subsidies, but as a result of factors such as falling commodity prices rather than drought. Such targeting places limits on the overall cost of support to governments. This cost saving, however, is diminished by the fact that assistance measures still require individual assessments to determine eligibility.

Lines on the map that fully encompass those affected and exclude those not affected by a drought are difficult to develop. In practice, lines on maps are developed around arbitrary boundaries such as roads, shire boundaries and rural lands protection board areas. In this respect, boundaries have the potential to be divisive, as stated by the NSW Government:

> Eligibility is determined by 'lines on a map' rather than by the individual needs of farm businesses or households. This creates equity issues as those outside the line can be in similar circumstances to those who are eligible. (sub. 90, p. 4)

This was also reported by the Expert Social Panel:

> EC policy was reported as having created feelings of division and resentment, particularly by farmers who have successfully managed and adapted to prolonged dryness towards those farmers eligible for EC assistance. (Kenny et al. 2008, p. 14)

Further, the coarseness and availability of the data used in assessing areas makes defining drought areas difficult. Data on climatic conditions within drought affected regions are typically available for the EC declaration process on a 25 square kilometre grid. In some parts of Australia, this is sufficient to describe drought conditions, but in others (for example, parts of South Australia and Queensland) this scale is either considered too coarse, with rainfall data at this level considered an unsatisfactory representation of local conditions, or not available. The Rangelands Drought Taskforce noted that:

> The current EC declaration requires good regional weather data to support the regional application, in the Outback regions of South Australia the data was not available due to the sparseness of weather stations and delayed the application submission by 6 to 8 months. (sub. 60, p. 5)

The creation of a buffer area around the EC declaration lines was an attempt to reduce the arbitrary nature of EC boundaries. Buffer areas are used where conditions and their impact have been highly variable along boundary lines, and whilst varying for different EC areas, have commonly taken the form of a 7 km area around the existing boundary. However, buffer areas equate to a widening of the existing boundaries and thus shift existing lines without avoiding potential inequalities of having lines on the map in the first instance. As put by the South Australian Country Women's Association Incorporated:

> Geographical boundaries do cause a problem in that adjacent areas are excluded because, on the whole, that adjoining region is not experiencing severe drought conditions. Example: a farm situated on the southern boundary of a region is EC declared whilst the neighbouring farm, located outside of the EC declared area, is excluded. Buffer zones can be just as discriminatory. (sub. 72, p. 5)

The addition of buffer zones has added to the confusion over whether some farmers are eligible for assistance. It is also questionable whether suitable buffer areas could be established if initial lines were difficult to develop.

Recognition of tough times

Throughout consultations to this inquiry, many producers stated that EC declarations also provided an important public recognition from governments that producers were facing difficult circumstances outside their control — a sentiment also expressed in earlier reviews (Drought Review Panel 2004). For example, as stated by AgForce:

> In many cases the simple approval of EC to Farmers who would never qualify [for assistance] has provided great psychological comfort to them in that the wider suburban community recognises how tough things are. (sub. DR185, p. 2)

On the other hand, there can be detrimental consequences for communities of using EC declarations to indicate that circumstances are 'tough'. For example, one South Australian farmer suggested that:

> The process of EC declaration focuses the community away from confidence in the future to examining victim status and the community mindset then changes to rights. This polarises an outlook of self help and focuses people on a mental search for eligibility. (J. Berger, sub. DR138, p. 2)

To the extent that EC declarations entrench a perception that there is little that could be done to mitigate drought impacts, the process has the potential to work against the NDP objective of encouraging greater self-reliance.

Timeliness of declarations

The process of assessing applications for EC necessarily requires investigations of the rarity of climatic conditions and claims of drought impact. The ANAO (2005) found that during 2002-03 and 2003-04, while most applications for EC declaration were processed by NRAC in 7 weeks, some took up to 23 weeks. In other years, average processing times have varied considerably (table 5.3).

With the introduction of NAMS in July 2006, processing time has reduced compared with the previous two years. Despite this, compared to assessment times over the 2001 to 2003 period when a similarly high number of applications were received, there has been little improvement. However, for those areas with limited available data and the need for NRAC to 'ground truth' conditions, it would be reasonable to expect assessments to take several months explaining, in part, the variability seen in processing times.

Table 5.3 **NRAC processing time for EC applications, 2001 to 2007**

Year	*Applications*	*Average weeks*
	No.	No.
2001	2	13
2002	15	9
2003	45	10
2004	9	19
2005	3	18
2006	9	11
2007	14	14

Source: DAFF (2008 unpublished).

Declarations for EC are, by their nature, ex post and thus producers suffer a degree of hardship prior to support becoming available. The subsequent lack of responsiveness in assistance measures was believed by some to be a failure of the EC system. For example, the Coonamble Shire Council stated:

> EC legislation needs to be changed or removed to enable a more responsive intervention. The process by which EC status is determined and the requirement for EC zones to have a certain minimum size or minimum number of producers is problematic as it delays an effective response and creates unsupportable inequities. Drought support should be based on area and level of need with support provided on the basis of individual need.
>
> Drought assistance should be focused on being responsive in times of severe drought. Other programs of assistance should be utilised to ensure farmers and regional small business are able to adapt to a changing climate. (sub. 63, p. 5)

The transition out of an EC declaration also carries concern. Some inquiry participants expressed a view that movements out of declarations are too sudden and do not allow sufficient time for businesses to recover. Many participants considered that while the usual process of allowing one year for recovery was suitable for one-off drought events, with prolonged conditions it did not allow for enough time for recovery. It was suggested that recipients of assistance were unprepared for survival post-EC without government support. As put by the Queensland Farmers' Federation (QFF):

> … what is relevant to this Review is that the current operation of the EC policy offers no clear steps to transition farmers still needing assistance. QFF finds it incongruous that some 3,400 farm families and small businesses can be in receipt of assistance for an "Exceptional" event one day, and the next day a third of them are cut off.
>
> For the record this followed the Advisory Council's inspections for "agricultural recovery" in Queensland and its failure to adequately assess the hydrological issues and low water allocations. As a consequence some of the 13 Queensland EC regions had assistance abruptly ended 15 June 2008 when a wider assessment would have suggested otherwise. QFF estimates this immediately impacted up to 1,200 farmers with no suitable transition arrangements for many of them. (sub. 82, p. 8)

Again, the lack of transparency in the revocation process is likely to have contributed to the concerns expressed over decisions made to end declarations — particularly given differences in post drought recovery speeds between agricultural industries and between regions. Further, in cases where the process has failed to identify exceptional events, the need for extended transitions is questionable.

Cost of the declaration process

There are extensive costs involved in preparing an EC application. The EC declaration process broadly includes the costs of: preparing applications for EC status consideration; assessing applications for EC status and extensions of that status; providing recommendations to the Commonwealth Government Minister for Agriculture, Fisheries and Forestry; and implementing EC declaration decisions. These costs are likely to vary considerably between drought years and may be higher in those years for which more applications for EC status are made.

Despite the presence of NAMS, the application process is data intensive. As put by the South Australian Government:

> The process has … highlighted a range of issues including the cost of the process, both in time and in dollars … Given that applicants for EC support were, quite appropriately, still required to go through the 'second gate' of eligibility assessment once a region had been declared, the cost-benefit of the current application process for EC declaration is debatable. (sub. 91, pp. 2-3)

The South Australian Government suggested that the cost of individual EC applications equated to close to $65 000 (sub. 91). This was made up of costs relating to state government support to develop applications including case studies of the affected regions, along with in-kind support and contributions provided by local stakeholders.

At the Commonwealth level, in 2007-08, NRAC, the main organisation involved in the assessment of EC applications, incurred expenditure of around $440 000 — approximately $275 000 of this was for travel and the remainder was remuneration to council members. However, this does not include the cost of staff within the Commonwealth Department of Agriculture, Fisheries and Forestry who are directly or indirectly involved in the NRAC processes.

In addition, approximately $1.2 million was set aside in the 2007-08 budget (on a 50 per cent cost sharing arrangement between the Commonwealth and state governments), for the maintenance and extension of NAMS. The Commission has only limited information on these costs for other years or for other agencies involved in the EC declaration process (including the Commonwealth agencies BRS and ABARE and the numerous state agencies and industry organisations which are involved in preparing applications).

Overall, the Commission considers that any process that attempts to declare areas according to the severity of drought is inappropriate, ineffective and inequitable.

6 Program evaluation

Key points

- The programs provided under NDP are overwhelmingly targeted at maintaining farming operations during a drought, regardless of its severity. Transitory drought triggered assistance does little to encourage preparedness or provide incentives for longer term self-reliance.
- The cost of government assistance has escalated over recent years, particularly for EC interest rate subsidies. The focus of support has markedly shifted away from farm households and towards farm businesses. There has been very little accountability in the use of funds or the evaluation of program outcomes.
- There is widespread acceptance of the need for income support for farm families who are experiencing temporary financial hardship. However, provision of income support based on geographical boundaries or events such as drought is inequitable.
- Interest rate subsidies are inappropriate and inefficient. They tend to focus support on farms and businesses that are the least financially prepared for drought.
- While transport subsidies may benefit producers of grain and fodder, they also have adverse consequences both on farms and between farms. They are not an appropriate or efficient use of government support.
- Exit packages are largely inaccessible and have generally failed to address the non-monetary reasons why farmers prefer to remain on their farms. They are not an effective means of assisting drought affected farmers to exit the industry.
- Farm Management Deposits have encouraged some farmers to save during periods of higher income. While mainly used for tax management purposes, they appear to also offer a means for increased self-reliance.
- Grants for training that are well targeted, area appropriate and have an educational outcome can provide community wide benefits and be worthwhile.
- The Rural Financial Counselling Service program enables financial counselling services in rural areas to facilitate a flow of information and act as referral points for other services.
- There appears to be no failure in rural finance markets that would warrant government support through irrigation management grants. The off-farm environmental consequences of these grants may be more harmful than beneficial.
- Drought policy is not the appropriate vehicle to sustain rural communities and small businesses in the face of underlying and ongoing changes.

6.1 Introduction

In addition to the key NDP programs offered to farmers and rural businesses during times of drought, other farm assistance programs operate under the Commonwealth Government's broader agricultural policy frameworks such as Agriculture Advancing Australia (AAA) and its successor, Australia's Farming Future (AFF) and run parallel with the NDP. Each state and territory also offers a range of assistance schemes either on an ongoing basis or in times of drought. These Commonwealth 'non–drought' related and state level farm assistance programs can potentially influence the eligibility for, and the take up and effectiveness of, the NDP programs. Hence, and in line with the terms of reference for this inquiry, other key programs available to farmers are evaluated alongside the NDP programs. The key programs considered in this report and evaluated in this chapter were outlined in chapter 4.

The aim of the evaluation is to determine which aspects of the programs, if any, might be suitable to retain as either income support to farm families in hardship or to facilitate the longer term goal of a self-reliant agricultural sector in the face of a variable and changing climate.

In the first part of this chapter, the underlying rationales for government intervention embodied in each of the three NDP objectives are examined and the desired outcomes are explored. Some issues that have arisen across the suite of programs offered to farmers and rural small businesses are discussed in section 6.3. The following three sections 6.4 to 6.6 then consider and evaluate, in turn, the key programs offered to farmers. For ease of discussion, these programs are grouped into those that support rural families, those that provide drought-triggered support for farm and rural businesses, and those programs that are targeted at preparedness and advice. The program evaluation draws on analyses set out in appendixes B through to E and on submissions to the inquiry.

6.2 Assessing the appropriateness, effectiveness and efficiency of drought support programs

The Commission has been asked to assess the appropriateness, effectiveness and efficiency of the current drought support and related programs with respect to the three NDP objectives (as outlined in chapter 1) and the Expenditure Review Principles. In addition, the principles and general policy guidelines of the *Productivity Commission Act 1998* require the Commission to take a community wide perspective when evaluating policy.

In order to assess drought support and related programs against the NDP objectives, it is necessary to understand:

- the underlying market failure and social equity rationales for government support that are embodied in the objectives (to assess appropriateness)
- what desired outcomes are embodied in the objectives, the degree to which they are achieved and the extent to which there may be unintended consequences (to assess program effectiveness)
- how programs are delivered and targeted (to assess efficiency).

The broader question of whether the NDP objectives are, of themselves, the most appropriate objectives that governments should pursue in times of drought and in intervening periods, is revisited in chapter 7, in the context of developing a policy framework to support self-reliance and preparedness to manage drought among farmers, farm businesses and farm dependent rural small businesses.

In evaluating programs against the NDP objectives, it is useful to consider that the objectives encompass three sequential stages of farm response to climatic variability — self-reliance and preparation for drought (objective one), maintenance and protection during drought (objective two) and recovery after drought (objective three).

NDP objective one: self-reliance in management

Underpinning this first NDP objective is an assumption that there is not just a failure by farmers to adopt self-reliant strategies to manage drought and other climate risks, but that there is a case for government intervention. As stated in the 1990 review of drought policy which proposed this objective:

> The Taskforce has found that most of the alleged instances of market failure in times of climate stress represent an unwillingness or inability on the part of individual producers to manage for the risks involved. (McInnes et al. 1990, vol. 2, p. 86)

Cultural and market failures which could impede farmers from adopting risk management strategies and provide a rationale for government intervention include: policy and regulatory failure; community wide benefit from research, development and extension; incomplete information available to improve the adoption of risk management strategies or new technologies; and an absence of insurance markets.

In terms of regulatory failure, for example, some past and current government policies have impeded farmers from becoming self-reliant for drought events. Steps to correct these failures have included governments providing compensation for the historical distribution of small unviable parcels of land through the soldier

settlement schemes in order to facilitate amalgamation (Industry Commission 1996), and intervention to correct, and compensate for, past water policies which saw an over allocation of water entitlements in some states. Drought assistance has also been largely a second best policy approach, with additional programs developed and delivered on a somewhat ad hoc basis during drought periods due to significant lobbying pressure.

However, even where policy or regulatory failure can be identified, compensatory assistance may not always lead to an improvement in the allocation of society's resources (Freebairn 1983). Generally where economic efficiency is being impeded through government action, the direct removal of the impediment is the best approach (Industry Commission 1996).

Another justification sometimes put forward for government intervention is the absence of drought insurance. Although theoretically possible, drought insurance markets have not developed as there are limited possibilities to offset the drought risk in one area through insuring producers in another. In the absence of market provided insurance, producers make 'self-insurance' production and investment decisions which, despite being potentially more costly than theoretical market insurance premiums, remain a rational response by producers in the face of drought risks and can generate efficient outcomes. Given this, if support is provided in lieu of insurance, which transfers the downside risks of drought onto governments (such as subsidies or grants during drought), then producers are less likely to take these risks into account, thus resulting in less efficient production decisions.

In evaluating programs against the first NDP objective, programs can be analysed on the basis of whether or not they overcome impediments to primary producers adopting risk management strategies that subsequently improve their self-reliance during droughts. Such actions are usually undertaken prior to drought occurring. Farmers are generally unable to prepare for drought (or increased climate variability) when in the middle of it — at that point, drought is already impacting on funds, livestock, land condition, water resources, labour time and motivation (Victorian farmers, W. and S. Rogerson, sub. 53). It is notable that, of the current suite of major NDP programs, none directly target the issue of self-reliance. In light of this, it would be fortuitous if these programs led to greater preparedness or facilitated a recovery process that is consistent with the desired self-reliant long term position for the industry.

NDP objective two: maintaining and protecting the resource base

The programs and assistance provided under the NDP are overwhelmingly targeted at maintaining farming operations during drought, regardless of the severity of drought (ostensibly under the second objective).

In order to assess whether the drought support programs achieve this objective, however, it is necessary to consider what constitutes Australia's agricultural and environmental resource base. In this regard, the 1990 review of drought policy suggested that the NDP should: ensure adequate protection of national livestock resources; minimise livestock stress; and ensure adequate protection of land, water and vegetation resources, and of native plant and animal species (McInnes et al. 1990).

In terms of agricultural resources, it could be argued that government intervention is warranted in times of drought when industry wide resources are at risk — such as the national cattle herd. However, it is in the interests of viable farmers within an industry to protect core genetic stock and there is no apparent failure in markets (such as for stock or capital) that would necessitate government intervention.

For environmental resources, the NDP objective implies a presumption that actions of farmers may have unintended adverse outcomes. Droughts represent a time of environmental stress, and thus the natural resource base of a property can be particularly vulnerable and easily damaged. Examples of adverse production decisions include overstocking and a lack of management of environmental resources (McInnes et al. 1990). One way this could occur is if a drought that farmers think will be short, turns out to be prolonged and severe. Appropriate government interventions in response to environmental concerns would target these impacts.

In terms of animal welfare outcomes, some programs are targeted at farmers to provide their businesses with food and water in order to maintain stock health. But there is a possible conflict between maintaining and protecting agricultural and environmental resources. Policies that target the maintenance of herds, for example, may create adverse environmental outcomes such as increased soil erosion through farmers maintaining stock on land longer than the resource base can sustain. Given the potential for conflicting outcomes, such programs are not likely to be the most efficient overall response to animal welfare concerns.

While the initial intention of the second NDP objective was to target agricultural resources at the industry level (McInnes et al. 1990), Commonwealth and State Ministers have also indicated that 'during severe downturns, Governments will act to preserve the social and physical resource base of rural Australia…' (Agricultural

Council of Australia and New Zealand 1992). Accordingly, the household support and interest rate subsidy programs emphasise the maintenance of current farm families and businesses as part of the resource base. There are also arguments put forward that assistance to farming families and farm businesses are a means of maintaining resources within rural communities either directly (funding small businesses within towns) or indirectly (increasing the spending capacity of farmers in those communities). As concluded later, the Commission does not find this to be a convincing rationale for drought programs.

NDP objective three: early recovery consistent with long term sustainability

The third NDP objective, ensuring early recovery of the agricultural sector consistent with long term sustainable levels, suggests that policy should not create barriers to the recovery of agricultural and rural industries, nor maintain resources within agriculture that are otherwise unviable without government support. This can be interpreted as not creating (or removing) barriers to adjustment which would slow the recovery of agricultural and rural industries post-drought. Importantly, the recovery is not intended to be to pre-drought levels, but to a level which is sustainable in the longer term.

As stated in the 1990 review by the Drought Policy Review Task Force:

> Adjustment assistance differs from other forms of industry assistance as the onus for responding to changing market and climatic conditions always rests with the individual producer. Its purpose is to provide producers with the opportunity to respond to changing conditions, without detracting from the need for adjustments to be made. Those producers not capable of responding to longer-term market pressures or who have lost prospects in the industry should be encouraged to leave. (McInnes et al. 1990, vol. 2, p. 86)

To facilitate industry adjustment, governments have provided support to households and farm businesses — such as through training, counselling and exit packages. These programs aim to address information barriers to alternative uses of farm assets or potential alternative job opportunities, or various barriers to farmers leaving their industry or region. While there may be information and social impediments that justify some training or guidance to farmers, there is no indication that industry adjustments would not occur just as readily in the absence of large grants to farmers who are exiting their industry. Such payments distort markets and raise inequities with other groups in the community.

6.3 Issues across programs

In evaluating the NDP and other packages on offer to farmers, there are issues with delivery, implementation and outcomes that cut across the suite of programs and have implications for the effectiveness and efficiency with which these programs operate.

Program provision and delivery issues

The provision of government assistance to farmers and rural small businesses is split mainly between Centrelink and agricultural departments. Broadly, the household support programs and some 'preparedness' measures are delivered by Centrelink, according to guidelines and funding provided by the Commonwealth Department of Agriculture, Fisheries and Forestry (DAFF). These include EC Relief Payments, Small Business Income Support, Interim Income Support, Transitional Income Support, Farm Help, Murray-Darling Basin (MDB) Irrigation Management Grants and the Professional Advice and Planning Grant. Business support programs, such as EC interest rate subsidies and the EC exit package are delivered by state rural adjustment bodies with funding from the relevant state and Commonwealth governments.

There are some within the rural community who believe that the manner in which income support is delivered to farmers should somehow be different to that delivered to other families in financial hardship because of a perception that farmers are more independent and 'proud', and therefore less able to approach Centrelink offices. For example, the Rural Financial Counselling Service in Gippsland argued that:

> Farmers and those connected to rural Australia are understandably very proud people and are not at ease asking for help and some have a particular reluctance to seek assistance from Centrelink. (sub. 34, p. 6)

There is no evidence that, in general, the attitudes of farmers to receiving financial support are different to others in the community who are experiencing hardship and who need to apply for assistance. While farmers may have become accustomed to having their financial assistance provided through agricultural departments rather than recognised as welfare support, the way in which assistance is delivered has changed during the latest drought, with a substantial increase in the number of programs now administered through Centrelink.

The Commission has been presented with considerable evidence that agricultural departments and Centrelink have actively engaged with those rural areas experiencing drought. This has been undertaken through Centrelink's 'drought

buses', the creation of Rural Support Officers and greater funding, by states and the Commonwealth, for Rural Financial Counsellors and health workers (appendixes B and D). Inquiry participants generally indicated that governments have been largely successful with this form of assistance delivery. For example, Lexo Pty Ltd, a merino wool, meat and breeding enterprise, indicated that:

> Centrelink and the RAA [Rural Assistance Authority] have been very efficient and friendly when dealing with support issues … The rural councillors have been of immense help to those of us who find the task too onerous … We have found NRAC [National Rural Advisory Council] personnel to be very efficient and knowledgeable about conditions. (sub. 54, p. 4)

Anglicare similarly conveyed a positive response to government service delivery:

> Centrelink staff have been very responsive and supportive to the rural sector and have learned new methods of engaging with farmers and rural businesses as well as maximising partnerships with other funded and unfunded service providers … Rural Financial Counselling services have made significant inroads to building confidence with the rural sector and providing support services they are willing to accept. (sub. 57, pp. 1, 2)

Some important benefits of delivering rural assistance through Centrelink rather than via agricultural departments are the potential for greater consistency in program delivery and the scope to make transparent the programs provided to farmers, compared with those provided to other groups in the community. While some differences in the current programs are deliberately favourable to farmers, Centrelink advises that others are likely to be unintended and are simply a consequence of being instigated under legislation other than the Social Security Act 1991 (Centrelink, pers. comm. 2008).

The Commission considers that it would be appropriate for income support to rural families to be provided under the *Social Security Act 1991* via Centrelink, in a manner that is transparent and, as far as practicable, consistent and equitable with that provided to other groups in the community. To the extent that delivery of the government's 'preparedness' programs, such as training and advice grants, is more efficiently achieved by utilising Centrelink expertise and resources, it is appropriate for these programs to also be provided via this agency.

Timeliness

Once an area is declared to be in EC, the time involved in applying and being considered for EC assistance is similar to other forms of government support. For the programs that Centrelink administers, there is an objective of processing 80 per cent of claims within 42 days. In 2007-08, Centrelink processed 91 per cent of claims within this time frame (Centrelink, pers. comm. 2008). All up, this

potentially means that once an application for EC is submitted, assistance is available to farmers, at best within about 10 weeks, at worst, up to 26 weeks later (given an average of 9 to 19 weeks taken by the National Rural Advisory Council (NRAC) to consider applications for EC declaration — chapter 5).

The timeliness of household income support is less of an issue than business support because of the potential availability of support prior to an EC declaration. Interim income support provides short term financial support to eligible farmers and small businesses in selected areas for which a case for EC assistance has not yet been established. Interim income support therefore potentially enables the provision of government support in a timely manner, which could prevent financial problems from escalating.

Burden of application processes

Most government support to farmers requires recipients to provide detailed information on their financial status. This is to ensure that the eligibility criteria are met and are consistently applied. Farmers within areas applying for EC declaration often have to provide considerable climatic, production and financial information to support their application. The Australian Dairy Industry Council noted that:

> The tiered process of declaring EC regions and accessing EC assistance by individuals has often been difficult, resource-intensive and time-consuming, with different processes in each state, and the burden often falling on industry associations to provide members with support and guidance to complete the process. (sub. 58, p. 6)

Applicants for household income support need to demonstrate financial need for assistance. Similarly, for those business programs (such as EC interest rate subsidies) that are only made available to farmers who are viable in the long term, there is a requirement for applicants to provide information that demonstrates viability. Some inquiry participants recognised the appropriateness of, and necessity for, providing such evidence, but still saw the process as unnecessarily resource intensive. For example, the Tasmanian Farmers and Graziers Association noted an additional burden from potentially having different processes and organisations for each assistance program:

> Each of these support payments involves different application processes, different eligibility criteria, and different funding and administrative bodies. This is a very arduous process for many farmers and their families … (sub. 69, p. 5)

In its review of regulatory burdens in the primary sector, the Productivity Commission (2007a) endorsed the need to avoid duplication and reduce unnecessary burdens in the application process for assistance. Specifically, it was advised that Centrelink and state and territory government rural adjustment bodies

should be able to provide applications for both EC relief payments and EC interest rates subsidies; applicant information should be able to be used across different Centrelink administered programs; and a single application form for EC interest rates subsidies should be adopted by state and territory governments.

To assist with some reporting requirements, governments have provided grants to the Rural Financial Counselling Service and run extensive advertising campaigns to encourage farmers to not self assess but instead seek professional advice. This means that, to some extent, one government drought program (financial counsellors) is, in part, targeted at helping farmers to access another program (interest rate subsidies) and necessitates skilled professional advice that may not be readily available in all parts of Australia. It can also mean that assistance is not necessarily being directed to its best end use — which would be to assist farmers to understand their financial situation and improve their viability or plan for exit.

Long term use of assistance and dependence on support

It could be expected that the longer a farmer is receiving government assistance, the less capacity and/or motivation there might be to take action which would lead the farm or household to become self-reliant. In addition, there is a risk of some farmers restructuring their business decisions at the margin to improve their eligibility for drought support.

For most government assistance programs, payments are either one-off — such as exit grants, training and advice grants and the MDB Irrigation Management Grant — or there are time limits (such as the duration of an EC declaration) for the receipt of assistance. Nevertheless, there is evidence that some farmers have become dependent on government support, particularly in (but not limited to) times of drought (see appendix B discussion on long term recipients of EC relief payments).

The Queensland Government reported that:

> Surveys relating to government support during drought have indicated that there is an expectation among primary producers and the community that some form of government intervention will automatically occur in a drought. (sub. 77, p. 3)

G. Schmidt, a farmer in Queensland, similarly claimed that:

> The same producers are queuing every time assistance is offered which proves there is no adapting to seasonal variability. (sub. 4, p. 1)

The Rural Financial Counselling Service in Gippsland reported that:

> … in some instances they [EC programs] are a disincentive to self reliance as some recipients become reliant on the payments and don't make the necessary changes. (sub. 34, p. 4)

The outcome of farmers becoming dependent on government support in the long term is not only that the agricultural sector is less productive overall, but also that there is concern within communities at the apparent inequities within their industry. K. Calder, a grazier, indicated that:

> Unfair distribution of assistance is highly stressful for those farmers who are excluded while neighbours who, by managing their affairs to fit drought criteria, can receive help from all programmes. (sub. 29, p. 3)

Overall, there is some evidence of dependence on government support, which can make it more difficult to achieve self-reliance across the farming sector.

Perverse incentives and consequences

Some government programs for drought assistance have had consequences that are perverse to the objectives of the NDP and inconsistent with the outcomes of other programs. This can limit the effectiveness of NDP and broader agricultural policies.

Business assistance programs, including EC interest rate subsidies and subsidies for other business inputs such as transport, water or irrigation infrastructure, can support some farmers and small businesses who may not have made wise management decisions and are consequently not self-reliant during droughts. Such programs provide an incentive for some farms to structure their expenditure and debt to maximise their receipt of government subsidies for business costs. Kenny et al. (2008) reported that there is considerable angst within some communities at the provision of assistance to farms which have undertaken 'creative accounting' in order to meet the eligibility criteria for support. Furthermore, these programs can discourage drought preparedness actions such as early destocking or diversification of income sources and distort production decisions by leading farms to use the subsidised input in excess of what would otherwise be the case.

The way in which eligibility for EC interest rate subsidies is determined can also mean that despite program requirements, not all recipients may be viable in the absence of the subsidy. The requirement for recipients of the interest subsidies to demonstrate viability through an independent assessment is typically not exercised until $300 000 has been paid in support. This means it is possible for unviable farms to receive support, unchecked, for several years.

In the longer term, these business assistance programs are an impediment to (and increase the costs of) farm adjustments that need to occur through exits and amalgamations, and potentially increase the costs for viable farms that want to expand.

In contrast to these policies, exit grants and the (Murray Darling Basin) water buy-back scheme are aimed at adjustment in agriculture through facilitating departure from farming — although in some areas these two programs can be partially in conflict with each other as farms that are in irrigation areas, but no longer have a water entitlement, become difficult to sell. As Horticulture Australia Council noted:

> … there is a lack of synergy in implementation of the Government's water buy-back program and it's interaction with the Exceptional Circumstances criteria – specifically, the Exit package. (sub. 66, p. 2)

Some states also provide other types of business support that are additional to Commonwealth programs and inconsistent with broader policy objectives (appendix E). For example, the Queensland Government offers a drought loan scheme to farmers. However, the scheme has not been widely taken up and one reason for this may be the more attractive provision of non-repayable funds by the Commonwealth under the EC interest rate subsidy program.

The fungibility of assistance money and a lack of distinction between farm and family expenses can also create perverse program outcomes. Assistance provided under one program may be used by the recipient for a quite different purpose to the intention of the program. The Queensland Government indicated that:

> The distinction between farm and family expenses is very blurred in a family farm. For example, with the money a farm saves on interest rates when accessing interest subsidies they may spend that money on family related expenses. Conversely, it is not unusual for producers to indicate that ECRP has been used to feed livestock. (sub. 77, p.19)

To the extent that household income support is being used to subsidise farm businesses, the risk management message of the NDP may be undermined.

Implications for the environment

A lack of measures within the current suite of drought support initiatives that explicitly address the NDP's stated objective 'to maintain and protect Australia's environmental resource base during periods of extreme climatic stress' may increase the scope for adverse outcomes for the environment. The Commonwealth Government Department of Environment, Water, Heritage and the Arts (DEWHA) noted that:

> The current initiatives may in fact be exacerbating environmental degradation as a result of farm businesses delaying necessary structural adjustment. (sub. 107, p. 9)

During periods of drought, land use and human pressures on natural resources may impose significant damage on farm biodiversity and increase the likelihood and severity of impacts downstream and in surrounding areas. The immediacy of focusing on drought impacts may also prevent adequate planning and adaptation for the long term impacts of climate variability. The Queensland Murray Darling Committee noted for example, that:

> Subsidies for movement of livestock for agistment purposes does not require the assessment of the property they are being moved to or moved from at any point in the transaction. Processes to safeguard agistment to or from drought affected areas or where the land has not adequately recovered from drought conditions appears to be not well facilitated in current policy. (sub. 41, p. 5)

Some drought assistance programs — particularly transport subsidies — have been shown in the past to provide incentives to keep stock on the land longer, through, for example, supplementary feeding. As discussed earlier, transport subsidies are still offered in New South Wales, Queensland and the Northern Territory, despite previous agreement to cease such subsidies (for example, Agricultural Council of Australia and New Zealand 1992), and conflict with the NDP objective for environmental management during drought. The Australian Landcare Management Group argued that:

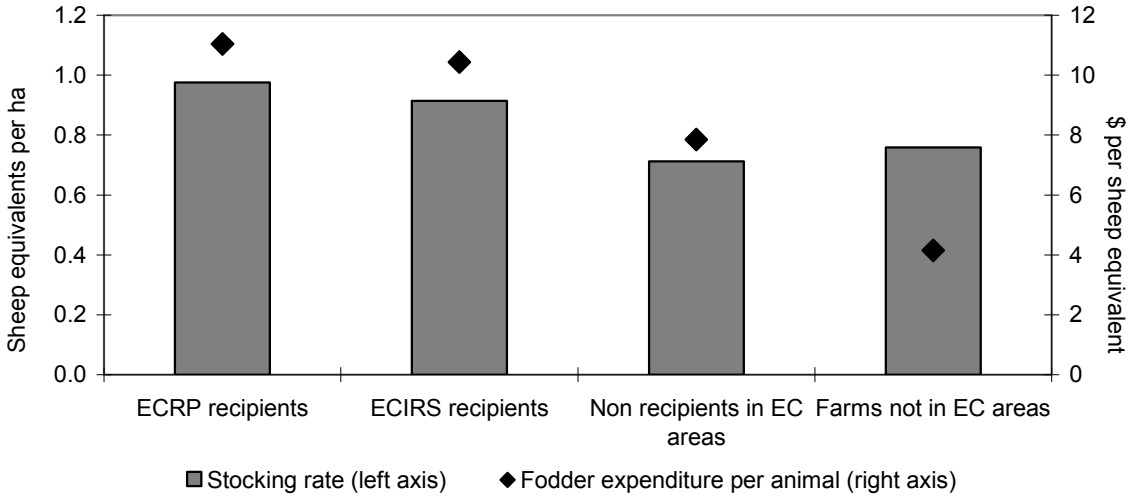
> … the impact of drought on land condition can be prolonged or increased through assistance that allows for extended grazing impact or re-stocking before recovery. (sub. 24, p. 7)

The impact of drought on the environment is expected to vary with the type of farming activities undertaken (crops or livestock for example) and in different regions (chapter 3). It would be expected that livestock numbers for farms in EC would be lower than for farms not in EC. During the latest drought, sheep and beef cattle numbers were, in general, slightly lower or not significantly higher on farms of EC recipients than non recipients, but dairy cattle numbers were considerably higher (appendixes B and C).

Evidence from farm surveys by the Australian Bureau of Agricultural and Resource Economics (ABARE) is that overall, the number of animals per hectare and fodder expenditure per animal were higher, on average, on farms of EC relief payment (ECRP) and EC interest rate subsidy (ECIRS) recipients than non recipients (figure 6.1). While there may be economies of scale reasons for this in dairy operations and a greater proportion of dairy specialists amongst ECRP recipients, higher fodder expenditure per animal may nevertheless be indicative of lower yielding pastures on farms of recipients and higher stocking rates may have implications for the ongoing condition of land and water resources in dairy regions.

Figure 6.1 **Stocking rates and fodder expenditure by EC recipients and non recipients**

Average annual data for 2002-03 to 2007-08



Data source: ABARE (2008 unpublished).

There is evidence from inquiry participants that some pastoralists may have selected stock management approaches for environmental reasons during this drought. One grazier, K. Calder, noted that stock containment areas have been a particularly beneficial tool during droughts — if used early enough, they can prevent loss of topsoil to wind erosion (sub. 29, p. 2). Another New South Wales farmer, P. Morris, described the link between pasture condition and use of government support:

> A degraded pasture may be unable to absorb a tiny fall, but a dynamic pasture may absorb a lot of rain very fast. As a rule of thumb the owner of the property which cannot effectively utilise rain is more likely to be seeking government assistance … During any drought, one can see adjacent properties that have been subjected to very different land management regimes, one with many starving cattle picking at round bales brought in by subsidised freight, next door to a few fat unsubsidised cattle. (sub. 23, pp. 1 and 9)

However, Crocker Farming Co. in Queensland pointed out that even when it destocks to protect the land, this is no guarantee that pastures will have an opportunity to recover:

> Spelling paddocks is good management and is common practice but the kangaroos come in and destroy paddocks of good feed if the surrounding area is getting eaten out. (sub. 45, p. 1)

There are likely to be substantial differences in the natural capital bases of farms even before drought, with respect to factors such as biodiversity, soil fertility, and capacity of soil to absorb moisture. All other factors being equal, it could be expected that these differences would become more pronounced during drought.

The Commission considers that there is no strong program setting to support the NDP objective to 'maintain or protect' the environmental resource base.

Long-term dependence on government assistance, inconsistency in key messages between programs and the creation of perverse incentives have reduced program effectiveness and been an impediment to the development of self-reliant management approaches.

Costs of assistance and program provision

Costs to government of program provision

Government expenditure on drought has increased dramatically in recent years with drought conditions having persisted in many regions and with existing EC assistance measures extended (in 2006) to all forms of agriculture in regions and to farm dependent small businesses (chapter 4). In addition, further assistance programs have been added. The Queensland Farmers Federation noted that:

> … governments tend to 'add programs' as droughts worsen. This may be a practical political reality but it has a significant downside for farmers … there is potential burden of 'program overload' from a primary producer's point of view … (sub. 82, p. 6)

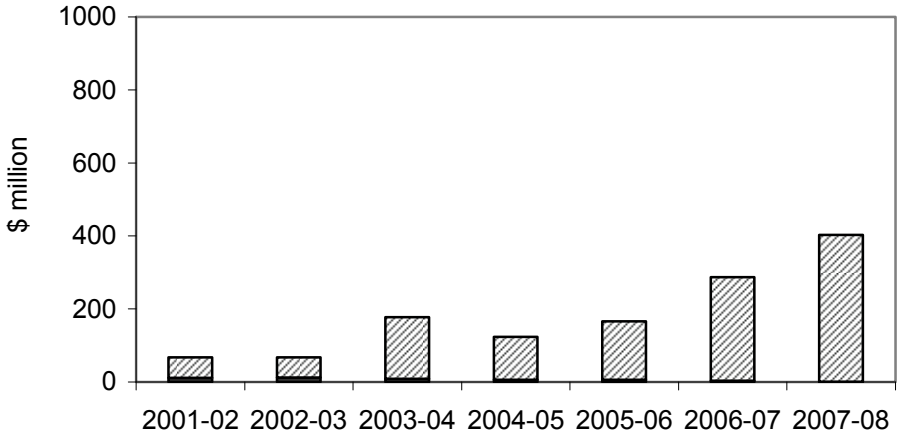
From July 2001 to June 2008, the Commonwealth Government provided around $1.2 billion in drought related household support, predominantly through EC Relief Payments to farm families, but also through programs such as Small Business Income Support and the Country Women's Association (CWA) emergency relief fund (figure 6.2a). A further $140 million was provided to rural households in the first half of 2008-09.

Also over the period from July 2001 to June 2008, $1.8 billion in drought assistance was provided by the Commonwealth Government to farm businesses and rural small businesses. Most of this support was via EC interest rate subsidies (figure 6.2b). An additional $230 million was provided to farm businesses and rural small businesses in the first half of 2008-09. The sharp growth in EC expenditure in recent years corresponds with the introduction of more generous eligibility criteria for EC interest rate subsidies in 2006 and 2007, and is reflected by an increase in both the number of recipients and also the amount received by each, on average (appendix C).

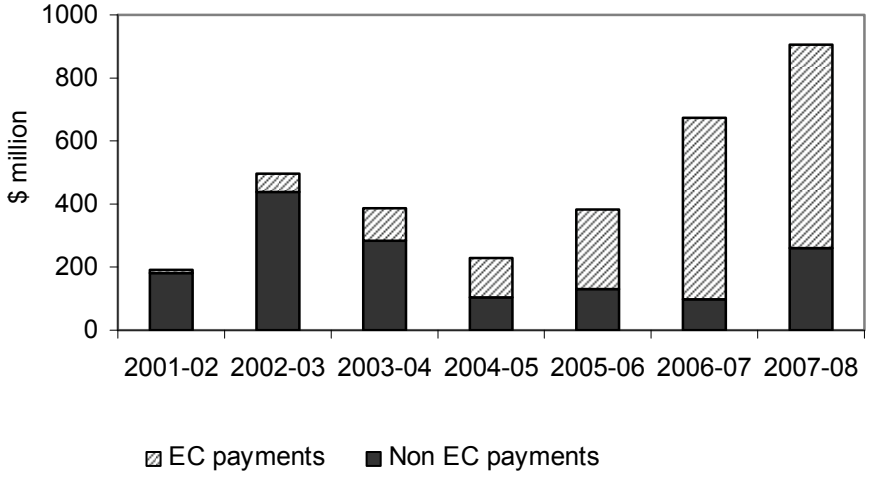
With the large increase in EC interest rate subsidy expenditure, the focus of government EC assistance has shifted markedly from household programs to business programs. Over the period since 2001-02, the share of EC expenditure that is directed to farm households has dropped from around 80 per cent of all EC expenditure to less than 40 per cent.

Figure 6.2 **Program payments to farmers and small businesses, 2001-02 to 2007-08[a]**

(a) Household income support[b]



(b) Farm business support[c]



a Program payments to farmers differ marginally from total funds for a program because of timing differences in funds paid to agencies administering the relevant program compared with funds received by farmers. **b** EC related household income support includes EC Relief Payments, Small Business Income Support and Interim Income Support and Commonwealth Government contributions to the CWA emergency drought relief fund. Non EC household income support is provided through the Farm Help Income Support program. Estimates exclude payments to households funded through from other Commonwealth Government departments, New South Wales Government Drought Household Payments and state government contributions to other programs. **c** EC related business support includes the Commonwealth contribution to EC interest rate subsidies to farmers and rural small businesses, Professional Advice and Planning Grants, and EC exit grants. Non EC business support includes the forgone tax cost of FMD deposits, FarmBis, Farm Help redevelopment grant, Farm Help training grant, Murray Darling Basin Irrigation Management Grant, Irrigated Agriculture Workshops, and Rural Financial Counselling Service. Excludes industry specific payments (such as sugar and dairy industry restructuring programs) to farmers and payments made under state assistance measures.

Data source: DAFF (2008 unpublished).

Supplementing these drought related measures, a further $1.5 billion was provided, mostly in the form of business assistance, to farmers who were not necessarily in EC areas. The share of non drought measures in total Commonwealth Government assistance to farms has, in aggregate, declined in recent years. In earlier years, non drought expenditure was dominated by FarmBis and the forgone tax cost to the community associated with the Farm Management Deposits (FMD) scheme. In 2007-08, the largest non drought expenditure programs were the MDB Irrigation Management Grants, the Rural Financial Counselling Service (RFCS) and (the forgone tax cost of) FMDs. The general upward trend in FMDs, both in terms of the number of holders and the value of holdings, suggests that the scheme is yet to reach maturity (appendix D). While the cost of the scheme is likely to vary with marginal tax rates, if the scheme were to be maintained in its present form, it is likely that it will continue to form a significant part of government assistance to farmers in the future.

In addition to the Commonwealth programs, there are state level programs aimed at assisting farmers in EC and other drought affected areas (appendix E). For New South Wales, Queensland and Northern Territory, transport subsidies were one of the most significant forms of state program expenditure to assist farmers. Over the period from 2002-03 to 2007-08, almost $190 million was provided by states to farmers (mostly New South Wales) in the form of transport subsidies. While this is much less than the main EC programs provided by the Commonwealth, it is nevertheless significant compared with other non EC programs for farmers.

There has also been significant expenditure on farmers and regional communities in some other states. For example, the Victorian Government announced a $115 million drought relief package in October 2008, bringing to their drought support for farmers and rural communities to over $500 million since 2002-03 (sub. 110). In Western Australia, $4.3 million was approved in 2007-08 to support farmers and regional communities under the 2007 Dry Season Assistance Scheme. In 2007-08, the states supplemented Commonwealth expenditure on the Rural Financial Counselling Service by approximately $2.8 million (appendix E).

The extent to which program funds are available as payments to program participants varies with the nature of assistance provided (table 6.1). It would be expected that those programs which provide one-on-one support to participants or which require extensive assessment of eligibility, would have higher administration costs. In recent years, Farm Help programs and the EC exit package have had the highest relative administration costs (50 per cent and 44 per cent of total program expenditure, respectively). In contrast, the administration costs of programs such as

the MDB irrigation management grant are very low as there is very little assessment required to determine either eligibility or use of funds. On average across all programs considered, around 4 per cent of total expenditure is attributable to administration costs.

Table 6.1 **Cost of providing key Commonwealth Government programs, 2001-02 to 2007-08[a]**

	Payments to program recipients		*Administration costs as % total program funds*
	2001-02 to 2007-08	*2007-08*	*2007-08*
	$ million	$ million	%
Business programs			
EC interest rate subsidies: farmers	1 703	604	3
EC interest rate subsidies: small business	53	30	4
Professional advice & planning grant	7	7	6
EC exits package	4	4	44
Total EC business	*1 768*	*645*	*3*
MDB irrigation management grant	142	142	1
MDB irrigated agriculture workshops	7	7	na
Farm Help training & redevelopment grants [b]	33	2	50
FarmBis	87	11	12
Farm management deposits [c]	1 175	85	na
Rural financial counselling [d]	52	14	14
Total other business	*1 497*	*260*	*3*
Total business	*3 265*	*906*	*3*
Household programs			
EC relief payments	1 163	379	6
Interim income support	45	8	6
Small business income support	20	16	6
CWA emergency drought aid	16	0	na
Total EC household	*1 244*	*402*	*6*
Farm Help Income Support [b]	50	1	50
Total household	*1 294*	*403*	*6*
Total business and household	*4 559*	*1 309*	*4*

na Not available. [a] Program payments differ marginally from total funds for a program because of timing differences in payments to agencies administering the relevant program and payments to support recipients. Administration costs represent only costs reimbursed by DAFF but exclude DAFF staff costs. For some programs, there are additional costs incurred by state governments and other Commonwealth Government departments. [b] For Farm Help, ECRP, PAPG, Interim Income support and Small Business Income Support, administration costs are not available for separate programs in any year. The administration costs for the group of programs have been assigned in equal proportion to each component program. [c] 'Payments to program recipients' under the Farm Management Deposits scheme refers to the reduction in tax paid by holders of deposits, less the additional tax paid by those withdrawing deposits in the period. [d] Rural financial counselling service administration costs are unavailable prior to 2004-05 so the administration cost percentage is calculated for expenditure over the period 2004-05 to 2007-08.

Source: DAFF (2008 unpublished).

In commenting on the large array of programs provided to farmers, the Queensland Farmers Federation argue that there are also likely to be administration costs arising from the need to manage so many separate programs with different criteria and application processes:

> … it is also questionable whether the benefits in the community match the administrative costs of managing many of those 93 programs identified in the [this inquiry's] Issues Paper. (sub. 82, p. 6)

The Commission's experience in this inquiry bears testament to this. It was inordinately difficult to obtain consistent information over recent years on the features of each of the Commonwealth Government programs, the number of farmers who benefited from the programs, the amount that they received and the cost to the Australian community of providing these programs.

State government departments also incur costs associated with provision of many of the Commonwealth and state programs, but for the most part, this information is not reported separately by program (appendix E).

Costs to the broader community/economy

Although assistance generally benefits the firms or industries that receive it (subject to the distortions that it may create), it typically comes at a cost to other sectors of the economy. For example, direct business subsidies increase returns to recipient farms and industries, but to fund subsidies governments must increase taxes and charges, cut back on spending for other programs in communities, or borrow additional funds. This can result in higher input costs for other businesses and/or lower disposable income for consumers to spend on goods and services.

In some cases, particular types of industry assistance — most notably research, development and extension funding — can deliver net community benefits. As noted by the Western Australia Department of Agriculture and Food:

> Collectively, the money spent over the past decade on Exceptional Circumstances (EC) and other dry season initiatives could have, arguably, been better spent on bolstering public sector research and development, and building farm business and financial management capacity to lift agriculture's declining productivity rate and to assist farmers to better manage risk. (sub. DR 186, p. 1)

Similarly, some policies that have industry assistance effects may be justified on other grounds, such as the achievement of social or environmental objectives.

To the extent that funds are directed to programs that have been assessed as providing benefits to the community, those benefits may be reduced if program funds are not used to meet program objectives. Funds provided under the main drought programs are highly fungible with few, if any, requirements that they be spent on measures that will enhance self-reliance and preparedness. There is little accountability in use of funds by service providers or recipients.

The cost of government assistance to farmers has escalated over recent years. With increases in expenditure on EC interest rate subsidies, the focus of support has markedly shifted away from farm households and towards businesses. Some programs have high administration costs relative to funds distributed. There has been very little accountability in the use of funds or the evaluation of program outcomes.

6.4 Evaluation of programs that support rural families

Australia's social security system is designed to provide a basic welfare safety net for all Australians through the provision of income support to those experiencing genuine financial difficulty. It is therefore appropriate that rural households in financial hardship similarly have access to basic income support.

This requirement is recognised by inquiry participants. For example, the Australian Dairy Industry Council stated that:

> The government has a role to provide access for farmers and rural businesses to the basic social safety net available to all other Australians. (sub. 58, p. 4)

Similarly, the South Australian Country Women's Association contended that:

> Government must ensure a minimum level of individual wellbeing for farm families at all times, not only in times of severe drought. (sub. 72, p. 2)

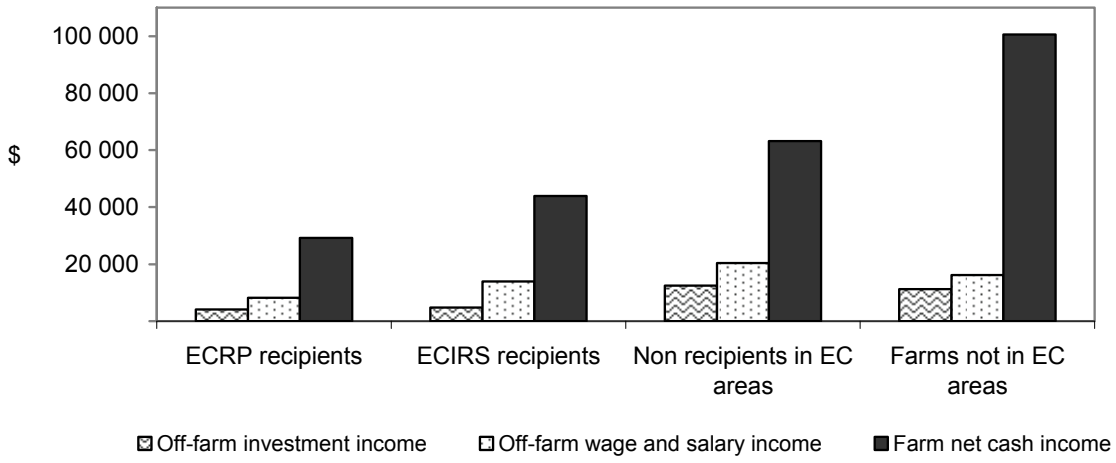
However, extensive farm assets and ongoing farm management obligations can mean that, even when in financial difficulty, farm families do not meet the income, asset and job search criteria necessary to access the community wide Newstart support or pension programs. The Commonwealth Government response to this has been to develop specific programs targeted at groups of farmers – such as those in EC areas. There are concerns as to whether this is the most effective and efficient way to support the rural community. Details on the programs for household income support are provided in appendix B.

EC Relief Payments

Accessibility of support

The EC Relief Payment (ECRP) program appears to be reaching those farms that it is targeting — farm families in EC areas that are experiencing financial hardship. ECRP recipients, on average, earned lower farm net cash income and had lower levels of off-farm income from employment or investments, than either non recipients within EC areas or those not in EC areas (figure 6.3). As the off-farm income position of farm families who are similarly experiencing EC but not receiving EC support is more akin to the position of farms not in EC areas, it seems that off-farm income is an important factor in improving the self-reliance of farm families during drought.

Figure 6.3 **Income levels of EC recipients and non recipients[a]**
Average annual data for 2002-03 to 2007-08



a Excludes government payments to farm businesses or households.

Data source: ABARE (2008 unpublished).

Despite reaching those that it is targeting, the accessibility of the ECRP program was criticised by inquiry participants. These criticisms tend to focus on the income threshold levels in the eligibility tests. In particular, the farm income and off-farm income threshold levels are considered by some farming groups to be too low and result in some drought affected farmers not receiving income support. For example, the Coonamble Shire Council suggested that:

> The level of combined farm and off-farm income that is used by Centrelink to limit eligibility for relief payments is too low … Gross incomes only are used. (sub. 63, p. 10)

However, even after allowing for key farm assets to be exempt, the eligibility tests for ECRP are considerably more generous than Newstart and average household income levels of recipients are potentially much higher already than those of Newstart recipients (appendix B). Those farmers who are not eligible for assistance under the current ECRP criteria could reasonably be considered to have the resources to support themselves.

For instance, the $20 000 off-farm income threshold for farm household income support is up to 12 times that applicable in the eligibility tests for other income support such as Newstart or disability allowances (appendix B). While generous eligibility criteria may enable some farmers with off-farm income to access support, in the longer term such criteria may discourage some farmers from diversifying farm income or maintaining the off-farm assets or income sources necessary for the farm family to become financially self-reliant. As suggested by the South Australian Advisory Board of Agriculture:

> … it is possible that the criteria is too generous and so farmers may see EC as their drought proofing rather than actively adding it to their own risk management planning. (sub. 71, p. 4)

The absence of a regular reconciliation of income to determine ECRP eligibility and payments, places additional importance on the accuracy of applicants' initial income estimates.

While ECRP is not intended to be a broader income support program for other farmers in financial hardship, there are equity concerns with providing preferential access to income support for some groups of farmers and not others. The 'lines on map' issues (discussed in chapter 5) mean that there are likely to be some drought affected farmers who are in financial difficulty but are not eligible to apply for income support because they are not in an EC area. There are also families who are in temporary financial hardship for reasons other than drought but are outside of EC areas and not eligible for EC support (but may be eligible for other programs such as Transitional Income Support).

Another criticism of ECRP is that the application process is overly burdensome. The Rural Financial Counselling Service in Gippsland detailed that:

> The income support applications through Centrelink are in most cases relatively straightforward taking as little time as an hour. Nevertheless, for a farmer to complete an application and be confident that it is correct can be daunting. Assistance is often required from either an accountant or a Rural Financial Counsellor. For farmers that operate their business as a Trust or Company there are extra forms to complete further complicating the application. (sub. 34, p. 7)

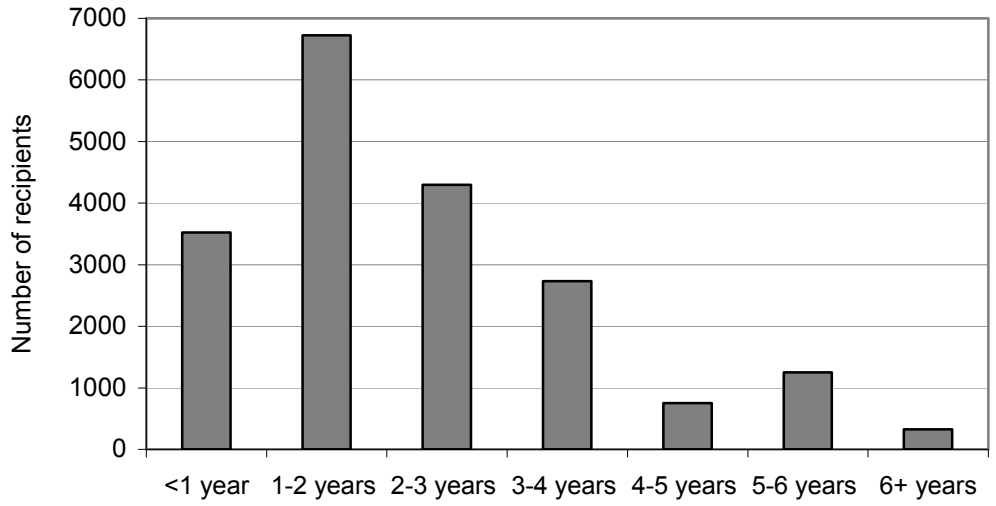
The Commission considers it appropriate that those who are applying for public funds for income support provide evidence to demonstrate their need of that support. That said, the application process should be as streamlined as possible, with minimal duplication in information provision and, for those with less complex business structures, generally not necessitate external professional assistance to complete the application forms.

In terms of timeliness, the delivery of ECRP to farmers appears to be reasonably prompt once an area is declared to be in EC (appendix B), and as an alternative, eligible farmers in EC areas also have immediate access to income support under Newstart hardship provisions.

Dependence on support

While almost half of the current recipients of ECRP have received assistance continuously for 1 to 2 years, around half have been supported for longer, with almost 10 per cent of current recipients having received ECRP assistance continuously since 2003 (figure 6.4).

Figure 6.4 **Length of time in continuous receipt of ECRP**[a]
Recipients current at 9 January 2009



a The number of families receiving ECRP for 1-2 years may include some who ceased to receive assistance for a short period and then recommenced receipt.

Data source: Centrelink (2009 unpublished).

From a survey of the 100 longest term recipients of ECRP, Centrelink reported that while nearly all intended to continue farming, only 60 per cent considered that they will be 'self sufficient' post EC and the remainder considered that they will require further support (Centrelink 2008c). Some current measures available that could further enhance self sufficiency are not widely adopted by long term ECRP recipients — only 4 per cent have FMDs and just over half have a business plan.

Farmers who received ECRP were also more likely to also have received assistance under other government support programs including ECIRS, FarmBis and the Rural Financial Counselling Service (SACES 2008a). Centrelink (2008c) reported that over half of the longest term ECRP recipients are currently accessing assistance in addition to ECRP. This may indicate a continued reliance on government assistance over a number of years, rather than temporary use of assistance to improve preparedness for long term self-reliance. For example, Macquarie River Food and Fibre indicated that:

> There is a concern that those farming families not prepared to earn income off farm and maintain a low income, may be developing a security net of dependency, rather than this being a safety net for those families, working hard to develop long term self-reliant strategies. (sub. 36, p. 11)

The Department of Transport and Regional Services (DoTRS) noted that the perception that recipients have only qualified for government support because they have made no attempt to become self-reliant has caused considerable tension within communities:

> The income test for ECRP has caused divisions in communities as farmers who 'do the right thing', diversifying the business base of their farms and households, are ineligible, and resent seeing neighbours who have 'done nothing' sit back and access government assistance. This has been described as an incentive to not diversify, which if true would exacerbate drought impacts in communities. (DoTRS 2005)

One way that other social support programs, such as Newstart, attempt to limit long term dependence is through a set of mutual requirements that accompanies receipt of assistance. There is no such requirement with ECRP receipt and the responsibilities that come with other farm household support measures (such as the need to develop plans with a financial counsellor) could not be considered a deterrent to long term use of assistance. That said, any design of conditions needs to recognise that even in drought, farmers need to manage their land and stock and attempt to maintain the underlying viability of their farms, even if alternative employment is nearby.

A lack of mutual responsibilities for ECRP receipt and evidence of some long term dependence on government support suggests that the program is distorting incentives for some families, may be delaying necessary farm adjustments in some areas and is unlikely to be efficient, in a whole of economy sense, in the long term.

The effectiveness of the ECRP program is limited by: its dependence on claimants being within an EC declaration area; the lack of mutual responsibilities on receipt of support; and the absence of a regular reconciliation with income earned. The farm specific assets and income criteria are very generous relative to Newstart criteria.

RECOMMENDATION 6.1

Exceptional Circumstances relief payments should be replaced, subject to transition arrangements.

Interim Income Support

Interim Income Support (IIS) aims to provide short term financial support to farmers and small businesses that are in regions not yet EC declared, but are experiencing financial difficulties as a result of drought. As such, IIS enables income support to be provided to farmers and rural small businesses in a timely manner, which could minimise the cost to recipients of 'red tape' associated with delays in the EC declaration process, ensure early access to other training and community support programs and prevent family financial problems from escalating.

However, the provision of IIS could reinforce an impression that recipients are 'entitled' to support or create the expectation within the recipient communities that EC status will ultimately be confirmed. Such a view could be further supported by the continued availability of IIS for 6 months, even if the region is rejected for EC status. IIS increases the scope for lobbying for income support in particular regions as assistance can be provided without due consideration of eligibility through the EC process. IIS also comes with a significant efficiency cost to Centrelink (Centerlink sub. 104).

Farm Help and Transitional Income Support

There are two key income support programs for farmers that are not triggered by drought — Farm Help Income Support (FHIS) under the AAA policy framework and Transitional Income Support (TIS) under the follow-on policy framework, AFF. These programs aim to provide short term income support and adjustment assistance to farmers in financial difficulty for reasons not necessarily related to drought. That is, they target the most vulnerable farm families that are in financial difficulty, regardless of the cause.

Given the characteristics of its recipients, the Farm Help Income Support program is effective at getting income assistance to the most vulnerable farm households

(appendix B). SACES (2007) report that Farm Help recipients increased their off-farm income after participation in the program. A particular concern to this inquiry though, is that the program specifically targets those who are unable to borrow against their assets from commercial lenders. This could mean that the government is supporting the owners of farms which are commercially unviable in the long term, thereby making farm and industry adjustments more costly to achieve. This factor, in combination with the accessibility of rural finance to viable farms in times of drought, even with recent adjustments to risk premiums (Australian Banker's Association sub. 76), suggests that Farm Help Income Support is not likely to be an efficient use of government funds in rural communities.

Transitional Income Support is similarly aimed at families on marginal farms in financial hardship, particularly those coming out of EC. While the objectives of the program are linked to management of climate change effects, provision of short term financial support to the owners of Australia's most marginal farms is not necessarily an appropriate means to achieve such a long term objective. As for Farm Help Income Support, TIS does not ensure that recipients operate farms which are commercially viable. However, and in contrast to Farm Help, the financial assessment in TIS does at least attempt to limit income support to those farm households which have insufficient liquid resources to support themselves or meet their immediate expenses. As for other income support programs for farmers, the absence of a regular reconciliation of income to determine eligibility and payments, places additional importance on the accuracy of applicant's initial income estimates.

There has been widespread criticism of the limited accessibility of TIS (appendix B). Of most focus is the $1.5 million threshold level for total farm business (and non-farm) net assets. While Paton (2008) speculated that 'as few as 1000 farmers will qualify for the new payments because the value of their land and farm assets is too high', ABARE data (2009 unpublished) indicates that there were around 10 000 broadacre and dairy farms and a further 2300 vegetable and sugar farms across Australia that had less than $1.5 million in farm net assets and less than $20 000 in liquid assets in 2007-08 (and this does not include farms in other agricultural industries). Further, the program has a higher asset threshold than Newstart, recognising farming circumstances.

Income support to farmers under Farm Help and TIS is due to end on 30 June 2009.

There is widespread acceptance of the need for income support for farm families that are experiencing financial hardship, while not facilitating long term dependence. However, provision of income support based on particular events, such as drought, is inequitable and ignores difficulties that farm families not in EC declared areas have in accessing broader social security programs. Income support for those in hardship should not be tied to broader policies such as climate change.

Small Business Income Support

Small Business Income Support (SBIS) was introduced by the Commonwealth Government, with little consultation or justification, in November 2006. The program is due to end on 30 June 2009 but may continue to be available beyond that date for current recipients in areas that remain EC declared (Primary Industries Ministerial Forum 2008b). In general, SBIS appears to be meeting its objectives of supporting the families of those small business operations that are most dependent on farm expenditure, such as contractors and suppliers (appendix B). In this sense, SBIS is operating effectively, but whether it is an appropriate program is questionable.

Families of small business operators typically do not face the same constraints that farmers do in accessing the broader income support measures available to the rest of the community. That is, they generally do not have such lumpy non divisible assets as do farmers (although there are exceptions to this — for example, Mengels Heli Services, sub. 3), do not face the same difficulties in diversifying income sources, and are usually located in towns and so would be more able to meet program obligations, such as those that are required of Newstart recipients.

There are also equity issues within and between communities in providing differential access arrangements for income support between different businesses. There are many factors other than drought which have significant negative impacts on the family income levels of small businesses operators. However, it is not government policy to provide special support for the myriad of small businesses that risk their capital and, in some cases, fail.

It is difficult to justify, on equity grounds, the preferential access to income support for some small businesses' families over all others who similarly take risks in setting up a business.

RECOMMENDATION 6.2

Exceptional Circumstances small business income support should be terminated, subject to transition arrangements.

6.5 Evaluation of drought triggered business programs

The primary form of drought triggered business support is interest rate subsidies. These are aimed at supporting farm and rural dependent small businesses which are viable in the long term but are currently experiencing financial difficulty due to an EC event (DAFF 2008d). The Commonwealth Government provides exit packages

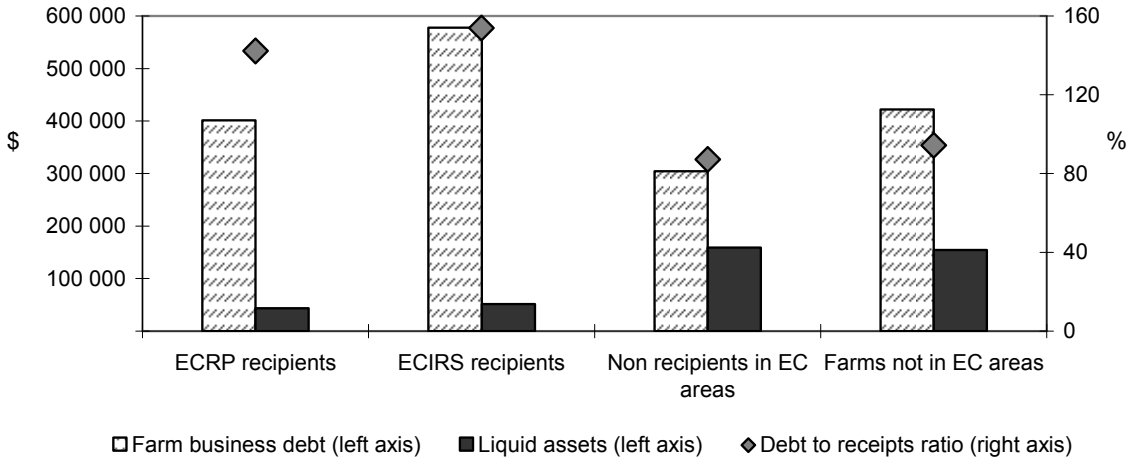
for those farms which are not viable in the long term, and several state governments offer business assistance in the form of transport subsidies. The effectiveness and efficiency of these programs is evaluated in the context of the NDP objectives. Further details on the programs for drought-triggered related business support are provided in appendixes C and E.

EC interest rate subsidies

Accessibility and appropriateness of support

The EC interest rate subsidy (ECIRS) program appears to be reaching those farms in EC areas that are most likely to have difficulty in meeting interest repayments on debt. ECIRS recipients not only have lower liquidity levels than non recipients, but have also incurred higher debt levels such that the interest payments absorb what little cash they do earn (figure 6.5). For those receiving EC assistance, the ratio of farm debt to farm receipts (which does not include government payments) is around 146 per cent on average, compared with around 90 per cent for non recipients. Further, ECIRS recipients may have less capacity to increase their farm receipts in the short term as they also have lower average crop productivity levels than non recipients (appendix C).

Figure 6.5 **Liquidity and debt of EC recipients and non recipients**
Average annual data for 2002-03 to 2007-08



Data source: ABARE (2008 unpublished).

However, as the liquidity and debt position of farms that are similarly experiencing EC but not receiving EC support is more akin to the position of farms not in EC areas, it seems likely that drought is only one of the factors contributing to the financial difficulties of ECIRS recipients.

The main criticisms from inquiry participants on the accessibility of ECIRS relate to the viability (or otherwise) of applicants. A number claimed that despite the eligibility criteria for ECIRS, many viable farms in EC areas in need of carry-on finance are unable to access business support under ECIRS, while some non-viable farms receive support (appendix C). Carrigan and Co. Pty. Ltd., a Narrabri accounting firm, noted that:

> While the program states that part of the eligibility criteria is that the farm must be viable in the long term, the reality is that a significant portion of the successful applicants are unviable and many viable farmers are having their applications rejected because they are 'not considered to be at financial risk' … among the reasons why unviable farmers are being granted subsidies is the reviewer's reluctance to 'make the call' that the applicant is unviable and hence being responsible for 'forcing' the applicant farmer to leave his/her farm. (sub. 32, p. 2)

This claim has some validity as an independent viability test is typically not required until the level of interest subsidy provided to a farm reaches $300 000. To the extent that non viable farms are receiving support, ECIRS is ineffectively provided and may be increasing the costs of industry adjustment in the longer term. However, ECIRS also potentially supports those who suffer from poor timing, such as a younger generation who have bought a property just prior to drought, or farmers who expanded their properties in the expectation of becoming more viable.

The asset thresholds used in ECIRS eligibility tests have also been criticised as insufficient, particularly for larger operations. However, there is no limit on the value of farm assets (including FMD balances and the family home) and the $750 000 threshold level for off-farm assets is about three times the residence asset threshold that is applicable to a Newstart couple.

Some inquiry participants noted differences between states in the way in which eligibility for ECIRS was assessed. In Victoria, for example, access to assistance was based on the financial need of the applicant and not only on having met the eligibility criteria. In contrast, it was indicated that in New South Wales, if a producer was eligible for the program, then the full payment amount could be accessed. While all states reject applications on the basis of 'not in need', there was evidence that rejections on this basis were disproportionately higher in Victoria (appendix C). Such differences in the interpretation of the ECIRS eligibility arrangements mean that the policy is not uniformly applied across the country.

These differences generate inequalities and lessen the scope for policy to meet its objectives.

There was also some commentary from inquiry participants on the resources required to apply for ECIRS. The Rural Financial Counselling Service in Gippsland detailed that:

> Interest Rate Subsidy applications generally take much longer [than ECRP] to complete; two hours at best plus time to collect information and Lender's Certificates – but may take 6 to 8 hours if complicated. Our RFCs report that if they are completed by an accountant the cost is generally $250 to $500, however we have knowledge of one instance of a fee in excess of $15,000. (sub. 34, p. 7)

It can be difficult for companies and trusts to meet the eligibility criteria for ECIRS as all directors' assets are summed for the asset test. Several farmers noted that access to ECIRS is difficult for farms which have set up their management structure as a corporation or family trust and that this is problematic and inconsistent with many succession plans:

> Farms that trade as Corporations or Family Trusts find it very difficult to separate assets between different generations. The younger generation is therefore ineligible for any form of support. (Highview, sub. 37, p. 2)
>
> Growers who have formed partnerships with neighbours or who have remained farming in a large business structure with family members, for the benefits of economies of scale, have been unable to access any form of financial assistance (L. Mann, sub. 42, p. 2)

However, the business structure under which farms operate is a management choice which should take into consideration the overall comparative advantages and disadvantages of operating as a sole trader, partnership, trust or company. While some management structures may afford greater access to government drought assistance, others may provide advantages more generally, such as through the tax system.

Unintended consequences of support

ECIRS creates a number of perverse incentives and unintended outcomes which are likely to reduce the effectiveness of the program. In particular:

- As the program provides the most assistance to those with the largest debt, there is an incentive for some to build debt and/or not reduce debt when faced with drought risk as governments have a history of stepping in and subsidising its cost (having financial reserves and a lower debt to equity ratio can be an important hedge against drought risks). Rural Directions claimed that:

  > [The EC declaration] can cause debt to be held in place for longer than normal to 'position' for potential assistance. (sub. 35, p. 3)

- Recipients may be less responsive to drought conditions as financial assistance increases the potential to spend money on additional variable inputs (such as fodder) to maintain production levels. The total cash costs of ECIRS recipients are greater than non-recipients, on average, during the latest drought, in particular for fodder costs (appendix C). This may have unintended consequences for the long term condition of natural resources. A group of farmers, the M. and D. Geldard and T. Reid, submitted that:

  > [ECIRS] promotes 'worst practice' farming ie. to overgraze and overspend in the good times, knowing the criteria for subsidy will be met in the drought. (sub. 46, p. 1)

- There may be a disincentive to diversify income sources off-farm. S. and A. Boardman, farmers in Northern New South Wales who did attempt to earn off-farm income, considered this a less profitable outcome than receiving government assistance:

  > If we had not carried out farm contracting during the 2007 year it is quite possible we would have received the maximum interest subsidy of $100,000. So therefore, other farmers who had a reduced workload due to the drought, made more money from receiving interest subsidy than we netted from farm contracting. How unfair is this? (sub. 43, p. 2)

- As with any subsidy on production, interest subsidies can become capitalised into asset values and thereby penalise non-assisted farmers and new farmers who wish to purchase capital inputs. For example, J. Cooper, a grazier, noted that:

  > The drought assistance being provided to unviable and 'poor' managers is helping to sustain land prices, and reducing the opportunity for more productive and viable farm businesses to expand. Without the interest subsidies more land would be on the market and the normal market driven by supply and demand would not be distorted. (sub. 10, pp. 1–2)

- Interest subsidies represent a windfall gain to farms receiving the subsidy and provide an unjustifiable competitive advantage to recipient farmers over non-recipient farmers (Milham and Davenport 1997).

Having farmers dependent on government support for their businesses not only has implications for the way in which they operate, but also results in a less productive agricultural sector in the longer term. The J. and P. Dampney, graziers in northern New South Wales, similarly argued that:

> … we felt very concerned that continually handing out interest subsidies was having a depreciating effect on the whole rural community eg., increasing the price of land values, farmers becoming reliant on the subsidy, farmers organising their finance so they remain eligible, so not being as productive as they could be. (sub. 16, p. 1)

Overall, the incentives inadvertently created by ECIRS may mean farm businesses adopt less self-reliant strategies prior to droughts in the belief that governments will

help to maintain the business during droughts. Ultimately, the appropriateness of ECIRS assistance rests on whether it is tied to a valid rationale for government intervention (section 6.1). However, the program does not meet any of the valid rationales for government intervention that underpin the NDP. The directing of ECIRS payments to those with liquidity problems during drought events would suggest there is some impediment to farmers accessing carry-on finance during these periods, which could be considered a basis for government intervention. However, recipients have high equity levels — an average equity ratio of over 80 per cent. Further, the Australian Banker's Association (sub. 76) indicate that viable businesses in the rural sector have been able to obtain credit in recent years, even with recent adjustments in risk premiums faced by farmers. Accordingly, the rationale for provision of this type of business support is not sound.

Interest rate subsidies are inappropriate, ineffective and inefficient. They focus support onto those farms and businesses in EC areas that, on average, have high levels of debt, low levels of liquid assets and low off-farm income.

RECOMMENDATION 6.3

Exceptional Circumstances interest rate subsidies should be terminated, subject to transition arrangements.

Exit packages

Exit packages are often supported as a tool to encourage unviable farmers to leave the industry and to enable expansion by other more efficient producers (chapter 5). They may include an asset-contingent exit grant and support to help the farmer with retraining or transitioning to other employment.

The EC exit package primarily targets smaller farmers with very low asset levels. Consequently, by the end of 2008 there had been a low uptake with only 98 farms (21 per cent of applicants) receiving assistance under the package.

Despite the availability of an exit package to farmers that goes well beyond any support provided to other small businesses who wish to cease trading, the EC exit package for farmers has been almost universally criticised by inquiry participants for its lack of generosity (appendix C). Horticulture Australia Council argues that:

> The Exit Grant package has been a fiasco from its inception. There are far too many hurdles and the 'rewards' for getting over them minimal. $150 000 would appear to be a pittance when it is expected that the recipient must relinquish their income, their ambition, their home and sometimes their life's work … The grant is taxable. Tenure is a problem. Even though the property owner may be severely affected by the exceptional circumstances, he/she must have owned the property for five years to be

> eligible. Those who have sought off-farm work to ride out the current crisis may be found ineligible because they are not contributing significantly to the enterprise. (sub. 66, p. 14)

Similarly, Murraylands Regional Development Board suggests that the program is largely inaccessible:

> That farmers need to be almost close to fore-closure before being considered is a perverse approach. (sub. 68, p. 4)

The South Australian Country Women's Association indicated that the number of farmers who wish to leave farming is considerable in some regions:

> A recent survey in the Riverland showed up to 60% wish to exit and see no future in irrigated horticulture. (sub. 72, p. 2)

As only 5 farms along the South Australian part of the Murray have received the exit grant (out of 33 applicants), this could support a view that the exit grant is not accessible to those who wish to leave farming and has done little to facilitate adjustment within the industry in times of drought.

To some extent, the effectiveness and uptake of the package may have been reduced by the provision of other forms of business assistance (such as ECIRS, MDB Irrigation Management Grants and Farm Help) which helps to maintain these farms both during drought and more generally. Of those who had received exit assistance by end June 2008, 65 per cent had also received other EC assistance (ECIRS and/or EC relief payment) for an average of 17 months prior to leaving the industry.

However, the effectiveness of the EC exit package is also limited by its failure to address the non-monetary reasons to remain on the farm – the knowledge of farming as an occupation and lack of knowledge of alternatives, lack of formal recognition of skills that are in demand in non-farming occupations, a reluctance to move away from the family home, lifestyle and the community in which the farmer and family have lived. These factors are believed to be major impediments to the effectiveness of exit schemes and mean that financial incentives alone are unlikely to encourage a significant number to leave farming (Botterill 2001).

While there may be some information and social impediments that justify the inclusion of assistance in retraining in exit packages, there is little evidence to suggest that a transition out of farming would not occur just as readily in the absence of exit grants as they are currently structured. There is no clear rationale for why exit grants should be available to the farming sector over other businesses.

There are several other exit packages also currently on offer to farmers. The exit package included in the AFF policy framework includes a Re-establishment Grant

and is very similar to the EC exit package. Its effectiveness is similarly likely to be limited by the current availability of other business and household support that keeps farmers on their farms and its failure to address the non-monetary reasons that delay people from exiting the industry.

To some extent, the non-monetary issues with leaving farming may have been addressed in the new exit grant package for small scale irrigators in Murray Darling Basin — the Small Block Irrigator Exit Grant package, introduced in November 2008. Under this package, the Australian Government will purchase the water entitlements of irrigators on very small blocks of land and in return, the farming family is able to remain on the land in their house, receive an exit grant, and assistance to remediate their land and undertake training (appendix C). As each state in the Murray Darling Basin has now agreed to pre-requisite water reforms, the program is available to all MDB irrigators until 30 June 2009.

While there may be information and social impediments that justify some adjustment assistance to exiting farmers, there is no indication that transition out of farming would not occur just as readily in the absence of exit grants, as currently structured. Provision of special grants to farmers exiting their industry distorts markets and raises inequities with other groups in the community.

RECOMMENDATION 6.4

The Exceptional Circumstances exit package should be terminated, subject to transition arrangements. The Re-establishment grants that are provided under the Australia's Farming Future initiative should similarly end.

RECOMMENDATION 6.5

The appropriateness, effectiveness and efficiency of the Small Block Irrigators Exit Grant package should be evaluated following its conclusion.

Assistance to rural dependent small businesses

A number of inquiry participants considered that assistance should be provided to small businesses impacted by drought. However, the limited evidence available on the uptake of small business assistance programs suggests that they have not been particularly useful in helping small businesses to manage the effects of drought. For example, a study into the effects of drought on small businesses in the New South Wales town of Wee Waa by Spanswick et al. (2008), found that for those who accessed drought support:

> … over 50% of businesses who accessed this service did not find it useful … One business commented that drought relief seemed to offer no benefit to well run businesses that were doing it tough. (Spanswick et al. 2008, p. 3)

Most of the reasoning provided by inquiry participants regarding small business assistance is based on the notion that governments should provide support to rural communities in order to maintain their functioning and social fabric and to resist external factors inducing change. While it is likely that droughts or other exceptional circumstances exacerbate the effects of other broader changes in communities, such objectives rightfully lie outside the focus of the current NDP. Temporary drought assistance is not the appropriate means to address these underlying long term issues. Indeed, there are many other programs provided by all levels of governments to assist with the development and functioning of rural communities (appendixes B and E) and it is not for this inquiry to assess their effectiveness.

There are also efficiency concerns with providing government assistance to businesses. Unless there is a sound rationale, poorly targeted assistance can distort production and supply decisions and make recipients less responsive to drought conditions.

Arguments for assistance to drought affected small businesses are largely based on a desire to sustain rural communities in the face of underlying and ongoing changes. Drought programs are not the appropriate vehicle to address this issue.

Transport subsidies

Transport subsidies for stock, fodder and water were introduced in a number of states to maintain stock levels and promote animal welfare outcomes (appendix E). Some inquiry participants strongly supported the payments, considering them to be useful in providing farmers with greater flexibility in managing their business in times of drought. For example, as argued by the NSW Farmers Association:

> The transport subsidy has been very beneficial to farmers providing valuable assistance to mitigate effects of drought on livestock … it is felt that the subsidy is assisting farmers to make decisions and supporting the welfare objectives of the subsidy. (sub. 98, p. 20)

However, the effectiveness of these provisions has been questioned by previous reviews of drought policy (chapter 4) and also by those governments that provide this assistance. The Queensland Government (sub. 77) suggested that transaction based subsidies have the potential to alter decision-making by:

- encouraging producers to maintain higher stocking levels during drought (potentially to the detriment of the environment and those farmers who might otherwise purchase stock or provide agistment)
- encouraging the maintenance of stock through agistment whereas it may have been better to dispose of stock
- encouraging the purchase of fodder and other inputs during drought rather than building fodder storages
- increasing the demand for fodder during droughts which provides benefits to fodder producers and those who supply fodder transport, but has a detrimental effect on other industries and producers in other states that do not receive the subsidies

In addition, the New South Wales Government suggested that such payments could have a longer term impact on sustainable production through creating permanent changes to production decisions (sub. 90). These comments were also echoed by the South Australian Government (sub. 91). Further, whether such payments provide material gains to those farmers who take advantage of them is also questionable. The New South Wales Government suggested that it is likely that such payments are capitalised into the cost of transport services and fodder (sub. 90).

The views of the state governments were also supported by the Australian Dairy Industry Council:

> … transport subsidies in EC areas – the result was increased feed and transport costs in areas that were not EC declared but still drought affected. (sub. 58, p. 6)

Australian Pork Limited similarly stated that:

> Certain forms of state assistance such as transport subsidies create perverse outcomes for pork producers. Current fodder and feed grain freight subsidies only serve to increase the price of grain to the extent of the freight subsidy conferring little or no benefit to pork producers in drought areas. (sub. DR155, p. 9)

Rural Directions further argued that:

> Where these [transport subsidies] are provided, they lead to all sorts of rorts:
>
> - Hay or grain prices increase to the level of the freight or fodder subsidies
> - Hay or grain may be 'resold' with extra freight paid
> - Hay and grain are sold interstate because prices are higher. This either pushes up prices in the state of origin or leads to an artificial shortage. (sub. 35, p. 4)

In terms of the NDP objectives, these subsidies do not encourage producers to become more self-reliant. Rather, payments may encourage producers to be less reactive to changes in climatic conditions and thereby be more exposed to climate risks. Transport subsidies are also likely to work against the objective of

maintaining and protecting the environmental resource base during droughts. By encouraging producers to hold onto stock there is an increased potential for environmental degradation through effects such as increased soil erosion.

Despite criticism amongst farming groups and by state government departments, and previous agreements by governments to remove transport subsidies (for example, Agricultural Council of Australia and New Zealand 1992), the subsidies continue to be available to farmers in New South Wales, Queensland and the Northern Territory.

Transport subsidies encourage producers to maintain higher stocking levels during drought and potentially lead to environmental degradation. They reduce incentives to store fodder in preparation for drought and thereby increase its demand during droughts. While this benefits fodder producers, it has detrimental effects on other industries and producers in other states who do not receive the subsidies.

RECOMMENDATION 6.6

States and territories should, as previously agreed, terminate transactions-based subsidies.

6.6 Evaluation of preparedness and advice programs

Farm business assistance measures that are not triggered by drought exist for a range of purposes including to encourage greater self-reliance, to build up the skills and knowledge of farm owners and workers to prepare them to deal with factors such as income volatility, and to facilitate long term productivity improvements and structural adjustment. The extent to which these purposes are met is considered in the evaluation of these programs, along with the effectiveness and efficiency of each program. Details on the programs for business support are provided in appendix D.

Farm management deposits

The Farm Management Deposit (FMD) scheme is a relatively effective form of assistance for primary producers that potentially assists in building a self-reliant platform for drought preparedness through incentives to maintain financial reserves. This assessment is consistent with earlier reviews of FMDs. The FMD scheme was found to be meeting its objectives as a risk management tool when reviewed in 2006 (DAFF 2006) and the Corish Report considered that FMDs are a vital risk management tool available to farmers and recommended that they be retained

subject to assessment that they were meeting objectives (Agriculture and Food Policy Reference Group 2006).

The scheme is effectively provided, largely through the commercial sector, with minimal input from governments. Importantly, availability of the scheme is not dependent on drought declaration, location or farm type. Of course, FMDs are not useful to farmers who are unviable, nor to new farmers who are impacted by drought before they are able to generate a cash surplus.

One of the main criticisms of the current FMD scheme by inquiry participants was its inaccessibility to those with farms operating under a company or trust structure. However Rodriguez, Watson and Mues (2006) reported that the eligibility restrictions on business structure and off-farm income levels prevented only a small number of farmers using FMDs. The Commission considers that the business structure under which farms operate is a management choice which should take into consideration the overall comparative advantages and disadvantages of operating as a sole trader, partnership, trust or company. While some of these possible structures afford greater ease of access to the tax deferral and tax saving advantages of FMDs, other business structures may offer the potential for lower business tax rates more generally.

Although a major reason for using FMDs appears to be for tax management purposes, the scheme has also been an effective risk management tool for farmers during the latest drought (Rodriguez, Watson and Mues 2006). For livestock enterprises, a pattern of increasing FMD deposits during a drought is likely to be driven by destocking and is indicative of the scheme being used for risk management purposes. For grain farmers, it appears that FMDs have been drawn down in recent years, coincident with poor or failed crops and higher input prices for fuel and fertilizer. It is likely that in the absence of competing forms of assistance, reliance on FMDs to manage for risks such as drought would be higher. Rodriguez, Watson and Mues (2006) reports that farms with FMDs, on average, received significantly less other government assistance.

The FMD scheme may make it rational for farmers to simultaneously borrow funds and place business income in FMDs (in effect, achieving an arbitrage). While this may be a somewhat perverse incentive, FMDs generally do not generate the distortionary outcomes for production decisions that are characteristic of other government business assistance (such as interest rate and transport subsidies). They are also unlikely to involve high administration costs and do not require the government to make assessments of farm viability or performance. FMDs are therefore likely to be a more efficient means of encouraging financial self-reliance than some other measures.

FMDs have encouraged some farmers to save during periods of higher income. While they are mainly used for tax management purposes, they appear to also offer a means for achieving increased self-reliance.

Grants for training and advice

Grants for training and advice are a common form of government assistance provided to farmers, both during drought and at other times (chapter 8 and appendix D). At the Commonwealth Government level, training and advice have been facilitated through:

- FarmBis — offered a partial subsidy for approved training activities. This program has now concluded but further discussion on its features is included in chapter 8.
- FarmReady — provides grants for training with approved providers to help farmers deal with the effects of climate change. Receipt of the grant is not related to income or farm financial position. The program was announced in July 2008 but was not fully operational until early 2009.
- Farm Help Advice and Training Grants — available to obtain advice, undertake training and purchase appropriate computer software to diversify and improve management. Receipt of a grant requires an initial advice session and development of a plan to improve financial position. This program ends on 30 April 2009 and will not be evaluated here.
- Climate Change Adjustment Program Advice and Training Grants — followed on from Farm Help to enable farmers to receive advice and training from recognised professional advisers and registered training organisations. Receipt of the grant requires an assessment of farm financial position. The program is available up until December 2011, but there is little information on recipients of these grants in this, the program's first year of operation.
- Professional Advice and Planning Grants (PAPG) — available from October 2006 to June 2009 to enable farm businesses affected by drought to obtain professional advice to aid in drought management and recovery. Receipt of the grant requires an assessment of farm viability.

Grants which are aimed at a training or educational outcome, such as those under FarmBis and FarmReady, may be appropriate for governments to fund, to the extent that they are well targeted and provide ongoing benefits to the broader community.

Grants for training that are well targeted, area appropriate and have an educational outcome may provide social benefits and be worthwhile.

The rationale for government intervention through planning and advice style grants is more limited. The benefits from advice provided by consultants are largely private in nature, with few community wide benefits, so a farmer should invest optimally in consultancy services on the basis of the return that these will generate for their business. That said, it is possible that there is a lack of awareness of advice available, a dearth of independent and objective sources for advice, or limited understanding of the benefits that such advice can provide.

PAPG is broadly consistent with the objectives of the NDP and is likely to have been effective in helping some farmers undertake private planning activities, such as developing a drought management plan, or gaining advice on income diversification into revenue producing off-farm assets. However, the effectiveness of the scheme may have been limited by: a requirement that applicants must be in an EC area to be eligible for the grants; the need for a farm viability assessment; increases in consultant fees to the level of the grant; and the availability of more generous and fungible assistance measures (EC interest rate subsidies). Further, it is not clear that funding of this type of advice by government to individual farmers has generated community wide benefits. While initial use of PAPG was quite low, there has been a considerable increase in its use more recently, with over half of the total funds under the scheme distributed in the second half of 2008 (appendix D). In line with other EC programs, PAPG may continue beyond 30 June 2009 for current recipients in areas that remain EC declared (Primary Industries Ministerial Forum 2008b).

Government provision of support for financial or farming advice to farmers is only appropriate in those areas for which there are community wide benefits.

RECOMMENDATION 6.7

Exceptional Circumstances professional advice and planning grants should be terminated, subject to transition arrangements.

Grants for the provision of counselling services

The Rural Financial Counselling Service (RFCS) program provides grants to state and regional organisations who offer free and impartial financial guidance for farmers and rural small businesses in financial difficulty. Commonwealth and State Governments have committed funding for the service until 30 June 2011.

While not a drought specific program, the objectives of the RFCS are not inconsistent with the NDP objectives. Counsellors funded under the program can assist farmers to adopt self-reliant approaches, facilitate access to advice from other agencies and help farmers to understand their financial position and long term

options for viability. In recognition of this, the TIS program uses rural financial counsellors to case manage those farmers who have uncertain prospects for viability in the future.

The RFCS is a popular scheme and the counselling services funded under the program were considered to be effective by many participants in this inquiry. For instance, AgForce submitted:

> Continuation of Rural financial counsellors is imperative. These counsellors provide significant services to clients and can in the future place further emphasis on climate variability planning to help producers become more proactive in this area. (sub. 80, p. 9)

Similarly, the New South Wales Government considered the RFCS to be effective:

> NSW considers the program to be equitable, needs driven and cost effective. It is very highly regarded in the community and achieves significant penetration of the farm sector. This Program is considered to be an effective means of facilitating improved farm businesses risk management and adjustment across rural NSW. (sub. 90, p. 6)

The Coonamble Shire Council reported that

> During drought, RFCs provide an easily accessible, independent source of information, support and referral for people experiencing high levels of stress. They have a thorough understanding of financial and personal options, other specialist sources of support, and are the 'frontline' in drought assistance. (sub. 63, p. 8)

However, there are potential issues that can reduce the effectiveness of the program. Many such issues were identified in the 2003 audit and 2004 review and subsequent changes to the program appear to have addressed many of these (appendix D). But it appears some issues remain. With only 120 counsellors, gaps in coverage remain. There also appears to be a relatively high retention rate of existing clients, although in some cases this may be due to a previous client seeking assistance for a new issue some years later. Expansion of the service in the last two years has also resulted in substantial numbers of new clients. It is likely that the effectiveness of the service diminishes over time for regular clients. The effectiveness of the scheme is also affected by cross-over and duplication between the RFCS and other services that are available.

As with grants for advice, the largely private benefits from financial counselling services mean that the rationale for government intervention is relatively weak. However, it appears from inquiry submissions that the RFCS program potentially has a useful, objective role in facilitating the provision of financial guidance in communities.

Financial counselling services also facilitate a flow of information in communities and should act as a referral point for other services. To the extent that these benefits eventuate, government funding of the RFCS could provide net social benefits, including greater social cohesion. However, to maximise the effectiveness of the RFCS program, the financial counselling services need to be responsive and educational for farmers, and clients should be referred on to other services as soon as needs are identified.

The RFCS program enables financial counselling services in rural areas to facilitate a flow of information and act as referral points for other services.

Murray-Darling Basin Irrigation Management Grant

The Irrigation Management Grant is a popular program with irrigators as it is relatively generous, and is largely unrestricted in its eligibility and use. It is not, however, an appropriate or efficient use of public funds.

In contrast to investments in human capital (through education and training), there would seem to be no information or rural financial market constraints that prevent irrigators (or any other farmer) from undertaking financially worthwhile infrastructure improvements.

There could be community wide issues with respect to water use efficiency that justify government intervention. However, the grant does not address these. Rather, the primary focus of the grant is to assist in improving on-farm water use efficiency — that is, it may assist farmers in maintaining productivity in the face of lower water availability and in increasing the commercial returns from their water allocation. The benefits of this will be largely captured by individual farmers; any broader regional consequences would be affected by the location of a particular irrigator. However, these regional consequences could be negative — for example, where increased on-farm efficiency reduces ground water recharge and the return flows into rivers (Productivity Commission 2006).

As for most other forms of business assistance, the Irrigation Management Grant has the effect of keeping businesses operating in their current location, rewarding those irrigators who have not acted early to update their infrastructure, and may delay long term decisions such as exit from the industry or sale of water entitlements, and thereby increase the costs of eventual adjustment in the industry. In particular, public investment in irrigation infrastructure which precedes the implementation of a water buy-back scheme could be expected to increase the cost of purchased water. The Irrigation Management Grant is also contrary to government water policy for greater use of water markets to bring about

adjustments in the location of water use. Payments under the grant are due to conclude on 30 June 2009.

There is no indication that farmers are impeded in undertaking financially worthwhile irrigation infrastructure projects, nor is it clear that the off-farm environmental consequences from such investments are more beneficial than harmful. Government support to farmers in the form of Irrigation Management Grants is therefore not considered appropriate.

RECOMMENDATION 6.8

The Murray-Darling Basin Irrigation Management Grants program should conclude, as scheduled, on 30 June 2009.

7 A new policy framework

Key points

- The National Drought Policy should be replaced by an extension of the objectives of the Australia's Farming Future initiative, to clearly place the responsibility for managing climate variability and other risks with farmers and farm-dependent businesses.
  - The agricultural policies of state and territory governments should also embody this principle.
- Governments should play a supporting role that addresses impediments to effective risk management and assists individuals and communities cope with change.
- There is a need for a program designed for farming circumstances that provides temporary income support. This program should respond to the needs of farm families, rather than to the occurrence of drought.

7.1 A revised national drought policy?

While the National Drought Policy's (NDP's) focus on self-reliance and preparedness is sound, analysis of the programs constructed in its name reveals serious deficiencies. These deficiencies were recognised by a broad range of inquiry participants. Limited improvements could be pursued through changes to the NDP; however, it would be preferable to have drought dealt with in the various policies that impact on agriculture. There are several reasons why this would be the best approach, as outlined below.

First, as explained in chapter 3, drought is only one of a number of risks faced by farmers. Other climate-related events (for example, unseasonal storms, hail and frost), changes in input costs and changes in output prices are also significant sources of risk. To the extent that management of risk by farmers is impeded by market failures that warrant government action, an approach that encompasses all types of risk is preferable to one that focuses on one particular type, such as drought.

Second, where climate-related agricultural programs are needed, these may be better targeted at climate variability and climate change generally, rather than specifically at drought. The Commonwealth, state and territory governments are developing climate change adaptation policies under the National Agriculture and Climate Change Action Plan. There is the potential for considerable overlap if these policies were pursued in parallel with a NDP, as they are all concerned with the challenges of managing climate risk.

Third, various net-beneficial interventions by governments that assist farmers in managing drought can also promote change that improves farmers' productivity and income during average and better seasons. There is a danger that having a separate NDP could result in an overemphasis on drought-related programs at the expense of other programs that may have a greater potential for producing benefits for farmers and the wider community.

Fourth, programs under the NDP provide for income support to farmers and others during severe drought. However, it is not clear that needs that arise during drought are more deserving than those that arise through other circumstances. Accordingly, it is preferable to have income support policy that responds to the needs of farm families, rather than to the occurrence of drought. Taking this approach also has the practical advantage of not tying eligibility for income support to declarations of exceptional drought. As chapter 5 demonstrates, all attempts to define the start, end and geographic extent of exceptionally severe droughts have proved to be inappropriate, ineffective and inequitable.

Finally, chapter 6 details the ways in which current programs under the NDP impede efficiency-enhancing rural adjustment. While it might be possible to make changes that reduce these problems, discontinuing the NDP altogether could potentially lead to greater recognition that long-term structural issues, rather than droughts, are often the root cause of financial difficulties faced by farm businesses. Policies that address barriers to adjustment and deal with any equity issues arising out of structural change may be more appropriate.

For these reasons the NDP should be replaced by a new approach that clearly places the responsibility for managing drought, and most other risks, with farmers and farm-dependent businesses. Governments should play a supporting role that addresses impediments to effective risk management and assists individuals and communities cope with change, including those who suffer hardship. This approach is similar to that advocated in the Corish report:

> Governments' main role in the agriculture and food sector is to secure the best environment for markets to operate. Policies should encourage self-reliance and international competitiveness and minimise intervention and regulation. This can have long term benefits for the sector, but can mean short term problems for affected

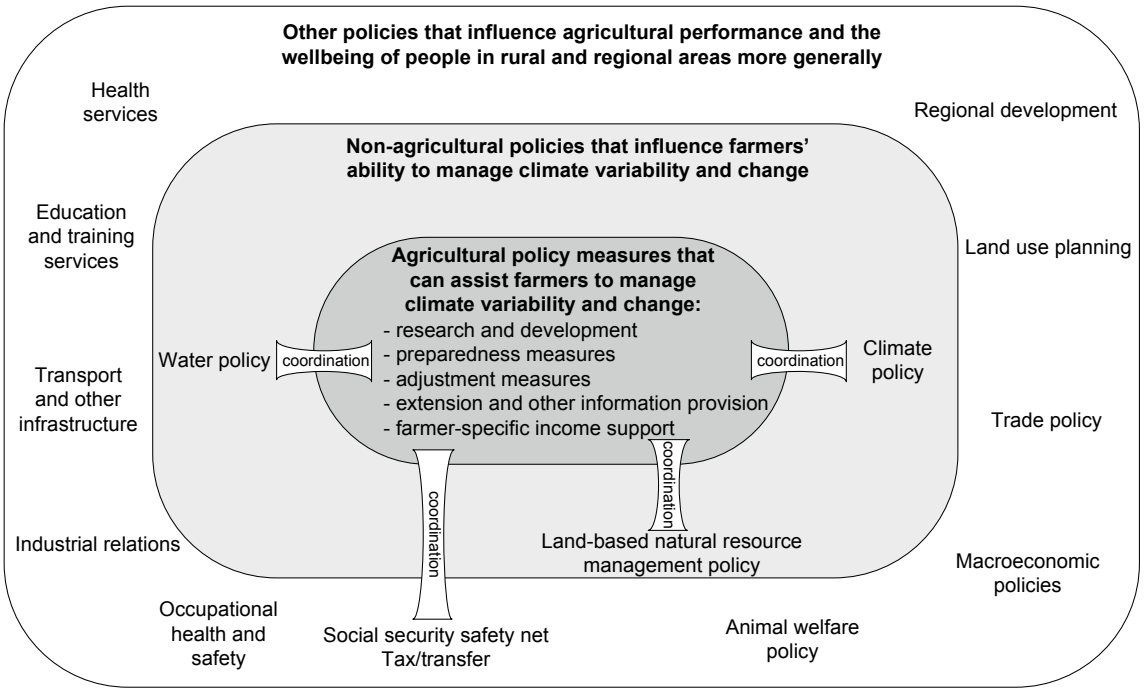
farmers, industries or communities. Governments sometimes take a role in helping these parties through their short term difficulties. (Agriculture and Food Policy Reference Group 2006, p. 29)

It is also consistent with the Expert Social Panel's argument that:

> … future policy should seek to move people towards an acceptance that future dryness will occur and is not a crisis, and that planning for dryness should be about personal, family, farm and community wellbeing.
>
> The challenge is to design policy to address the social wellbeing needs of farm families, rural businesses and communities in ways which do not inhibit the efficiency of agricultural industries. (Kenny et al. 2008, p. 3)

The elements of the approach advocated by the Commission are outlined in figure 7.1 and described in detail in the remainder of this report. Chapters 8 and 9 deal with aspects of agriculture policy relating to climate variability and climate change, which is the main focus of this inquiry. The role for other policies, including those relating to water, natural resource management, climate and human services, is considered in chapter 10.

Figure 7.1 **Policy elements of a new approach**



The objectives that should guide the agricultural policy measures shown in the inner ring of figure 7.1 are set out in the following section. These measures should not focus entirely on drought, but the impact of climate variability and change on the ongoing viability of farm businesses and other agricultural enterprises should be

considered in their design. For example, government support for agricultural research and development should encompass projects to improve options for drought management as well as projects that aim to improve profitability in good years.

7.2 Objectives for agriculture policy

At the federal level, the new policy framework should be pursued primarily through expanding the objectives of the existing Australia's Farming Future (AFF) initiative. The current objective of this initiative is to equip primary producers to adapt and adjust to the impacts of climate change and to manage their emissions. The Commission considers that the broader issues of climate variability, self-reliance and a farm-based social security safety net should be included in an extended AFF set of objectives. It is envisaged that funding for the initiative would need to be increased in order for these objectives to be achieved. Chapters 8 and 9 provide analysis that is relevant to assessing resource needs, but the appropriate level of funding is ultimately an issue for the Commonwealth Government to decide.

RECOMMENDATION 7.1

The objectives of the Australia's Farming Future initiative should be revised and extended to the following:

- ***assist primary producers to adapt and adjust to the impacts of climate variability and climate change***
- ***encourage primary producers to adopt self-reliant approaches to managing risks***
- ***assist primary producers to manage greenhouse gas emissions and other adverse impacts on the environment***
- ***ensure that farming families in hardship have temporary access to an income support scheme that recognises the special circumstances of farmers.***

State and territory governments should embed the first two of the above objectives, and, to the extent relevant at a sub-national level, the third, within their agricultural policy frameworks. National coordination of policy, and the possible role of an intergovernmental agreement, are discussed in chapter 11.

The objectives above refer to primary producers and farm families but not to farm-dependent businesses. It is the case, however, that some of the measures discussed in later chapters have the potential to directly and indirectly benefit

farm-dependent businesses. Where appropriate, these chapters consider whether farm-dependent businesses should have access to particular measures.

Adapting and adjusting to climate variability and climate change

The first objective above expands on a current objective of the AFF initiative to include climate variability as well as climate change. The reasoning for this is that:

- it is currently very difficult to distinguish (except in hindsight) between climate variability and climate change, especially with respect to rainfall
- the impacts of climate change on agriculture are, at least initially, largely felt through the effects on climate variability (Bureau of Meteorology, sub. 33; Department of Climate Change, sub. 109)
- some farmers experience difficulties in adapting or adjusting to conditions that are within the range of known past climate variability — in many cases these difficulties would be expected to increase if conditions were to move outside this range due to climate change.

As B. White argued:

> … the need now [is] … to consider research on climate variability and climate change adaptation as simply parts of adaptive climate risk management. Farmers don't make the same compartmentalisations that scientists do. (sub. 94, p. 9)

Some inquiry participants expressed concern that long-term climate change tended to capture the attention of governments and that this could be at the expense of addressing immediate needs for better tools to manage climate variability (Crocker Farming Co, sub. 45). It would appear that many hold similar views to Paul Ziebarth (Queensland farmer and chair of the Managing Climate Variability Program Management Committee):

> We've always had climate variability but climate change appears to be magnifying it. We need to get on top of that and understand the relationship between the two. It's important that climate variability research not get lost in the sea of climate change. I want to help keep that balance and keep the focus on variability. (Land and Water Australia 2008, p. 2)

Farmers themselves are generally best placed to adapt and adjust. For some, adjusting to the impacts of climate variability and climate change may involve recognising that their best course of action would be to leave farming, or to remain on, or owner of, the farm but to hand management to others through such means as leasing or sharefarming. The Commission's view is that governments should take a neutral position on these matters. Governments should not dictate that certain farms are too small or in the wrong location to be viable, but nor should they provide

ongoing support that has the effect of impeding adjustment from occurring. The role for government here is to address informational and other barriers that may prevent farmers from fully understanding, and acting in, their own best interests.

Self-reliant approaches to risk management

The second objective broadens a current NDP objective, to encompass the wider range of risks faced by primary producers, including those associated with commodity prices, input costs, climate variability and climate change.

As stated by Rural Directions Pty Ltd (sub. 35, p. 1) 'Self-reliance relates to the businesses' view on "who is responsible in bad times?"'. Current policy sends mixed signals on this question. What is needed in future is a consistent approach by all levels of government that recognises that the responsibility for managing climate variability and most other risks should rest with farmers and farm-dependent businesses.[1] Realising this objective may require government measures that give farmers better skills and tools for managing risks, such as schemes that encourage savings for difficult financial times.

One concern with an overemphasis on self-reliance was expressed by the Australian Land Management Group:

> The continuing emphasis on the stated need for unqualified self-reliance has the potential to further entrench the reluctance of farmers to access personal and social support programs. (sub. 24, p. 6)

In this respect, policy should encourage farmers to seek out advice and support when they need it. The Commission's view is that making considered judgements on when to seek professional advice on agronomy or business planning, or on accessing personal and social support services demonstrates self-reliance, not its absence, and should be actively encouraged. Self-reliance should also be seen as being consistent with participation in regional or industry groups that seek to achieve goals through collective action.

[1] There are some types of agricultural risks for which governments should take a significant level of responsibility for managing. Perhaps the most important example is biosecurity. Preventing the introduction and spread of pests and diseases provides a 'public good' (that is, it benefits all farmers and the wider community) and as such, requires government regulation and coordination. This contrasts with effectively managing climate risks, which essentially provides private benefits to individual farmers and farm-dependent businesses.

Managing greenhouse gas emissions and other environmental impacts

The current objective of the AFF initiative refers to managing emissions. It would seem from the detail of policy being developed for the initiative that this relates mainly to greenhouse gas emissions. The third objective for the AFF proposed by the Commission makes it explicit that greenhouse gas emissions and other adverse environmental impacts are targeted.

While objectives relating to environmental outcomes should be pursued primarily through natural resource management and other environmental policies, having an environmental objective within AFF is considered worthwhile for two main reasons. First, it provides a focus for efforts to prepare the agriculture sector for possible inclusion in a greenhouse gas emission reduction scheme. Second, it signals the need to take into account possible unintended, and adverse, environmental impacts arising from AFF policy measures.

Income support

In terms of the basic social security safety net, ensuring that farm families in hardship have access to income support commensurate with that available to other Australians is an appropriate aim. However, there are factors unique to the situation of farm families that, in the Commission's view, warrant temporary support being taken up as a separate objective within agriculture policy. These factors include the impediments to some farmers or their families seeking off-farm sources of income, the need for ongoing environmental stewardship of farming land and the desirability of retaining current ownership of valuable farm assets in some situations, even when income is temporarily negligible or negative. Having a farmer-specific income support program of limited duration also has some synergies with addressing barriers to adjustment. The program should be accessible at all times, however, not just during exceptional drought.

What about other objectives?

The NDP contains two objectives that, in the Commission's view, need not be carried over into the AFF initiative.

The first of these is 'maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress'. The environmental aspect of this is covered by the proposed objective above and by the objectives of natural resource management and other environmental policies. Existing animal welfare regulations also have a role to play. Maintenance of the agricultural resource base,

during periods of climate stress is, in the Commission's view, largely the responsibility of individual farmers and industry groups. Thus, it is unnecessary to have this objective embedded in AFF.

In addition, this objective appears to have been interpreted as seeking to maintain each individual farm business as part of the resource base. Not including this objective, therefore, has the benefit that it avoids this common misinterpretation.

The second NDP objective that need not be carried over is 'ensure early recovery of agricultural and rural industries consistent with long-term sustainable levels'. As discussed in chapter 6, removing barriers to adjustment promotes early recovery from drought. As such, issues relevant to this are covered in the first two expanded AFF objectives.

8 Promoting self-reliance and preparedness

Key points

- Farmers are in the best position to assess the climate and other risks they face and adopt risk management strategies that reflect their individual circumstances. There are strong private incentives for farmers to manage their risks well.
- Governments have a role to play in encouraging farmers' self-reliance and preparedness by:
  - avoiding interventions that encourage dependence on government assistance
  - addressing impediments that lead to the underprovision of research, development, extension and training.
- The Farm Management Deposits scheme should be retained as it is a reasonably efficient means of encouraging financial self-reliance.
- Rationales for government assistance are weaker in relation to subsidising on-farm improvements, providing concessional finance and underwriting insurance markets for agricultural production risk.
- Government funding for self-reliance and preparedness measures should be sufficient to achieve appropriate, effective and efficient outcomes from justified policies. This amount bears no relationship to previous levels of exceptional circumstances payments.

8.1 Introduction

This inquiry originates from the recognition by all governments that current drought policies are no longer the most appropriate in the context of a changing climate. The Commission's evaluation establishes that the main drought assistance measures do not focus on helping farmers improve self-reliance, preparedness and risk management. In fact, they are more likely to hinder these aims.

The Commission has proposed that the National Drought Policy (NDP) should be replaced by an expanded set of objectives integrated within the Australia's Farming Future initiative, with equivalent changes to the agricultural policies of state and

territory governments (chapter 7). The first two of these new objectives focus on adaptation and adjustment to climate variability and climate change, and adoption of self-reliant approaches to managing the full range of risks faced by farmers. This chapter considers what policies should be adopted to fulfil these objectives.

Managing the risks of farming

Farmers and policy makers need to consider preparedness for drought within the broader context of farm risk management. Topp and Shafron (2006) present five categories of risks faced by farmers, with drought encompassed within the first category:

- Production risk: relates to uncertainty over the natural growth processes of crops and livestock.
- Price or market risk: uncertainty about the prices that producers will receive for commodities and prices they pay for inputs.
- Institutional risk: result from uncertainties about government actions.
- Human or personal risk: relate to possible problems with human health or personal relationships that can affect farm businesses.
- Financial risk: uncertainty relating to interest rates on debt and the actions of lenders (for example, the possibility that credit availability will be restricted).

Farm dependent businesses can face similar categories of risk.

Not all of the above categories of risk are independent. For example, production risks are sometimes negatively correlated with price risk. When there is a widespread drought, prices of some commodities tend to rise due to shortages.

The objective of risk management is to maximise expected returns in a way consistent with each individual's attitude to risk. Optimal risk management does not usually mean risk minimisation. Regardless of attitudes to risk, all businesses must take on some risks to earn profits (Hardaker et al. 2004).

Risk management for farmers and farm dependent businesses is about identifying and evaluating risks, assessing what can be done to prevent them eventuating and deciding how to deal with them if they arise. It involves deciding which risks to accept (so as to gain the rewards that may follow) and which to avoid (Hardaker et al. 2004). There is a wide range of actions that farmers can take to manage climate and other risks, as outlined in box 8.1. Some of these are also relevant for farm dependent businesses.

Box 8.1 **Actions that farmers can take in managing risks**

Some actions farmers can take in managing risks are listed below. The actions that are appropriate (and possible) vary greatly between farm businesses.

- Develop, use and periodically update a business plan.
- Seek professional advice on the financial condition of their business and options for the future.
- Talk through financial issues with financiers, including how risks can be managed.
- Diversify income through off-farm employment.
- Diversify assets through off-farm investments.
- Lease out land so as to obtain a low risk source of income.
- Lease land or enter into sharefarming arrangements as an alternative to purchasing land (for example, as part of a staged entry to farming).
- Off-load drought and other risk by entering into a sharefarming arrangement (for example, Australian Agricultural Contracts Limited's Grain Co-production) whereby investors provide unsecured capital to plant crops in return for a share of the proceeds.
- Spread land holdings geographically to reduce the chance of the entire farm business being in drought at once.
- Build up financial reserves in Farm Management Deposits and other financial products for use in low income years.
- Use financial instruments such as price hedging.
- Use climate forecasts, decision support tools and information on individual paddocks in making decisions, such as the area to crop and what inputs to use.
- Draw down financial reserves or access carry-on finance to maintain business operations and household consumption during periods of low income.
- Store fodder for use during dry years.
- Reduce stocking during drought according to a predetermined plan.
- Invest in increasing water use efficiency so as to be able to better cope with low allocations of irrigation water.
- Move to single or no-till cultivation systems to make better use of available soil moisture.

Banks and other financiers also play a role in managing the risks of farming. Risk management can involve a measure of self insurance, by saving for future contingencies. Banks provide financial products that allow this to occur. By providing loans to farm businesses they also take-on some of their risk.

Accordingly, they have an incentive to assist businesses to manage risks and remain viable. The Australian Bankers Association reported:

> During the drought individual banks have offered:
>
> - to provide carry-on finance to meet short term needs;
> - to restructure existing loans, to reduce annual payments or defer payments without cost; …
> - direct communication with customers about the bank's view about drought issues;
> - support of specialised advice to industry groups such as dairy farmers;
> - similar support for drought affected small businesses that provide services to Agribusiness;
> - targeted courses to assist farmers plan to recover from drought. (sub. 76, pp. 2-3)

Banks also have an incentive to avoid exposure to bad risks. One way they do this is by setting credit limits in line with their assessment of businesses' capacity to service their loans.

The role for government

Many inquiry participants saw an important role for governments to support improvements in risk management in agriculture. A wide range of areas were put forward as being worthy of public funding.

Several key submissions from governments and farmer groups proposed integrated assistance packages. For instance, the National Farmers' Federation (NFF) — with support from most of its state affiliates — contended:

> Within the national agriculture policy framework, climate change adjustment tools such as research, development and extension, risk management tools, water management and education and training, must be maintained in non-drought years if they are to obtain results …
>
> The NFF proposes a new approach to drought policy based on a partnership between primary producers and government.
>
> - The key platforms of this policy model are that farmers can select the policy option best suited to their circumstances, industry/government co-investment is achieved and the bulk of government investment will result in tangible on-farm preparedness improvements. (sub. 51, p. 3)

The NFF's proposal is summarised briefly in box 8.2.

Box 8.2 **National Farmers' Federation Strategy**

The National Farmers' Federation proposed a new approach whereby government policy for drought is delivered in conjunction with other aspects of national agricultural policy. This approach would provide producers with a choice of the following drought policy streams:

- Stream one: Innovate — utilises Professional Advice and Innovation Grants and Risk Management Deposits to assist farmers to improve preparedness.
- Stream two: Advance — provides Income Contingent Loans for those who need short term government support to invest in preparedness strategies.
- Stream three: Secure — includes Professional Advice Grants, income support payments and Farm Exit Grants for those who require a longer consolidation before moving to preparedness or who wish to weigh up their future options in the industry.

Source: NFF, sub. 51.

In the Commission's view, the government's role in improving risk management and drought preparedness is to implement measures that will make the community better off overall. Applying this principle entails the following:

- Setting the level of funding for preparedness measures according to the potential level of communitywide benefits. In contrast, some inquiry participants suggested that the level of funding for preparedness should offset any decline in funding for reactive drought relief (Queensland Farmers' Federation, sub. DR123; NFF, sub. DR176). In this context, the Commission notes that expenditure on the exceptional circumstances interest rate subsidy was $604.1 million in 2007-08, but only $12.8 million in 2001-02. There is no reason to suppose that the appropriate level of funding for preparedness measures bears any relationship to the widely fluctuating levels of funding for drought relief.
- Having realistic expectations about the likely outcomes of government policy. Persistently low incomes for some farms, for example, are most often due to structural problems at the farm or industry level, such as insufficient size or inappropriate land use (chapters 2 and 3). Better risk management will do little to improve farm income while the underlying problem remains. Governments can not make all farm businesses viable by assisting them with drought preparedness and nor should they try.
- Avoiding interventions that promote dependence on government assistance and reduce incentives for self-reliance.

Drawing on these perspectives and the lessons from the evaluation of current programs (chapter 6 and appendixes B–E), this chapter explores the case to expend taxpayer resources on:

- research and development (section 8.2)
- information and advice (section 8.3)
- education and training (section 8.4)
- farm management deposits (section 8.5)
- accelerated depreciation and grants for investing in preparedness (section 8.6)
- income contingent loans (section 8.7)
- assistance to develop insurance markets (section 8.8).

8.2 Research and development

Institutionalised agricultural research and development, as well as farmers' own experimentation, have been important factors in achieving productivity improvements in Australia and elsewhere (PC 2005b). This section focuses on areas that are of particular importance for promoting self-reliance and preparedness — seasonal and longer term forecasting and general agricultural research and development to manage climate variability. The research agenda relating to climate change impacts and adaptation is also relevant, but is broader than the scope of this inquiry.

Seasonal and interannual climate forecasts

Improved forecasts for the weeks and months ahead would be of enormous value to farmers in managing climate variability — for example, to allow cropping decisions to be tailored to rainfall probabilities. The Bureau of Meteorology reported that a new approach for seasonal forecasts is needed :

> The future of seasonal prediction lies in a move away from statistically-based systems towards dynamic climate prediction models – similar to those used for weather forecasting. (sub. 33, p. 3)

Several inquiry participants argued for a greater research effort on seasonal forecasting and better understanding of climate variability. The NFF, for example, contended:

> Australia, having a variable climate, needs to make a significant investment in better understanding and predicting that variability. Our Bureau of Meteorology (BoM) needs a massive investment in its basic computer and modelling infrastructure. It requires an

> investment in a range of measurement and weather tracking tools. It requires an investment in its international collaborative data sharing and climate modelling. Additionally, the BoM needs to get down to a local level with an expanding emphasis on drought preparedness. (sub. DR176, p. 31-2)

The Department of Agriculture and Food Western Australia identified a lack of research as an impediment to self-reliance and preparedness:

> Western Australia does not receive as accurate climate forecasting as the Eastern States given the lack of meteorological investment in researching and analysing Indian Ocean weather patterns. (sub. 65, p. 3)

B. White, a consultant and former National Coordinator of the Managing Climate Variability Research and Development Program, argued:

> In … recent years climate change science has dominated and attracted resources away from climate variability research. (sub. 94, p. 10)

Due to the public good nature of the information generated, there is a strong case for governments to fund basic and applied research into climate variability and climate change. Representatives of the agriculture sector should play a role in guiding research priorities. Attention should also continue to be given to finding the most effective means for clearly conveying forecasts in formats that meet the needs of farmers in the various agricultural industries.

Governments should continue to fund research into climate variability and climate change. While there are synergies and overlaps between the two, governments should ensure that a high priority is given to research into climate variability in its own right.

General agricultural research and development

Research and development funded by governments

The Commonwealth and state and territory governments and the private sector fund agricultural research. Governments fund agricultural research through:

- Rural Research and Development Corporations (RRDCs) and relevant industry bodies
- Cooperative Research Centres (CRCs)
- public research institutions, such as CSIRO, universities and research divisions within state government departments of agriculture
- tax concessions for private research.

The majority of publicly funded agricultural research is managed through RRDCs which were first established in 1989. RRDCs are funded through government and industry contributions, or through relevant industry bodies such as Horticulture Australia Ltd, that have deeds of agreement with the Commonwealth Government for research and development funding. RRDCs are responsible for commissioning and monitoring research and facilitating the dissemination, adoption and commercialisation of research results (PC 2007b).

In principle, RRDCs have a sound governance model. By requiring industry to contribute levies that are then matched by the government, RRDCs aim to reduce the 'free riding' that can be associated with research. The levy model also gives industry a direct incentive to shape research priorities. This, in turn, makes it more likely that innovations are relevant to the needs of producers and that new technologies are disseminated quickly. However, the extent of industry capture of research priorities needs to be monitored to ensure that there remains a strong public benefit component that warrants government funding.

There are emerging concerns that research activities are being focused disproportionately on industry-specific, applied research. Research that delivers benefits appropriable by industry groups is likely to be promoted by these groups at the expense of research that is cross-sectoral, regionally focused and/or with strong public good features (Frontier Economics 2006; Agriculture and Food Policy Reference Group 2006; Mullen 2007). The Commission has similarly queried whether the public benefits from many RRDCs or relevant industry bodies are sufficient to justify the levels of funding (PC 2007b).

Two RRDCs, which are exceptions to the industry model, are Land and Water Australia and Rural Industries Research and Development Corporation (RIRDC). Land and Water Australia aims to improve the way natural resources are managed and improve the profitability of farming systems. It is responsible for several programs, including the Managing Climate Variability Program established in 1992 under the NDP (box 8.3). RIRDC focuses on new and emerging industries and also addresses strategic cross-sectoral issues facing the rural sector. This includes research into risk management, climate change and climate variability.

Another tranche of public support for relevant research and development is through CRCs, which were introduced in 1990 to encourage public sector agencies and private interests to work cooperatively together. In 2005-06, the Commonwealth Government directly contributed about 30 per cent of total CRC funds and contributed indirectly through its funding of CSIRO and universities. Businesses and state and territory governments also help fund CRCs (PC 2007b). There is currently one CRC which directly addresses issues of climate variability in agriculture — the Future Farm Industries Cooperative Research Centre (box 8.3).

Box 8.3 **Government funded research into agricultural adaptation and climate variability**

Climate Change Research Program — part of the *Australia's Farming Future* initiative — has funding of $46.2 million over four years. It will fund research projects and on-farm demonstration pilots that address: reducing greenhouse pollution, better soil management and adapting to a changing climate.

Managing Climate Variability Research and Development Program — managed through Land and Water Australia — has funding to 2010 from various industry-specific RRDCs and has in the past received funding from the Commonwealth Government's Department of Agriculture, Fisheries and Forestry. The program aims to improve climate forecasting, provide tools and services for managing climate risk and increase adoption of climate risk management.

Future Farm Industries Cooperative Research Centre — established in July 2007 — has $114 million in funding over 7 years. Contributors include RRDCs, universities, government departments and private companies. This centre invests in research and development, education and training and commercialisation and adoption. It also aims to create new land-use systems which will make agriculture more productive, sustainable, diverse and able to adapt to climate variability.

Most inquiry participants supported continued or increased government funding for research and development to assist farmers better manage and adapt to climate variability and change. The South Australian Government (sub. 91) argued that such research will need to focus on the development of new production systems, as well as the improvement of existing varieties and management practices.

The New South Wales Government promoted the contribution that research and development has made in assisting farmers to manage their risks through 'offering improvements in areas such as seasonal forecasting, grain breeding, mechanisation, reduced tillage and weed control practices' (sub. 90, p. 2).

It is appropriate that a significant proportion of Australia's agricultural research and development is funded by governments because private sector agents, unable to capture all of the benefits that can spillover to others, tend to underinvest, resulting in less than socially desirable levels of research effort. Moreover, research can deliver wider third party benefits — for example, the community as a whole can benefit when farmers use research results to manage their natural resources more sustainably.

The Commission, therefore, endorses a role for government to provide funding for agricultural research and development. The strongest case relates to basic research, or where businesses undertake novel research and development activities that have spillover benefits to the community, or trigger cycles of innovation by rivals

(PC 2007b). Beyond this, the case for government support for commercialisation and deployment activities becomes weaker as the opportunities for the innovator to capture the benefits increase.

As the boundaries between public and private research are not always clear, there can be uncertainties about the extent to which support should be provided. The challenge for public policy is to elicit investments that:

- would not otherwise have been made — programs need to be designed to ensure that public funds stimulate *additional* research and development rather than simply displace privately funded research and development
- generate total private and spillover returns that exceed the costs associated with the policy measures (including administration and compliance costs and efficiency distortions of taxation required to finance the measures).

It is important to provide balance in the allocation of funding for agricultural research and development activities between projects designed to: improve risk management for climate variability; develop climate change adaptation technologies and strategies; and improve production more generally.

Improving the effectiveness of government funding

Inquiry participants offered various suggestions as to how the effectiveness of public support for research and development could be improved.

The NSW Farmers' Association suggested that improved collaboration between researchers and producers was required:

> … to enhance the effectiveness of observation networks, monitoring, prediction, information delivery, and applied research and to foster public understanding of and preparedness for drought and climate change. (sub. 98, p. 32).

In the Commission's view, collaboration and two-way communication between researchers and producers should be promoted by integrating research and development with extension services. This makes researchers more aware of farmers priorities and increases the likelihood that farmers will adopt new practices that improve profitability and self-reliance (extension is discussed further in the next section).

The Tasmanian Farmers and Graziers Association (trans., p. 7) argued that there was duplication of research effort that needed to be addressed. To this end, the Primary Industries Ministerial Council is developing a National Primary Industries Research Development and Extension Framework that, among other things, is designed to improve collaboration and reduce fragmentation of research.

The NFF also raised the issue of effective coordination of research and avoidance of duplication:

> The NFF urges caution to ensure that targeted investment in areas such as climate variability and climate change are done through existing RRDC Government agencies. These agencies have been established, co-funded, and engage with the farm sector. NFF opposes special pools of funding being managed by a Government Department rather than one of these RRDC agencies. (sub. DR176, pp. 69–70)

There would appear to be some merit in this argument, as special pools of funding for research can be problematic where they lead to short term funding of research providers. Such arrangements can work against the recruitment and retention of high quality researchers and the establishment of effective relationships between researchers and primary producers.

One drought-related research and development issue raised during this inquiry is that producer levies usually decline during drought and this can disrupt research and development activities. The Western Australia Rural Business Development Corporation reported:

> During drought years, there are less levy collections, therefore fewer funds available for good applied research, development and extension, and many good research programs may not recover from these funding cuts or fluctuations in funds provided. (sub. 83, p. 5)

Of those inquiry participants that raised this issue, there was general agreement on the desirability of maintaining research and development programs during droughts, but differing views on how best to achieve this. The South Australia Advisory Board of Agriculture (sub. 71) suggested that exceptional circumstances funding be used to compensate for reduced levy revenue. The Birchip Cropping Group, argued that the best approach was for governments to encourage research institutions to keep money in reserve for use in difficult times (trans., p. 473). The Commission concurs with this view. RRDCs should maintain sufficient financial reserves to prevent the disruption of their core activities during droughts and other periods when their revenue temporarily declines.

The importance of monitoring and evaluation of research was raised during the inquiry and was also addressed in the Corish report. Corish highlighted the need for evaluation of research against meaningful criteria and illustrated this by citing examples where research had continued well past there being any likelihood of success (Agriculture and Food Policy Reference Group 2006). The Commission has previously stressed the importance of monitoring and evaluation of agricultural and other types of research (PC 2007b). There is a need not only for project evaluations, but also for reviews of the objectives for assisting businesses in the forms and levels provided.

As discussed in chapter 5, the National Agricultural Monitoring System (NAMS) is an information system that is used in the exceptional circumstances application and assessment process. If the recommendations of this report are followed NAMS will, in time, not be needed for this purpose. Some inquiry participants argued that NAMS could be further developed to serve other uses, including assisting farmers in managing climate risks (South Australian Government, sub. 91). It was also suggested that the desired end point was a tool similar to the US National Integrated Drought Information System (NFF, sub. DR176). A detailed assessment is needed to determine whether NAMS should be phased out or reoriented to serve other purposes.

Given the broad range of organisations involved in climate change and agricultural research and development, it is essential that consistent principles are applied. This was recommended by the Cutler review of science and innovation (Cutler et al. 2008). The Commission supports that recommendation.

The Commission considers that the following principles for public investment in agricultural research and development to manage climate variability and climate change should be pursued:

- *funds should be expended in areas where there are net public benefits*
- *there should be safeguards against funds being directed into areas that deliver benefits appropriable by narrow industry groups — where research provides clear private benefits, contributions from relevant organisations should be required*
- *excessive use of short-term funding arrangements should be avoided because they can work against the recruitment and retention of high quality researchers and the establishment of effective relationships between researchers and primary producers*
- *there should be integration with extension services to ensure researchers are aware of farmers' priorities and farmers are able to appropriately adopt new practices*
- *funding should be channelled through a small number of well functioning institutions (such as several of the RRDCs and CRCs) rather than multiple additional funding pools being set up*
- *research should be subject to regular monitoring and evaluation.*

8.3 Information and advice

Successfully managing the increasing complexity of farming requires access to information and advice on such diverse issues as agronomy, marketing and financial and risk management. A common theme brought up by inquiry participants was that there is a vast amount of information available and the challenge for farmers is to identify the most relevant information and use it effectively in making decisions.

This section examines the various ways that governments can assist farmers with information and advice. Provision of extension services has traditionally been the main area of government involvement, but grants for professional services and facilitating access to financial information are other possibilities. In all cases it is necessary to determine the appropriate roles for government and private services.

Extension

The term 'extension' is used here to mean public and private sector services that enable farmers to change their management practices, including through the adoption of new technologies. It includes raising awareness, providing information and advice, and addressing misconceptions about particular technologies. Extension will commonly involve farmers learning new things and may identify training needs. Education and training programs are considered separately in the next section.

There was strong support among inquiry participants for government funding of extension services. The NFF (sub. 51) identified extension as one of a suite of key areas that affects agriculture's ability to deal with drought. It emphasised that extension efforts, alongside other key areas, must be maintained at all times and not just during droughts.

There was general agreement on the importance of extension as part of an integrated policy approach for dealing with climate variability and improving risk management (Cotton Australia, sub. 9; Australian Dairy Industry Council, sub. 58; Queensland Farmers' Federation, sub. 82). S. Pearson stated:

> Improved education, research, information provision and, most importantly, adequate public and private extension services needs to underpin Australian drought (and other extreme event) responses. The human capital on farms and in the advisory sector needs urgent investment as it copes with a torrent of new information and complex issues. Self-reliance should not be an excuse for isolation from trusted advisory networks. Opportunities should be sought to build and maintain such professional networks for farmers and advisors. (sub. 28, p. 1)

Changes to extension

Given its importance, some participants were concerned that governments were reducing their investment in extension. The Tasmanian Farmers and Graziers stated:

> We have always been of the view that there needs to be an increased emphasis on research, development and extension in agriculture. What we have seen historically right around the nation is a drawback from state governments and their investment, and particularly in the extension area. (trans., p. 7)

It is certainly the case that state and territory governments have scaled back their direct delivery of extension services over the last decade or two. This, however, is only one of a number of important changes to extension in recent years. Some of the most significant changes are considered below.

Adoption of a partnership approach

Historically, governments delivered extension services directly through state departments of agriculture. As governments have wound back these services they have developed a partnership approach whereby they partly fund extension services that are delivered by the private sector. A prominent example is government funding of RRDCs to provide extension services. Partnerships have also been pursued through CRCs, regional grower groups and others.

There are a number of positives associated with these changes. A major one is that they give farmers and agricultural industries much greater control over the services delivered. Growcom argued:

> Then there is … the extension component. That, in my view, is best done by industry, because industry people helping other industry people to learn and there's a better mechanism of adoption there. (trans., p. 316)

Inquiry participants put forward many examples of what they regarded as successful extension programs that take a partnership approach. A selection of these is outlined in box 8.4.

These extension arrangements involve sharing costs between governments and those using the services. For example, RRDCs and relevant industry bodies are now major providers of extension services and, as discussed previously, are financed by industry levies and government funding. Production-oriented extension provides mainly private benefits and so it is appropriate that there is a significant private contribution towards their cost.

Box 8.4 **Examples of extension services**

Birchip Cropping Group (BCG): a farmer-driven not-for-profit organisation operating in the Wimmera and Mallee regions of Victoria. BCG conducts applied research and extension on all major crops grown in the region. It aims to investigate the critical success factors that ensure sustainable and profitable crop production systems and to bring together farmers, industry and government representatives so that they may cooperate to solve common agricultural problems (BCG 2008).

Western Australian No-Tillage Farmers Association: a farmer group that aims to find sustainable ways of growing high yield crops. It provides information to farmers about no-till cropping systems, facilitates the exchange of ideas, encourages no-till research, and disseminates no-till information. Funding sources include the Grains Research Development Corporation (GRDC), Australian Government Department of Agriculture, Fisheries and Forestry, National Landcare Program, corporate sponsors, and membership fees (WANTFA 2009).

Masters of the Climate: an initiative of the Managing Climate Variability Research and Development Program that aims to improve understanding and increase adoption of climate risk management tools and knowledge. One way this is done is through publishing interviews with innovative farmers about their management of climate risks, including drought (Land and Water Australia nd).

GRDC Planning Guide for Farmers with Limited Finances: aims to assist farm businesses plan a low-risk return to modest profit. A planning cycle for the year it set out, which includes steps relating to financial and production decisions (GRDC 2009).

Rural Water Use Efficiency Initiative: a partnership between the Queensland Government and industry groups (such as Cotton Australia and Growcom) that aims to assist irrigators improve water-use efficiency and irrigation management. Specific activities included: on-farm trials, demonstrations and system assessments, in addition to financial incentives for upgrading irrigation and effluent management systems (Department of Natural Resources and Water 2009).

8x5 Wool Profit Program: undertaken by the Tasmanian Institute of Agricultural Science and funded by Australian Wool Innovation Ltd as an extension program to service their levy payers in Tasmania. The first phase was a mix of research, development and extension programs, while the current second phase is entirely focused on extension. Extension approaches include grower groups, workshops, demonstrations and newsletters (Hunt 2008).

Dairy Extension Centre: established by the Victorian Government and Dairy Australia as a 'virtual' centre of extension capability and program delivery. As well as maintaining a website, the centre has set up three Regional Extension Committees that are responsible for overseeing the delivery of extension services in their region. These committees undertake activities such as developing delivery programs for extension, delivering extension news to member's networks and encouraging innovation among extension providers (Dairy Extension Centre nd).

Some arrangements also appear likely to have made more efficient use of government resources, by working with, rather than in competition with private providers. For example, the Department of Agriculture and Food Western Australia stated:

> My comment to the development officers, as we call them now, is, they're better to talk to one farm management consultant and in theory they're talking to 40-odd farmers. That's a more efficient way of doing business, rather than trying to talk to 40 farmers. (trans., p. 135)

There have, however, been some negative consequences of the change to a partnership approach. The Western Australian Farmers' Federation reported that the resulting increase in the number of providers could cause difficulties:

> Currently, the dissemination of information to farmers is affected by the number of research and information providers, which contributes to a perception of information overload among clients, and this can contribute to a weakening of the consistency of delivery of the [state-based extension] program's core principles. (sub. DR161, p. 2)

R. Toms-Morgan reported that the changes were leading to a loss of expertise:

> Agricultural extension expertise is diminishing at a significant rate without defined opportunities for the next generation to gain from the decades of experience and expertise which is/has retired from the front line of agriculture. (sub. DR126, p. 1)

It is the Commission's view that the changes themselves, and the short term nature of some government funding, have resulted in some loss of expertise and trust between farmers and extension providers.

Increasing focus on the environment

The focus of government extension activities has shifted to a significant extent from agricultural production to environmental outcomes. Environmentally-oriented extension has been delivered in a variety of ways, including through the National Landcare Program, the Natural Heritage Trust and the National Action Plan for Salinity and Water Quality (these programs have now been replaced by the Caring for our Country initiative).

The rationale for this change is that services which promote more efficient agricultural production mainly benefit farmers and agricultural industries and so there is only a limited role for government. Services that improve environmental outcomes, on the other hand, can produce benefits for the wider community and so there is a stronger case for government provision.

Environmentally-oriented extension can result in benefits for both farmers and the wider community, for example, through wider adoption of a cropping practice that both increases farm profit and reduces sediment loads in creeks and rivers. Pannell

et al. (2006), however, note that this is not always the case as government extension agents sometimes promote practices that conflict with the goals of individual landowners and which would require broadscale adoption to produce significant environmental benefits. Using extension in these circumstances is likely to be ineffective and can reduce the credibility of extension agents. Other policy instruments may be more appropriate, as discussed in chapter 10.

Increase in group-based activities

Government extension was in the past often delivered one-to-one on the farmer's property but this has given way to increasing use of group-based activities. Marsh and Pannell (2000, p. 610) report that this is only partly due to agency cutbacks:

> There has been a change in extension ideology away from the 'linear model' of 'top-down' technology transfer, to extension methodologies that emphasise information flows, adult learning principles and participation by stakeholders.

Group-based activities have the potential to make effective use of practical knowledge held by farmers and focus attention on the issues of most importance to them. That is not to say that group-based activities are always the most appropriate. Farmers often require one-to-one information and advice when considering or implementing changes to their farm management practices. There is, however, only a limited role for governments to provide such services.

Rise in private extension

The private sector has emerged as a significant provider of extension services to the agricultural sector. Private sector extension has taken different forms and is provided by farmer organisations, cooperatives and groups, consulting firms and input suppliers. Many farmers contract agronomists and other advisors to provide them with specific and tailored information for running their farm businesses. As stated earlier, RRDCs play a significant role. Marsh and Pannell (2000, p. 623) argue:

> The withdrawal of government extension services judged to be predominately private goods has revealed that the private sector was indeed being crowded out of these markets.

Inquiry participants reported that the use of private consultants was widespread among some, but not all, groups of farmers. The Department of Agriculture and Food Western Australia reported:

> There is a consulting profession here that has been long and well established and [has] a very high take-up by farmers. Some farmers use three separate consultants. They will use a general farm business consultant, they will use an agronomy consultant and then they will use a grain marketing consultant. (trans., p. 132)

AgForce advised that it was the smaller, not as advanced, producers who were likely to be missing out on 'on-the-ground' extension services (trans., p. 392). Rural Financial Counselling Service Victoria – Murray Mallee reported that the group of farmers who access its services were unable or unwilling to pay for professional services (sub. DR151).

In the Commission's view, that some farmers are unable or unwilling to pay for private extension services is not sufficient justification for governments to attempt to provide equivalent services. Rather, governments should be conveying the message that paying for private services that will enhance profitability, viability and sustainability is a normal part of managing a farm business.

In some cases farmers can also obtain free information and advice from sellers of agricultural inputs. Some inquiry participants said that this could be of value to farmers, while others reported instances where the advice was deficient. For example, Productive Nutrition contended:

> Stock agencies tend to employ university graduates to utilise their limited knowledge to sell products; many of these products have no place during a drought and most are not property specific and offer little return on investment for farmers. (sub. DR122, p. 3)

While sellers of agricultural inputs who also provide information and advice clearly have a vested interest in promoting their own products, they also have an incentive to protect their credibility and to be seen to add value to their client's business. Accordingly, it would seem likely that farmers would be able to benefit from such free advice, provided that do not rely too heavily on it and are able to test it against independent sources of information.

The way forward

In summary, there has been enormous change in extension over the last twenty years. Some changes have been for the better, while others have not. The public policy rationale for change has often been sound, but its implementation has sometimes been deficient.

In calling for improvements in extension, many inquiry participants recognised that the aim should not be to revert to how extension used to be. For example, AgForce stated ' … old-style extension has sort of gone, and I'm not saying we go back to what it was' (trans., p. 392). Rather, there is a need to learn from the successes and failures of the past. Doing so has considerable potential to promote self-reliance and preparedness.

It is essential that governments have a sound and clearly stated rationale for their role in the extension arena. In the Commission's view, governments have an important supporting role to play in extension for three main reasons.

First, as discussed in the previous section, there is a clear rationale for government funding of research and development in agriculture. To maximise the cost-effectiveness of this funding, extension needs to be considered as an integrated part of the research and development effort. There need to be strong two-way links between research and extension if the needs of farmers are to be well served.

Second, Australian governments wish to maintain a capacity to influence farm management practices in order to produce public benefits, such as improved environmental outcomes. Extension services should be used as part of this effort. To do this effectively, state agencies need to maintain sufficient agricultural expertise.

Third, with the large number of information providers available, it can be difficult for farmers to access the information they need and assess its credibility. Government should continue to address potential information failures by:

- providing some general agricultural information directly (for example, using fact sheets and the like)
- connecting farmers with extension groups and services that have a greater capacity to assess the credibility and relevance of information.

In fulfilling this supporting role governments should ensure that they:

- promote continuity of services and strengthen career paths in extension through their employment practices and funding arrangements
- do not add unnecessarily to the number of information sources by spreading funding too thinly across extension groups
- use extension primarily to promote practices that are consistent with the interests of farmers (as discussed in chapter 10, other policy instruments, such as financial incentives, may be appropriate in other circumstances)
- seek to support and complement, rather than duplicate, services provided by the private sector.

RECOMMENDATION 8.1

Significant public funding should be directed to research, development and extension to assist farmers prepare for, manage, and recover from the impacts of climate variability and change.

Grants and subsidies for professional advice and planning

Examples of current programs that provide grants to farmers to access professional advice are the EC Professional Advice and Planning Grants program (PAPG) and the Climate Change Adjustment Program (CCAP) Adjustment Advice and Training Grants. This section focuses on the provision of incentives for accessing professional advice and planning; support for training is discussed in a later section.

The PAPG program was assessed in chapter 6 and was found to be generally effective in helping some farmers undertake planning activities. However, the effectiveness of the scheme may have been limited by the requirement for farmers to be in an EC declared area, the need for a farm viability assessment and the tendency for consultant fees to converge to the level of the grant. Furthermore, the appropriateness of the PAPG program was questioned and it was concluded that the rationale for government intervention through professional advice and planning style grants is limited.

Some inquiry participants supported government funding of grants for professional advice and planning activities (Otto Agribusiness, sub. DR189; D. and T. Allen, sub. 20). The NFF recommended funding for a professional advice grant as a key element of its proposed drought policy strategy (box 8.2).

Risk management and business planning advice is generally tailored to a particular farm business. Given the significant level of private benefits involved, the Commission sees little public benefit in providing grants or subsidies for farmers to access professional advice and planning. However, there may be a role for government to provide grants for advice and planning in the context of addressing informational impediments to rural adjustment, particularly where farmers are accessing income support (chapter 9).

Rural Financial Counselling Service

The Rural Financial Counselling Service (RFCS) program provides grants to organisations who provide counselling services to primary producers, fishers and small rural businesses. The program is popular among individuals, producer organisations, governments and shire councils. Tasmanian Women in Agriculture (sub. DR115), AgForce (sub. 80) and the Coonamble Shire Council (sub. 63) were among many inquiry participants who recommended that the RFCS program should continue.

The RFCS was assessed in chapter 6 and was found to meet a need for objective guidance in some communities. However, several possible limitations were identified including: gaps in coverage, a relatively high retention rate of existing clients (although this may reflect instances where a previous client seeks assistance for a new issue some years later) and duplication between the RFCS and other services.

The largely private benefits from financial counselling suggest that the rationale for government provision is weak. However, the RFCS appears to have played a useful role by facilitating a flow of information, acting as a referral point for other services and servicing clients without the ability to pay for their services (Sunraysia RFCS, sub. DR151; South Australian RFCS, trans. p. 222). Depending on the magnitude of these benefits, government funding of the RFCS program could provide net social benefits.

In the draft report it was recommended that the RFCS program be reviewed. However, as the service is currently moving to a new case management approach, participants suggested that any review should wait until existing funding arrangements run out in 2011 (Department of Primary Industries and Water Tasmania, sub. DR179; RFCS Tasmania, sub. DR164; South Australian Rural Financial Counselling Service trans. p. 224). Tasmanian Women in Agriculture supported such an approach on the grounds that:

> This means that the Government will have at least a two year time frame where it can assess the success (or otherwise) of the case management approach and at least one year of any new operational requirements under an enhanced Australia's Farming Future package. (sub. DR115, p. 3)

RECOMMENDATION 8.2

The Rural Financial Counselling Service program should be reviewed prior to the end of its current funding. The review should assess whether the program delivers net benefits to the community and, in doing so, examine:

- ***the extent to which alternative sources of information are lacking in certain areas***
- ***whether counsellors refer their clients to relevant services in a timely and effective manner***
- ***the future role of the service in view of the wide ranging case management options under the Farming Family Income Support scheme.***

8.4 Education and training

A range of institutions and organisations make up the education and training system that services agriculture. This system comprises a formal sector, which includes universities and Technical and Further Education (TAFE), and an informal sector such as some extension services provided by government or private providers and continuous learning programs, such as FarmBis. The education and training system is complex and multifaceted (Synapse Consulting 1998).

There is some evidence that the formal and informal education and training sectors for agriculture have developed largely in isolation and with limited linkages (Kilpatrick and Millar 2006). Marsh and Pannell posit that:

> …the current emphasis on farmer 'education' appears to be occurring with minimal liaison with education institutions and little attention given to the contribution that should be made through TAFE and higher education sectors. (2000, p. 619)

The NFF and the Corish report both identify the need for improvement in the quality and responsiveness of the training market to the needs of the agriculture sector (NFF 2008; Agriculture and Food Policy Reference Group 2006). The Corish report noted the need for 'both formal and informal learning opportunities, for short courses as well as longer training, and for skills development that goes beyond the technical or operational to embrace innovation and adaptability to change' (Agriculture and Food Policy Reference Group 2006, p. 107). It advocated effective consultation between agriculture and training sectors so that a partnership approach is adopted in developing learning activities.

Continuous learning program

Continuous learning programs for agricultural producers are part of the broader training system that services agriculture and should not be developed in isolation of this system. These programs either subsidise, or provide a grant for, farmers to attend professional training.

FarmReady, Farm Help, the Climate Change Adjustment Program (CCAP) Adjustment Advice and Training grants and formerly FarmBis provide financial assistance to primary producers and rural land managers to undertake a range of management training and education activities depending on program focus.

Farm Help and the CCAP Adjustment Advice and Training grants provide training and advice grants in the context of income support (see appendixes B and D). Grants can be accessed through both programs without having to access income support, although income and asset eligibility requirements and mutual responsibilities are applied.

Commencing in 1998, FarmBis provided subsidies for a wide range of training activities. This scheme was abolished prior to the introduction of FarmReady (see appendix D). The mid-term review of FarmBis found that, for the most part, it had improved access to training in rural and regional areas and that it had catalysed significant levels of repeat participation (Price Waterhouse Coopers 2006). FarmBis may also have provided benefits where farmers had inadequate information regarding the training opportunities available to them or the benefits that may result.

The FarmReady program has just commenced. FarmReady has parallels with FarmBis, although with a narrower scope of training courses (box 8.5). While the available reimbursement under FarmReady is greater than the average grant that was provided under FarmBis, the FarmReady allocation of $26.5 million over four years equates to significantly lower average annual funding than that expended on FarmBis programs. This suggests that in its current form, FarmReady will provide training opportunities to a smaller number of farmers than FarmBis.

Box 8.5 **FarmReady**

FarmReady aims to boost training opportunities for primary producers and to enable industry, farming groups and natural resource management groups to develop strategies to adapt and respond to the impacts of climate change.

While similar to FarmBis, FarmReady has a narrower climate change and adaptation focus. The program has two components:

1. Grants for agricultural producers to undertake accredited training. Reimbursement of up to $1500 per year will be available to primary producers. This grant can cover course costs, travel, accommodation and childcare costs incurred in attending the training. Learning areas for FarmReady training have a climate change and/or farm planning focus and funding does not cover courses covering production, technical or operational topics unless there is a link to a whole of farm climate change adaptation strategy
2. Grants of up to $80 000 per financial year for farming or natural resource management groups to undertake projects that will assist in the development of strategies to manage the impacts of climate change.

Source: DAFF (2008i).

Many participants supported government funding for a continuous learning program building on the FarmReady platform and incorporating the successful elements of FarmBis (NFF, sub. DR176; South Australian Farmers' Federation, sub. DR144; Rural Business Development Corporation, trans. p. 166; Northern Territory Department of Regional Development, Primary Industry, Fisheries and Resources, sub. DR142; Australian Pork Limited, sub. DR155). The NFF argued:

> While this program [FarmReady] has been altered by the Australian Government as it moves to a focus on climate adaptability, there is a significant opportunity to review the FarmBis program and expand it into a much wider, broader and more encompassing approach to agricultural education and training. (sub. DR176, p. 24)

However, the Coonamble Shire Council submitted that FarmBis had not been successful in their region and that courses were not reflective of regional diversity (sub. DR133). One participant in the public hearings, while supportive of a continuous learning program, commented on the lack of capacity of the FarmBis model for follow-ups and the importance for benchmarking and evaluation (Productive Nutrition, trans., p. 260).

The rationale for government funding of a continuous learning program for farmers is stronger where training and education lead to changes in farming management practices that provide spillover benefits to the community or where there are barriers to farmers accessing information. Moreover, assistance for accessing training activities may be appropriate in the context of addressing impediments to rural adjustment, especially where farmers are receiving income support. This is discussed further in chapter 9.

Continuous learning programs generally provide a mix of public and private benefits. This makes a case for support to be provided in the form of a partial subsidy with co-contribution rather than a full grant for costs. One hearing participant noted in regards to FarmBis' co-contribution model:

> I think that it was a two-way street and it wasn't just, "Here's a course; you can come to it," that people could actually target things that were specific to them, that it was not just a subsidy or a free course, that they actually also had to contribute to that. So I guess in that case then they're taking more on, responsibility for the learning and the outcomes that they achieve out of those. (Tasmanian Women in Agriculture, trans., p. 46)

A required contribution means that recipients will have a greater stake in the outcomes of education and training activities and will actively ensure that training meets their needs.

The Commission concludes that grants for training, while providing significant private benefits, are consistent with the objective of promoting self-reliance and can also provide public benefits. It is important that continuous learning programs have sound monitoring and evaluation processes.

RECOMMENDATION 8.3

Significant public funding should be directed to a continuous learning program, incorporating the successful elements of the former FarmBis within an enhanced FarmReady platform. The revised program should encompass advice and training for managing climate variability and for farm business management. Funding should be provided in the form of a subsidy which covers a proportion of the cost of training, with the recipient contributing the balance.

8.5 Farm management deposits

Farm Management Deposits (FMDs) were assessed in chapter 6 and found to have encouraged some farmers to save during periods of higher income. While they are used for tax deferral and tax saving purposes, they also offer a means for achieving increased self-reliance.

Should FMDs be retained?

By providing a tax linked instrument that enables cash flow smoothing and liquidity management, FMDs have the potential to promote better and more timely resource allocation decisions. For example, input purchases or capital investments could be made when most appropriate rather than in the year that high income is earned:

> Better farm management decisions are entirely consistent with better risk management decisions. Timely investments make the farm more financially viable and sustainable to cope with downturns due to climate variations or market fluctuations when they occur. (DAFF 2006, p. 4).

There was strong support for FMDs in submissions, with the Victorian Farmers' Federation (sub. DR160), Australian Bankers' Association (sub. 76), Growcom, (sub. 93) and Rural Directions (sub. 35) recommending retention of the scheme. The NSW Farmers' Association submitted that 'FMDs provide a valuable income equalisation scheme that has beneficial financial outcomes in business planning and operations' (sub. 98, p. 4).

The FMD scheme does not appear to address any market inefficiencies and there are no apparent impediments to farmers building up financial reserves. However, on balance, providing primary producers with a risk management tool that could

reduce calls for assistance during rural downturns is consistent with the government's aim of encouraging primary producers to improve their preparedness and become more self-reliant. In addition, the scheme is likely to be a more efficient means of encouraging financial self-reliance than many other measures. Recent changes to the taxation provisions for superannuation are likely to encourage future generations of farmers to establish dedicated superannuation funds bolstering the use of FMDs as a risk management tool rather than as a de facto superannuation fund. Moreover, FMDs may contribute to removing period inequity for primary producers with fluctuating incomes, especially those who do not practise tax averaging. Taking all these factors into account, the Commission considers that the FMD program should be retained.

Should the cap be increased?

Some submissions argued that the FMD cap of $400 000 was too low (Western Australian Farmers' Federation, sub. DR161; Victorian Farmers' Federation, sub. DR160; AgForce, sub. DR185; Growcom, sub. 93).

The average FMD deposit is $70 000, well below the cap (appendix D) and the FMD cap does not limit the amount of reserves a farming business can put aside in other accounts. Rather it limits the extent of the favourable tax treatment. There is a tax expenditure cost to the provision of FMDs which is likely to increase with enhanced use of FMDs and would increase further with any increase in the cap. The Commission considers that there is no argument for increasing the FMD cap.

Should FMDs be more widely available?

FMDs are available to individual primary producers, but not to companies or trusts. There was strong support in submissions for FMDs being made available to all farm business structures, in particular trusts and companies (AgForce, sub. DR185; Pastoralists and Graziers Association Western Australia, sub. DR121; Australia Pork Limited, sub. DR155; Growcom, sub. 93; NSW Farmers' Association, sub. DR182; Australian Bankers' Association, sub. 76).

The 2006 Review of FMDs (DAFF 2006) addressed widening the availability of FMDs to trusts and companies. It concluded that it may be appropriate to extend the use of FMDs to companies, but that further investigation of the feasibility and cost of such a move should occur. The review did not support extension of the scheme to trusts, arguing that this would increase the likelihood of FMDs being used as a tax deferral mechanism for purposes other than risk management (DAFF 2006).

The Commission notes that company profits and undistributed income of trusts are taxed at a fixed rate. (Generally, however, all the income of trusts is distributed to beneficiaries.) Any case that exists on period equity grounds for FMDs as a supplement to income tax averaging for individual primary producers therefore does not exist for companies or trusts. Moreover, trusts provide flexibility in sharing income and the tax burden among beneficiaries, and individual beneficiaries of trusts can deposit the income they receive from a trust in FMDs. However, income received as dividends from companies engaging in primary production cannot be placed in FMDs.

While some business structures may afford increased incentives for preparedness by the provision of FMDs, other business structures may have different advantages or features that relate to improved risk management or other priorities of the business. The business structure under which farms operate is a management choice that should take into consideration the overall comparative advantages and disadvantages of operating as a sole trader, partnership, trust or company. Companies already have some tax advantages, for example lower marginal tax rates, and trusts provide flexibility in income management. Given these existing advantages the Commission considers that there is not a strong case to extend the tax deferral advantages provided by FMDs to trusts and companies.

Given that a relatively small number of farmers indicate that they do not use FMDs due to their business structure (Boero Rodriquez, Watson and Mues 2006), the Commission considers the expansion of FMDs to trusts and companies is unlikely to result in net benefits for the community or improve the effectiveness of the scheme.

In addition to calls to make FMDs available to trusts and companies there were also representations that access to FMDs could be extended to small agriculture dependent businesses (South Australia Farmers' Federation, sub. DR141; South Australian Advisory Board of Agriculture, sub. DR157; Rural Financial Counselling Service New South Wales Central-West, sub. DR178). To the extent that these businesses are organised as companies or trusts, the arguments advanced above against extending FMDs to them apply. It would also raise concerns about inconsistencies in the treatment of businesses in different locations, as businesses that are not agriculture dependent are also subject to significant risk exposures.

RECOMMENDATION 8.4

The Farm Management Deposits scheme should be retained with its current cap of $400 000 and no widening of its eligibility criteria.

8.6 Accelerated depreciation and grants for investing in preparedness

Accelerated depreciation or infrastructure grants can provide incentives for farmers to make certain types of 'approved' investments in preparedness to improve their physical capital base. There was support in submissions for depreciation incentives with the South Australian Farmers' Federation (sub. DR141), AgForce (sub. 80) and NSW Farmers' Association (sub. 98) recommending such an approach. The NFF supported grants for physical preparedness investments and contended that yearly grants would encourage self-sufficiency and improve farmers' ability to manage climate variability (sub. 51).

In the Commission's view, individual farmers (appropriately supported by government funded information and training) are best placed to make their own investment decisions. Furthermore, there is no demonstrable failure of capital markets to provide funding for these sorts of investments. Investments in preparedness would generally yield largely private benefits. Unless investments produce wider community benefits, subsidies or grants for preparedness investments are likely to generate a poor return for the community.

The record of governments picking winning technologies in agriculture is mixed. Where governments are required to arbitrate on what qualifies as appropriate preparedness investments there is a risk that preparedness could be overpromoted or inconsistently promoted (with some types of investments receiving support and others not).

For these reasons, the Commission does not accept that governments should subsidise investments in drought preparedness. Farmers should choose to invest in preparedness and improve their capital base where it is in their interest to do so rather than have the community do this on their behalf. The Commission sees little role for government in this process.

There is not a strong rationale for accelerated depreciation provisions or a case for infrastructure grants to underpin private on-farm preparedness investments.

8.7 Income contingent loans

Income contingent loans (ICLs) are subsidised loans with repayments dependent on the future economic circumstances of the recipient. That is, in periods when the recipient experiences adverse financial outcomes, required loan repayments would be reduced or nil (L. Botterill and B. Chapman, sub. 52).

ICLs were initially introduced in Australia to enable an increase in the contribution that students made to financing their education (currently under the Higher Education Loan Program (HELP)). An ICL was justified on the basis of the difficulty that some students face in securing funding for their education (Chapman 2006). Their appropriateness is more readily apparent for an improvement in human capital through higher education, than for situations where loans are taken out for more tangible investments.

Box 8.6 discusses some of the issues in providing ICLs for farmers and identifies some of the characteristics of a potential approach.

Box 8.6 **Issues in providing ICLs and possible characteristics of an ICL scheme for farmers**

- **Assessment of viability**. To ensure that ICLs are not disproportionately taken up by those who are less likely to repay the loan, L. Botterill and B. Chapman propose that commercial banks could be involved in determining eligibility for the scheme. Finance could be provided as a 'top up' on existing loans delivered through private financial institutions and a real rate of interest (to be determined with reference to long term government bond rates) could be applied.
- **Repayment as a proportion of gross revenue**. Given that decisions on the timing of sales of livestock and crops and on purchases of farm inputs together with decisions on FMDs and the use of various tax provisions can greatly influence farmers' taxable income levels in any given year, L. Botterill and B. Chapman propose that repayment of an ICL be made as a small percentage of gross revenue as reported on Business Activity Statements. Furthermore, given the variation in farm size and revenues, a repayment free threshold would not be included (in contrast to the HELP loan).
- **Sale of the farm**. To protect against recipients avoiding repayment through selling the farm asset (over which the government would have no claim) or changing inheritance or partnership arrangements, L. Botterill and B. Chapman propose that the ICL could be attached to the farm's ABN. Furthermore, farm businesses in receipt of an ICL would be required to report their activities on a single Business Activity Statement.

Source: L. Botterill and B. Chapman (sub. 52).

There was support for an ICL scheme in some submissions, with the New South Wales Government (sub. 90), NSW Farmers' Association (sub. 98), AgForce (sub. 80) and Murray Dairy (sub. 70) recommending such an approach. The NFF supported the use of ICLs for 'primary producers that are looking at growing their business but are not yet in a position where they are able to invest with confidence in preparedness and growth strategies' (sub. 51, p. 15).

However, the South Australian Farmer's Federation raised concerns about ICLs, on the grounds that 'those that really need the assistance would struggle to ever pay it back on top of all their other liabilities' (sub. DR141, p. 3). AgForce submitted that an ICL scheme would need a tight time frame, such that the loan is due and payable after a certain time limit irrespective of whether the farm is generating a profit (sub. DR185).

Is there a market failure rationale for providing ICLs to farmers?

The rationale for government provision of ICLs rests on limitations in credit markets that prevent farmers from obtaining finance. Some participants argued that during periods of hardship, such as drought, income streams can fall to zero or become negative and this impedes the capacity to service any new, let alone existing, loans.

However, the Australian Bankers' Association argued that 'there is no compelling case that there is a failure of rural credit financial markets that warrants government intervention in the provision of financial services to agribusiness' (sub. 76, p. 3). It submitted that customers who are viable in the long term should not have a problem accessing finance in drought conditions. It further contended that in times of drought, carry-on finance may be accessed and existing loans restructured to reduce annual debt repayments or to defer payment without cost.

L. Botterill and B. Chapman submitted that there is market failure on the demand-side of credit markets: 'farmers will borrow less than the finance sector is willing to provide because of their high level of sensitivity to the possible loss of the farm' (sub. DR139, p. 2). They point to the fact that farmers may enjoy non-financial benefits in their occupation and as such the value the farmer places on their farm is higher than the dollar value placed on the property by the finance sector. In addition, they point to the tendency for people to discount upside risk and overestimate downside risk.

The Commission does not support offering concessional finance to a group of borrowers to induce them to borrow at a higher level than their own risk preferences would allow. A greater sensitivity to a loss of the farm due to the high non-monetary value placed on farming is rational and does not provide an efficiency case for measures to encourage farmers to take on more debt. Accordingly, the Commission is of the view that an ICL scheme would run the risk of over-incentivising borrowings.

The use of ICLs for investments in preparedness

ICLs could be used to provide farmers with finance to invest in preparedness, so as to encourage self-reliant approaches to managing risks. Such an approach would require some sort of assessment to ensure that potential recipients had businesses that were viable in the long term and that the investment was an appropriate way to improve that particular business' preparedness for adverse outcomes.

However, as discussed previously, the Commission does not see a role for government in providing incentives for investment in physical preparedness, nor in assessing the appropriateness of different investment options. Inevitably, there would be costs involved in determining the viability of businesses (about which there is always some uncertainty) and approving different types of investments. The Commission considers that such a policy would essentially be an administratively complex and costly way of enhancing preparedness and would likely mean 'picking winners'.

ICLs as a drought relief measure

An ICL program specifically for farmers has most commonly been advocated as a drought relief measure. Thus, where farmers are experiencing low revenue due to drought (or other reasons) they could access finance to assist them through a difficult period without the concern that they may lose the farm if income does not improve in the short term. ICLs provided as drought relief would still require the government to determine whether a business was viable, although there would be no need to assess what the loan was to be used for.

As a drought relief measure, ICLs have been presented as an alternative to the current interest rate subsidy (L. Botterill and B. Chapman, sub. 52 and sub. DR139). Compared to the interest rate subsidy, an ICL scheme would be more likely to encourage self-reliance through the imposition of the responsibility to re-pay the loan (if and when cash flow recovers). It is also argued that an ICL would also be less likely to encourage farmers to take on more risk, and it could be less costly for taxpayers (L. Botterill and B. Chapman, sub. 52).

However, the Commission does not believe that an ICL scheme for drought relief is justified. In comparison to tertiary students, drought-affected farmers with sound prospects of longer-term viability appear to be reasonably catered for by the commercial financial system.

Furthermore, the Commission has concerns that an ICL scheme could encourage farmers to take on more risk. As discussed previously, where there is no efficiency

case for an ICL program, such an approach could encourage farmers to increase their debt levels. Where banks are responsible for undertaking viability assessments of farm businesses, there is a risk that they may consider more marginal farmers, who they would otherwise not provide finance, to be eligible for an ICL as the farm asset is protected from default.

Does support for FMDs imply support for ICLs?

An ICL scheme has been presented as an 'opposing half' to FMDs (NFF, sub. DR176, p. 73). In their response to the draft report, L. Botterill and B. Chapman noted that where 'the Commission accepts the rationale for the provision of FMDs as a risk management tool even though they "do not appear to address any market inefficiencies" it should logically see the case for ICLs on the same grounds' (sub. DR139, p. 2).

However, an ICL is more than a 'mirror image' to FMDs. The Commission considers that ICLs would be a less effective risk management tool than FMDs, as FMDs increase savings in high income years, do not require governments to make assessments of business viability, and do not have high administrative costs that extend into the future.

Most proponents of an ICL program for farmers recognise that the case rests on a 'second best' perspective. That is, notwithstanding the absence of a clear rationale, if business support is to be given anyway, an ICL scheme would have some desirable features relative to the existing interest rate subsidy. This second best perspective is only relevant to the extent that the (consistent) recommendations of past reviews of drought policy to terminate the interest rate subsidy have been ignored. The Commission does not support the provision of ICLs to farmers.

8.8 Assistance to develop insurance markets

Apart from insurance for fire and hail damage, there are limited options for agricultural producers to insure themselves against production risk in Australia. The literature describes some potential insurance arrangements (see box 8.7), but real world insurance markets for drought in Australia and elsewhere are scarce.

From a policy perspective, an inability to insure against production risk from drought means that farmers lack a major risk management tool. Several participants (NFF, sub. 51; NSW Farmers' Association, sub. 98; AgForce, sub. 80) contended that missing insurance markets provide a powerful rationale for governments to make available a range of policies that assist farmers to become self-reliant in other ways.

Box 8.7 **Types of insurance**

Multi peril crop insurance (MPCI): insures farmers against multiple risks including drought, flood and disease. As the extent of loss is established after the crop is harvested it can be difficult to determine the cause. MPCI involves problems of systematic risk, asymmetric information and moral hazard. Studies in Australia concluded that MPCI would not be commercially viable without significant government assistance (Industries Assistance Commission 1986; MPCI Taskforce 2003; Ernst and Young 2000).

Rainfall insurance: avoids problems of asymmetric information and moral hazard through tying indemnities to a measurable and verifiable event, in this case rainfall. Consequently, it can be offered at lower premiums. However, for farmers to purchase rainfall insurance, rainfall would need to be closely correlated with incomes or yields, otherwise it would not sufficiently indemnify farmers against income losses.

Yield index insurance: attempts to more closely correlate indemnities with variations in income due to rainfall, through a non linear model of yields as a function of rainfall. However, this product does not fully insure farmers against income losses. Yield losses may also be a result of heat and cold, not just rainfall; and yield may be more sensitive to the timing of rainfall not just the total rainfall for the growing season (Hertzler 2005). The complexity of yield insurance is a deterrent to its widespread use in Australia.

Weather derivatives: involve payouts derived from an observed event, such as district rainfall, temperature or the southern oscillation index. The difference between what the derivative is derived from (for example rainfall recorded at a specific station) and a farmer's own set of conditions (yield as a result of rainfall and other environmental conditions on-farm) is indicative of how well the derivative will insure the farmer. Derivatives need to be fairly generic if they are to be readily tradable, and are generally sold at high values. As a result they may not be flexible enough or sufficiently aligned with the farmer's circumstances to be attractive.

There do not appear to be any significant examples of fully commercial MPCI, rainfall or yield index insurance schemes anywhere in the world (MPCI Taskforce 2003; Hertzler 2005).

The major reasons for why the private sector does not provide drought insurance include:

- many farmers can be simultaneously affected by a drought which provides limited opportunities for insurers to spread risk among a large group of clients (systemic risk)
- insurers and farmers do not have the same information, which can lead to a situation where those farmers who face greater risks purchase insurance, as they expect to receive more than they pay in premiums (farmers with lower risks do not purchase insurance as they expect to receive less than they pay in premiums)

— insurers will raise premiums to cover their costs and an increasingly risky pool of farmers will purchase insurance (adverse selection)

- once farmers purchase insurance they can alter their behaviour and make riskier decisions than they would otherwise, making it hard for insurers to determine the reason for loss (moral hazard).

In addition, government drought policy may impede the development of a private market for insurance. If farmers believe that the government will provide assistance during drought — and they would have every reason to do so given historical experience — the incentive to purchase private insurance is reduced. The Queensland Government suggested:

> … while certainly not the only reason, the fact that the government is prepared to take on an element of the climate risk by providing drought assistance measures may crowd out this potential [insurance] market. (sub. 77, p. 8)

The Western Australian Task Force into multi peril crop insurance similarly posited that the expectation of on-going assistance may partially explain why there is no privately offered multi peril crop insurance schemes in Australia (MPCI Taskforce 2003).

There was support in several submissions (Queensland Farmers' Federation, sub. 82; NSW Farmers' Association, sub. 98) for governments to subsidise or provide reinsurance for schemes which insure production income.

The Western Australian Farmers' Federation advocated 'a nation-wide approach, implemented at a federal level covering as broad a spectrum of crops and varieties as possible to reduce rates' (sub. DR161, p. 5). They submitted that government could underwrite the scheme 'until such time as a premium bank is created which removes the need for substantial government investment' (sub. DR161, p. 5).

In the absence of insurance markets, farmers may alter their production decisions in order to diversify and limit the possible impacts of future droughts. For example, where a farmer diversifies production to decrease their risk exposure, farm income may be decreased relative to the previous situation where cropping was specialised for maximum expected yield (MPCI Taskforce 2003). This can result in resources not being used in the most efficient way. This could be addressed by governments providing insurance to farmers. However, such a move would only result in net benefits to the community if governments were able to overcome the same difficulties that prevent private insurance markets from developing.

Governments may not be able to offer drought insurance at a lower cost than private firms (Newbery and Stiglitz 1981; Ha et al. 2007). In providing subsidised insurance, governments would be exposed to the same risks as the private sector, and would be less able to offset systemic risk if they only deal with farmers within their borders.

Historically, loss ratios for government provided insurance have been very high and the Commission is not aware of any international examples of a scheme where the government has reduced their financial involvement after an initial period of support. In the United States, where crop insurance has been subsidised by government since 1983, the indemnities paid by the public insurer plus administration costs are three times the premiums paid by farmers (loss ratio of 3). This is also the case in Canada where government subsidised crop insurance has been available in all provinces for the last twenty years. Brazil and Japan have even higher loss ratios of up to 4.5 (Hertzler 2005).

Governments, like private insurance providers, would also face issues of moral hazard. The Federal Crop Insurance Corporation scheme in the United States has been plagued by such problems — many have argued that the scheme has led to farmers in the United States taking on more risk (Skees 1999; Glauber 2004; Young et al. 2001).

The Queensland Farmers' Federation identified weather derivatives and index-based yield contracts (box 8.3) as an area where public research may yield 'considerable long term benefits for primary producers and the wider community' (sub. 82, p. 12). Research into insurance and derivatives has been undertaken in the past and, where appropriate, could continue to be supported through research and development efforts on managing climate variability in agriculture. This is relevant to section 8.2.

The Commission considers that it is likely that markets will develop for risk sharing products like yield index insurance and weather derivatives in the future with technical progresses in global information gathering and processing, improved understanding of climate and weather and greater integration of global capital markets (Malcolm 2006). For example, the Grain Co-production model offered by Australian Agricultural Contracts Limited has grown strongly since its inception (see box 8.8) and similar arrangements are evolving elsewhere in Australia.

Box 8.8 **Australian Agricultural Contracts Limited grain co-production**

Australian Agricultural Contracts Limited (AACL) was founded in Western Australia in 1997 and has offered a Grain Co-Production product since 1999. This product shares agricultural production risk between farmers and investors.

Essentially, funds of investors (usually urban) are placed with farmers. The advanced capital is unsecured. In some cases, up to $4 million is provided to a farmer to plant, manage, harvest and deliver a crop. The analogy with bank finance would be that AACL advances the funds, the farmer pays off the capital with grain proceeds and the 'interest cost' is the investor return. After that, the farmer retains any remaining upside. If the crop fails, however, the farmer pays back nothing as investors 'wear' the risk . As the AACL Managing Director explained:

> … our model … is … an insurance policy. It's not supposed to be something that is going to make the farmer extra money … It's not a profit-making instrument; it's a hedge instrument.
>
> … it costs the farmer a little bit more in an average or above average year. In a bad year, he's got a little bit of downside but he hasn't got all the downside; the investor wears that. But we have an investor pool. The pool hopefully absorbs those individual losses, because hopefully we've been good enough to spread our pool across a big enough area …
>
> I've heard the NFF … talk about: 'We need a system that the farmer puts a little bit away each year so that he's got a pool withdraw fund in drought.' This is exactly what this model is doing. He's giving up a little bit in a good season; in a poor season, he's spread that risk to a pool of people spread across potentially the whole country —- we're now into barley and canola, as well, and it's with parties who aren't in a poor agricultural season. (trans. pp. 185)

In 2008 AACL extended their coverage and offered Grain Co-Production to some farmers in New South Wales, Victoria and South Australia and also offered a barley contract for the first time. From very modest beginnings, the total investment by AACL in 2008 was $65 million — contracting approximately 170 farmer clients to grow around 380 000 tonnes of wheat and barley.

Source: AACL (sub. DR117).

The Commission does not consider that the higher cost of feasible self-insurance compared with hypothetical efficient market insurance provides a rationale for government to share producers' risks. Furthermore, it is unlikely that governments can overcome the problems with information and incentives, faced by the private sector, in providing insurance products without creating adverse outcomes such as encouraging farmers to take on more risk.

It is the Commission's view that government subsidised insurance schemes, broad ranging drought assistance measures and ad hoc drought assistance will impede the development of more efficient private sector arrangements for sharing production risk in agriculture.

9 Farming family income support and adjustment

Key Points

- All farm households in hardship should have access to income support irrespective of whether this hardship is a result of drought.
  - Farmers often face difficulty accessing the social security system due to the level of their farm assets and the requirements of working on the farm.
- There is a case for a targeted income support scheme for farm households that:
  - is equitable
  - recognises issues of farm viability
  - avoids welfare dependence by limiting the duration of support
  - is provided in conjunction with training, professional financial advice and counselling to assist farmers to improve their viability or to evaluate their options outside of farming.

9.1 Introduction

Throughout the inquiry there was broad endorsement for income support to be provided to all farming families experiencing hardship. In contrast, the Exceptional Circumstances Relief Payments (ECRP) scheme does not assist farmers experiencing hardship if they reside outside of drought declared areas. This is just one of many reasons leading the Commission to propose that the scheme be replaced (chapter 6).

In addition to ECRP, there is another farmer specific income support program — the Transitional Income Support Scheme (TIS) — which provides case managed income support to all eligible farmers experiencing hardship and simultaneously aims to encourage farmers to improve their viability or to leave farming. TIS funding is scheduled to conclude in June 2009 (chapter 6).

These developments raise questions about farm households' access to alternative forms of income support, particularly as the characteristics of farmers (especially their assets) can render them ineligible for general safety net measures.

Farming in Australia has been subject to significant and on-going changes (chapter 2). Where this change is impeded through inappropriate government policy settings, assets and human capital can be locked into under-performing activities with adverse implications for the wellbeing of farming families, as well as for the agricultural sector. Economy-wide performance and the quality of environmental management can also suffer.

It is important, therefore, that any income support provided to farm households does not impede farm adjustment or undermine self-reliance (O'Meagher 2005; Cockfield and Botterill 2006). The Corish review concluded that 'propping up otherwise unviable farmers can make their eventual departure financially and personally more painful. It can also frustrate the growth of other farm businesses that are viable' (Agriculture and Food Policy Reference Group 2006, p. 181). Support needs to be targeted and short-term, so that farmers can 're-establish viable enterprises, obtain off-farm income or leave farming' (McColl et al. 1997, p. 114).

This chapter explores the links between income support and adjustment and assesses whether these objectives are compatible. It examines the need for a special income support program for farming circumstances. It proposes an integrated approach to income support and adjustment that seeks to avoid bringing them into conflict.

9.2 Financial hardship and farming families

There are some differences between the income of farmers and of all Australian households on an equivalised basis (figure 9.1). In 2006, the median equivalised gross income for farm households ($605 per week) was $44 lower than that for all households ($649 per week). Differences are most apparent at the lower and mid-point of the income scale, with a larger proportion of farming families experiencing negative incomes and incomes between $400 and $999 per week. A similar proportion (three to four per cent) of farm households and all households experienced high income levels of $1600 or more.

The broad similarities in the incomes of farm, and non-farm, households are not mirrored in perceptions of hardship. Analysis by the Australian Institute of Family Studies (sub. 92) shows that a larger proportion of farmers reported experiencing financial hardship in any given year than did farm workers and individuals living in rural and regional Australia who were not employed in agriculture (see box 3.2 and table 3.1).

Another study submitted to the Expert Social Panel — using the Household, Income and Labour Dynamics in Australia Survey — compared people living in rural and urban areas. It found that people living in urban areas were more likely to report instances of financial hardship than those in rural areas (figure 9.2) (Hogan et al. 2008).

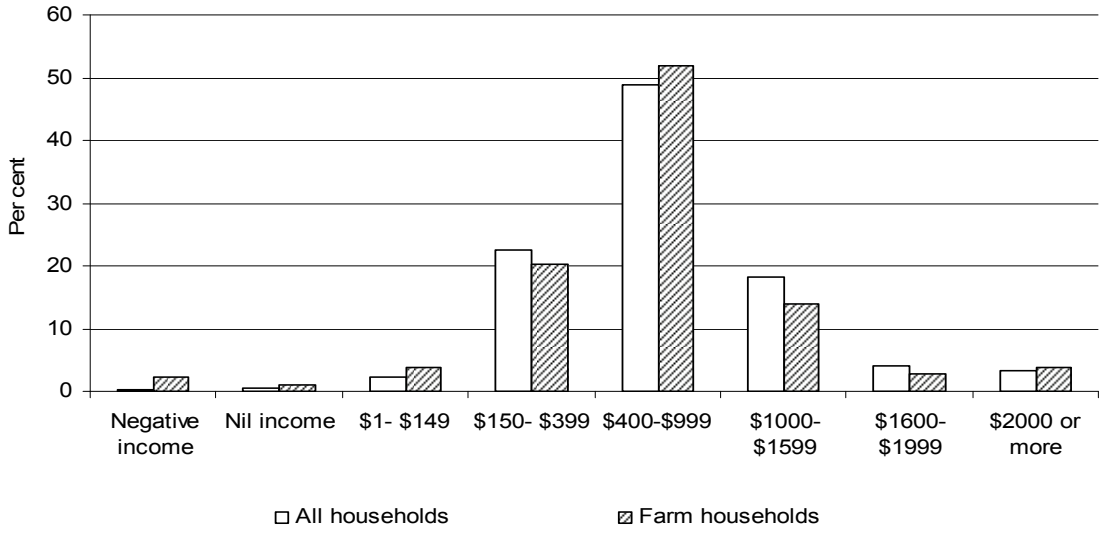
Although there is no clear evidence of significant income discrepancies or levels of financial hardship being faced by farmers in drought, there is ample evidence of its effects on farm incomes. As shown in figures 2.9 and 2.10, each of the major droughts that occurred in the past 25 years has been associated with a reduction in the cash incomes of broadacre and dairy farms.

Variability of farm household income

Farm households are often closely integrated with the farm business, leading to high degrees of income variability. This variability, and the need to balance capital accumulation against consumption, leads to circumstances where many farming families are 'asset rich and income-poor' (Botterill 2002, p. 2). Given the variability of income, simply looking at periodic farm household income will not necessarily indicate the welfare of the family.

Increasingly farm households are obtaining off-farm income to stabilise income flows. As discussed in chapter 2, the (real) level of off-farm income obtained by broadacre and dairy farm households has increased (figures 2.14 and 2.15). The level of wage and salary income received by broadacre farm households, on average, has increased significantly since the late 1970s, as have total government sourced payments.

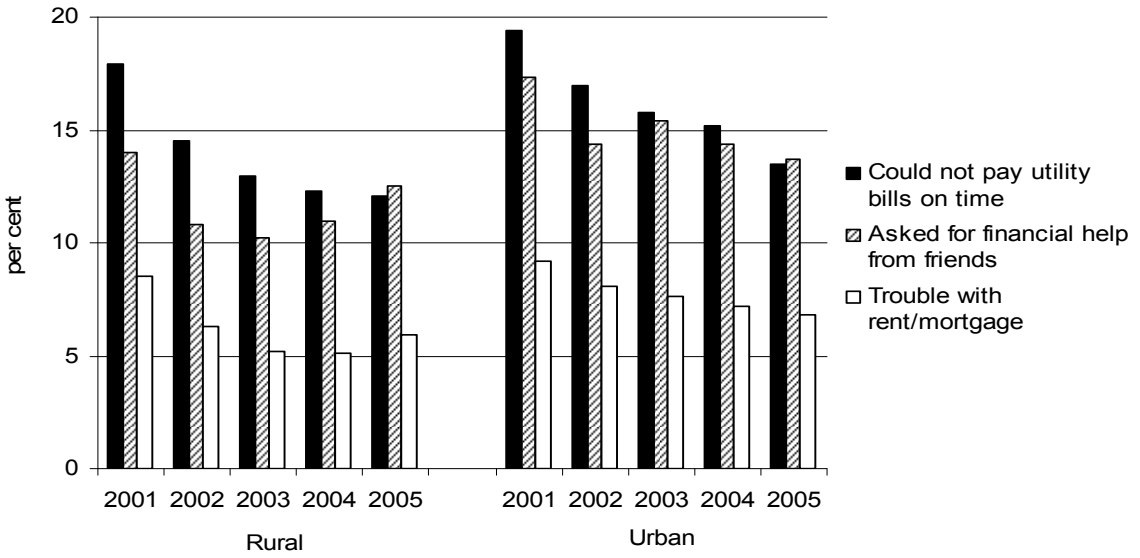
Figure 9.1 Average weekly equivalised income[a] of farm households and all households, 2006



[a] Equivalised income is calculated by adjusting household income by an 'equivalising factor' based on the number of adults and children in the household (ABS 2008c). Weekly income is determined by asking respondents to state their usual gross weekly income, which is the income before tax, superannuation, health insurance, or other deductions are made. Family income is calculated by summing the individual incomes reported by all family members aged 15 years and over and includes income earned both on and off-farm.

Data source: ABS (*Agriculture in Focus: Farming Families, Australia, 2006*, Cat. no. 7104.0.55.001).

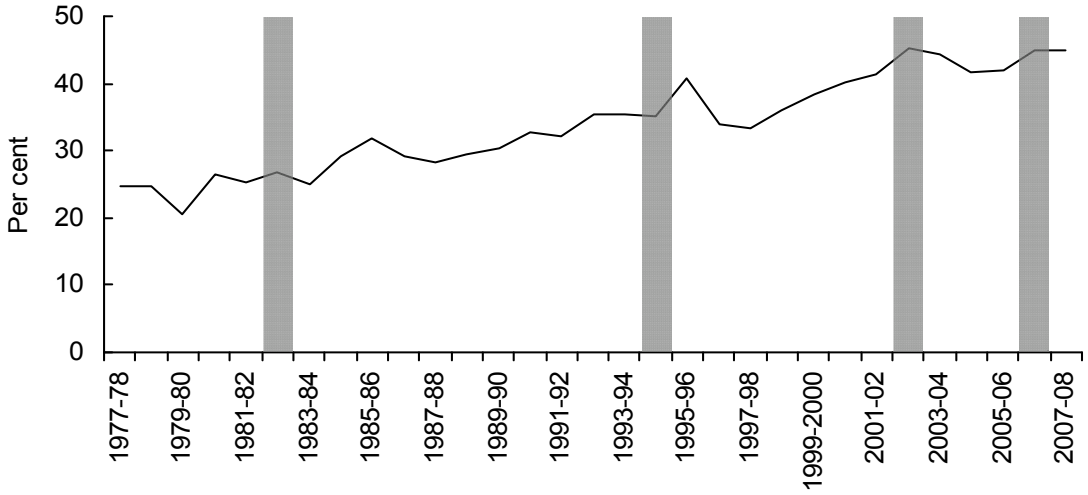
Figure 9.2 Financial stressors, 2001–2005



Source: Hogan et al. (2008).

In addition, the proportion of farm households[1] with off-farm wages has increased (figure 9.3). In 1977-78, the share of broadacre farm households receiving off-farm wages was just 25 per cent, but by 2005-06, this had risen to 42 per cent. The experience of dairy farm households has been slightly different, as there does not appear to be a clear trend in the proportion of dairy farmers in receipt of off-farm wages.

Figure 9.3 **Broadacre farm households with off-farm wages, 1977-78 to 2007-08**



Data source: ABARE (unpublished data).

Does cash income understate the welfare of a farm household?

One complicating factor in determining whether a farm household is experiencing hardship is that cash incomes can understate the welfare of a farming family as income does not encapsulate the value of non-cash benefits of living on a farm (Musgrave 1990). These non-monetary benefits refer to people's preferences for living on the land and also to unmeasured monetary benefits.

Vincent et al. (1975) presented a sample of farmers with a range of incomes in different rural or metropolitan locations and found that farmers were willing to accept little more than half of what they would receive in the city, to stay on the farm. This was increasingly the case the higher the farm income. However, many people who live in cities also value this lifestyle and have access to a range of services that are not readily available to rural communities (Musgrave 1990). As

[1] Collected from ABARE surveys and referring to the farm operator-manager's household. That is, the off-farm income of the principal operator and their spouse.

such, the non-monetary benefits of living on the farm are balanced against such factors as higher transport costs and lower levels of services and facilities.

9.3 An income support scheme for farming families

The social security system aims to provide a safety net for all Australians through income support payments to individuals and families who are without the means of self provision (box 9.1). As income is, in itself, an insufficient indicator of need for assistance, asset tests are also applied. This recognises that those with substantial assets, other than their family home, should apply those assets to support themselves before calling on the community for assistance (Senate Rural and Regional Affairs and Transport and References Committee 1995).

It is not the intention of the social security system to provide a guaranteed minimum income for all Australians in the occupation of their choice. Further, 'people who have a significant level of assets which could be used for financial support, and self-employed people whose businesses are running at a loss, cannot expect to receive assistance from Social Security' (Special Rural Taskforce 1997, p. 4).

Box 9.1 **Social security system**

Five key principles underpin the design of the social security system:

- It supports a basic acceptable standard of living, accounting for prevailing community standards. Payments are not related to past earnings and do not compensate for pain, suffering or loss of amenity.
- It is equitable. It treats people in similar circumstances similarly. Those with additional costs are given greater assistance either through transfer payments or services to help them achieve a similar living standard. In some circumstances, these additional costs are recognised across a range of income levels.
- It targets payments to those not able to fully support themselves. Those with their own resources and therefore the capacity to support themselves do not have the same need for transfers. Income and asset tests are used to reduce payments for people with private resources.
- It promotes participation and self-provision through a combination of:
  - services and assistance to help people deal with disadvantage (including disability, caring, improving skills and seeking work)
  - incentives to work to provide for current needs and for retirement — for example, through contributions to superannuation
  - obligations to work and to seek suitable work for those who are expected to, and the use of private savings to support themselves for those with savings.
- It is sustainable. The broad community accepts that those who receive social security payments are in genuine need and that the overall system is affordable across the economic cycle and in the long run, given the ageing of the population.

Source: Harmer (2008, pp. 4–5).

Impediments to farmers accessing the social security system

Farm households may face difficulties accessing government income support. The NSW Farmers' Association argued that the social security system does not adequately cater for self-employed persons such as farmers (sub. 98). Two key barriers to farmers accessing support are the asset tests applied to most Centrelink programs and the activity test used for the Newstart unemployment benefit.

Asset tests

A key concern of participants was that where eligibility for income support is contingent on a farm household meeting a specific asset limit this would force farmers to significantly run down their equity before they receive any assistance — potentially selling their 'superannuation' or endangering the long-term viability of

their farm (NFF, sub. DR176; RFCS Tasmania, sub. DR164). The NSW Farmers' Association submitted that setting too low an asset threshold for income support could result in farmers taking 'much longer to recover from drought or even make the farms non-viable' (sub. 98, p. 24).

Furthermore, many submissions pointed to perceived inequities between farmers and non-farmers in relation to the asset requirements for pensions and allowances administered through Centrelink. In particular, the exemption of the family home from asset tests was highlighted — 'people who live in big expensive houses don't have to sell them to get help so why should we have to [sell] our properties. Off-farm assets should be included but the farm properties should be exempted from assets test' (H. Clark, sub. 78, p. 10).

To address certain circumstances where people may be income poor but asset rich, the Commonwealth has introduced Hardship Provisions. These enable those with assets in excess of the eligibility limits for a Centrelink pension, benefit or allowance, but are otherwise experiencing hardship, to access income support. The provisions apply where people cannot sell, or borrow against, their assets or are trying to sell their assets at a realistic market price and are unable to qualify for other Commonwealth Government assistance (Department of Families, Housing, Community Services and Indigenous Affairs 2009, section 11.(12)).

Hardship Provisions differ depending on the type of assistance sought. In the case of the Age Pension, applicants are not required to put their assets on the market to access the pension through Hardship Provisions. Rather the test is whether it 'could not reasonably be expected' that the individual rearrange their financial affairs and sell their property (Department of Families, Housing, Community Services and Indigenous Affairs 2009, s.4.6.7.10). In the case of Newstart, the Special Rural Task Force recommended changes to lessen the requirement for farmers to sell their assets under Hardship Provisions (Special Rural Taskforce 1997). This recommendation was not adopted by the government. The Commission agrees with the government's approach, as the theoretical possibility of converting assets into income 'must be distinguished from the practical desires of people to do so' (Vincent et al. 1975, p. 83).

The Commission considers that the provisions for the Age Pension, to a certain extent, adequately address the specific circumstances of farmers. However, this is not necessarily the case for Newstart Allowance, where those farmers able to meet the Newstart asset tests are likely to have run down their equity to irrecoverable levels.

Activity test

Another impediment to farmers accessing Newstart Allowance is the activity test — that is, the requirement to actively look for work or undertake other approved activities (such as voluntary work or training). The Special Rural Taskforce (1997) recommended that alternative criteria be developed for the Newstart activity test so as to reflect rural and farming situations for those farmers who fulfil the assets and income requirements for Newstart Allowance.

According to Centrelink 'mutual obligation is about helping you find and take part in an activity that will improve your job prospects and contact with your community' (Centrelink 2008d). The Commission agrees with this and considers that mutual responsibility should ideally involve actions which improve recipients' circumstances in the future. For an unemployed person, for example, undertaking training or gaining work experience through a volunteer program could achieve this. For a farmer, who is not unemployed, mutual responsibility could be better focussed at flexible training arrangements, risk management or business planning to either increase the capacity of the farm household to earn off-farm income or to improve production and on-farm management practices. To this end, the Commission does not consider that the Newstart activity test affords sufficient flexibility to ensure that there are mutual responsibility activities that would improve farmers' circumstances in the future.

Alternative activities for farmers might include, for example, participation in Landcare or other natural resources management activities in the community. However, the diversity of daily labour requirements of agricultural producers, such as between dairy, horticulture and cereal cropping for instance, makes it difficult to introduce a standard set of activity requirements for farmers. Furthermore, for some farmers, on-farm labour requirements may rise during drought periods — for example, with more handfeeding of stock. While Centrelink advised that activity testing can be applied flexibly to applicants in rural and remote areas under current guidelines (Centrelink, pers. comm., 2008) alternative criteria for rural and farming situations have not been developed.

What about rural and farm dependent small businesses?

Rural and farm dependent small business operators may also have significant assets which prevent them from accessing income support. But, whereas farm assets are generally lumpy and non divisible and can be site specific, this is not always the case for rural and farm dependent businesses. Furthermore, such businesses are generally located in towns and consequently have greater access to casual or

part-time employment opportunities and would be better able to meet the activity requirements of Newstart.

Rural and farm dependent businesses do not generally face the same difficulties in diversifying income sources as farm businesses and are more able to make adjustments to their business model (such as broadening the range of services or products that they provide). For example, agricultural contractors (such as harvesters) are also more mobile and can seek work in other locales.

Many factors can have significant negative impacts on the family income levels of small business operators. Myriad small businesses risk their capital and, in some cases, fail. Little or no government support is provided in these situations. An extension of favourable conditions to particular businesses would raise concerns about inconsistencies in the treatment of businesses of different types and in different locations.

Concluding comments on farmers' access to income support

Overall, the Commission concurs with the conclusions of the 1990 Drought Policy Review Task Force that, 'the possible extension of the unemployment benefit system to cover the specific needs of primary producers and their families during periods of adversity, while they still remain in farming, would seem inappropriate' (McInnes et al. 1990, vol. 3, p. 68).

The Commission considers, therefore, that a special income support program tailored to farming circumstances is required, but that extension of any such program to farm dependent or rural businesses is not appropriate.

9.4 The Commission's proposal for an income support scheme for farming families

The Commission considers that an income support scheme designed for farming circumstances should be consistent with the principles in box 9.1 and aim to achieve a balance between the four following objectives:

- equity — by enabling all farming families in hardship to access income support, not just those within administratively-determined drought boundaries
- recognition of farm viability — by setting the asset threshold at a higher level than Newstart

- avoidance of welfare dependence — by limiting the duration of income support and assisting farmers to undertake farm planning or training suited to earning off-farm income
- helping recipients determine their future in farming — by providing support for viability assessments, counselling and succession planning.

To meet the first objective, income support should be available to all farm households experiencing hardship, irrespective of the cause of this hardship. Such an approach received strong support (NFF, sub. 51; NSW Farmers' Association, sub. 98; New South Wales Government, sub. 90; Queensland Government, sub. 77).

However, any assistance should be consistent with the broader social security system — 'sector-specific income support should not set up any *major* inequities and/or adverse incentives in the way that it interacts with the general social security system' (Industry Commission 1996, p. 37, emphasis added).

The Commission proposes that assistance should be based on the same payment levels and income tests as Newstart with modifications to asset tests and activity requirements to appropriately address farmers' needs. And, to prevent income support impeding adjustment in agriculture, there would be mutual responsibility and case management. Support should also be time limited. The Commission proposes that these objectives be met through a new Farming Family Income Support scheme which would be administered by Centrelink and provided under the Social Security Act (1991).

Farmer eligibility

Support should be conditional on applicants demonstrating that they are farmers (based on similar tests to those that apply for TIS — see appendix B). While the scheme should operate at the farm household level, eligibility and payments should be on an individual basis (unlike ECRP and TIS where successful applicants receive payments for themselves and their partner) and where a couple applies they must each satisfy this test. In line with Newstart (and other Centrelink payments) where an unemployed person's spouse does not automatically receive payments, a farmer's spouse should not automatically be eligible for assistance through the Farming Family Income Support scheme.

Viability testing

While it should be compulsory for all income support applicants to seek advice regarding the financial situation of their business, support should not be conditional

on the farm business being assessed as viable. Accurately identifying viable and non-viable farm businesses can be difficult even in good times. Furthermore, there will be a range of farm incomes that a farm household is prepared to accept, reflecting trade-offs with non financial costs and benefits of farming. Concerns about the potential for government support to sustain farmers in non-viable activities can be addressed more effectively through mutual responsibility, case management and a time limit on assistance.

Income

ECRP and TIS use the Newstart income payment levels and eligibility thresholds. However, the ECRP program allows an additional $20 000 to be earned in off-farm income through wages and salary. This means farming couples on ECRP can earn more (over $400 per week) and still receive the full payment of ECRP relative to a couple both on Newstart.

Currently, where a Newstart Allowance recipient earns more than $62 per fortnight, or their spouse earns over $769 per fortnight, income support is reduced. Box 9.2 provides further information regarding this income eligibility rule.

Some participants disagreed with importing Newstart's income requirements into a farming family income support program. They argued that strict income tests deter farming families from earning off-farm income (Tasmania Farmers and Graziers Association, sub. 69; Rural Youth Organisation of Tasmania, sub. 88). The National Farmers' Federation (NFF) submitted that 'imposing barriers to farmers earning off-farm income to assist with the survival of the farm business … is counter-productive' (sub. DR176, p. 77).

The alternative view is that 'welfare is provided by government as a safety net measure to ensure that families do not fall below community-acceptable standards of hardship. It is not intended to provide a reward structure for good management'. (Botterill and Chapman, sub. 52, p. 3).

An income support safety net is targeted primarily at assisting families in hardship, rather than aiming directly to enhance farmers' self-reliance. That said, given the links between viability, income support, welfare dependence and farm adjustment, any income support scheme should not pose barriers to earning off-farm income.

The Commission does not consider that Newstart income eligibility necessarily creates a disincentive to earning off-farm income. As shown in box 9.2 and figure 9.4 (below) for example, the taper rate does not result in effective marginal rates so punitive that income in excess of $62 per fortnight is deterred for an individual.

Therefore, the Commission sees no case to depart from the income payments and eligibility thresholds for Newstart Allowance.

Assets

Generally, eligibility requirements for social security payments require that, where an individual has significant assets, they liquidate or borrow against these assets to support themselves rather than call on the community for assistance.

Farm household specific income support programs generally have higher asset thresholds than programs offered to the general community. For example, the asset test for ECRP does not include the value of farm land or farm assets, but has restrictions on off-farm assets. TIS imposes a total net asset cap (including the farm, family home and farm assets) of $1.5 million and separate off-farm asset and liquid asset sub-caps. In comparison, Newstart applies a total asset test of $243 500, excluding the family home, for applicants who have a partner.

Many farmers and industry groups criticised these thresholds for being too restrictive and for discouraging diversification. There are, however, a range of options for converting assets to income that do not require their sale. One option is to convert equity in assets to debt or generate an income stream, for example through borrowing, leasing the farm or renting out off-farm property.

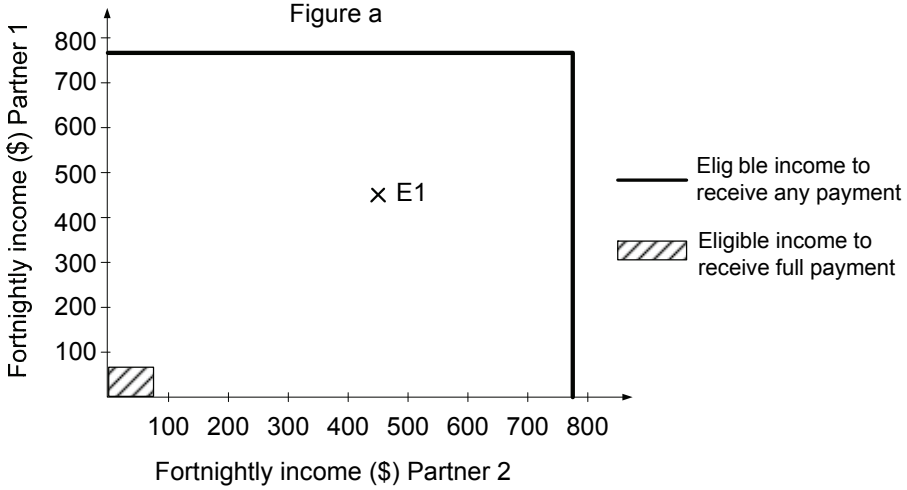
A balance must be struck between targeting those most in need and ensuring that farmers are not required to run their equity down to irrecoverable levels. Accordingly, the Commission proposes that the asset cap should be set at a level higher than for Newstart in accordance with its second objective for an income support scheme — to recognise the issue of farm viability — while not being too high.

Box 9.2 **Income eligibility rule for the proposed scheme**

The following figures demonstrate the different combinations of income that can be earned for a range of recipient and spouse incomes under the proposed scheme.

Figure a shows a scenario where both members of a couple receive income support. Any combination of income earned within the lined box would mean both members of the couple are eligible for payment under the scheme. Any combination of incomes within the shaded box would mean both members of the couple were eligible for full payment under the scheme.

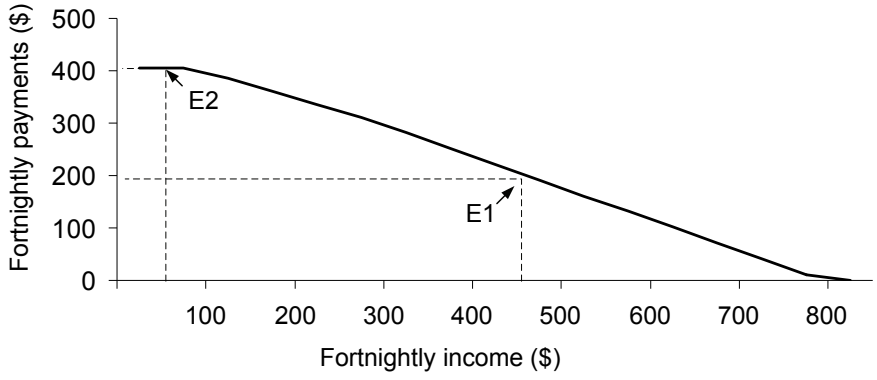
Figure a



Example 1: Bill (partner 1) and Sarah (partner 2) usually both derive a significant proportion of their income from their farm. It is a drought year and their combined farm income is $10 500 ($400 on a fortnightly basis). They have off-farm investments which provide $500 in deemed income per fortnight. They are both eligible for partial payment under the scheme (E1 on figure a) and would receive $191 a fortnight each (see figure b).

Figure b shows how payments are determined given recipient's income[a].

Figure b



(Continued next page)

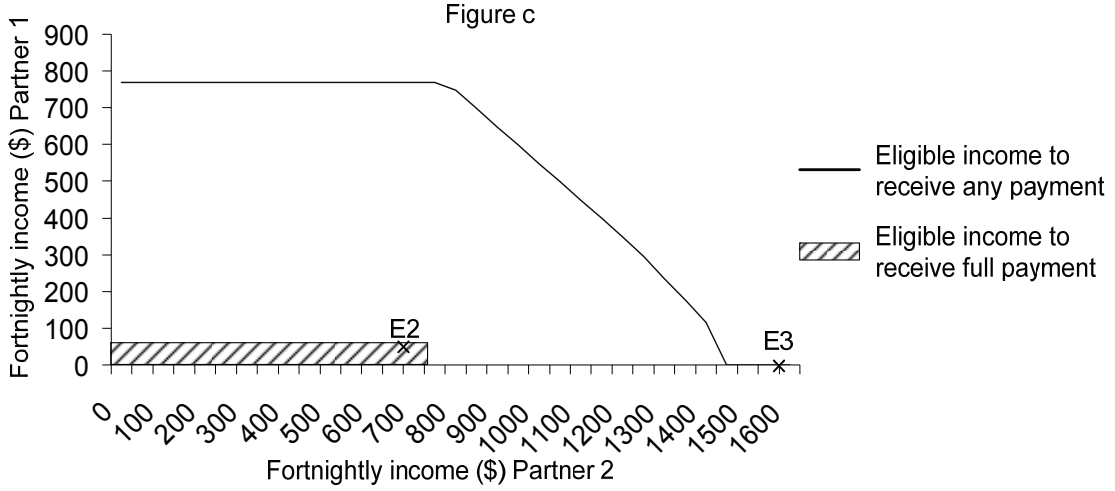
Box 9.2 **(continued)**

Figure c shows a scenario where one member of a couple is receiving income support (partner 1) and the other member is working (and not receiving income support) (partner 2). Any combination of income earned below the line would mean partner 1 would be eligible for payment under the scheme. Any combination of incomes within the shaded box would mean partner 1 would be eligible for full payment under the scheme.

Example 2: Todd (partner 1) works on the farm and has made a loss of $20 000 for the year. Todd occasionally earns some off-farm income, around $50 per fortnight. Todd's partner Jennifer (partner 2) works as a full time nurse and receives a fortnightly salary of $700. Todd would be eligible for full payment of $405.40 per fortnight under the scheme. Jennifer would not be eligible for a payment (E2 on figure b and figure c) [b].

Example 3: Lee (partner 1) works on the farm full time and has made a loss for the year of $50 000. Lee's partner Kelly (partner 2) works full time as a doctor and earns $1600 per fortnight. Both Lee and Kelly are ineligible for assistance under the proposed scheme (E3 on figure c).

Figure c



[a] Income above $62 reduces payments by $0.50 in the dollar. Income above $250 reduces payments by $0.60 in the dollar. [b] Jennifer is not eligible for a payment as she derives a significant proportion of her income from her full-time job.

Asset thresholds

There was significant disagreement among participants about the Commission's proposed total net asset cap of $2 million tapering to $3 million. Some contended that it was unjustifiably generous to provide taxpayer support to people with $3 million in net assets. However, most participants felt that the proposed asset limit was too low and/or that farm assets should not be included in any determination of eligibility for income support.

The NFF submitted 'that a $2 million cap tapering to $3 million is problematic in the same way as setting any line in the sand' (sub. DR176, p. 77). It pointed to increases in farm land values due to urban encroachment and argued that property values are not an indicator of earning capability.

The NSW Farmers' Association agreed, stating 'farm assets should be considered in their income earning capacity to the farming business and therefore should not be included in any asset assessment for income support' (sub. DR182, p. 6). The Victorian Farmers' Federation also argued that farm assets should be exempt from the proposed asset cap and stated that 'the asset thresholds as recommended do not sufficiently take into consideration the particular circumstances of modern agriculture' (sub. DR160, p. 4). Horticultural organisations suggested that these limits may not be appropriate for the businesses they represent and proposed a study into this matter (Horticulture Australia Council, sub. DR169; Growcom, sub. DR171).

The Senate Rural and Regional Affairs and Transport References Committee examined the impact of social security asset tests for farming families in 1995. The Committee recommended that both off-farm and on-farm assets should be taken into account when assessing a farm household's eligibility for income support payments. It concluded that exempting farm assets would create equity problems with non-farmers and may diminish incentives for self provision.

A range of thresholds were proposed by participants, including an asset cap of $5 million with a taper to $6 million in pastoral areas (Rangelands Drought Taskforce, sub. DR153). The NSW Farmers' Association argued that where a limit for farm assets is applied it should be indexed in some way to reflect increases in property values.

The Western Australian Farmers' Federation supported the concept of a taper but considered that the proposed asset cap and taper would be insufficient for most farms in that state (sub. DR161). Data provided by the Department of Agriculture and Food Western Australia (sub. DR186) shows the financial position of farms in the North Eastern Agricultural Region (table 9.1). The financial position of the bottom 25 per cent of businesses indicates net asset levels of $1.5 million. This suggests that, on average, these businesses could be eligible for support under the scheme (not taking into account income or the value of liquid assets).

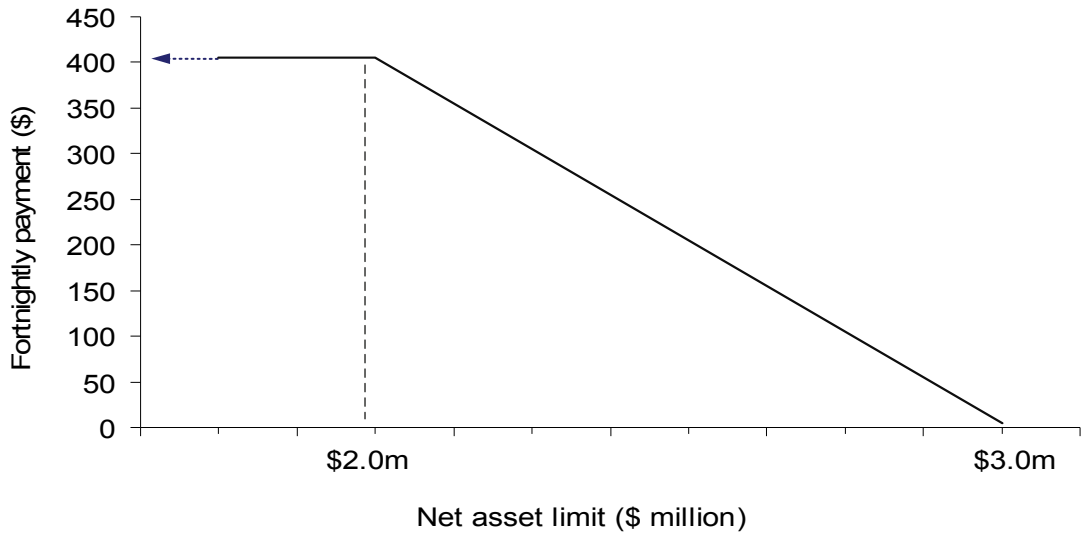
Table 9.1 **North Eastern Agricultural Region farm financial positions**

		Top 25%	*Group average*	*Bottom 25%*
Farm Size	ha	5 684	4 801	4 165
Total farm assets	$ '000	6 608	4 513	2 852
Total farm liabilities	$ '000	1 195	1 270	1 311
Farm equity	$ '000	5 413	3 244	1 541

Source: Department of Agriculture and Food Western Australia (sub. DR186, p. 2).

The Commission considers that a balance must be met between recognising farm viability and the extent to which asset limits should deviate from those applying to the general community. In the Commission's view, this balance is met with a total net asset cap beginning at $2 million and with a taper to $3 million (figure 9.4). This asset limit would be indexed annually in line with asset limits for other Centrelink programs.

Figure 9.4 **Impact of net asset limit on payment rate with linear taper[abc]**



[a] Payment values assume that all other eligibility requirements are fulfilled and that income is below the full payment threshold and therefore only assets affect the level of payment received. [b] Fortnightly payment is reduced by $0.40 for each $1000 over $2 000 000. [c] As at February 2009, the maximum fortnightly payment for an individual receiving Newstart allowance with a partner is $405.

Sub-caps

Many submissions expressed concern that, by imposing limits on off-farm assets, the current ECRP restricts farmers' options to spread their risk and respond to adverse circumstances (Macquarie River Food and Fibre, sub. 36; NSW Farmers' Association, sub. 98). They argued that off-farm assets are a legitimate

diversification and risk management strategy and that government assistance should not discriminate against those who have chosen to invest off-farm.

To enable flexibility in the structuring of farm assets and off-farm assets, the Commission proposes that the asset tests for income support should not distinguish between on and off-farm assets. This simplification recognises the complexity of farm financial arrangements and aims to avoid disincentives to self-reliance and risk management. It also recognises that funds can be easily moved across asset classes.

However, the Commission proposes a liquid asset sub-cap that would require farm households to draw their liquid assets down to $20 000 or below before accessing income support.

There was a mixed response by participants to this proposal. The Pastoralists and Graziers Association of Western Australia submitted that 'liquid assets like FMDs should be differentiated from physical ones with the requirement that liquid ones are drawn down to get household relief' (sub. DR121, p. 1). The NFF supported a liquid asset cap of $20 000 provided that it excluded Farm Management Deposit (FMD) balances. Other organisations submitted that $20 000 was too low (South Australian Farmers' Federation, sub. DR141; South Australian Advisory Board of Agriculture, sub. DR157). The Victorian Farmers' Federation argued that the limit should be at $50 000 and not include FMDs (sub. DR160).

The $20 000 liquids cap is based on the TIS scheme. This is an arbitrary cap, but the Commission was not presented with compelling evidence to depart from it, nor why FMD balances should be exempt. On the contrary, the Commission notes that the liquid asset sub-cap:

- that applies to the rest of the community is much more stringent — for example $5000 for an individual (with a partner) accessing Newstart
- recognises that a farm requires more working capital than, say, an urban household, but also that funds in excess of $20 000 should be drawn down in times of need — before the community is called on to provide income support
- should include FMDs, on the basis that they are designed for farmers to use to support themselves through downturns — see also the 2006 Review of the FMD scheme (DAFF 2006) and the Corish report (Agriculture and Food Policy Reference Group 2006).

Some contend that it is not appropriate to oblige farm businesses to draw down their FMDs, a farm business measure, to be able to access income support for the farm household. However, as noted earlier the farm household and business are often highly interconnected. This was recognised by the Queensland Government (sub. 77), which pointed out that money from business assistance measures, such as

the interest rate subsidy, can be spent on family related expenses and that household income support, such as ECRP, can also go towards the farm business.

Given this high level of fungibility between business and household finances the Commission considers that FMD deposits should be included in the liquid asset test. In essence, whether funds are held in FMDs, savings accounts or 'under the bed' should not bear on access to income support. Excluding FMDs could simply result in transfers of funds to alternative accounts in order to qualify for assistance.

However, the Commission considers that the liquid asset test should be set at a level higher than that applied to the general community to recognise the special circumstances of a farm household.

In cases where an applicant's liquid assets are above the specified limit, but all other requirements are fulfilled, eligibility need not be declined. Rather, eligibility assessment could be deferred until liquid assets are drawn down under the limit. Where an applicant has funds in FMDs above the liquid asset threshold, Centrelink could issue a certificate to enable funds to be withdrawn while still retaining the tax benefits as is currently in place for FMD holders in EC declared areas.

Mutual responsibility

The Commission's third and fourth objectives for farm household income support are that some conditionality should be imposed to reinforce self-reliance, discourage long-term dependency on income support and assist farmers to determine their future.

To access assistance, farm households should be required to seek independent advice on the financial situation of their business and develop a 'Mutual Responsibility Contract' specifying, if necessary, the actions that are to be taken to improve self-reliance.

Participants were generally supportive of incorporating mutual responsibility into an income support scheme (NFF, sub. DR176; Australian Dairy Industry Council, sub. DR145; Victorian Farmers' Federation, sub. DR160; Australian General Practice Network, sub. DR170). Australia Pork Limited welcomed the recommendation to tie financial assistance to independent financial advice on business viability (sub. DR155). The Rural Financial Counselling Service South Australia stated that:

> It can't be just a welfare payment. There's got to be something else attached to it that says "Look, this can't go on forever. This is why you're in trouble. We now have to

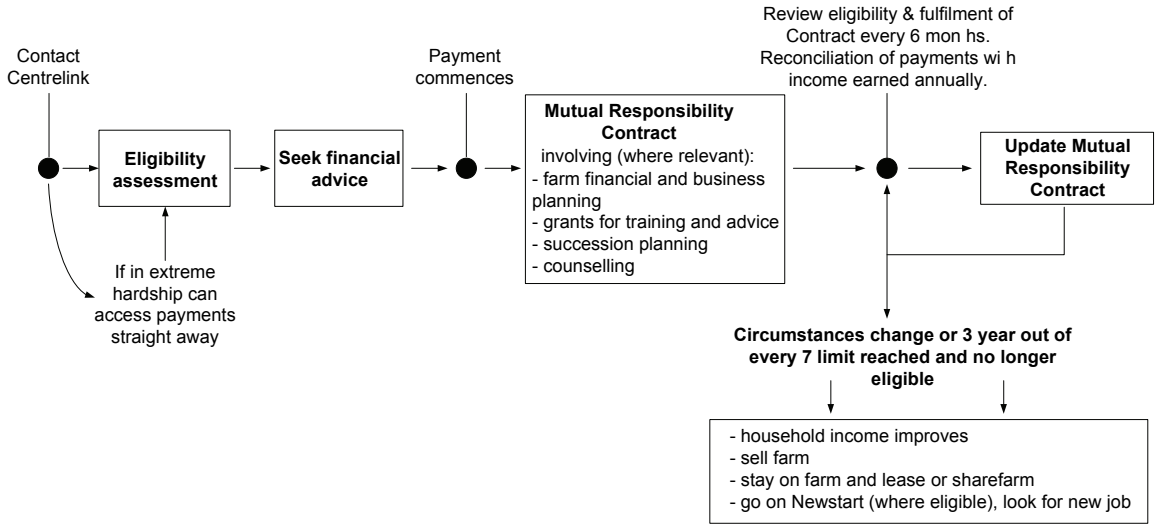
work towards getting you out," and they have to agree to that. That has to be part of the deal … (trans., p. 243)

The ACT Department of Territory and Municipal Services similarly submitted that 'encouraging self-reliance may be enhanced by a mutual obligation approach to future drought assistance e.g. assistance measures will be dependent on the implementation of a business plan incorporating risk management strategies' (sub. 101, p. 2).

Initial assessment and the 'Mutual Responsibility Contract'

Under the Commission's proposal, applicants for income support would be required to obtain an assessment of the financial situation of their business prior to receiving income support (with a grant provided to cover the cost). The results of this consultation would not affect eligibility to income support, but rather provide the applicant with information to assist them to make decisions so that income support is not needed in the future. Once financial advice has been sought, recipients would work with Centrelink's Rural Support Officers to create a 'Mutual Responsibility Contract'. Figure 9.5 illustrates how this process would operate for the proposed Farming Family Income Support scheme.

Figure 9.5 **Farming Family Income Support scheme**



By not making support contingent on whether a farm is viable (as has been the case for farm household specific income support programs in the past, such as TIS), access to assistance is simplified. There is some indication that the farm financial assessment for the TIS and the Climate Change Adjustment Program (CCAP)

Adjustment Advice and Training Grants programs is too complicated and deters farmers from applying (M. Willet, sub. DR125).

Nevertheless, the initial consultation needs to be conducted by a financial expert who is not the farming family's accountant. Advice regarding the long-term viability of the farm should be provided by an unbiased expert who has not had a long-term relationship with the applicant. One possibility proposed by participants is that 'appropriately accredited' rural financial counsellors could also provide this service (South Australian Advisory Board of Agriculture, sub. DR157; D. McKenzie, sub. DR187). This may assist in reducing the difficulty faced by applicants in remote areas in finding an appropriate expert.

The 'Mutual Responsibility Contract' would outline the steps that the farmer plans to take to obviate the need for future income support. For most, the Contract would require a household financial plan and/or a farm financial and business plan to, at least, indicate the sustainable earning potential of the farm business. For viable farmers this requirement would not be particularly onerous as most would have such plans already.

The Contract would allow for the recognition of farmers' particular circumstances and preferences. Hence, it could involve commitments to gain skills suited to earning off-farm income, or participation in programs such as Landcare or those conducted by Catchment Management Authorities. To help farmers determine their future, the plan could also include accessing counselling services and advice regarding succession planning.

Where possible, the plan should explicitly take into account 'family life cycle' factors, such as the changing demands for household income, the occupational and life-style preferences of various family members, and where appropriate, planning for retirement, managerial succession and the integration of the involvement of various family members into farm business planning.

Grants would be provided to assist the recipient fulfil their responsibilities. These grants could be similar to the CCAP Adjustment Advice and Training grants, such that where an applicant qualifies for income support they automatically qualify for grants for professional advice and training where identified as relevant in the Mutual Responsibility Contract. Training need not be farm related but would have to be management or income related — farmers would be encouraged to explore off-farm income sources. The CCAP program also provides additional grant monies to assist with travel and incidental expenses incurred in order to obtain professional advice or undertaking training activities.

Currently CCAP grants provide up to $5500 for advice and training. Grants are provided in the form of a voucher. Funds are then paid directly to the provider of advice or training once the activity has been completed. The Commission considers that while the quantum of the grant is appropriate, it would be more effective to provide applicants with cash and require that funds be spent on approved activities (with receipts audited during the six monthly reviews). This would give recipients greater control over the quality and type of service they receive using this grant. Cash grants may also lead to greater value for money. It was evident during industry visits that often where a voucher system is employed, the cost of services tends to equal the value of the voucher irrespective of the service provided.

Regular assessment

Assistance would be re-assessed every six months, on the basis of compliance with conditions — including carrying out the actions identified in the Contract — and acquittal of payments against income earned.

Australia Pork Limited was supportive of income support payments being tied to a six month review cycle (sub. DR155). However, some raised concerns about the time and expense required to update plans on a six monthly basis and reconcile payments, particularly where an accountant or professional needs to be consulted (Country Women's Association of Victoria, trans., pp. 520-1; M. Willet, sub. DR125).

As is currently the case for ECRP and TIS, fortnightly payments would be based on an estimate of annual income. Given the high level of variability of farm income, it is very difficult for farmers to accurately forecast annual income (especially during drought). However, despite this variability ECRP and TIS do not have formal reconciliation of estimated and actual income and consequent adjustment of payments made. While fortnightly payments are adjusted when new information is received, a reconciliation at the end of the financial year using actual taxable income would ensure recipients received the correct entitlements. This would involve subsequent reparations or recovery actions.

Any program that involves on-going case management of mutual responsibilities will have higher administrative costs than programs without case management (for example ECRP). However, effective case management is integral to ensuring that farm households are not only supported, but also are in a well-informed position to make difficult decisions about their business and their future in agriculture.

Succession planning and the Age Pension

The scheme would also include measures to encourage succession planning. For older farmers, accessing professional advice on succession planning will be strongly recommended. Furthermore, Centrelink Rural Service Officers should ensure that farmers at or near retirement age are fully apprised of their options. Where relevant and subject to normal eligibility rules, farmers should be encouraged to move onto the Age Pension. Succession is discussed further in section 9.3.

Time limited support

A limit on the duration of income support is necessary to ensure the scheme does not lead to long-term welfare dependence. The National Rural Advisory Council, in its submission to the Expert Social Panel, observed that receiving income support payments 'for a prolonged time may foster a welfare-dependent attitude rather than promote self-reliance for some farmers. Long-term profitable farming will hinge on farmers' ability to prepare for, and adapt to, change' (NRAC 2008, p. 5).

The Commission has proposed a limit of three years out of every seven per farm household for accessing the Farming Family Income Support scheme. The seven year period would be applied at the farm household (not enterprise) level and would commence from the date of the first income support payment. Any prior income support through ECRP or TIS should not affect access.

The basis for three years out of every seven recognises that, one of the many reasons why farm households might get into difficulty, is prolonged dry conditions. Virtually all participants accepted that a farm business should be prepared for at least a one and probably two year drought. It is likely that those farm households potentially eligible for the income support scheme would expend their reserves before, say, the third year. In such a situation, three years of assistance would then be available to carry people through a drought event lasting for at least five years. Further, as shown in figure 2.10 farm cash income tends to recover quickly for many farm enterprises after a drought event.

The concept of a time limit was supported by many participants. For instance, the Rural Financial Counselling Service South Australia noted:

> I think it's absolutely pivotal that it isn't forever and that they must be working towards getting themselves out of that current situation during that period of time. (trans., p. 243)

However, there was disagreement about the proposed three years in every seven time limit. Several organisations argued that the mutual responsibility requirements and regular assessment processes should predicate whether continued support is warranted, not an administrative limit (NFF, sub. DR176; Western Australian Farmers' Federation, sub. DR161; Australian Pork Limited, sub. DR155). The NFF argued that 'using the three years out of seven to force adjustment with farmers leaving the land bears no relationship to the objective of maintaining a viable farm during a severe drought event' (sub. DR176, p. 79).

The Victorian Farmers' Federation suggested that the three year limit could be bolstered with an additional two years of progressively reduced payments (sub. DR160). The Hindmarsh Shire Council supported the three year limit but with an option for a fourth year following an independent review of viability and efforts to improve self-reliance (sub. DR174).

The Commission reiterates that it is not an objective of the scheme to force farmers to leave farming after three years of access to income support. There are other options that a farm household could take such that income support is no longer required. Training, advice and counselling is available to support families to make these decisions. It is important that this three year out of every seven limit is maintained absolutely and that no exemptions or extensions are made.

At the end of the three years of assistance out of seven, farmers who still require financial assistance would have to meet the requirements of programs available to all Australians through the social security system. This would involve meeting all the income and asset limits and fulfilling any activity requirements. In some instances certain Centrelink benefits (for example Health Care Cards, access to the Job Network and children's Youth Allowance payments) could continue for a fixed period. An overview and comparison of the conditions and criteria of the Commission's proposed scheme relative to Newstart and ECRP is provided in table 9.2.

Table 9.2 **Comparison of income support programs**

	Newstart	*EC Relief Payment*	*Farming Family Income Support – proposed*
Mutual Responsibility	Must be unemployed (not underemployed)	Must be a full time farmer in EC area	Must be a full time farmer
	Activity test — must look for job and/or undertake training or an approved activity	Activity test — none	Activity test — must develop a 'Mutual Responsibility Contract' with actions to be taken
Income test	Where claimant earns above $62 per fortnight or their partner earns above $769 per fortnight, payments are reduced[ab]	Based on Newstart income test but an additional $20 000 off-farm wage and salary income per annum per couple exempt[c], proceeds from forced disposal of livestock are exempt[d]	Same as Newstart
Asset test (combined assets with partner)	Must have combined assets under $243 500. Principal home and superannuation (if under age pension age) are not included[e]	No total asset limit. Off-farm asset limit of $243 500. Principal home, life insurance, superannuation of farmer (even where over pension age) are not included	Must have assets under $2 000 000 for full payment, and under $3 000 000 for any payment. House and superannuation (where under age pension age) included in asset test
Liquid asset test	Payment may be deferred where liquid assets exceed $5000 (couple or single with dependants)	na	Must have under $20 000 in liquid assets
Hardship provisions	In severe financial hardship and have unrealisable, non-income producing assets[f]	na	Same as Newstart
Payment to individual or couple	Individual	Couple	Individual
Maximum fortnightly payment[g]	$405 (each)	$405 (each)	Same as Newstart
Additional payments[h]	Payable if eligible	Payable if eligible	Same as Newstart

[a] Income for the recipient of $62 to $250 per fortnight reduces payments by 50 cents in the dollar, each dollar of income over $250 per fortnight reduces payments by 60 cents in the dollar. As at September 2008, partner income above $769 reduces the recipient's payment by 60 cents in the dollar. [b] Practical effect is maximum allowable income (after working credit) of $769 per fortnight for the recipient or $1445 for the recipient's partner [c] Payment is reduced after earning $769 per fortnight per couple in off-farm income (this $769 is proportioned between the two depending on the amount of off-farm income earned by each spouse, plus $62 each in either off-farm or on-farm income. Assumes application is made at the beginning of the financial year — higher earnings may be possible if application is made later in financial year. [d] Where the proceeds go into FMDs or a term deposit of at least 3 months duration. [e] This asset test does not include the principal home and permanent fixtures, it does include household contents, cars, boats and surrender value of any life insurance. [f] That is, cannot derive income or borrow from assets, or asset is currently for sale or unable to be sold due to legal restriction. [g] Comparison is for a couple who are home owners. [h] Rent assistance, pharmaceutical, telephone and zone allowances.

RECOMMENDATION 9.1

All farmers facing hardship should have access to a Farming Family Income Support scheme designed for farming circumstances. It would provide payments and have income eligibility thresholds at Newstart levels, subject to:

- ***an overall net asset cap, inclusive of the value of the farm house, beginning at $2 million with a taper to $3 million***
- ***a liquid asset sub-cap of $20 000 inclusive of bank balances and Farm Management Deposits balances.***

While the scheme should operate at the farm household level, eligibility and payments should be on an individual basis and conditional on:

- ***meeting the definition of a farmer, based on a similar test to that used currently for the Transitional Income Support scheme***
- ***seeking independent financial advice on the viability of the farming business***
- ***developing and carrying out a plan of action to improve household self-reliance***
- ***eligibility being reviewed, mutual responsibilities being met and plans updated every six months.***

The scheme should be limited to a maximum claim per farm household for three years out of every seven. The seven year period should commence from the date of receiving the first income support payment. Payments should be acquitted annually.

The Farming Family Income Support scheme should commence on 1 July 2009 in conjunction with programs to provide counselling, the recognition of prior learning and grants for training and professional advice.

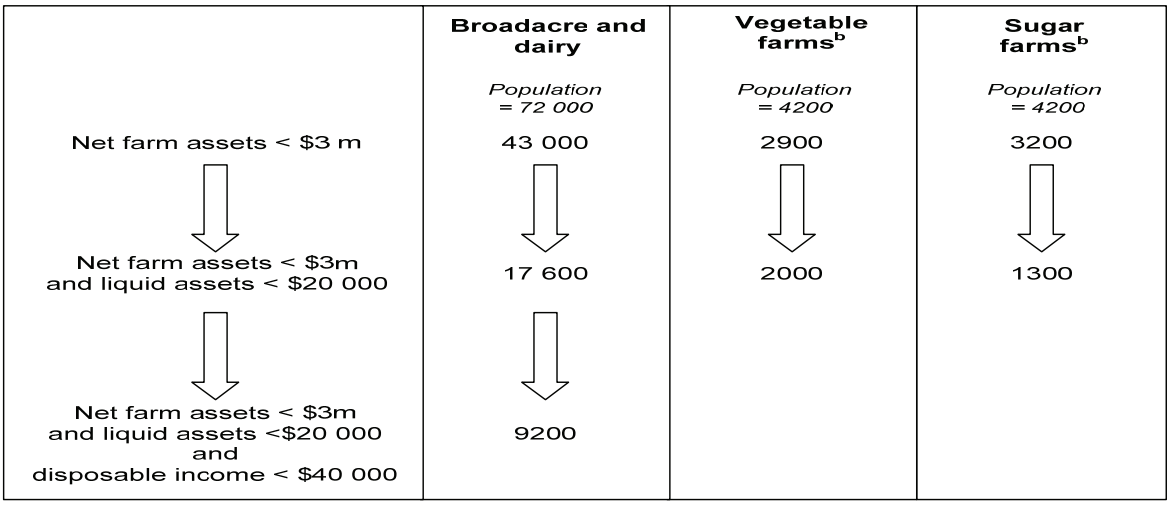
Potential coverage of a Farming Family Income Support scheme

Estimating the number of farm households that would be eligible for support under the Commission's recommended scheme is complex. Figure 9.6 illustrates the potential scope. The analysis underpinning the estimates is in the annex to this chapter. In brief the estimates are based on:

- farm survey data for the broadacre and dairy sectors covering farms with an estimated value of agricultural operations over $40 000 — approximately 50 per cent of all farms in Australia
- other survey data for vegetable and sugar farms.

In interpreting these indicative estimates, it should be noted that the liquid assets and income 'filters' may not be as restrictive as implied. Liquids can be drawn down and sources of income can fluctuate. The analysis also involves assumptions about who is earning income — estimates are sensitive to who applies for support.

Figure 9.6 **Number of potentially eligible farmers for proposed income support scheme[a]**



[a] Figures do not include off-farm assets [b] Data on the disposable income levels of vegetable and sugar farms is not available and as such no estimate of the number of eligible farms is available for this group or in total.

Data source: ABARE (2009 unpublished).

Given the lack of data on all farm types in Australia and of income levels of each spouse in the household and the fact that income levels for farm households fluctuate considerably, it is difficult to get an accurate picture of the number of farmers who may access this scheme, even for a snapshot in time. From figure 9.6 it would appear that numbers could involve from 9000 to 17 000 broadacre and dairy farmers and something less than 6000 vegetable and sugar farmers – similar to the number of Australian farm households that are currently receiving ECRP, but the composition and location of recipients could be quite different.

9.5 Agricultural adjustment

The Commission's proposed income support scheme does not seek to force structural adjustment through viability assessments. Rather, it aims to use case management, grants for advice and training and access to counselling to assist farmers to make decisions about their future in farming. In addition, the strict time limit of assistance aims to avoid dependence on welfare support. These mechanisms may result in some farmers leaving farming. In this context, it is important to

understand the issues around adjustment and the reasons why many farmers choose not to leave farming even when in persistent hardship.

Structural adjustment occurs in all sectors of the economy and while often having negative associations, it comprises opportunities and challenges.

> At its broadest level, rural adjustment is about changes in rural communities and industries. Changes on the farm have outcomes that affect rural communities and have implications for regional development. Changes in rural communities also have an influence on the lives of farm families. (McColl et al. 1997, p. 16)

Farmers' aims and objectives can change and are often based on factors relating to the 'farm family life cycle', such as changes in household income requirements or the need to finance the retirement of the senior generation (Stayner and Musgrave 1994, p. 2470). Some farmers aim to increase their capital, expand their operations and diversify their production. Others may be satisfied with maintaining sufficient production to earn a sustainable income over long cycles. For those facing persistent insufficient incomes, off-farm income or investments can be drawn on; or alternatively where they consider that the business is not viable over the long-term, alternative management arrangements can be sought; others may choose to leave farming.

There are a range of actions that can fit under the title of adjustment, including changing farm management regimens, taking an off-farm job, or expanding operations. Thus, policies for adjustment are not simply policies which remove impediments to farmers leaving the land. Other policies that can assist adjustment are covered in chapter 8. These include for example, grants for training that result in farmers making changes to their current situation. The remainder of this chapter discusses policies for leaving farming.

The decision to leave the farm

Decisions to leave farms, particularly if they are not viable over the long-term, involve many non-financial considerations. In the view of one researcher, farmers tend not to exit agriculture until they are forced out by low levels of income and/or by high debt (Harris 1970). Box 9.3 provides a collection of views expressed by farmers when discussing their experiences and attitudes regarding retirement and leaving the farm.

Where a family chooses to stay on the farm due to its strong attachment to farming, this is not, of itself, an issue for government policy. However, it is a policy issue where income support assistance is sought to meet the family's basic needs and/or business support is sought to keep the farm business operating.

The current drought support measures are seen to help keep non-viable farmers in the industry. Indeed many submissions argued that this is, or should be, the principle rationale for drought relief, because their imperative is to maintain the number of farmers in Australia and the small country towns that have been servicing them. However, retaining all farmers currently in the industry and maintaining country towns should not be the driving objective of drought or climate variability policy (see chapter 2). Such an approach is inconsistent with the objectives of improving self-reliance and preparedness (see chapter 7).

Box 9.3 **Views on leaving farming**

See our farms they weren't that big and we had three boys and they had their own lives and they didn't want it anyhow – and if they had you'd have to sell it to one as you couldn't give to all three. There was no use in hanging round because they couldn't share it and we did sell out in a hurry in the end and everybody's happy – the boys are happy and that's the main thing. (p. 54)

I'm happy here now, but for the first few years I found it very difficult to settle into town life, even though I was involved in the volunteer work, I missed the farm a lot. You'd go to bed at night and it'd sort of take over your mind you know, and yes it was very difficult. But I wouldn't like to [be] back out there now, I realise that I wouldn't be able to cope and I'm quite settled in what I'm doing. I've got a big vegetable garden by the way and that keeps me occupied on days I'm not doing voluntary work. (p. 58)

When we did sell and come to town my husband was very unhappy … it was a very difficult time. (p.57)

I reckon that one of the saddest things that I say at X, and I visited over 300 farms, was the number of people on their own seventy or eighty [years old] and running two or three thousand acres on their own and the whole thing going to a wreck, it was a wreck, then – the only way I'm going leave here is in a box – if I heard that once I heard that dozens of times. I made no apology for challenging those people as to whether they should be there. But it takes a change. (p. 58)

My husband had various accidents during his years and in the west they use a lot of motorcycles for mustering and he just wasn't able any longer physically to work. We had two sons who weren't too sorry to take over – so they are still out there. So, it was just the right time to leave. (p. 37)

I think it is a case of letting go to a certain extent. My experience, not ourselves personally, because we sold our farm to our son and moved up here, but what we have found, a lot of people just can't let go. I mean this farm had been left from generation to generation … three generations on a farm, and the people in their 70s still hanging onto everything, they still hadn't let go. (p. 56)

Source: Foskey (2005).

Impediments to leaving the farm

One possible impediment to leaving the farm is the lack of a financial base to be able to fund the future. For example, where a farmer's assets have been significantly run down and they are not sufficient to meet the cost of a home elsewhere or the farmers are of old age and wish to give the farm to children but have little superannuation to support themselves.

Kerridge (1978) examines farmers' values and finds that older farmers and those on smaller farms tend to strongly value farming as a way of life and may not be induced to exit the business through financial incentives. Musgrave (1990) discusses how farmers can become trapped in farming where, despite their low incomes, the returns from selling the farm and from earnings in off-farm employment are not sufficient to compensate for the loss of on-farm benefits (both financial and non-financial) and the costs of relocation. This is particularly the case where the farmer strongly values the identity and lifestyle of farming.

There are very significant non-financial impediments to farmers leaving the industry. For most farmers, the family home is on the farm, they have a significant attachment to the land and feel that farming is part of their identity. One farmer in a 1997 study commented:

> The thought of handing over the farm to the next generation is a concept that is very hard to come to terms with. Means letting go of how I see myself … as a landholder – basically of no significance anymore. (Kaine et al. 1997, p. 47)

Ageing of the farm population has been evident over the past two decades (Barr 2004) (see box 2.5) with the median age of farmers in 2006 being 52 years old. The proportion of farmers older than 65 years of age increased to 18 per cent in 2006 from 15 per cent in 2001 and the proportion of farmers under 35 years of age decreased to 10 per cent in 2006 from 12 per cent in 2001 (ABS 2008c). Currently approximately 30 per cent of all ECRP recipients are over 60 years of age (Centrelink unpublished 2008).

While the issue of farmers retiring and selling, or passing on, the farm is important, there is often a lack of effective succession planning.

> While older farmers may not always be the main decision makers in farm businesses, a lack of effective planning by farm families tends to delay or distort retirement decisions, including the intergenerational transfer of property. These delays can increase the risk of older farmers facing reduced incomes and poor health, and can slow the adoption of best practices. (Agriculture and Food Policy Reference Group 2006, p. 170)

The problems associated with a lack of succession planning can be made worse by drought, which can force some older farmers, especially those without formal superannuation, to delay retirement and stay on the farm (Drought Review Panel 2004; NRAC 2008).

Planning regulations at a local/regional level can also influence farmers' choices whether to leave the industry. In some areas local governments are setting limits on the sub-division of farmland for hobby farms and/or urban development. This can prevent farm land being sub-divided from the family home and sold separately so that the family may continue to reside in the home. These laws differ from shire to shire.

A lack of information can also inhibit farmers from making adjustments decisions. For example, farmers may choose not to leave farming where they are uncertain about their employment options outside of farming, or where they have inadequate information regarding the future viability of their farm.

Policy approaches

Exit package for small block irrigators

Special exit grants to farmers were discussed in chapter 6 and were found to distort markets and raise inequities with other groups in the community. As such, this section will not focus on exit grants as delivered through ECRP or the CCAP program.

The exit package offered to small block irrigators in the Murray-Darling Basin (announced September 2008) was also examined in chapter 6. This program differs from other exit grants in that it has design features which address some of the social and informational impediments to leaving the farm.

Within the context of the southern Murray-Darling Basin, the Small Block Irrigator Exit Grant package may be effective in addressing some of the non-financial reasons for farmers remaining on the land.

However, such a model is unlikely to be applicable to all parts of the country or to large-scale farming. The question of local sub-division limits is difficult and reflects a range of considerations to be taken into account in state, territory and local government planning controls. The adjustment benefits of retaining the family home need to be weighed against considerations of zoning, buffer zones, environmental values, alternative uses and the efficient provision of services to semi-urban areas.

Retirement assistance and succession planning

Where farmers pass the farm to their children (in the form of a gift, or where it is sold below market value) the farmer may not be able to access the Age Pension for five years due to gifting provisions (see box 9.4).

Box 9.4 **Gifting rules**

Gifting is where assets are given away or transferred to others without adequate return for the gift or transfer (in the form of money, goods or services). The allowable gifting amount for a single person or couple is $10 000 in each financial year. In addition, persons or couples are limited to a maximum allowable gifting amount of $30 000 in any five year rolling period.

Gifting rules apply to any gifts made in the five years before receiving a pension or allowance. Where an individual or couple gift assets over the allowable amount these assets are called 'deprived assets'. When assessing eligibility for a pension or allowance, deprived assets are included in total assets owned until the fifth anniversary of the date the assets were gifted. In addition, the total value of deprived assets is added to the value of other financial investments. Deeming rates are then applied to these financial investments to calculate assessable income (deeming assumes that financial investments are earning a certain rate of income, no matter what income they are actually earning).

Source: Centrelink (2008b).

Temporary schemes have been used to grant an exemption to the gifting rules for targeted groups of farmers, for example the Retirement Assistance for Farmers Scheme (RAFS) in 1997 to 2001 and the Retirement Assistance for Sugarcane Farmers Scheme from 2004 to 2007. These schemes offered a 'one-off', three year moratorium on the gifting provisions, which allowed eligible farmers to gift farm assets valued at up to $500 000 without affecting their eligibility for the Age Pension. The RAFS was introduced on recommendation of the Special Rural Taskforce and was intended to target farming families with low incomes and low net assets, and where farm income was insufficient to support more than one generation.

The uptake of RAFS was projected to be around 2100 farmers. By the end of the scheme approximately 2200 farmers had been successful in their application (as at May 2001) (Centrelink pers. comm., 2008). A little over half of the successful applicants were already receiving a partial payment of the Age Pension and therefore obtained a higher rate through RAFS. Centrelink consider that the RAFS successfully enabled those farmers with low incomes and low net assets who were

receiving income support through ECRP or Farm Help to transfer their farm to the next generation and move to the Age Pension (Centrelink pers. comm., 2008).

The Corish report found that RAFS encouraged the intergenerational transfer of small scale and marginally viable farms and that this 'effectively transferred the problem from one generation to the next' (Agriculture and Food Policy Reference Group 2006, p. 170). However, where low incomes are a result of poor management and the new owner is prepared to take on more innovative approaches, passing the farm onto the next generation may result in improved viability.

Several participants argued for a temporary or on-going waiver of the gifting rule for the intergenerational transfer of family farms (Carrigan and Co Pty Ltd, sub. DR129; H. Loller, sub. 49; AgForce, sub. 80). The Rural Financial Counselling Service in New South Wales Central West stated that the issue of gifting the farm needed to be addressed as a matter of urgency (sub. DR178). AgForce suggested that the five year gifting rule could be reduced to two years (sub. DR185).

Arguably, it is inequitable to allow farmers with viable and valuable farms to simply gift them to their children and then receive the pension when this is not available to owners of other businesses. One participant reported:

> I did have a lady ring me recently, just as an example, and said, 'Look, I need to be able to access the pension and I can't.' 'Why can't you, madam?' 'Well, we can't because our assets are too highly valued and we've given it away to our son.' I said, 'Just before we go through this, can I ask what the value of it is?' and she said, 'About 3.5 million.' I said, 'And your other family members?' 'Well, they didn't get anything.' 'Okay. So you're telling me that you've given away $3.5 million to your eldest son, nothing to the rest of your family, and you now want the government to support you for the rest of your life?' 'Yes.' I had a little bit of trouble with that. (Tasmanian Farmers and Graziers Association, trans., p. 19)

An applicant's pension is not affected where the farm was gifted more than five years prior, suggesting that with effective succession planning and management, the problems posed by the gifting rules could be avoided. In addition, there are several concessions that primary producers can avail themselves of to avoid having their farm assets included in the asset test for the Age Pension (see box 9.5).

It is possible that there is a lack of awareness regarding these provisions and that succession planning efforts could be improved through more widespread understanding. This could be achieved through Centrelink and Rural Financial Counsellors, for example, ensuring farmers are informed regarding issues of succession and how this will impact on their ability to access social security payments if applicable.

Box 9.5 **Provisions that can reduce the impacts of the gifting rules**

Forgone wages – The forgone wages provision is a limited concession designed to assist farmers to retire and pass control of the farm to the next generation. Where a farmer has transferred the title or effective control of the farm to a close relative the value of gifted assets can be reduced by the value of any past contributions to the farm by the close relative. Past contributions can include forgone wages, contributions made to improve the farm, purchase of livestock and equipment or unpaid care of the farmer.

New land value concession – For homeowners applying for the Age Pension the value of land, greater than two hectares adjacent to the house, is counted for asset test purposes. However, in some cases where the home and land is on one title document the whole property may be exempt from the asset test. This applies where the applicant has had a long-term (20 year) continuous attachment to the land and home and where effective use is being made of the land to generate an income given the applicant's capacity to do so.

Private Trusts Special Concession for Primary Producers – This concession enables farmers to pass the farm (where contained in a trust) to the next generation while still retaining some control (for example, living in the family home and the ability to prevent others from selling the farm) without the assets or income of the private trust being attributed to them. While the gifting rule still applies this means that the farm could be gifted five years prior to the farmer wishing to apply for the Age Pension with the farmer retaining some control of the farm. Alternatively, where the farmer cannot access the pension due to the gifting rules they are able to receive income from the farm for the five years where they are not able to receive the pension due to the gift. There is an income and asset test of eligibility for this concession.

Sources: Department of Families, Housing, Community Services and Indigenous Affairs (2009), Centrelink (2008a) and Centrelink (2008e).

Other measures to encourage the intergenerational transfer of farm assets include stamp duty exemptions on the transfer of farming properties to younger generations and grants for professional advice on succession planning. Such grants are provided through the CCAP and Farm Help (although the Exceptional Circumstances Professional Advice and Planning Grant does not include advice relating to farm succession). Rural Financial Counsellors may also play a role, by encouraging farmers to seek advice on succession planning and by providing them with information on how to do so.

The Corish report pointed out that succession planning 'is of little value where the farm enterprise's fundamentals (size, structure and profitability) are unsound' (Agriculture and Food Policy Reference Group 2006, p. 170). It contended that there is little to justify capital assistance to promote farm succession and that there are risks that such policy could distort land prices and create impediments to entry for those with no direct family links to agriculture.

The Commission considers that succession planning is a private matter and that governments should not seek to dictate the type and extent of succession arrangements used by farming families. Furthermore, market instruments can be used to address this issue, such as reverse mortgages which enable farmers to remain in their home but with better access to cash flows (AgForce, sub. 80). However, there is potentially an information role for government where families are seeking income support and succession issues are posing an impediment to adjustment.

Grants for advice, training and recognition of prior learning

The Commission considers that programs targeted to facilitate a move out of farming should incorporate access to information and advice. As submitted by the Department of Primary Industries and Water Tasmania:

> There is a need to help farmers see the difference between life style and business decisions. Governments need to put more resources into addressing this issue through education and training. In this way, smaller non-viable businesses could be encouraged to see a life outside farming and in the face of falling income, make a decision to exit early with dignity rather than suffering a 'death by a thousand cuts'. (sub. 85, p. 14)

This was supported by several participants (Victorian Farmers' Federation, sub. DR160; South Australian Government, sub. 91; Australian General Practice Network, sub. DR170; Victorian Murray Mallee Rural Financial Counselling Service, sub. DR151). The Hindmarsh Shire Council submitted that 'further consideration should be given to adequate programs supporting farmers considering leaving the farm or pursuing off-farm employment options. These should include career counselling, training and recognition of prior learning' (sub. DR174, p. 3).

As discussed previously, the Commission recommends the use of grants similar to that available through the CCAP which provides grants for professional advice and adjustment training for those who satisfy income and asset eligibility tests.

The Commission considers that Recognition of Prior Learning (RPL) could also be part of this program. RPL is an assessment by trained facilitators which aims to recognise the skills and competencies that an individual has outside formal education or training. These skills can be gained through training, or through life or work experience. RPL can therefore provide pathways to higher qualifications for those who may not have had previous access to training and can assist with movement to different occupations.

There was support in submissions for policy which incorporates RPL processes. In particular, there was support for Victoria's 'Rural Skills Connect' program (North West Municipal Association, sub. 59; Rural City of Wangaratta, sub. DR140;

Hindmarsh Shire Council, sub. DR174). This program seeks to identify transferable skills of farmers, where formal recognition of these skills have not been obtained, and match rural farm workers, owners and operators with employment and associated training opportunities in regional areas. Training in key skill shortage areas is subsidised. Rural Skills Connect is complemented by 'Skills Store' which uses RPL to identify how a farmer's existing skills may be counted towards nationally recognised qualifications.

The South Australian Government also supported RPL programs as part of a coordinated response to assisting farmers exit the industry (sub. 91). South Australia's Riverland Drought Response Projects have a RPL component. For example, one two year project involves training participants to be assessors of RPL and then subsequently assessing farmers to enable them to either earn off-farm income or move into alternate employment.

The Commission agrees that RPL programs have the potential to effectively address one of the impediments to adjustment when used in combination with other job training and job search tools. The Commission considers that such programs should be available to all farmers irrespective of whether they are eligible for income support, although where farmers are not accessing income support cost recovery should be sought.

Rural Financial Counselling Service

As discussed in chapters 6 and 8, Rural Financial Counsellors, while not able to assess farm viability, can play a role in assisting certain farmers to realise their farms are not viable under their current farm management regimen. This is a necessary first step to help those farmers take action to change their management arrangements or, alternatively, exit the industry before their equity position worsens. Furthermore, Rural Financial Counsellors can facilitate access to advice from a range of relevant services to assist those farmers who need to make these changes.

An integrated adjustment approach with income support

Previous reviews and studies into rural adjustment and drought policy have advocated short-term income support to assist those moving out of the industry (McInnes et al. 1990; McColl et al. 1997; Special Rural Taskforce 1999; Stayner and Barclay 2002). Such programs aim to assist farmers with 'the transition to an alternative career and as the farm sector shifts to self-reliance' (McColl et al. 1997, p. 114).

The Commission's proposal that income support be provided in tandem with case management, access to counselling and grants for training and advice received strong support in submissions. Victorian Murray Mallee Rural Financial Counselling Service stated that 'realistic long-term support, particularly in training, re-location, family education and income support should be part of the total package if there is to be any likelihood of farm departure policies being effective in the future' (sub. DR151, p. 4). The South Australian Government stated that individuals and families require additional support to assist them through such a significant decision as leaving the land. It advocated a 'coordinated support package' which could 'assist primary producers to make decisions and access support to exit the industry' and 'seek alternative business and personal options' (sub. 91).

The Australian General Practice Network welcomed such an approach and stated that:

> farming families must be supported financially with training and education to make their own choices and implement their own changes. A sufficient duration of financial support will also help them to transition to alternative income sources, to diversify into alternative farming businesses, upskill into new industries and/or exit farming. (sub. DR170, p. 12)

Income support should be provided in conjunction with government programs to address impediments to farmers leaving the industry should not purely focus on financial matters, but rather should target the wider range of cultural and informational impediments to adjustment in a coordinated way. Such an approach will reduce the likelihood of income support impeding adjustment or undermining incentives for self-reliance. Case management of income support recipients and a time limit on assistance will also reinforce this objective.

Annex: Indicative eligibility levels for the proposed Farming Family Income Support Scheme

To garner a better understanding of the number and characteristics of farmers who may be eligible for the proposed Farming Family Income Support scheme, ABARE farm survey data was grouped according to the scheme's features. Specifically, two groups of broadacre and dairy farms were considered:

- those farms with net farm assets of less than $2 million and liquid assets less than $20 000 at the end of 2007-08
- those farms with net farm assets of less than $3 million and liquid assets less than $20 000 at the end of 2007-08.

These groups are not discrete — the less than $3 million net farm assets group also comprises the less than $2 million net farm assets group (unless otherwise specified). This dataset only provides information on broadacre and dairy farms with estimated value of operations greater than $40 000. This represents approximately 50 per cent of all farms in Australia.

Importantly, no information is available on off-farm assets for either group. As the net asset test for the proposed income support scheme includes both on and off-farm assets, some farmers may not be eligible for support once their off-farm assets are taken into account.

Given the many assumptions involved in estimating the number of households eligible for the proposed scheme and the lack of comprehensive data for the agriculture sector, the analysis should be read as purely indicative of the different factors involved, and any estimates of eligibility numbers treated as approximate.

Table 9.3 shows some characteristics of these two groups. On average in 2007-08:

- both groups made a loss
- farmers in the less than $3 million net farm assets group had a positive average farm cash income
- both groups had similar levels of debt
- off-farm income was slightly higher for the less than $2 million net farm asset group than for the less than $3 million asset group, due mainly to higher off-farm wages of the farm operator.

Table 9.3 **Characteristics of broadacre and dairy farmers by asset group, 2007-08**

		Net assets < $2m, liquid assets < $20k	*Net assets < $3m, liquid assets < $20k*
Estimated population of farms	no	13 388	17 893
Net assets	$	1 090 576	1 447 909
Farm cash income	$	-1 435	5 716
Farm business profit	$	-46 112	-52 553
Total capital value	$	1 315 719	1 738 615
Farm debt at 30 June	$	229 701	294 636
Liquid assets	$	4 557	3 930
Off-farm income	$	45 282	40 221
Operators off-farm wages	$	18 197	13 736
Spouses off-farm wages	$	17 575	17 082
Operators off-farm investment income	$	1 591	1 885
Spouses off-farm investment income	$	641	669
Total off-farm wages and investment income	$	37 564	33 023
Family share off-farm income[a]	$	14 187	19 769
Family disposable income[b]	$	51 751	52 793

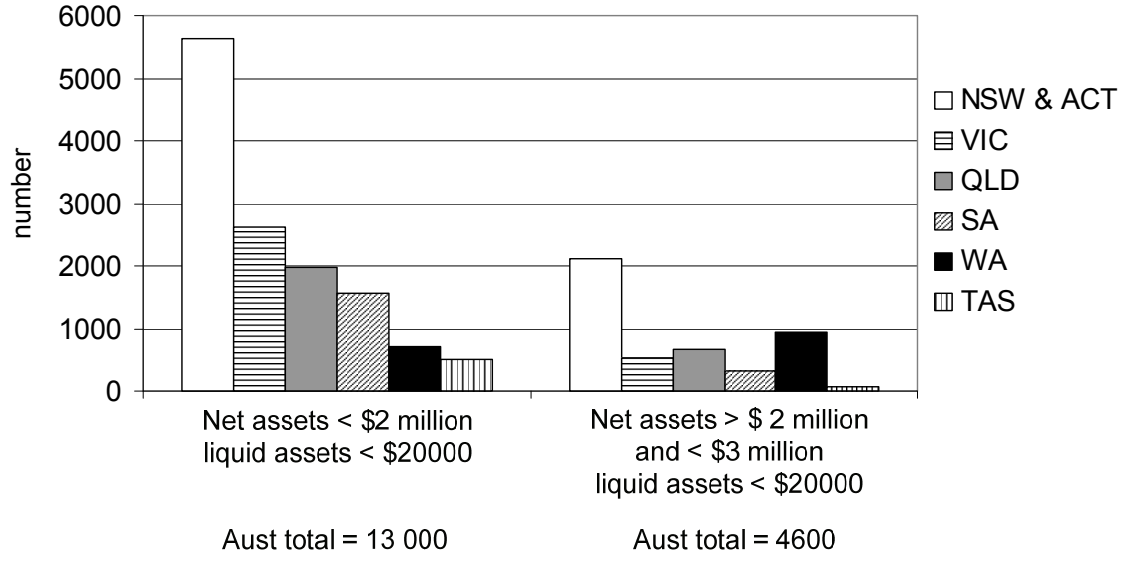
[a] Defined as family share of net farm income (farm cash income minus depreciation). [b] Defined as family share of net farm income plus off-farm wages and investment income.

Source: ABARE (2009 unpublished).

Figure 9.7 shows the number of broadacre and dairy farmers in each of the two asset groups. This indicates that approximately 25 per cent of dairy and broadacre farms had net asset levels in 2007-08 under $3 million. There are farmers in each state covered represented in both assets groups, but most are in New South Wales. These data suggest that:

- 13 000 broadacre and dairy farmers across Australia had net farm assets below $2 million and liquid assets below $20 000, potentially making them eligible for full payment under the proposed income support scheme (not taking into account other eligibility factors)
- an additional 4 600 broadacre and dairy farmers had net farm assets above $2 million but below $3 million and could be eligible for partial payment under the scheme.

Figure 9.7 **Broadacre and dairy farmers by asset group and state 2007-08[ab]**



a This data does not include information for Northern Territory. **b** Data in this figure is presented on a farm enterprise basis.

Data source: ABARE (2009 unpublished).

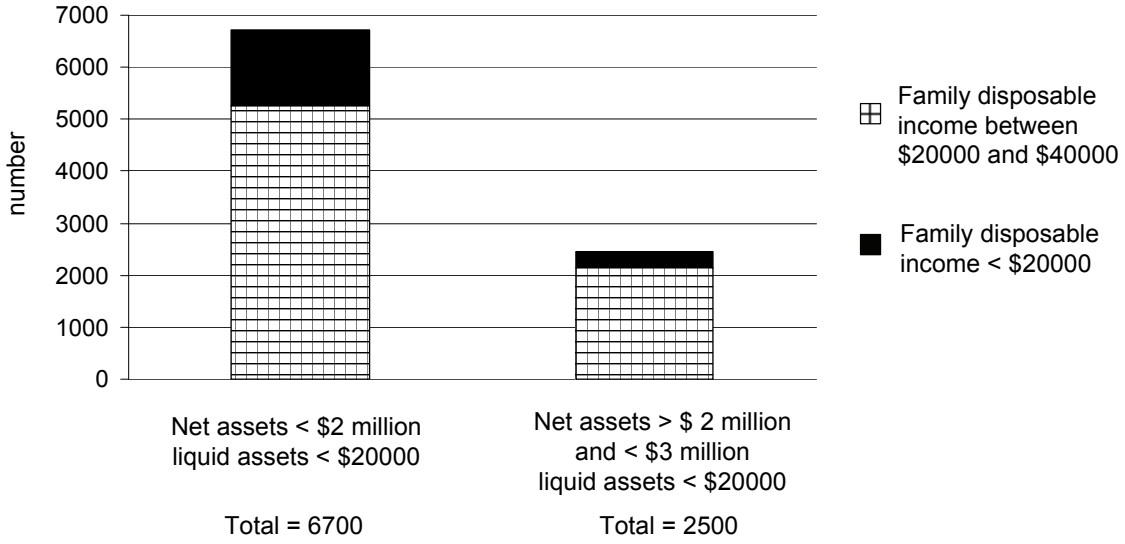
Assessment of eligibility based on income levels is more difficult. For example, in a two person household, if both are in receipt of the proposed payment, benefits would begin to phase out when incomes rise above $124 per fortnight. Alternatively, if only one household member received the proposed payment, benefits would begin to phase out when the other's income began to exceed $769 per fortnight (approximately $20 000 per annum) (box 9.2). Given this, two broad but indicative income cut-offs were used to determine potential eligibility:

- household disposable income (net farm income plus off-farm wages and investment income) under $20 000 for full payment
- household disposable income greater than $20 000 but less than $40 000 for partial payment.

These two income cut-offs suggest that around 5200 broadacre and dairy farmers would potentially be eligible for full payment under the income support scheme (family disposable income below $20 000) and an additional 1500 would be eligible for partial payment (family disposable income below $40 000) (figure 9.8). A further 2500 would potentially be eligible for partial payment (those in the group with net assets greater than $2 million and below $3 million). This means that the

number of broadacre and dairy farmers eligible for income support could be reduced from around 17 600 to 9 200 by the income test.

Figure 9.8 **Broadacre and dairy farmers by net asset group with family disposable income[ab] below given thresholds, 2007-08**



a Defined as family share of net farm income (farm cash income minus depreciation) plus off-farm wages and investment income. **b** Data in this figure are presented on a farming family basis, that is showing the family's share of net farm assets and income.

Data source: ABARE (2009 unpublished).

To gain an appreciation of eligibility of farmers in other industries, further data was sourced from ABARE for vegetable and sugar farms. While the sample size was not large, it was found that 48 per cent of vegetable farmers and 31 per cent of sugar farmers had farm net asset and liquid asset levels in line with eligibility requirements for the proposed scheme. (Figure 9.6 in the body of the chapter provides a diagrammatic representation of possible eligibility for the proposed scheme for available data sets.)

It should be noted that these figures do not take into account the fact that more than one member of a farm household may be eligible for income support. Under ECRP, partners of eligible farmers automatically receive payment. This is not the case for the proposed scheme where a test will be applied to each individual applicant such that all recipients (including partners of farmers) must demonstrate that they normally receive a significant proportion of their income from farming.

Thus a complicating factor in this analysis is the possibility that in some households there will be two members eligible for assistance and in others only one member will be eligible.

At the end of November 2008, there were 19 400 farm households across Australia in receipt of ECRP. Given that ECRP is delivered as a single payment for both members of a couple this equates to around 30 000 individuals receiving a assistance at Newstart levels (as approximately two thirds of ECRP recipients receive payments for two adults).[2]

This suggests that there will be more recipients eligible for the proposed income support scheme than currently projected. However, the proportion of households that receive a double payment will be less than that for ECRP.

Given the lack of data on all farm types in Australia and of income levels of each spouse in the household and the fact that income levels for farm households fluctuate considerably such that those who may appear eligible given data from 2007-08 may not be eligible in subsequent years, it is difficult to get an accurate picture of the number of farmers who may access this scheme, even for a snapshot in time.

[2] 74 per cent of ECRP recipients had partners. However, 7 per cent had partners who were already receiving another Centrelink payment.

10 Related policies

Key points

- There is a range of policies outside the agriculture portfolio that are often at cross purposes to drought policy.
  - Some of these problems would be rectified by the implementation of the recommendations in this report.
  - Other improvements in coordination require changes to water and natural resource management policies.
- The extent to which irrigators will be affected by future periods of low inflows depends to a large extent on progress with water reform and the implementation of the Water for the Future plan.
- Effective natural resource management policies can potentially reduce some of the negative impacts of drought.
- Many government-provided human services are important for the wellbeing of people in rural and regional areas, including during droughts. In general, it is preferable for these services to be provided on a continuous basis, rather than being temporarily available during drought.

10.1 Introduction

A range of policies outside the agriculture portfolio, such as those related to water, natural resource management and climate, influence farmers' abilities to manage climate variability and change. Other broader policies, such as those related to health, education and industrial relations, influence agricultural performance and/or the wellbeing of people in rural and regional areas more generally (figure 7.1).

The occurrence of drought is but one factor, among many, that needs to be considered within these broader policy settings. As it is beyond the scope of this inquiry to consider all of the relevant factors, this chapter does not make policy recommendations. Rather, its purpose is to explain the influence of non-agricultural policies on drought-related outcomes and identify where better coordination between these policies and agricultural policies is needed.

10.2 Water policy

Water policy is concerned with, among other things, the arrangements for allocating water between individuals and groups that wish to use it for irrigation, industrial purposes, mining, servicing rural and urban households and environmental services. Water policy reform in Australia has been pursued through the National Water Initiative (NWI) and preceding processes established by the Council of Australian Governments (COAG 2004).

Where water policy is well designed, the negative impacts of drought will be less than they would otherwise be. In this regard, some of the hallmarks of good water policy include:

- entitlements and other water products having well defined characteristics (for example, the security of supply) that allow irrigators to understand and manage water-related risks
- trading arrangements that allow water to flow to its highest value use (within constraints, such as the physical connectivity of water systems)
- not unnecessarily restricting irrigators' choices about water use and trade between irrigation seasons (PC 2006).

There is evidence that some of the policy reforms implemented through the NWI, particularly those allowing increased development of water trading, have been of benefit to many farmers during the latest drought. According to the Department of the Environment, Water, Heritage and the Arts:

> Water trading has played a vital role in assisting (irrigation) farmers during this period of ongoing drought and very low water allocations, and gives them much greater flexibility in the way they operate their businesses and manage their risks. (sub. 107, p. 11)

A report examining changes in the Victorian Murray Valley found the following:

- With or without water trading, drought would lead to tough times and many property foreclosures. Water trading delays and prevents some of the sales by giving farmers an additional asset with which to manage debt …
- Without temporary trade the dairy industry would have fared much worse than it did during the past 10 years of drought.
- Even with temporary trading many dairy enterprises collapsed as a result of the extraordinarily low seasonal allocations of 2002-03 and 2006-07. Permanent trading meant that those farmers left farming with more money than they otherwise would have had.
- Without temporary trading many existing horticultural enterprises in the Goulburn system would not have survived the extraordinarily low seasonal allocations.

- Many mixed farms survived the low seasonal allocations by selling water on the temporary market, thus making more money than they would have done by growing crops. (Frontier Economics 2007, p. xiii)

There would appear to be potential to improve outcomes further by reforming various arrangements that govern or influence water trading. First, there is currently an annual threshold limit on the level of permanent trade out of irrigation districts of 4 per cent of the total water entitlement. In some cases this limit prevents trades from occurring that would be beneficial to both the buyer and seller. Accordingly, the limit imposes costs on the community and it is not clear that there are substantive benefits that offset this. On the release of a National Water Commission (NWC) report on Australian water markets, Ken Matthews (CEO of the NWC) stated:

> … the case previously put by the Commission for reviewing the 4 per cent per annum interim threshold limit on permanent trade out of irrigation districts is stronger than ever. (NWC 2008b)

The 4 per cent limit is due for review in 2009.

Second, irrigators who sell their permanent water entitlement are sometimes required to pay exit (or termination) fees. The Productivity Commission has previously found that exit fees constrain trade in entitlements and impede adjustment (PC 2006). The Australian Competition and Consumer Commission is currently considering this issue and its draft advice is that the maximum fee should be reduced by one-third (ACCC 2008).

Finally, the New South Wales Irrigators Council (sub. 62) reports that government departments sometimes take an excessively long time to process water trades and barriers to interstate trade in water entitlements impede the efficient operation of water markets. A report by the NWC confirms that there is room for improvement in some states in these areas (NWC 2008c).

Notwithstanding the benefits delivered by reforms to date, the low inflows over recent years have been exacerbated, in some respects, by deficiencies in water policy. The major problem is that of overallocation, most notably in the Murray-Darling Basin. According to the Department of the Environment, Water, Heritage and the Arts:

> This situation has arisen as a result of past decisions by state and territory governments to issue more entitlements than can be delivered by water systems, and by a failure in water sharing plans to set the pool of water available for consumption at sustainable levels. (DEWHA 2008b)

To address this overallocation the Commonwealth Government plans to spend $3.1 billion on buying back water entitlements from willing sellers as part of the Water for the Future plan. Under this plan, a further $5.8 billion has been allocated to measures such as upgrading irrigation infrastructure and assisting non-viable irrigators to exit the industry (DEWHA 2008a).

While droughts will continue to have negative impacts on irrigators, the extent of these will depend to a large degree on how the Water for the Future plan is implemented and on the progress of policy reform, through the NWI and other processes. It is not within the scope of this inquiry to make recommendations in these areas.

There is a need for water policy and agricultural policies to be better coordinated to prevent poor outcomes, as discussed below.

Drought relief payments can reduce the gains from water trading

As discussed in chapter 6, current programs under the National Drought Policy, particularly the Exceptional Circumstances Interest Rate Subsidy, have supported some unviable farm businesses. As a consequence, some farmers who would otherwise have exited, or sought alternative management arrangements for their properties, have continued to purchase water for irrigation. Others may have purchased more water than they otherwise would have, due to receipt of EC payments. Where this occurs water prices for other users will tend to increase, making it more difficult to combat overallocation. It can also work against water being allocated to higher value uses. The policy approach advocated by the Commission in this report will reduce the extent of these unintended outcomes.

Assistance with drought preparedness measures can reduce inflows

Some drought preparedness measures, such as laser grading irrigation farms, can reduce the quantity of irrigation water used per tonne of agricultural output. Because of this, it is often thought that assisting a farmer to implement such measures will not only benefit that farmer but will save water that can then be used by other irrigators or for environmental flows. Often, however, such measures actually reduce the quantity of water available to other water users. This is because they tend to reduce the volume of water that leaves the farm to flow back into rivers or groundwater sources (PC 2006; Crase and O'Keefe 2008). When farmers decide to use the water savings to increase their production, the net result is that there is less water available for other water users. Other preparedness measures, such as building farm dams, unambiguously reduce the quantity of water available to other users.

Accordingly, where governments subsidise preparedness measures, for example through irrigation management grants, they may effectively be providing a benefit to one farmer at the expense of other farmers and of environmental flows.

It should be recognised, however, that even without subsidies, farmers may overinvest in such measures compared to what is socially optimal. This is because their decisions are quite legitimately focused on improving their farms and are not generally influenced by the costs they impose on downstream water users. This problem can only be rectified by changes to water policy to address the connectivity of water systems. This issue is recognised in the NWI, but is yet to be adequately addressed (Young and McColl 2008).

Subsidies for irrigation infrastructure can impede adjustment

There is potential for some of the Water for the Future allocation of funds to upgrade irrigation infrastructure to be wasted if there is not effective coordination with agriculture policy and recognition of the various adjustment pressures at play within agricultural industries that use irrigation water. For example, a costly infrastructure upgrade could be made redundant if the farmers it served decided to exit and sell their water entitlements.

Where governments are actively seeking to purchase water, it is counterproductive to improve infrastructure, which then increases the value of water rights. It is essential to make the buybacks before deciding which infrastructure is worth upgrading.

In commenting on the draft report the National Farmers' Federation (NFF) questioned this conclusion, citing an ACIL Tasman report that says:

> … to effectively manage the risk of paying too much to return the target flows to the environment, there is a solid prima facie case for considering urgent active investment in identifying and proving up an expanded set of infrastructure projects. (ACIL Tasman 2008, p. ii)

There is a risk that the water buyback program will prove to be more expensive than necessary if it is not well designed. However, the Commission cautions against using investments in water infrastructure to manage this risk. This is because such investments:

- are often a more costly way of 'saving' water compared to buying water in the market (PC 2006)
- can produce savings that are illusory when 'saved' water is removed from return flows to rivers and groundwater sources

- can be rendered redundant if the farmers it serves decide to sell their water entitlements.

Exit assistance provided through water policy can reduce adjustment pressures in agriculture

In September 2008, the Commonwealth Government announced $150 000 exit payments for small block irrigators in the Murray-Darling Basin who agree to sell all their water entitlement to the Commonwealth (Rudd and Wong 2008). The assistance will allow eligible irrigators with permanent water entitlements of at least 10 megalitres, who choose to leave irrigated farming, to stay on their land. In addition, grants of up to $10 000 each will be provided for advice and training, and for removal of permanent plantings (such as grape vines).

If assessed in terms of addressing the overallocation of water, this would appear to be an extremely high cost measure. However, it does have the benefit of reducing adjustment pressures, as it would be expected that many of those who apply would not have a viable future in irrigated agriculture. By allowing people to remain in their home and retain their land, the measure also addresses one of the non-financial impediments that can prevent people from exiting an unviable farm business (chapter 9). Many small irrigators are located near regional centres where alternative employment may be available which, in combination with assistance for training, lessens the chance that recipients will have difficulty finding employment.

Deficiencies in water policy can increase calls for drought assistance

Some inquiry participants expressed the view that government water policy had been deficient and that this justified the provision of drought assistance to irrigators. For example, the Rural Financial Counselling Service Victoria — Murray Mallee argued:

> A major factor contributing to the lack of irrigation water is the poor risk assessment associated with the allocation of water rights throughout Australia's irrigation districts by successive governments … Financial support for farmers in a format which encourages better performance in the future is therefore justified, governments must accept some of the "responsibility" for the current lack of irrigation water, and it is not all due to drought and climate change. (sub. DR151, p. 3)

Water policy is an important avenue through which irrigators' concerns regarding drought should be addressed. In the Commission's view, efforts should be directed to achieving sound water policy, and this leaves no residual role for governments to provide any drought-related assistance to irrigators additional to that outlined in chapters 8 and 9. The NWI sets out a framework for assigning risks to water access

entitlement holders and Commonwealth, state and territory governments regarding any future reductions in the availability of water. Calls for extra assistance to irrigators through future drought policy amount to an attempt to renegotiate this assignment of risk and should be resisted.

10.3 Land-based natural resource management policy

Effective natural resource management policies can potentially reduce the negative impacts of drought in two ways. First, they can result in agricultural land being in better condition at the onset of drought (for example, greater vegetation cover, less soil erosion and less salinity). Second, they might involve payments to farmers for the provision of explicit environmental services to the broader community. Such an additional income stream would likely be relatively independent of climatic conditions and could help to diversify farmers' incomes.

Several inquiry participants argued that government payments to farmers for providing environmental services should be part of the answer to low farm profitability due to drought or other cause. For example, Dragon Point Enterprises stated:

> My suggestion is that we should turn the environment card face up: support farming enterprises to regenerate their production environments through stewardship arrangements that provide a return comparable to other investments. (sub. 15, p. 2)

A range of natural resource management and environmental policies seek to improve the environmental management of agricultural and other land. Some of these policies do provide for payments to landowners for the provision of specific environmental services:

> The Australian Government has recognised the benefits of incentive-based schemes to improve environmental conservation and management. The Government already has a scheme to purchase high value conservation outcomes for the public good, in the Environmental Stewardship Program under the *Caring for our Country* initiative. (Department of the Environment, Water, Heritage and the Arts, sub. 107, p. 12)

The Environmental Stewardship Program will offer contracts to landholders who can provide environmental services on a cost-effective basis. The targets for investment are:

- nationally endangered or vulnerable species and ecological communities
- migratory species and wetlands for which Australia has international responsibilities
- natural values associated with world and national heritage places.

The budget for the program is $50 million over four years, with an indication from the Commonwealth Government that this may increase in the future (DAFF and DEWR 2008). In addition to this program, some state governments, such as Victoria, have programs in place that pay landholders for the provision of environmental services.

The question of whether there should be a greater emphasis on payments to landowners to achieve desired environmental outcomes (and perhaps less emphasis on proscriptive regulation) is one that should be addressed in the ongoing development of these policies. The Commission has previously set out some principles for determining who should bear the costs associated with environmental protection that are relevant to this process (box 10.1).

The Commission's preferred approach, therefore, is to develop natural resource management policy based on sound principles and evidence, rather than adjusting policy settings to meet drought-related objectives. It would be poor public policy to pay farmers for providing environmental services on the rationale that this would provide them with private benefits during drought. The Commission's approach would appear to be consistent with that of the NFF, that stated:

> … the NFF is cautious in linking environmental conduct to other programs such as drought support … we do believe the merits of environmental stewardship stand on their own two feet. (sub. DR176, p. 38)

Two coordination issues related to natural resource management policy are discussed below.

Drought assistance can result in environmental damage

Coordination is important because drought policy can unwittingly result in environmental damage (chapter 6). This is acknowledged by the Department of the Environment, Water, Heritage and the Arts:

> Every effort should be made when considering alternative drought policy approaches to avoid perversely undermining investments made under the $2.5 billion *Caring for our Country* and other environmental initiatives. (sub. 107, p. 6)

There is, therefore, a need for natural resource management policy and drought and other agricultural policies to be better aligned and coordinated. The approach recommended by the Commission improves on past policy in this regard, for example, by phasing out fodder subsidies that can promote environmental damage.

Box 10.1 Sharing the costs for environmental protection

The Commission's 2004 inquiry report *Impacts of Native Vegetation and Biodiversity Regulations* considered cost-sharing arrangements for protecting the environment and providing environmental services. The following is an extract from that report.

Landholders' responsibilities

In the Commission's assessment, it is reasonable to expect landholders in the aggregate to bear the costs of actions that directly contribute to sustainable resource use and, hence, the long-term viability of their operations. Thus, actions and mechanisms to 'internalise' efficiently what could be broadly described as externalities occurring within and between regions — landholder actions affecting soil and water quality, for example — would constitute the responsibility of landholders individually and/or as a group. This approach does not mean that individual landholders should only be expected to undertake what is in their private interests — it implies a broader responsibility to their neighbours and communities and, indeed, where actions have broader impacts, surrounding communities.

Society's responsibilities

In the Commission's assessment, the wider public should bear the costs of actions to promote public-good environmental services — such as biodiversity, threatened species preservation and greenhouse gas abatement — that it apparently demands, and which are likely to impinge significantly on the capacity of landholders to utilise their land for production.[1]

This assessment is not simply based on some notion of fairness (although perceived fairness is not irrelevant when landholders are being relied upon to provide the environmental services demanded by the wider community). It is based on the reality that achieving the environmental outcomes that society desires on private land as efficiently and effectively as possible will require clear specification of the environmental outcomes demanded and the ongoing cooperation, knowledge and effort of landholders who ultimately must deliver those outcomes on their land.

Over and above agreed landholder responsibilities, the Commission therefore considers that public-good conservation should be purchased from individual, or groups of, landholders.

Source: PC (2004, p. XLI).

[1] The context for greenhouse gas abatement has changed since 2004. At that time there was no general requirement for industries to undertake costly action to reduce greenhouse gas emissions. In such an environment, it would be appropriate for the broader community to pay if a particular industry was required to reduce its emissions. Since then the Commonwealth Government has announced that the Carbon Pollution Reduction Scheme will be introduced and this will involve the majority of industries (and indirectly, all consumers) paying for whatever greenhouse gases they emit.

Natural resource management policy have synergies with drought management

A CSIRO report, which was included in an Australian Conservation Foundation submission (DR128), suggested a way that environmental stewardship agreements could be designed to have synergies with farmers' management of drought:

> An agreement might set out … that specified parts of an on-farm conservation area could be moderately grazed on a long rotation — such as at 40 per cent of the normal stocking rate once every nine years — where this was compatible with the environmental outcomes sought. Such provisions might mimic the impacts of natural climate variation. Provisions of this kind would provide improved on-farm management of climate risk (such as by providing additional fodder), making the conservation agreement more attractive to landholders. (Hatfield-Dodds and Procter 2008, p. 28)

This concept, which was also mentioned in an NFF submission (sub. DR176), would appear to be worthy of further investigation.

10.4 Climate policy

Of all the areas of climate policy that can impact on farmers' abilities to manage climate variability and change, two of the most important are:

- research aimed at improving seasonal and interannual climate forecasts
- climate change mitigation measures, such as the planned Carbon Pollution Reduction Scheme.

Research aimed at improving seasonal and interannual climate forecasts is discussed in chapter 8.

The Commonwealth Government has announced that it will introduce the Carbon Pollution Reduction Scheme in 2010. This scheme will impose a cost on those emitting greenhouse gases in certain sectors of the economy. One consequence is that energy and some goods whose manufacture is emissions intensive will be more expensive than they would otherwise be, driving up production costs, including for farmers. Farmers may also have an opportunity to earn income from the scheme if they diversify into eligible forestry activities that remove carbon dioxide from the atmosphere. Such diversification could make farm businesses more self-reliant during drought.

The Commonwealth Government has indicated that agricultural emissions (such as those associated with the digestive processes of livestock and with fertiliser use) may be included in the scheme from 2015, suggesting that farmers may need to be

planning for the possibility that there will be a price signal on agricultural emissions from that time (Department of Climate Change 2008).

10.5 Other policies

The outer ring of figure 7.1 includes the more generic policy frameworks that impact across the entire community, such as economic policies, human services (such as health and education) and the social security safety net. Economic policies influence the operations and profitability of all businesses, including farm businesses. For example, trade policy can increase profitability through improving access to export markets. Human services and the social security safety net, on the other hand, focus on the wellbeing and development of individuals and families. In the context of hardship caused by drought or other circumstances, these areas are of particular importance, as recognised by the Expert Social Panel:

> The Panel believes people should be the priority (and not the farm property or the respective industry), and propose future policy be about people: changing perspectives on dryness. (Kenny et al. 2008, p. 1)

The Commission strongly concurs with this conclusion.

Human services

A wide range of education, health and aged care services are provided, or funded (at least in part) by governments. State and territory governments have the major role in delivery of most of these services.

Governments attempt to achieve equitable access to these services. This often entails governments devoting more resources per person to groups in the community that have special needs or are more costly to provide accessible services to. Accordingly, governments often spend more per person on delivering equivalent levels of services, such as school education, to people in rural and regional Australia than people in major cities. For example, expenditure per government primary school student in New South Wales was 14 per cent higher in nonmetropolitan than metropolitan areas, in 2003-04. For Victoria it was 7 per cent higher and for South Australia 10 per cent higher (SCRGSP 2006).

Despite this, people outside the major cities, and particularly those in more remote areas, will continue to have greater travel times and have to go to provincial centres for higher order services.

This context needs to be borne in mind when considering ways to improve services to people in rural areas. One theme of the Expert Social Panel's report is that governments should consider the social impacts of withdrawing services from small towns affected by dryness. This is important, although it is also necessary to weigh up the impacts against the opportunity costs of maintaining services in the face of changing patterns of settlement.

The Expert Social Panel observed that drought-specific human support service providers 'frequently did not appear to have the appropriate training or skills to effectively engage farming individuals or rural communities' (Kenny et al. 2008, p. 37). In the Commission's view, these shortcomings are difficult to avoid when temporary services are set up in response to a drought. In addition to potential training and skills problems, new service providers inevitably take time to become known in the community and to develop relationships with potential clients and other service providers. Appendix E discusses various drought-specific human support services operated by state and territory governments.

In the Commission's view the emphasis should be on human services that are available all of the time, rather than on drought-specific services. Services that operate on a continuous basis should be responsive to community needs. The occurrence of drought is one factor that influences these needs, but chapter 3 indicates it is often not the major driver of need.

The Expert Social Panel also found a need for better coordination and referral mechanisms between service providers. The Commission agrees with this. The Expert Social Panel report includes a detailed consideration of these issues.

Social security safety net

Drought and other circumstances can result in some farm families being in hardship. As discussed earlier, the Commission's view is that there should be a farmer-specific income support program that is able to be accessed on a temporary basis. The design of this program, including how it should be coordinated with the general social security safety net, is discussed in chapter 9. Even with a program designed for farming circumstances, aspects of the general social security safety net, such as the Age Pension, would remain relevant to some farmers. The general social security safety net is also available to support operators of farm dependent businesses and farm employees (and their families) in a range of circumstances.

Tax policy

Tax policy can interact with drought policy in a number of ways and can influence the way farm businesses are managed during drought. Perhaps the most important of these relates to the tax treatment of livestock. The value of livestock that are bred by a farm business (referred to as natural increase) that is used for tax purposes is often substantially less than the market value. For example, cattle can have a tax value of $20 per head and a market value of well over $300 per head.

This creates an incentive for farmers to delay the sale of livestock so as to defer the payment of tax. During a drought this can result in farmers delaying destocking, which may cause land degradation (Douglas 2002). There is provision in the tax system for the profits arising from the forced sale of livestock due to lack of pastures caused by drought, fire or flood to be spread over five years. While this may to a limited extent counteract the incentive to delay destocking, it is in itself inconsistent with the principle that the sale of trading stock should be taxed when it occurs, irrespective of the reason for the sale (Douglas 1995).

There would appear to be scope to alter these tax arrangements so as to achieve both a more consistent treatment of agriculture compared to other industries and more appropriate incentives for destocking at the onset of drought. Recommendations for how this could be achieved are, for example, given in Douglas (1995). It is noted that a 'root and branch' review of Australia's tax system is currently being undertaken.

Regional development

As discussed in chapter 2, provincial and coastal centres are growing in part by attracting spending that previously occurred in small towns and by offering commercial services, employment, education, health services and retirement lifestyles. In addition, small towns are feeling the impacts of farm productivity improvements through scale economies and capital substitution for on-farm labour. Some inquiry participants saw these changes in a negative light and argued that drought policy should seek to slow them.

While drought can increase the rate of some of these changes, it is not the main driver and the pressures for change do not dissipate when a drought is over. Accordingly, it is the Commission's view that the maintenance of small rural communities should not be a rationale for drought policy. Any attempt to influence the future of rural communities would be better pursued through regional development policies. These policies need to be developed with an appreciation of the drivers of change.

11 Implementation and outlook

Key points

- The exceptional circumstances (EC) declaration process should be terminated.
  - There is no need for a 'trigger' for drought relief, nor for 'lines on a map' to show eligible areas. The concept of a once in 20-25 year extreme or exceptional drought is unnecessary and unworkable given climate variability, let alone, climate change.
  - Areas currently in EC should continue to be reviewed as to whether EC status is warranted.
- Most current programs to provide support to farm businesses during drought should be wound up as soon as practicable. Any new schemes would require thorough ex ante justification and independent ex poste evaluation of their effectiveness and efficiency within five years.
- It is vital that there is a high degree of confidence that the new policy approach will be consistently and rigorously applied. This is best achieved through an incentives based intergovernmental agreement with independent compliance monitoring.
- Adopting the Commission's recommended approach would be likely to result in:
  - agricultural production being slightly higher than it would otherwise be.
  - farm families and rural communities, in the longer term, suffering less acutely from the effects of drought because they would be better prepared for the variability and change in Australia's climate.

11.1 Context for reform implementation

Drought policy in Australia since 1992 has pursued reasonably sound stated objectives, but the measures and instruments adopted have been only tenuously related to those objectives and, at times, inconsistent and incompatible with them. In practice, implementation has been shaped more by political considerations and responsiveness to lobbying. Longstanding expectations by many farmers that assistance will be provided during drought events, regardless of the policy architecture, have proved true. Previous reviews of the National Drought Policy, for instance, all recommended the abolition of interest rate and transport subsidies. Yet, both subsidy regimes have been expanded. With the latest drought, ad hoc policy

changes, without the benefit of review, led to increases in the coverage, quantum and expediency of delivery of assistance.

Despite the compelling evidence from earlier reviews of the need for a policy framework that actually promotes farmers' self-reliance and preparedness, this has not been realised. And a set of recommendations from this inquiry — if driven solely by fiscal stringency — would likely suffer a similar fate. Appropriately, and consistent with its approach more generally, the Commission has balanced effectiveness, efficiency and equity to improve the wellbeing of the community as a whole. This is evident in its proposed income support scheme for farm households which have assets of up to $3 million, and advocacy for sufficient public funding of advice, training and extension services — particularly given the level of private benefits that arise. Accordingly, this report's proposals should not be viewed as a base from which more munificent policy responses are built.

If the policy recommendations in this report are adopted, the consistency and rigour with which they are implemented will significantly influence outcomes. A successful outcome is critically dependent on two key considerations.

1. *Managing the transition from the current to the new approach.* A balance must be struck between fairness for current beneficiaries of EC assistance on the one hand and, on the other, the costs of a prolonged transition involving dual regimes running in parallel (section 11.2).
2. *The credibility of the new policy direction.* The history of drought policy in Australia (chapter 4) demonstrates the problems with instituting reform — recommendations from reviews have been ignored; policy making has been disjointed and poorly linked to objectives; and commitments entered into by governments have been breached (section 11.3 and 11.4).

11.2 Making the transition

The Commission's recommended policy approach does not include any drought-triggered programs. Drought triggers — whether attempted to be defined as 'exceptional', 'extreme' or any other such variation — have proven to be a failure at best and divisive at worst. Further, as this report demonstrates, they are not relevant to the formulation of programs aimed at developing self-reliance, preparedness and sustainability. There is no place for them in any future policy architecture. Accordingly, Exceptional Circumstances (EC) declarations will become redundant. Therefore, no new EC, prima facie or interim assistance, declarations should be made. Areas currently in EC should continue to be reviewed as to whether EC status is extended in duration or rescinded.

In undertaking the transition however, there should be no sudden change to the arrangements in EC declared areas that would leave people worse off. However, to mitigate the inequities that would inevitably arise between EC areas and non-declared areas, the former should not remain declared for too long.

Under the Commission's recommendations, farm families in hardship could access income support, regardless of drought events, from 1 July 2009 (when the Transitional Income Support scheme ends). But for areas still in EC, relief payment (ECRP) recipients would continue to access assistance different to that available to other farm households — with income and assets tests in excess of those available to the rest of the community, no mutual conditionality and no time limits. In addition, recipients of the EC interest rate subsidy (ECIRS) — for which a valid rationale has never been established — would continue to access unconditional funds, whereas farm businesses in non-declared areas could not.[1]

Moreover, within a given budget constraint, the effectiveness of new arrangements could be constrained if a large proportion of available funding continues to be channelled into the decreasing number of remaining EC areas.

By definition, the inequities and inefficiencies from a dual stream system continue as long as any area remains in EC. In recognition of the undesirability of allowing such arrangements to perpetuate, the Commission proposed in its draft report that, while an area remains EC declared, existing recipients of the ECRP and ECIRS should be able to continue to apply for those benefits, but that the schemes should terminate on 30 June 2010 (PC 2008a).

Two weeks after the Commission released its draft report, Ministers with responsibility for primary industries affirmed that 'the EC rules will not change for those producers currently receiving assistance in existing EC-declared areas' (PIMF 2008b). Subsequently, the Minister for Agriculture, Fisheries and Forestry stated in the Parliament that:

> … [the national review of drought policy] is a review of how we will handle the next drought and does not carry changes to the protections people enjoy when they are going through the current drought … (Burke 2008a).

The implication of these developments is that a 30 June 2010 end date for EC arrangements would not be accepted.

[1] These anomalies would be exacerbated if small business support schemes were to be extended beyond 30 June 2009.

Minimising transitional costs given governmental undertakings

Notwithstanding governmental undertakings, the costs and associated inequities of having farmers in similar situations subject to different arrangements must ultimately be addressed. Allowing such a situation to linger for many years would be costly, inequitable — probably more divisive than the current 'lines on map' problem associated with the EC system — and inefficient.

The Commission considers that there are actions that could taken to reduce these costs, but which are consistent with the undertakings given by government.

- Given the high level of benefits flowing to some producers in EC areas, the pressure placed on assessments of EC status would be amplified. That process has been shown to lack transparency and to have been subject to manipulation. There is a strong case for the assessments made by the National Rural Advisory Council (NRAC) to the Minister for Agriculture, Fisheries and Forestry and the Minister's subsequent reasoning to be made transparent.
- Given the wording of the Primary Industries Ministerial Forum Communiqué — that 'EC rules will not change *for those producers currently receiving assistance* in existing EC-declared areas' — there should be no new enrolments for EC assistance in declared areas. However, in new cases of hardship, ECRP should be available until the new farming family income support scheme is operational.
- The lack of conditionality for farmers receiving EC assistance should be rectified even if support continues until an area's EC status is rescinded:
  - ECRP recipients should be subject to similar case management as that which will apply to people accessing the new farming family income support scheme
  - ECIRS recipients should be subject to rigorous assessment (as occurs in Victoria, for example) including demonstrating appropriate financial and business management planning.

Ultimately, EC assistance in the residual legacy areas cannot run in perpetuity. A pre-announced date (even some years into the future) for an end to EC assistance would be reasonable in order to facilitate a transition to the new arrangements.

RECOMMENDATION 11.1

The Exceptional Circumstances (EC) declaration process should be terminated. No new areas, full or interim, should be declared. Currently declared areas could have their EC status extended where they meet the criteria. To mitigate the inequities and costs of running two regimes in parallel:

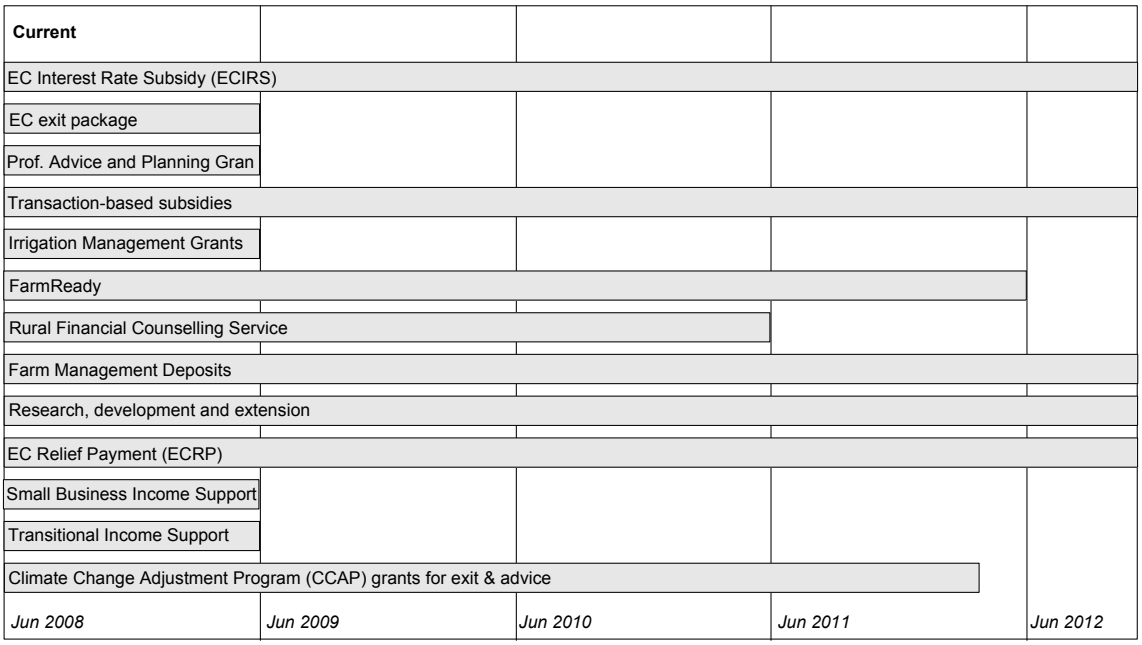
- ***assessments and advice made by the National Rural Advisory Council on extension or revocation of EC declarations and the Minister's reasons for the subsequent decision should be made public***
- ***in areas that remain declared, only active recipients of EC assistance measures should be eligible to reapply, but enrolments for EC relief payments should cease once the Farming Family Income Support scheme commences***
- ***continuing recipients of EC interest rate subsidies should be subject to rigorous assessment including demonstration of appropriate financial and business management plans***
- ***continuing recipients of EC relief payments should be subject to similar case-management arrangements as those applying to recipients of the Farming Family Income Support scheme***
- ***an end date for all EC arrangements that provides sufficient time for a transition to the new arrangements should be pre-announced.***

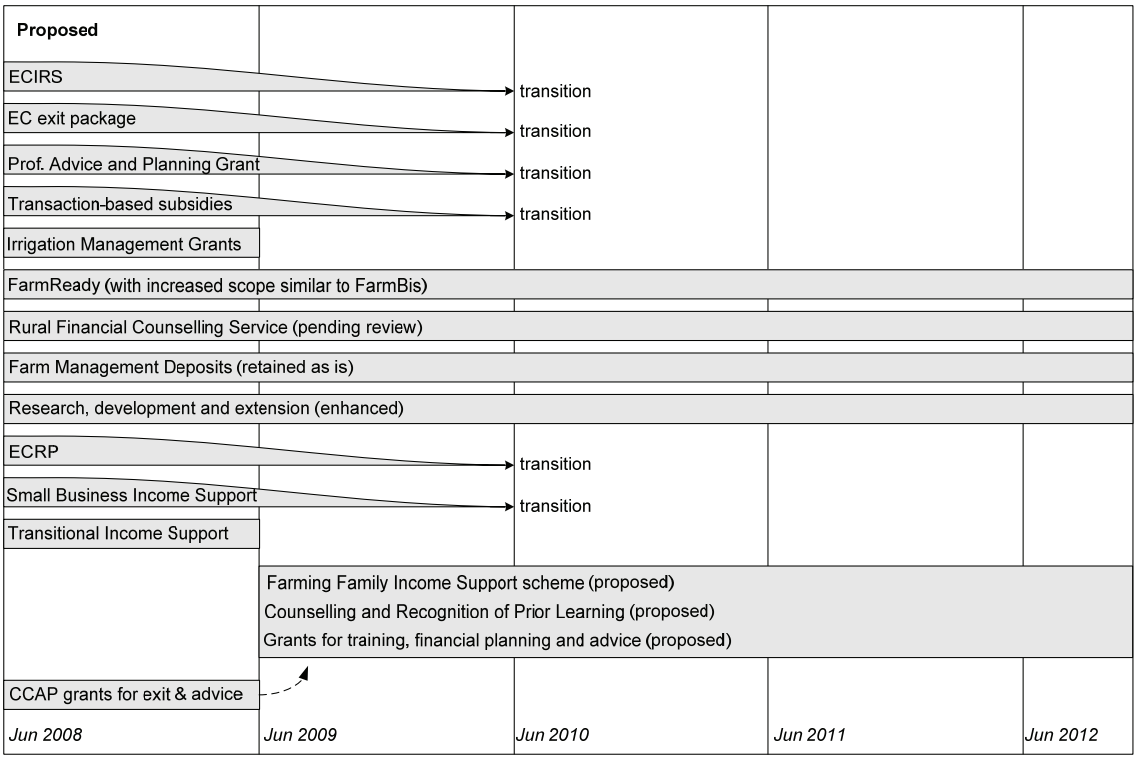
In relation to other EC and climate change related measures:

- EC Small Business Income Support, the EC Exit package and the EC Professional Advice and Planning Grant are all scheduled to end on 30 June 2009. However, given the affirmation by primary industries' Ministers that the EC rules will not change for declared areas, these schemes may be extended.
- The Murray-Darling Irrigation Management Grant and Transitional Income Support programs should end on 30 June 2009, as scheduled.
- Drought-triggered transaction-based subsidies administered by state and territory governments should be terminated as soon as possible — with the timing to be determined through negotiation of an intergovernmental agreement (IGA) (see below).
- Some elements of the Climate Change Adjustment Program (CCAP) should be subsumed within the new Farming Family Income Support program. Others, such as the CCAP exit payments available under this program, do not appear to have a clear rationale and so consideration should be given to terminating them.
- All other new policy measures recommended in this report, together with the recommended policy improvements (such as those relating to the enhanced Farm Ready program) should be introduced as soon as is feasible.

The timing of the recommended transitional arrangements is shown in figure 10.1.

Figure 11.1 **Current and proposed arrangements**





11.3 Ensuring policy credibility

Many of the potential advantages of the recommended policy approach will be realised only if there is confidence that it will be consistently and rigorously applied. Progress towards greater self-reliance and preparedness for periods of financial difficulty would be undermined if there is an expectation that governments will eventually revert to providing reactive support when droughts recur. To date, such expectations have proved well-founded.

The Commission's recommendations are similar to those of past reviews. That such recommendations have not been adopted, or followed only briefly, highlights that policy credibility is a fundamental prerequisite for success. Fortunately, present circumstances appear more favourable for reform than previously. Specifically:

- current projections of climate change add weight to an argument for avoiding government support that impedes innovation, adaptation and industry adjustment
- Australian governments agree that current approaches to drought and EC are no longer the most appropriate in the context of a changing climate
- stakeholders such as the National Farmers' Federation, the NRAC, the Bureau of Meteorology–CSIRO and many individual farmers are also seeking an approach that does not involve an EC trigger.

These circumstances work in favour of achieving a credible commitment to a new approach based around self-reliance, preparedness and equity. Nevertheless, lobbying for reactive drought support could still create media and political dynamics for backsliding that are difficult for governments to resist.

A mechanism for strengthening policy credibility would be for the Commonwealth, state and territory governments to enter into an agreement that committed:

- the Commonwealth to provide funding to the states and territories through, but not necessarily limited to, the Australia's Farming Future initiative
- the Commonwealth, state and territory governments to not (re)introduce or maintain reactive business support for farmers and farm-dependent businesses.

By making full funding contingent on outcomes, an IGA would provide an incentive for state and territory governments to adhere to commitments. There is no complementary measure for achieving such discipline within the Commonwealth Government.

11.4 Intergovernmental cooperation

There are many forms of IGAs with varying degrees of effectiveness.[2] Typically IGAs arise in areas where the Commonwealth Government is best placed to co-ordinate policy, with state and territory governments undertaking much of the implementation. IGAs can therefore improve national consistency — for example, through uniform regulation, harmonisation or mutual recognition.

Various funding models apply to interjurisdictional arrangements. For example, under the IGA establishing the National Transport Commission, the Commonwealth contributes 35 per cent of the budget with the remainder contributed by the states and territories.

Changes to, and derogations from, commitments can be determined by voting arrangements (for example, consensus voting which can allow one jurisdiction to 'hold out', compared to majority voting). However, IGAs are not binding — a point the Victorian Government made to an earlier Commission inquiry:

> … no jurisdiction can be made to accept a decision that it sees as disadvantageous to its interests, even if supported by a majority of others. This … places the onus on officials-led coordination to work towards consensus agreement with ministerial negotiation to be used … where consensus is not achieved. (cited in PC 2009, p. 12)

To overcome such limitations, in certain instances, incentives have been used to encourage states and territories to adopt reforms. For example, under the National Competition Policy (NCP) the Commonwealth made 'competition payments' to the states and territories conditional on reforms being implemented. Compliance monitoring was undertaken by the National Competition Council and in some cases payments were withheld. Recently, the Commonwealth indicated that National Partnership Payments (NPPs) could be used to encourage the states and territories to implement reforms with national benefits (Commonwealth Government 2008).

A Commission review of the NCP found that granting (and withholding) incentive payments was an important element for its success (PC 2005a). However, because the Commonwealth did not face financial 'penalties', some states and territories were critical of its reform effort.

The Commission's study on national approaches to regulation arrived at several conclusions that are particularly germane to this review:

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[2] The Commission's supplement to its inquiry report on Chemicals and Plastics Regulation elaborates on national approaches to regulation, including a summary of forms of national arrangements (PC 2009).

- Effective national approaches need strong governance arrangements covering the development of a national policy response and its subsequent implementation, monitoring and refinement.
- Although the states are sovereign entities and hence are not formally bound by [IGAs], they promote transparency and accountability. The more successful IGAs feature … reporting requirements through which the jurisdictions report back to the Ministerial Council (or equivalent) on implementation issues.
- … monitoring the progress of states and territories in implementing agreed reforms, and rewarding those that meet reform goals, can help to progress policies that may otherwise falter. (PC 2009, pp. 37–8)

An intergovernmental agreement to promote farm sector self-reliance

Under the NCP model, incentive payments arose after a comprehensive assessment of the benefits and costs that would flow from achieving a comprehensive reform agenda. A similar approach is envisaged for the NPPs. As a general principle, there should be material net benefits on offer to warrant proceeding to an IGA. Moreover, given that incentive payments have an opportunity cost they should only be used where reform outcomes will deliver significant net benefits to the community.

On these criteria, the case for an IGA to underpin a new policy paradigm for a self-reliant and prepared farming sector appears compelling.

First, Australian agriculture operates in a national (and global) market. Yet in some cases, inputs and outputs are affected by inter-state distortions. For example, the current framework involves border anomalies through inconsistency of administration of national programs such as the ECIRS and the effects of state programs such as subsidies for stock transport. The status quo, therefore, is less effective than it could be.

Second, as noted, policy credibility will determine the success or failure of the recommended shift away from 'revolving door' funding unencumbered by any requirement to improve self-reliance, to a regime that aims to promote a farm sector that can better manage climate variability and change. Any reversion to the policies of the past would impose double adjustment costs on the farm sector — the transition towards self-reliance and preparedness would be halted and the sector would need to re-adjust to an environment in which taxpayers faced more farming risk.

Third, under the Commission's proposals, the Commonwealth would retain primary responsibility for an income support safety net for all Australians. In contrast, policy measures that aim to address weaknesses in business and risk management

skills, extension services and research and development — with geographic, demographic and localised climate dimensions — are better delivered by states and territories. For example, the Commission's proposal to improve the reach of Farm Ready would involve program funds being made available to state and territory governments to administer.

Fourth, many current state and territory programs would conflict with the new policy direction. Some involve duplication, others are counterproductive and some — such as fodder and transport subsidies —conflict directly with the objective of self-reliance and preparedness and potentially have adverse environmental impacts. There is also a wide range of state and territory policies that appear to confound regional development and drought assistance objectives. Related to this, all tiers of government provide a range of regional health, social and community services reinforcing that consistency in approach is desirable.

In addition, the need for program funding arising from this review (see chapter 8) in part obviates the need for specific and new targeted 'incentive payments'. Conditional commitments could be tied to funding that is already necessary.

In summary, there is a powerful rationale for an IGA that embodies a systematic assessment of compliance. It would not be appropriate for the Commission to devise a specific IGA. That is a matter for governments to negotiate. The following sections provide a principles based discussion to help guide the derivation of an IGA with a focus on:

- rationales and objectives
- matters pertaining to the quantum of assistance that might be linked to an IGA
- identifying areas of government activity that should be circumscribed to the extent that incentive payments could be withheld for breaches of commitments
- compliance monitoring.

Objectives

As noted above, the primary rationale for an IGA is to ensure the credibility and sustainability of a long term reform path that recognises that the primary responsibility for managing risks, including those from climate variability and change, rests with farmers. Governments need to agree that the focus of policy should be on people and communities, not propping up the 'bottom line' of individual businesses.

An IGA would need to be consistent with the revised and extended objectives of Australia's Farming Future (chapter 7).

Quantum of assistance

Specifying the quantum of funds that should be linked to any IGA is properly a function of governments to determine, taking into account commitments entered into and the relative roles and responsibilities ascribed to the Commonwealth, state and territory governments. Some participants contended that the assistance delivered through current Commonwealth programs should be earmarked for future initiatives — a starting point of well over $1 billion per year based on 2007-08. For example, responding to the Commission's draft report; the Queensland Farmers' Federation drew attention to farm 'business assistance' and submitted that:

> … the only substantive 'new' initiative offered by the Commission is to expand the Australia's Farming Future (AFF) initiative, especially the Farm Ready component. It is the view of QFF that this is neither a reasonable or credible trade-off given that Farm Ready is a $26.5 million program over four years. … it seems to us there is about $1.5 billion of 'business support' being removed without any real replacement programs. This is unacceptable … (DR123, pp. 1–2)

The Commission does not consider that past expenditures, particularly in recent years that reflect one of the three worst droughts in a hundred years, have validity as an ambit claim. (Nor did the Commission contend that current funding for Farm Ready was an appropriate indicator of future expenditure needs.)

Commonwealth funding for preparedness programs should reflect the actions necessary to meet specified objectives based on robust rationales. That is, the quantum of assistance needs to be sufficient to ensure that warranted programs are delivered effectively and efficiently and also account for the implementation and transitional costs of changing administrative structures. Expenditures in excess of that constitute a transfer of funds for other motivations — such as 'buying reform'.

State and territory governments also provide significant drought-related expenditures, some of which is inconsistent with encouraging self-reliance and preparedness. For example, from 2002-03 to 2007-08, New South Wales and Queensland spent over $186 million on transport subsidies (chapter 6 and appendix E). Terminating such programs would liberate state funds that could be used for more appropriate programs. Indeed, current state and territory expenditures on drought-related programs are part of the overall funding calculus that leaves open the possibility of an IGA with some matching funding components.

The cost of providing income support for farming families in hardship (chapter 9) is taken as exogenous for the purposes of an IGA-related funding. It is, however, relevant to the extent that, like the objectives of an IGA, it aims to not impede necessary structural adjustment.

Commitments

Any IGA should:

- incorporate agreed principles relevant to the types of program delivered by state and territory governments — both delivery of national programs (discussed in chapter 8) and jurisdiction-specific programs (see appendix E)
- address overlaps that arise across programs dealing with drought, structural adjustment and regional and community development, including:
  - taking into account matters identified in the Expert Social Panel report (Kenny et al. 2008) that imply Commonwealth and state funding initiatives to meet gaps in social support services available to help people cope with change.

Prior to committing to an IGA, state and territory governments should undertake a stocktake of their drought assistance, drought-related and overlapping regional programs with a view to consistency with the revised principles of the AFF. Consideration should be given to removing all drought triggers (state based drought declarations). Persisting with drought-triggered policy responses after the EC system has been abandoned would be inimical to treating drought as one of many normal risks that must be managed. In relation to this, it is instructive to draw on the Victorian Drought Interdepartmental Committee's proposal that drought assistance:

- should not undermine the incentive for businesses/farmers to prepare for drought
- should not be provided to businesses who have not taken available measures to prepare for drought
- should not set a precedent whereby Government will be responsible for climate related risks (SACES 2008b).

To the extent that state and territory governments consider it necessary to retain any specific drought-centric programs, then these principles have merit.

Most fundamentally, assistance should not involve measures that distort farm business decision making without a valid rationale. Accordingly, an IGA should include commitments that governments will not introduce transactions based subsidies (such as subsidies for interest payments and the transport of fodder, water or stock). This logic extends to other farm business costs such as rates, fees and charges which should not be subsidised by government. While a case might be made for deferring some charges in times of low incomes, they remain legitimate business costs. If farms are not sufficiently viable to prepare for such charges (through for example, Farm Management Deposits or short term business loans),

shifting these costs onto taxpayers (or other ratepayers) can only impede necessary and desirable adjustment.

If the IGA gives governments sufficient freedom to persist with providing loans and grants to farmers, funding should:

- be conditional on an assessment to ensure that the farm will be self-supporting in the longer term
- be directed to reinforcing longer term outcomes such as capacity building through improving farm business and risk management (see chapter 8), rather than specifying a technology or activity (for example, building silos).

More pragmatically, while government-provided incentives that enable farmers to carry out actions, adopt practices or undertake investments that are privately cost-effective are unlikely to be warranted, they may have a role to play in moving away from current flawed practices.

Greater degrees of freedom should be afforded governments in how they choose to meet the general social, health, welfare and recreational needs of regional communities. While such programs should be based on robust benefit-cost assessments, there may need to be sufficient scope for governments to 'do something' if extended drought events adversely affect rural and regional communities.

Rather than revert to assistance measures that are inconsistent with self-reliance and preparedness, it would be preferable — albeit perhaps not always warranted on efficiency criteria — for governments to meet such pressures through more generalised counter-cyclical expenditures via their regional programs. In addition to addressing the social and health needs of affected communities, this could include bringing forward justified regional infrastructure spending and/or increasing funding for catchment management authorities, pasture protection boards and shire councils to assist communities to manage and cope with change. As noted, the focus should be on people and communities, not individual private businesses.

Such actions would help alleviate the social costs of extended drought periods without conflicting with the objective of improving farmers' self-reliance and preparedness or of impeding necessary structural adjustment. As the rationale for triggering such measures is an assessment of need, a formulaic drought trigger would be inappropriate.

Finally, while an IGA needs to inhibit the parties from engaging in activities that conflict with policy objectives, it should not prescribe uniformity — Western Australian broadacre farms and pastoral rangelands are different to irrigated

horticulture establishments. States should not be constrained from introducing novel measures (consistent with the overarching principles and objectives of an IGA) that could be beneficial.

Compliance

An IGA can assist state and territory governments to undertake reform. It can put governments in a stronger position to resist lobbying by pointing out that reversion to inefficient assistance measures will have adverse funding consequences for the state. This structure is superior to the strategic incentives within the current EC system which all work in the direction of acquiescing to lobbying (chapter 5).

That said, for policy credibility, there will still be a need for appropriate monitoring of compliance and sanctions for breaches of agreed commitments. This can be viewed as imposing 'penalties', but is more correctly akin to withholding some funds for commitments that have not been met.

A weak agreement that is monitored by the parties themselves who assess their own compliance is unlikely to be credible. Ideally, an independent assessor such as the CoAG Reform Council should be charged with assessing whether full payments should be made, some funds withheld, and the validity of any derogations sought and/or extenuating circumstances.

The extent to which an IGA can provide the appropriate incentive structure to discipline the Commonwealth Government from backsliding on commitments is problematic. Independent and transparent monitoring and reporting can help by subjecting the Commonwealth to public scrutiny for breaching commitments.

Finally, evaluating compliance in meeting commitments is one thing. Equally, it is imperative that all governments ensure that their policy frameworks are robust. This means programs are justified, monitored and evaluated. Too often, drought-related programs have been introduced without evidence establishing that they were warranted. Indeed, many drought programs appear to have been based on objectives other than improving outcomes for the community. Also of concern is the lack of evaluation of programs, many of which have run for years. This is primarily a matter for jurisdictions' regulation impact assessment and gatekeeper protocols.

RECOMMENDATION 11. 2

The Commonwealth, state and territory governments should enter into an intergovernmental agreement linking Commonwealth funding to the states and territories to a range of commitments. These commitments should include:

- ***ensuring policies and instruments are compatible with the extended objectives of the Australia's Farming Future initiative***
- ***avoiding the use of reactive business assistance measures such as interest rate subsidies and other transactions-based subsidies, including waivers for legitimate business expenses***
- ***ensuring that if assistance is provided to farm businesses rather than farm households, it is conditional on an assessment of whether the farm will be self-supporting in the longer term and directed to reinforcing longer term capacity building.***

The disbursement of funds linked to an intergovernmental agreement should be dependent on an arms-length evaluation of the extent to which the parties have met their agreed commitments. The agreement should be established, and independent monitoring and assessments undertaken, at the Council of Australian Governments level.

11.5 The outlook under the new approach

The policy approach recommended in this report places a strong emphasis on self-reliance and preparedness for drought, with farmers and farm-dependent businesses taking responsibility for managing climate variability and governments playing a supporting role to better equip them to do so. The Commission also recommends that a greater emphasis be placed on government support for families in genuine need and less emphasis on supporting businesses that experience financial difficulties during drought or other periods of climatic variability.

This approach is consistent with reforms in agricultural policy over the last two decades that have reduced government subsidies and given greater responsibility and control for managing risks to farm businesses (for example, through the unwinding of statutory marketing arrangements). These past reforms have contributed to productivity growth in the agriculture sector and freed up resources that have then been available to meet other community priorities. There have also been costs at the farm level, however, with some farmers no longer benefiting from government support and, in some cases, leaving farming when their personal preference would have been to continue.

In broad terms, the Commission's view is that implementation of the recommendations in this report would have results in line with those of these past reforms. The likely outcomes for agricultural production, risk management and the impacts of drought are outlined below.

Agricultural production

Several inquiry participants suggested that the removal of drought-triggered business support could have a significant impact on Australia's agricultural production and the need to import food. This concern, for example, would seem to be behind this request from the Australian Beef Association:

> Before analyzing drought we ask that the Productivity Commission addresses macro issues including: … Food production – does Government want to import a high percentage of food? (sub. 100, p. 1)

In terms of overall food security it is worth noting that Australia exports around 60 per cent of all its agricultural production (ABARE 2008b). For the removal of drought-triggered assistance to result in a major decline in that production, farmers responsible for producing a significant proportion of production would need to exit farming as a result and be replaced by owners who produced much less food from those same farms.

The ECIRS is by far the most significant drought-triggered business support measure available at present. Appendix C shows that the proportion of producers who accessed ECIRS at least once over the period 2001-02 to 2007-08 was 25 per cent in New South Wales and considerably less in the other states and territories for which data are available (table C.4). Termination of the ECIRS, therefore, would leave the large majority of farmers, at worst, unaffected.

Further, information on the characteristics of recipients suggests that only a small proportion of those on ECIRS were financially vulnerable to such an extent that they might be forced to exit farming in the absence of ECIRS:

- eighty-one per cent of recipients had high equity and only 8 per cent had both low equity and a negative income (table C.8)
- the average recipient had net farm assets of well over $2 million (table C.8), while the average subsidy payment was just under $37 000 in 2007-08 (figure C.2).

Further analysis shows that the equity ratio (net equity divided by total capital value) of an average ECIRS recipient was around 0.86 after three years of receiving ECIRS payments. Without ECIRS payments the equity ratio would have been 0.83 — marginally lower but still at a high level (appendix C). Even without ECIRS payments, net assets would have increased in real terms (in other words, these farmers would have become wealthier over the three year period, even allowing for the effects of inflation). There would of course be some recipients who would have been more strongly impacted if they had not had access to ECIRS payments.

This suggests that removing drought-triggered business support would be likely to result in a very small number of forced exits from farming. This conclusion would appear to be consistent with the statement by the Australian Bankers Association that, while debt levels had increased in recent years, 'the number of agribusiness customers categorised by banks as being 'at risk' has remained at historically low levels' (sub. 76, p. 2). In addition to forced exits, there might be some other farmers who choose to exit because of the absence of government support.

The influence of this, likely small, increase in farm exits on agricultural production is hard to determine. Many of the farms involved would be purchased by more successful farmers with greater capital backing, who would be expected to increase production. Other farms might be purchased for an alternative use, such as plantation forestry or the provision of environmental amenity.

The net result overall would seem likely to be a small increase in agricultural production. Even where some farms were taken out of agricultural production the outcome for the community would be expected to be positive. If the highest bidder for land has a non-agricultural use in mind, this generally indicates that agriculture is not the highest value use of that land.

Self-reliance and preparedness

The Commission expects that implementation of the recommendations in this report would result in improvements in farm businesses' and farm-dependent businesses' self-reliance and preparedness for periods of financial difficulty. This will not, however, occur for all businesses. Most farmers are already self-reliant and prepared and many of these may be only marginally affected by the changes proposed. Others operate businesses that have little chance of being viable in the long-term and so government investment in improving their preparedness would be unlikely to be successful. The Commission instead advocates that, where needed, these farmers be provided with short-term income support and other assistance with transitioning to new endeavours.

The Commission has a five part plan to bring about improvements in self-reliance and preparedness. The first two parts remove some of the impediments to self-reliance and preparedness, and the final three provide active government support to better equip farmers to deal with future climate variability and other risks.

First, current measures such as the ECIRS can impede the development of private arrangements for risk sharing (Malcolm 2006). Removing these measures would increase the incentive for the development of private arrangements to allocate risk

to those best able to bear it. This might include greater use of alternative forms of farm business activity, such as sharefarming or leasing, that are at present less common in Australia than in many other countries (Agriculture and Food Policy Reference Group 2006). The development of weather derivatives for use in a farming context is another possibility (chapter 8).

Second, the removal of all forms of drought-triggered business support signals the need for all farmers to take responsibility for managing risks associated with climate variability. Provided that this policy change is well communicated and farmers accept that governments will not revert to providing reactive drought support, it would be expected to result in improved self-reliance and preparedness among the current population of farmers. This could occur through changes to on-farm practices and increases in off-farm diversification. In addition, a greater appreciation of the risks faced by farmers may influence exits and entries. Those who are unwilling or unable to accept these risks may be more likely to exit and less likely to enter farming. Over time this would be expected to result in greater levels of self-reliance.

Third, it is recommended that farm management deposits be retained as a risk management tool. These have proven to be effective in helping farmers prepare for and recover from drought events (chapter 8).

Fourth, it is recommended that the most successful elements of FarmBis be brought into the FarmReady scheme to strengthen the program. Grants for business training and professional advice that are well targeted and have an educational outcome can deliver public, as well as private, benefits (chapter 8).

Finally, it is recommended that significant public funding be provided for agricultural research, development and extension. There are sound rationales for governments to assist farmers to build their capacity through funding for research, development and extension (chapter 8).

Social impacts of drought

Droughts have a range of negative social impacts as discussed in chapter 3 and in the Expert Social Panel report (Kenny et al. 2008). As acknowledged by many inquiry participants, government policy can hope to ameliorate these impacts. The relevant question, therefore, is how the recommended approach, including the Farming Family Income Support program, is likely to perform in this regard, relative to current policy or relative to some other benchmark of what might reasonably be expected.

The Commission's approach places a high priority on assisting those who are least able to cope with loss of income due to drought or other cause. At the same time, the possibility of creating an ongoing dependence on this support is guarded against by requiring that steps be taken towards a self-reliant future and through placing a time limit on it. The Commission also acknowledges the importance of the various human services provided by governments that can be particularly important to people who are vulnerable to the impacts of drought.

Not all farmers or farm-dependent business owners who experience serious difficulties during drought do so because of poor management. Luck and timing also play a part. There have been many sound farmers who have relied on the current assistance measures to help them stay on their properties. The Commission's proposed increase in training, research and development and extension may enable many of these farmers to achieve a pathway to viability. The Commission acknowledges, however, that under its approach there will be some farmers who may leave farming who may have been able to return to viability under the old arrangements.

At the community level, the social impacts of drought under the Commission's approach are likely to be, in the short term, fairly similar to those under the existing arrangements. Removal of ECIRS would be expected to result in a small reduction in expenditure by recipients in some towns, with a consequential loss of income. For example, it is estimated that the annual incomes of people in smaller towns (less than 5000 people) in EC declared areas would have been, on average, around $37 less in 2007-08 (the peak year for payments) had ECIRS payments not been made (appendix C). For larger towns the effect on incomes would have generally been less than this.

One of the benefits of the proposed changes would be that the social divisiveness created by the inequities of the current arrangements would be largely removed. In the longer term it would be expected that both farm families and rural communities would suffer less acutely from the effects of drought because they will be, overall, better prepared for the variability and change of Australia's climate.

A Conduct of the inquiry

This appendix outlines the inquiry process and lists the organisations and individuals that have participated. Following receipt of the terms of reference on 20 June 2008, the Commission placed a notice in the metropolitan, rural and regional press inviting public participation in the inquiry. It released an issues paper in early July to assist participants to prepare their submissions. Prior to the release of the draft report in October 2008, the Commission received 107 initial submissions. After the Commission's draft report was released, a further 81 submissions were received. (table A.1)

The Commission held informal discussions with organisations and government departments and agencies, conducted roundtables with various groups and held open regional public forums. It conducted a total of 81 meetings, attended a total of 24 roundtables, and visited rural cities in all states (listed in table A.2) before releasing its draft report. In doing so, a range of agricultural operations were covered, such as broadacre cropping, horticulture and viticulture, in both marginal and reliable farming regions. The scale of operations encountered spanned from large pastoral properties to the extensive broadacre areas in the Western Australian wheatbelt, and down to small scale irrigators in the Riverland. In all, the Commission held meetings in 31 towns and cities around Australia and conducted a teleconference with government officials in Darwin prior to releasing its draft report. Subsequently, the Commission held 7 public hearings and 5 roundtables in November and December 2008 after the release of its draft report (table A.3).

Table A.1 **List of submissions**

Individual or organisation	*Submission number*
AACL	DR117
ACT – Department Territory and Municipal Services	101
AgForce	80, DR185
Allen, D. and T.	20
Anderson, G.	31
Anglicare	57
Australian Bankers' Association	76
Australian Beef Association	100
Australian Conservation Foundation	106, DR128
Australian Dairy Industry Council	58, DR145
Australian Fodder Industry Association	DR172
Australian General Practice Network	DR170
Australian Institute of Family Studies	92
Australian Land Management Group	24
Australian Pork Limited	95, DR155
Beale, J.A.	39, DR135
Belalie Pastoral Company	67
Bennett, M.	55
Berger, J.	DR138
Boardman, S. and A.	43
Botterill, L. and Chapman, B.	52, DR139
Buloke Shire Council	DR158
Bureau of Meteorology	33
Burnett, V.D.	DR112
Calder, K.	29
Canegrowers Australia	47
Carrigan and Co. Pty. Ltd.	32, DR129
Central Darling Shire Council	99
Centrelink (confidential)	104
Centroc	105
Citizens Electoral Council (Qld)	DR127
Chappel, K.	DR120
Clark, H.	78, DR175
Climate Adaption Flagships	108
Community and Neighbourhood Houses and Centres Association Inc.	DR159
Coonamble Shire Council	63, DR133
Cooper, J.	10
Cotton Australia	9
Country Women's Association – NSW	DR137
Country Women's Association – Tasmania	17
Crocker Farming Co.	45
Cunningham, L. (MP)	7

(continued on next page)

Table A.1 **(continued)**

Individual or organisation	*Submission number*
Dampney, J. and P.	16
Department of Agriculture and Food Western Australia	65, DR186
Department of Climate Change	109
Department of the Environment, Water, Heritage and the Arts	107
Department of Primary Industries and Water - Tasmania	85, DR179
Department of Primary Industry, Fisheries and Resources - NT	DR142
Dragon Point Enterprises	15
Duncan, Hon. W. (MLC)	50
Eyre Peninsula Drought Task Force	11
Fenton, C. and M.	64
Fleurieu Regional Development	18
Foundation for Australian Agricultural Women	DR124
Freeman, L.	87
Gadsby, A. and K.	96
Gannawarra Shire	75
Geldard, M., Geldard, D. and T. Reid	46
Government of South Australia	DR192
Grady, G.	19, DR143
Greater Shepparton City Council	DR183
Growcom	93, DR171
Hallam, G.J. and P.C.	DR156
Hardie, G.	12, DR116
Hickey, P.	DR111
Hindmarsh Shire Council	DR174
Horsham Rural City Council	DR167
Horticulture Australia Council	66, DR169
Highview	37
JJ Hallam Pty. Ltd.	2
Kelley, P.	DR146
Kettlewell, M.	DR150
Lexo Pty. Ltd.	54
Local Government Association of NSW	102, DR184
Linnett, C.	DR131
Loller, H.	49
Macquarie River Food and Fibre	36
Mallee Sustainable Farming	DR168
Mangelsdorf, P.	30
Mann, L.	42
McKenzie, D.	DR187
Mengel's Heli Services Pty Ltd	3
Mid Lachlan Alliance of Councils	38
Mid Western Regional Council	1

(continued on next page)

Table A.1 **(continued)**

Individual or organisation	*Submission number*
Moira Shire Council	25, DR154
Morris, P.	23
Murray Dairy	70
Murray Lands Regional Development Board Inc.	68
Murray Valley Citrus Board and Sunraysia Citrus Growers Inc.	89
Nason, C.	6
National Farmers' Federation	51, DR176
North East Riverina Rural Counselling Service Inc.	DR149
North West Municipalities Association	59
Northern Grampians Shire	DR173
Northern Yorke Drought Taskforce	61, DR152
NSW Farmers' Association	98, DR182
NSW Farmers' Association – Bourke District Council	81
NSW Government	90
NSW Irrigators' Council	62
O'Donnell, C.	5, DR132
Oil Mallee Association	8
Otto Agribusiness	DR189
Pastoralists' Association of West Darling	79, DR130
Pastoralists and Graziers Association – WA	DR121
Pearson, S.	28
Plant Health Australia	DR166
Plunkett Orchards	13
Polkinghome, A.G. and J.C.	103
Pristine Forage Technologies	DR162
Proctor, G.	DR114
Productive Nutrition	DR122
Queensland Farmers' Federation	82, DR123, DR165
Queensland Government	77, DR190
Queensland Murray-Darling Committee (confidential)	41
Ramsay, J.	DR113
Rangelands Drought Taskforce	60, DR153
Riverland Drought Taskforce	56
Riverland Horticultural Reference Forum	21
Rogerson, W.R.B and S.J.	53
Rural Business Development Corporation	83
Rural City of Wangaratta	DR140
Rural Directions Pty. Ltd.	35
Rural Financial Counselling Service, NSW – Bourke	DR181
Rural Financial Counselling Service, NSW – Central West	73, DR178
Rural Financial Counselling Service – Gippsland	34

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Table A.1 **(continued)**

Individual or organisation	*Submission number*
Rural Financial Counselling Service - Tasmania	DR164
Rural Financial Counselling Service, Victoria – North Central	DR136
Rural Youth Organisation of Tasmania	88
Salvation Army – Geraldton Community Church	DR148
Schmidt, G.	4
South Australian Advisory Board of Agriculture	71, DR157
South Australian Country Women's Association Incorporated	72
South Australian Farmers' Federation	84, DR141
South Australian Government	91, DR192
Southern Riverina Irrigators	DR188
Stothers, K.	DR163
Strathbogie Shire Council	DR144
Such, B.	DR191
Tasmanian Department Primary Industries and Water	85
Tasmanian Farmers and Graziers Association	69
Tasmanian Women in Agriculture	DR115
Toms-Morgan, R.	DR126
Towong Shire Community Support Committee	40
Trua Pty. Ltd.	48, DR180
Uebergang, J.	27
Victoria Murray Mallee	DR151
Victorian Farmers' Federation	74, DR160
Victorian Government	110
Wallace, P.	97
Watts Price and Associates	DR134
Wells, G.	DR118
Western Australian Farmers' Federation	26, DR161
Western Australian Rural Counselling Association Incorporated	22
Whelan, G.	DR147
White, B.	94
Willett, M.	DR125
Wimmera Development Association	DR177

Table A.2 **Pre-draft report consultations**

Interested parties/location

NEW SOUTH WALES

Meetings

Australian Farm Institute
Cotton Australia
Expert Panel on social impacts of drought
Meat and Livestock Australia
NSW Department of Primary Industries (NSW DPI)
NSW Farmers' Association
NSW Rural Assistance Authority

Roundtables

Moree (22 participants) including farmers, rural financial counsellors and bank representatives
Narrabri (15 participants) including farmers, rural financial counsellors and bank representatives
Dubbo (12 participants) including farmers and rural financial counsellors
Parkes (12 participants) including farmers, rural financial counsellors and bank representatives
Wagga Wagga (8 participants) including farmers, NSW Farmers' Association and ANZ Bank
West Wyalong (6 participants) including farmers, rural financial counsellor, agronomist
Hay (11 participants) including farmers, rural financial counsellor, NSW DPI, agronomist
Deniliquin (10 participants) including farmers, Ricegrowers' Association of Australia, NSW DPI, agronomists
NSW Farmers' Association Annual Conference (12 participants)

VICTORIA

Meetings

Australian Dairyfarmers' Association
Australian Dried Fruits Association
Bureau of Meteorology
Centrelink
CSIRO
Mildura Rural City Council
Murray Valley Citrus Board
Murray Valley Winegrape Growers Association
Robinvale Table Grape Growers Association
Rural Finance Corporation of Victoria
Sunraysia Rural Financial Counselling Service
Victorian Farmers' Federation
Victorian Department of Primary Industries

Roundtables

Birchip Cropping Group (BCG) (12 participants) including farmers, BCG chair and staff, Buloke Shire Mayor
Echuca dairy stakeholders (5 participants) including dairy farmers, Murray Dairy and Fonterra Milk Australia
Murray River Group of Councils (6 participants) including Campaspe, Gannawarra and Loddon Shires
Tatura horticulture stakeholders (7 participants) including orchardists, National Australia Bank, Fruitgrowers Victoria and GMH Agcare.

(Continued on next page)

Table A.2 **(continued)**

Interested parties/location
QUEENSLAND
Meetings
AgForce
Canegrowers Australia
Cotton Australia Limited
Growcom
Herron, Todd, White
Queensland Dairyfarmers' Association
Queensland Department of Primary Industries and Fisheries (QDPIF)
Queensland Farmers' Federation
Queensland Rural Adjustment Authority (QRAA)
Woods, Professor Beth (QDPI)
Roundtables
Cunnamulla (24 participants) including sheep and cattle graziers, Paroo Shire Mayor, QRAA, AgForce
Roma (16 participants) including grains, sheep and cattle producers, QRAA, Mayor
Biloela (28 participants) including grains and pastoral interests
Kingaroy (28 participants)[a]
WESTERN AUSTRALIA
Meetings
Chance, Kim, MLC, former Minister for Agriculture and Food, Forestry, (Leader of the Government in the Legislative Council Department)
Department of Agriculture and Food Western Australia (DAFWA)
Mid West Regional Council
National Australia Bank
North East Farming Futures Group
Pastoralists and Graziers Association
Planfarm Consultants
Rabobank
RSM Bird Cameron
Rural Business Development Corporation
Western Australian Farmers' Federation
Wheatbelt Men's Health
Roundtables
Merriden Shire (15 participants) including farmers, small businesses and shire representatives
Mullawa Shire (10 participants) including farmers, DAFWA North East Office
Wyalkatchem Town Hall (20 participants) including farmers and local small businesses

(Continued on next page)

Table A.2 **(continued)**

Interested parties/location

SOUTH AUSTRALIA

Meetings

Advisory Board of Agriculture
Ag Excellence Alliance
Australian Women in Agriculture
ANZ Bank
Bank SA
Commonwealth Bank
Expert Panel on Social Impacts of Drought
Lucas Group
McColl, Jim
McEwen, Hon. Rory, MP, Minister for Agriculture, Food and Fisheries, Minister for Forests and Minister Responsible for Matters Relating to Drought
Primary Industries and Resources of South Australia (PIRSA)
Rabobank
Regional Communities Consultative Committee
Regional drought taskforces
Regional Development SA
Rural Directions Pty Ltd
Rural Finance and Development (PIRSA)
Rural Solutions SA
South Australian Farmers' Federation

Roundtables

Tumby Bay (12 participants) including farmers; ANZ Bank; Centrelink; Commonwealth Bank; PIRSA; Drought taskforce; Centacare.
Murray Lands Regional Development Board (18 participants) including Lower Murray Drought Group and dryland farmers from the Mallee Drought Group
Barmera (25 participants) including irrigation farmers, SA Citrus Board, Centrelink, PIRSA, rural financial counsellors
Burra (8 participants) including farmers, regional drought task force members

TASMANIA

Meetings

Tasmanian Country Women's Association
Tasmanian Farmers and Graziers Association
Tasmanian Department of Primary Industries and Water
Tasmanian Rural Financial Counselling Service
Tasmanian Women in Agriculture

(Continued on next page)

Table A.2 **(continued)**

Interested parties/location
ACT
Meetings
ACT Department of Territory and Municipal Services
Australian Bureau of Agricultural and Resource Economics
Australian Bureau of Statistics
Australian Government Department of Agriculture, Fisheries and Forestry
Australian Government Department of Environment, Water, Heritage and the Arts
Australian Government Department of the Treasury
Australian Pork Limited
Botterill, Linda
Bureau of Rural Sciences
Centrelink
CSIRO
Horticulture Australia
Murray Darling Basin Commission
National Water Commission
National Farmers' Federation
National Rural Advisory Council
NORTHERN TERRITORY
Teleconference
Northern Territory Department of Primary Industries, Fisheries and Mines (teleconference)

[a] Productivity Commission unable to attend owing to bad weather. Meeting record taken by AgForce.

Table A.3 **Post-draft public hearings and regional roundtables**

Interested parties/location

NEW SOUTH WALES

Public Hearings
Country Women's Association - NSW
NSW Farmers' Association
NSW Irrigators' Council
Local Government and Shires Association – NSW

Roundtables
Dubbo

VICTORIA

Public Hearings
Australian Bankers' Association
Birchip Cropping Group
Citizens Electoral Council
Country Women's Association - Victoria
Victorian Farmers' Federation

Roundtables
Mildura

QUEENSLAND

Public Hearings
AgForce
Citizens Electoral Council
Freeman, L.
Growcom
Queensland Farmers' Federation
Willett, M.

Roundtables
Roma

WESTERN AUSTRALIA

Public Hearings
AACL
Department of Agriculture and Food – WA
Pastoralists and Graziers Association – WA
Rural Business Development Corporation
Stehlik, D.
Western Australian Farmers' Federation

Roundtables
Northam

(Continued on next page)

Table A.3 **(continued)**

Interested Parties/location

SOUTH AUSTRALIA

Public Hearings

Agvance Rural Services
South Australian Farmers' Federation
Pristine Forage Technologies
Productive Nutrition
Rural Clay Services
Rural Financial Counselling Service – SA

Roundtables

Port Lincoln

TASMANIA

Public Hearings

Department of Primary Industries and Water – Tasmania
McKenzie, D.
Tasmanian Farmers and Graziers Association
Tasmanian Institute of Agricultural Research
Tasmanian Women in Agriculture

ACT

Public Hearings

Australian Beef Association
Botterill, L. and Chapman, B.
Grady, G.
National Farmers' Federation
North East Riverina Rural Counselling Service
Trua Pty. Ltd.

B Income support for rural families

Farm families and small business owners in financial need in drought affected areas have access to the broad social security measures available to others in financial need in the community such as the unemployed, the disabled and the aged. They also have access to a number of assistance programs that are specifically targeted at the rural sector. Some of these latter programs, including Exceptional Circumstances Relief Payments, Small Business Income Support and Interim Income Support, are triggered by government declarations of drought within a region. There are also programs such as Transitional Income Support and Farm Help Income Support, which provide income support and adjustment assistance to farmers in financial difficulty for reasons not necessarily related to drought. The community sector also provides emergency financial assistance to individuals and small groups in rural areas.

In this appendix, the main features of these programs and the eligibility criteria that farmers or small rural businesses must satisfy to receive financial assistance are outlined. Characteristics of recipients under each program are discussed and an assessment is made of the appropriateness of the programs, the effectiveness with which each program operates, including its accessibility to rural families and the efficiency with which it is delivered.

B.1 EC Relief Payments

Drought related family income support has been in place for farmers since 1994 as 'Drought Relief Payments', and was renamed the EC Relief Payment (ECRP) in 1997. ECRP is the primary avenue by which the Commonwealth Government provides income support to eligible farm families in drought declared areas. The payment is intended to assist with day to day family and personal living expenses, rather than farm business operation expenses.

The ECRP is paid fortnightly by Centrelink according to guidelines set by, and with funding provided through, the Commonwealth Government Department of Agriculture, Fisheries and Forestry (DAFF). Payment of ECRP is at a rate equivalent to the Newstart allowance (that is, currently a maximum of $810.80 per fortnight for a couple), and is taxable. In addition to the basic income support,

ECRP recipients and their families receive a Health Care Card and may also be eligible for concessions under the Youth Allowance and Austudy means test for dependent children.

ECRP can be received for up to two years from the time that EC is declared in a region, although extensions for subsequent years may be made. The initial two year period is inclusive of any income support paid under the Interim Income Support program (see section C.2). Continued eligibility for ECRP is reviewed by Centrelink on a six monthly basis.

Eligibility for ECRP

To be eligible for ECRP, a farm family must demonstrate that they:

- are farmers, when under 'normal' conditions
- contribute a significant part of their labour and capital to the farm enterprise
- derive a significant part of their income from the farm enterprise
- are Australian residents located in Australia
- are located in an EC region (this can be demonstrated by obtaining an EC certificate from Centrelink, but with the large increase in the coverage of EC areas in recent years, these certificates are no longer consistently used).

What constitutes a 'significant' contribution of labour, capital and income is determined largely at the discretion of Centrelink.

Receipt of ECRP is also subject to assets and income tests that are a modified version of the general Newstart allowance tests (table B.1):

- Certain assets — the principal home (and up to 2 hectares surrounding the home on the same title), formal superannuation (even when over pension age), life insurance (of the farmer only), and essential farm assets (such as farm land and machinery) — are excluded from the assets test for ECRP.
- Furthermore, proceeds from the forced disposal of livestock due to drought are excluded from the ECRP income test, but farmers are required to deposit the proceeds from the forced sale into either a Farm Management Deposit (FMD) or a financial institution term deposit of at least 3 months duration.
- From 25 September 2007 until 30 June 2009, ECRP recipients can also earn an additional $20 000 in off-farm salary and wages each financial year and still retain their ECRP in full. The additional allowance on off-farm salary and wages may continue to be available beyond 30 June 2009 for current recipients in areas that remain EC declared (Primary Industries Ministerial Forum 2008b).

- In contrast to Newstart allowance, there is no activity test (such as job seeking or training) or other formal mutual obligation required of ECRP recipients.

Table B.1 **Comparison of Newstart and ECRP eligibility criteria[a]**

	Newstart	*ECRP*
Mutual responsibility	Must be unemployed (not underemployed)	Must be a fulltime farmer in EC area
	Activity test — must look for job and/or undertake training or an approved activity	Activity test — none
Income test	Where claimant earns above $62 per fortnight or their partner earns above $769 per fortnight, payments are reduced[bc]	Based on Newstart income test but an additional $20 000 off-farm wage and salary income per annum per couple exempt[d], proceeds from forced disposal of livestock are exempt[e]
Assets test (combined assets with partner)	Must have combined assets under $243 500. Principal home and superannuation (if under age pension age) are not included [f]	No total asset limit. Off-farm asset limit of $243 500. Principal home, life insurance, superannuation of farmer (even where over pension age) are not included
Liquid asset test	Payment may be deferred where liquid assets exceed $5000 (couple or single with dependants).	Not applicable
Hardship provisions	In severe financial hardship and have unrealisable, non-income producing assets[g]	Not applicable
Payment to individual or couple	Individual	Couple
Maximum fortnightly payment[a]	$405 (each)	$405 (each)
Additional payments[h]	Payable if eligible	Payable if eligible

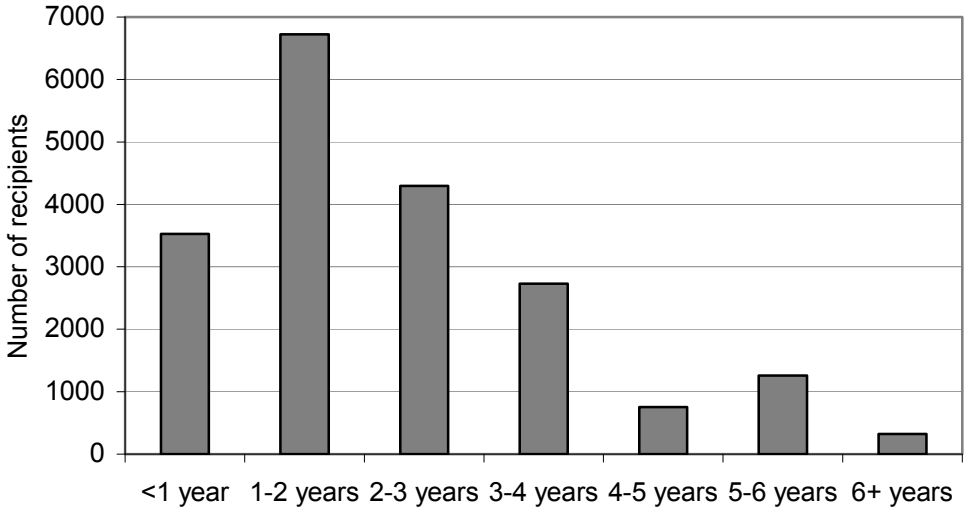
[a] Comparison is for a couple who are home owners. [b] Income for the recipient of $62 to $250 per fortnight reduces payments by 50 cents in the dollar, each dollar of income over $250 per fortnight reduces payments by 60 cents in the dollar. As at September 2008, partner income above $769 reduces the customers payment by 60 cents in the dollar. [c] Practical effect is maximum allowable income (after working credit) of $769 per fortnight for the recipient or $1445 for the recipient's partner [d] Payment is reduced after earning $769 per fortnight per couple in off-farm income (this $769 is proportioned between the two depending on the amount of off-farm income earned by each spouse, plus $62 each in either off-farm or on-farm income. Assumes application is made at beginning of financial year — higher earnings may be possible if application is made later in financial year. [e] Where the proceeds go into FMDs or a term deposit of at least 3 months duration. [f] This asset test does not include the principal home and permanent fixtures, it does include household contents, cars, boats and surrender value of any life insurance. [g] That is, cannot derive income or borrow from assets or asset is currently for sale or unable to be sold due to legal restriction. [h] Rent assistance, Pharmaceutical, Telephone, Zone Allowances.

Source: Centrelink (2008 unpublished).

ECRP recipients

At the beginning of 2009, there were around 20 000 farm families across Australia in receipt of ECRPs. This equates to around 30 000 individuals who are receiving support under ECRP (as approximately two thirds of recipient farm families receive ECRP payments for two adults). While most families have received assistance continuously for 1 to 2 years (figure B.1), around half have been supported for longer, with the earliest current recipients having received ECRP assistance continuously since late 2002 (Centrelink 2009 unpublished). Since 2002-03, a total of $1.23 billion in ECRP has been paid to farm families across Australia. The average amount received by each farm family is now around $13 000 per year (compared with a maximum possible $21 080 per year), more than double that received in 2002-03.

Figure B.1 **Length of time in continuous receipt of ECRP[a]**
Recipients current at 9 January 2009



[a] In addition to those who have received assistance continuously, each group may also include families who ceased to receive assistance for a short period and then recommenced receipt.

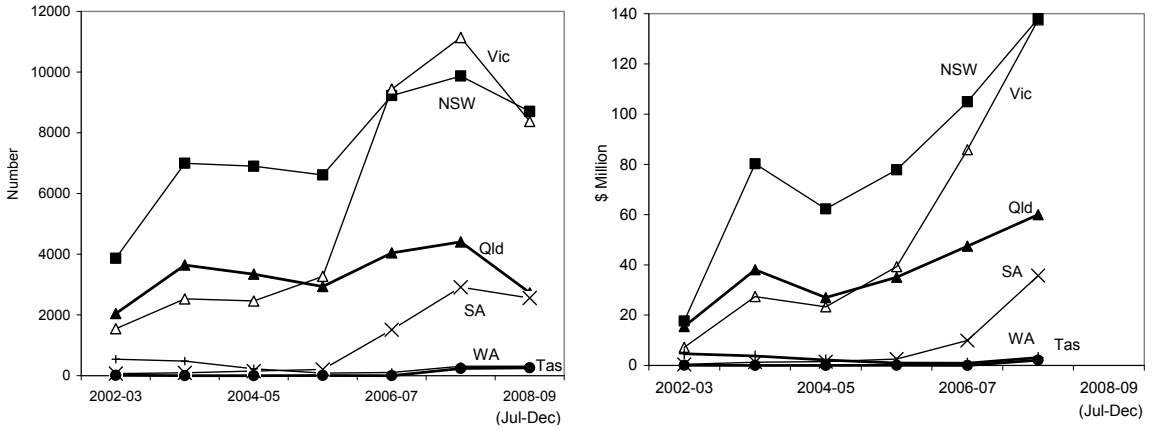
Data source: Centrelink (2009 unpublished).

Farmers in New South Wales and Victoria received just over 70 per cent of Australia's ECRP payments over the period from 2002-03 to the end of 2008, with most of the remainder being in Queensland (figure B.2). Use of the program has escalated in all states in recent years. In 2008-09 to date, the total number of recipients has declined due to a number of EC areas expiring. Within the areas that remain in EC, the number of recipients has gradually risen over recent months with slightly more new applicants for ECRP than there are recipients leaving the program (Centrelink pers. comm. 2009).

The most common reason for claimants no longer receiving ECRP in the first half of 2008-09 is that the drought end date has been reached in the relevant area (nearly 40 per cent of claimants). The end of EC was also associated with a reduction in claimants in earlier years (18 per cent of cancelled claims in 2007-08). However, income levels that precluded entitlement to assistance (25 per cent of claimants) and failure of the claimant to reply to Centrelink correspondence (18 per cent of claimants) were also common reasons for cessation of ECRP in 2007-08.

There were also approximately 104 farms (19 per cent of cancelled claims) in the first half of 2008-09, 284 farms (3 per cent of cancelled claims) in 2007-08 and 184 farms (8 per cent) in 2006-07 reporting that they had left farming or the farm business, and therefore ceased to receive ECRP. The majority of those ECRP recipients who left farming were irrigated dairy farms in the Goulburn-Loddon, Campaspe and Victorian Murray regions; or dryland grazing and mixed farms in South Western Victoria.

Figure B.2 **ECRP recipients and payments by state, 2002-03 to 2008-09[ab]**



a The number of recipients and total payments in the ACT and Northern Territory are omitted but are very small (fewer than 15 recipients per year and total payment over the 6 year period of less than $500 000). **b** Recipient numbers for 2008-09 represent the number of farm families receiving ECRP at end November 2008. Payment estimates for July to November 2008 are not comparable with estimates for previous complete financial years and are therefore not presented.

Data source: Centrelink (2008 unpublished).

Given how widespread Australia's drought declarations have been in recent years, farmers in all industry groups have received ECRP, albeit to varying extent. The number of ECRP recipients and the total amount paid is highest in the mixed crops and livestock industry (table B.2). Approximately two thirds of all farms in this industry group are estimated to have received ECRP assistance in 2007-08. A high proportion of farms in the dairy, cropping and sheep–beef industries also received assistance. Centrelink (2008 unpublished) indicated that the majority of long term recipients of ECRP (those who have received assistance continuously since

2002-03) are sheep and mixed sheep–beef producers in western NSW, which may partly reflect early EC declarations in this part of Australia (see chapter 5).

Table B.2 **ECRP recipients and payments by industry, 2007-08**

	Number of recipients	*Proportion of all farms in industry*[a]	*Average gross receipts*	*Total gross receipts*
	Number	%	$	$ million
Beef	4 659	10	12 999	60.6
Dairy	3 940	44	13 109	51.6
Cropping	2 369	21	12 718	30.1
Mixed crops & livestock	9 121	66	13 222	120.6
Sheep–beef	2 003	24	13 193	26.4
Sheep	1 678	14	12 488	21.0
Other livestock	413	9	12 333	5.1
Fruit & viticulture	1 876	14	11 945	22.4
Other crops [b]	732	5	12 957	9.5
Other [c]	2 096	na	14 082	29.5
Total [d]	28 887	na	13 045	376.8

na Not available. [a] There may be some differences in the industry reported by ECRP recipients compared with the classification given to their farm by the ABS on the basis of production. [b] Includes vegetables, flowers, nursery, rice, cotton and sugar. [c] Most of this group is reported to be 'other non-irrigated', although 'aquaculture' and 'not stated' are also included in the aggregate. [d] Total includes all recipient farm households during 2007-08 (both ongoing recipients and those who received payments for only a part of the year).

Sources: ABS (2008b); Centrelink (2008 unpublished).

There have been several surveys of ECRP recipients in recent years that shed some light on the similarities and differences in the farms of recipients and non recipients. The South Australian Centre for Economic Studies (SACES 2008a) reported the characteristics of 263 recipients of ECRP in 2007. Boero Rodriguez, Watson and Mues (2006) provided information on 320 farms that received ECRP and ABARE (2008 unpublished) provided information based on 1435 recipients of ECRP over the period 2002-03 to 2007-08.

During this period, ECRP recipients had farms that were smaller, on average, than those of non recipients. SACES (2008a) reported that 20 per cent of ECRP recipients had farms of less than 200 hectares, but 37 per cent had farms that were greater than 1000 hectares (non recipients in EC areas have, on average, farms of around 5000 hectares). ABARE estimates indicate that amongst surveyed broadacre and dairy farms, those of ECRP recipients are smaller in both land area and scale of operation (table B.3). On average, ECRP recipients tend to have lower sheep numbers, lower wool production and lower beef cattle numbers, than non-recipients within EC areas. There is no evidence of a significant downsizing having occurred on the farms of ECRP recipients over the survey period, suggesting that these farms were smaller than average prior to the drought.

Table B.3 ECRP recipients and non recipients: physical and short term financial position of farms

Average annual data per farm for the period 2002-03 to 2007-08[a]

		Farms in EC declared areas		*Farms in*
		Recipients	*Non recipients*	*non EC areas*
Physical				
Area of land operated	ha	3 262	5 655	7 320
Area irrigated	ha	5	8	5
Scale of operations	sheep equiv.	5 994	7 063	10 710
Wheat yield per hectare sown	tonnes	1.0	1.4	1.7
Barley yield per hectare sown	tonnes	1.0	1.6	1.9
Sorghum yield per hectare sown	tonnes	2.3	2.8	3.0
Sheep numbers at end June	no.	1 010	1 138	1 660
Change in sheep numbers	%	*-4.3*	*-3.5*	*0.8*
Wool cut per sheep shorn	kg	4.2	4.4	4.3
Beef cattle numbers at end June	no.	169	299	327
Change in beef cattle numbers	%	*1.0*	*0.5*	*0.5*
Dairy cattle numbers at end June	no.	54	31	45
Milk production	litres	166 248	103 407	144 791
Stocking rate (sheep equiv.)	per ha	1.0	0.7	0.8
Receipts				
Total cash receipts	$	267 545	355 566	444 748
Cash receipts per sheep equiv.	$	45	50	42
Costs				
Sheep and lamb purchases	$	7 099	6 489	8 440
Beef cattle purchases	$	15 122	37 807	16 826
Other livestock purchases	$	1 574	821	1 189
Seed	$	3 320	3 729	3 626
Fodder	$	33 251	30 580	22 026
Agistment	$	3 850	2 483	1 695
Fertilizer and sprays	$	25 348	33 549	69 254
Fuel, oil and lubricants	$	17 890	18 954	23 800
Repairs and maintenance	$	21 443	23 327	30 982
Livestock materials & expenses	$	8 669	11 238	15 509
Administration expenses	$	8 872	9 569	11 882
Freight, handling and marketing	$	11 554	16 992	24 590
Rent and rates	$	12 695	13 613	15 600
Interest payments	$	29 516	23 915	31 926
Hired labour	$	6 784	13 508	15 453
Payments to sharefarmers	$	846	3 076	3 041
Other cash costs	$	30 475	42 732	48 380
Total cash costs	$	238 308	292 383	344 222
Cash costs per sheep equiv.	$	40	41	32
Fodder expenditure per sheep equiv.	$	11	8	4
Farm financial performance				
Farm cash income	$	29 237	63 184	100 527
Farms with negative cash income	%	33	30	26

[a] All estimates, except those italicised, have a relative standard error of less than the estimate.

Source: ABARE (2008 unpublished).

In contrast, and reflecting the high dependence of the dairy industry on ECRPs, recipients tend to have significantly higher stocks of dairy cattle and higher milk production than either non recipients within EC areas or other farms in non-EC areas. Stocking rates (the number of animals per hectare of land) are also significantly higher, on average, on farms of ECRP recipients than non recipients.

There is little difference evident in the financial and business structure of ECRP recipients compared with other farms. Both SACES (2008a) and Boero Rodriguez, Watson and Mues (2006) reported that, in line with the majority of farms in Australia, sole trader and family partnerships are the dominant forms of farm ownership for ECRP recipients. Furthermore, one third of ECRP farm units had more than one family unit supported by the farm (SACES 2008a).

Farm income levels were found to be substantially lower for ECRP recipients than for other farms. ABARE estimated that farm cash income levels (cash receipts less cash costs) of ECRP recipients averaged around $29 000 — about 46 per cent of the average farm cash income level of non recipients in EC areas and about 29 per cent of the average farm cash income level of those not in an EC area. The lower farm cash income is partly due to the smaller overall size of recipient farms but is also attributable to lower cash receipts — crop yields tend to be lower, on average, on the farms of ECRP recipients.

However, the cost structure of these farms also differs. Recipients tend to spend less on hired labour and payments to share-farmers, and a greater share of farm activities tends to be undertaken by the owner/manager and family members. Recipients also spend substantially less on fertilisers and sprays, and freight, handling and marketing expenses, but more on agistment and fodder. ECRP recipients spend significantly more on fodder per animal (on a sheep equivalent basis), on average, than do non recipients. It is not clear whether the cost structure of ECRP recipients, compared with non recipients, reflects receipt of government subsidies for fodder transport in some states or retention of greater numbers of stock (in particular, dairy cattle) on lower quality pastures.

One immediate implication of the lower farm cash income levels of ECRP recipients is a substantially lower level of liquid assets and reduced capacity to meet debt payments. While the absolute level of debt for recipients is marginally lower, on average, than that of farms not in EC areas, the liquidity to debt ratio is around 11 per cent for recipients, compared with 52 per cent for farms in EC areas but not receiving assistance and 37 per cent for farms not in EC areas (table B.4). Another implication of lower farm cash income levels is that the balance held in FMDs and the proportion of farms increasing their FMD balance is lower amongst ECRP recipients than non recipients.

There is evidence that some farmers, particularly those with smaller operations, have offset lower farm income with off-farm earnings. ABARE (2008 unpublished) estimated that 42 per cent of small ECRP recipients (on the basis of the scale of operations), 36 per cent of medium and 32 per cent of larger ECRP recipients earned some off-farm income. SACES (2008a) reported that the number earning off-farm income was highest amongst irrigators, which may reflect the proximity of many of Australia's irrigation areas to towns and opportunities for off-farm employment.

Off-farm income from investments, wages and salaries was, on average, around $12 300 for ECRP recipients over the period 2002-03 to 2007-08 (ABARE 2008 unpublished). This was less than half of recipient's total off-farm income, with the remainder sourced from the government. Income from government sources consists not just of ECRPs, but also assistance provided as Dairy Structural Adjustment Payments, ECIRS and 'other government sourced income'. It was estimated that 44 per cent of farms that get ECRP also received farm business support in the form of ECIRS. In contrast, non-recipients of ECRP within and outside of EC areas earned an average of around $30 000 per year in off-farm income — almost all from investments, wages and salaries.

There is no evidence that age is a defining characteristic of ECRP recipients. Approximately 70 per cent of recipients are less than 60 years of age, and the median age of recipients (52 years in 2007-08) is equivalent to the median age of the wider farming community (Centrelink 2008 unpublished and ABS 2008c).

While recipients generally have considerable experience in farming, their knowledge of best practices and other off-farm investments, and their capacity to consider alternative approaches, could be improved. SACES reported that 76 per cent of surveyed farmers had 10 years or more of farming experience. However, they also noted that little more than half of ECRP recipients had a written business plan and 60 per cent had not had a financial assessment of their farm in the last two years. It was also found that about 80 per cent of recipients had not undertaken any courses or training while on ECRP, although those ECRP farmers who had participated in training found the courses 'very helpful'. Amongst the 30 per cent of recipients aged over 60 years, most did not have a retirement or succession plan in place.

Table B.4 ECRP recipients and non recipients: capital, debt and liquidity position of farms

Average annual data per farm for the period 2002-03 to 2007-08[a]

		Farms in EC declared areas		*Farms in*
		Recipients	*Non recipients*	*non EC areas*
Farm profit and return				
Farm business profit	$	-55 396	-19 769	16 432
Profit at full equity	$	-19 971	10 117	56 928
Rate of return excl. capital apprec.	%	-0.9	0.3	1.6
Rate of return incl. capital apprec.	%	4.7	6.5	8.6
Farm capital and debt				
Capital value of livestock	$	240 057	316 106	406 708
Capital value plant & equipment	$	238 454	270 139	354 454
Capital value land & improvements	$	2 009 511	2 572 538	3 065 687
Total capital value	$	2 499 593	3 173 753	3 841 776
Farm business debt at 30 June	$	401 165	304 636	422 156
Change in farm debt within year	%	8.5	9.2	10.8
Net farm assets	$	2 157 991	3 034 151	3 581 209
Equity ratio at 30 June	%	83	90	88
Capital additions and disposals				
Net capital additions	$	26 073	34 783	51 085
Farms acquiring land	%	4.1	5.1	6.1
Farms selling land	%	4.3	3.9	5.5
Farm liquid assets				
Liquid assets	$	43 567	159 150	154 572
Farms with liquid assets < $20 000	%	58	39	39
Liquid assets to debt ratio	%	10.9	52.2	36.6
FMDs at 30 June	$	8 173	27 434	31 130
Change in FMDs within year	%	*5.0*	*2.9*	*15.8*
Farms with increasing FMDs	%	5.1	8.2	9.5
Off-farm income				
Investment income	$	4 112	12 527	11 251
Wage and salary income	$	8 207	20 411	16 232
ECRP	$	14 668		
Dairy structural adjustment payment	$	2 004	1 259	1 750
Other govt household support	$	2 592	1 594	1 348
Total off-farm income	$	29 578	34 532	28 830
Farms with off-farm wages	%	36.5	39.1	36.8
Government assistance to farm business				
Total govt business assistance	$	15 551	1 443	1 084
ECIRS	$	10 944	0	0
Other govt business assistance	$	4 264	1 282	1 005
Farms receiving ECRP & ECIRS	%	44.2	0	0
Survey sample details				
Estimated population	no.	11 879	34 843	21 095
Sample of farms contributing	no.	1 435	4 274	3 394

a All estimates, except those italicised, have a relative standard error of less than the estimate.

Source: ABARE (2008 unpublished).

Evaluation of the ECRP program

Appropriateness of ECRP

A widespread acceptance of the need for income support as a safety net measure to ensure that the standard of living for farm families is maintained at a community accepted level was confirmed by the Commission's initial consultations with farming groups, industry and government representatives.

Although the NDP objectives do not provide for a particular family welfare outcome, household income support (through ECRP) is one of the main programs under the NDP. Provision of income support by the government is appropriate in the interests of maintaining a socially acceptable standard of living in rural communities. In times of drought there is the potential for living standards to fall and for households to experience extreme hardship as otherwise productive assets controlled by the household become unproductive — as noted in chapter 3 and in the Expert Social Panel's report (Kenny et al. 2008). ECRP potentially maintains individual households as part of the agricultural resource base.

Farming families may also have difficulty in accessing broader safety net payments (those available to other Australians more generally) due to the value of their farm assets, despite these assets being currently unproductive due to drought. To the extent that broader income support programs are inaccessible to farm households, it is appropriate on an equity basis for the government to provide ECRP as an accessible income support program for this group.

Effectiveness of ECRP — accessibility issues

A key consideration in the effectiveness of income support is the accessibility of assistance. That is, are those families which are most in need of financial assistance receiving income support? From data presented in the previous section, it is apparent that ECRP recipients have lower farm and off-farm income levels than non recipients, on average, which indicates that ECRP is well targeted.

However, a number of inquiry participants argued that eligibility for ECRP is too limiting and families who need assistance are not able to access support. For example:

> WAfarmers understands that eligibility tests have deterred many families from applying for assistance. (sub. 26, p. 6)

Some criticisms of ECRP accessibility are related to the farm income and off-farm income threshold levels. These threshold levels are generally considered by farming groups to be too low and result in some drought affected farmers not receiving income support. For example, the Coonamble Shire Council claimed that:

> The level of combined farm and off-farm income that is used by Centrelink to limit eligibility for relief payments is too low. No consideration is given to the cost of travel to work or the cost of childcare … (sub. 63, p. 10)

However, the off-farm income threshold for ECRP is up to 12 times that applicable in eligibility tests for other income support such as Newstart or disability allowances. On the one hand, a generous off-farm income threshold may enable some ECRP recipients to maintain off-farm income bearing assets or off-farm employment necessary for the farm family to move toward financial self-reliance in the future. On the other hand, generous access criteria for income support could also discourage farm families from becoming financially self-reliant. ECRP is intended to assist those families in EC areas who are having difficulty in meeting basic living expenses and those who exceed the income or asset thresholds could be considered to have sufficient resources to meet their living requirements.

The necessity for an area to be EC declared before income support is available has also been criticised. The 'lines on maps' used to narrow the scope of those who can apply for EC support may be a useful means of targeting assistance, but only if it reflects the actual scope of drought affected areas or of those in need of income support (chapter 5 also discusses EC boundaries and issues that have arisen in their application). For example, drought can contribute to a widespread increase in some input prices (such as feed grain) which can potentially impact on farming businesses well beyond EC declared regions. L. Botterill and B. Chapman noted that:

> Basing access to the welfare safety net on geographical boundaries creates inequities and the causes of low farm incomes should not be relevant if farmers do not have the resources to meet basic family needs. (sub. 52, p. 4)

Similarly, the Australian Landcare Management Group suggested that:

> … policies and programs should be aligned to the ongoing and widespread social needs of farmers irrespective of whether these needs arise because of drought or other factors. (sub. 24, p. 6)

For the most part, these criticisms of the accessibility of ECRP relate not so much to access issues of those in EC areas, but rather, to there being farmers outside of EC areas who are nevertheless in need of income support.

Effectiveness of ECRP — self reliance and preparedness issues

The distinction between support for the farm family and support for the farm business has become blurred in recent years. For example, an increase in the off-farm income threshold level in September 2007 to 12 times that applicable to Newstart applicants, was part recognition that off-farm earnings are used by farmers to support their business. The Queensland Government indicate that 'it is not unusual for producers to indicate that ECRP has been used to feed livestock' (sub.77, p. 19). To the extent that household support is used to subsidise farm business operations, ECRP may be reducing incentives for business risk management and undermining the risk management objectives of NDP.

While there is little direct evidence that the availability of ECRP alters incentives of farmers to prepare for drought, there is some indication of differences (that have likely arisen for a variety of reasons) in the capacity of recipients and non recipients to cope with variability in farm income. For example, ECRP recipients and non-recipients were equally likely to use seasonal climate forecasts as a farm management tool, but strategies to deal with drought differ considerably between recipients and non recipients. In particular, Boero Rodriguez, Watson and Mues (2006) estimated that the proportion of ECRP recipients using short term debt to cope with drought impacts is more than double the proportion of non recipients. This was also evident from the analysis of ECRP recipients in the previous section.

To some extent, these actions may reflect the lack of alternatives available to ECRP recipients as they also tend to have lower farm cash income than non recipients and lower levels of off-farm wages and salaries and investments. However, a lack of alternative sources of income to meet debt repayments when farm income is very low does not suggest a high level of preparedness for drought.

Along these lines, several participants in this inquiry have indicated that financial preparedness is crucial and that off-farm assets and income from wages, salaries or investments is a necessary part of becoming self-reliant and able to cope with a highly variable farm income (J. Cooper, sub. 10 and H. Loller, sub. 49). However, SACES (2008a) indicated that in response to the current drought, less than 4 per cent of surveyed ECRP recipients had earned *additional* off-farm income. To some extent, this may reflect a lack of employment opportunities in the more remote rural areas. Nevertheless, a lack of diversification of income sources prior to and during drought may have increased the vulnerability of some ECRP recipients to variations in farm income. DoTRS (2005, p.10) noted that this is a source of considerable tension within some communities:

> … farmers who 'do the right thing', diversifying the business base of their farms and households, are ineligible, and resent seeing neighbours who have 'done nothing' sit

back and access government assistance. This has been described as an incentive to not diversify, which if true would exacerbate drought impacts in communities.

These sentiments were also evident in inquiry submissions, with J. Cooper, a farmer on Flinders Island, claiming:

> It is disconcerting to see a number of 'inefficient' graziers on Flinders Island receiving drought assistance when they have done little to plan and manage the risks of drought, or other production or market risks for that matter. (sub. 10, p. 2)

The Riverland Drought Taskforce also indicated that:

> There are many enterprises which are too small to sustain the farmer and family without income support. This was a factor before the drought. In effect these farmers are using a scarce resource to provide negative income and are using Centrelink payments to support their lifestyle. (sub. 56, p. 12)

Farmers who received ECRP were more likely to also have received assistance under other government support programs including ECIRS, FarmBis and the Rural Financial Counselling Service (Boero Rodriguez, Watson and Mues 2006). This may indicate a continued reliance on government assistance over a number of years, rather than a temporary use of assistance to improve preparedness for long term self-reliance.

From a survey of the 100 longest term recipients of ECRP, Centrelink reported that while nearly all intended to continue farming, only 60 per cent considered that they will be 'self sufficient' post EC and the remainder considered that they will require further support. Over half of the longest term ECRP recipients are currently accessing assistance in addition to ECRP and some current measures available that could further enhance self sufficiency are not widely adopted — only 4 per cent have FMDs and just over half have a business plan (Centrelink 2008c).

One way that other social security programs (such as Newstart) attempt to limit long term dependence is through the inclusion of activity conditions that accompanies receipt of assistance. There are no such conditions with ECRP receipt, although as do all farmers, recipients have ongoing responsibilities for the welfare of their animals and for farm maintenance.

On the other hand, there is evidence that some ECRP recipients are aware that they could have done more to prepare for drought and have subsequently attempted preparations for greater self-reliance in the future. SACES (2008a) found that 26 per cent of ECRP survey respondents indicated that they could have been better prepared for drought and that only 7 per cent claimed that they 'can't make changes' to their current practices. In response to the drought, the main areas that were being improved were more rapid destocking, improved water storage and

transmission and better fodder storage. Specifically, 25 per cent of survey respondents indicated that they had undertaken water management (such as dam deepening and irrigation measures) and 23 per cent reported destocking or stock containment. (There are no data on how these drought responses compare with preparations of those farms not receiving assistance.)

Implications of ECRP provision for the condition of the environmental resource base are not conclusive. Higher stocking rates and fodder expenditure per animal on farms of ECRP recipients suggest that income support may have been provided, on average, to those who have attempted to retain higher numbers of animals on lower quality pastures. It is also apparent that expenditure on improving land, capital and equipment is lower for ECRP recipients than non-recipients, which may indicate that even if ECRP is freeing up funds that would otherwise be directed to household maintenance, the outcome is not necessarily maintenance or improvements in the natural resource base. Nevertheless, Boero Rodriguez, Watson and Mues (2006) report similar land degradation issues for both recipients and non recipients and ABARE (2008 unpublished) report no significant difference between recipients and non recipients in terms of seeking advice on and managing land and resources. Overall, there is little conclusive evidence to assess whether ECRP contributes to the NDP objective of maintaining the environmental resource base.

Efficiency of ECRP delivery

Centrelink has actively delivered ECRP assistance to those rural areas experiencing drought with several 'drought buses' and the creation of 'Rural Support Officers'. Inquiry participants were generally supportive of these measures and the efficiency with which Centrelink has delivered ECRP. For example, Lexo Pty Ltd, a merino wool, meat and breeding enterprise, indicated that:

> Centrelink and the RAA have been very efficient and friendly when dealing with support issues … (sub. 54, p. 4)

There are a number of areas in which income support provided by Centrelink to farm families differs from that provided to other parts of the community (as detailed in table B.1). Some of these differences may simply be a consequence of ECRP being instigated under legislation other than the Social Security Act 1991. While these differences generally favour ECRP recipients, they may nevertheless be a source of confusion for farm families, raise equity issues within communities, necessitate additional resources in program implementation, and reduce the efficiency with which programs can be delivered.

A further point of inconsistency is that while eligibility for ECRP is based on the income and assets of the farm family, the payment is made (at double the Newstart partner rate) to one member of a couple. As ECRP is assessed as taxable income, this can create issues with regard to structure of the farm business and marginal tax rates paid. Some other Centrelink payments, such as Newstart, are assessed separately and paid to each member of a couple.

In their applications for ECRP, farmers are required to estimate their net farm income level for the coming year, with their estimate affecting the rate at which the relief payment will be paid. This is similar to requirements of some other programs, such as the Family Tax Benefit. But expecting a farmer in the middle of extreme drought to be able to accurately estimate income for the coming year is unrealistic. More problematically, unlike these other programs, there is no routine reconciliation at the end of the financial year. This means that if a recipient's income is higher than estimated, there is little action that can be taken by Centrelink to recover benefits paid out. If income is lower than estimated by the farmer, then there is no revision to the rate paid. This provides a significant incentive for farmers to underestimate their income in order to meet ECRP eligibility criteria and is not an adequate way of dealing with a group that potentially has highly variable incomes. It is in contrast to the reporting responsibilities and treatment of all other groups in the community that receive income support.

Summing up on ECRP

Provision of income support to farm households in EC areas under the ECRP program is:

- appropriate in its intent to address the potential for living standards to decline during drought and the difficulties that farm households have in accessing the community's broader income support programs
- accessible, but the program is more generous than other income support programs in the community and there is evidence that some farmers have become dependent on the availability of government income support
- efficiently delivered, but the overall efficiency of the program is reduced by inconsistencies with other income support programs in the community and the absence of a regular reconciliation of payments with income actually earned.

B.2 Interim income support

Interim income support (IIS) provides short term financial support to farmers and small businesses that are in regions not yet EC declared, but are believed to be

experiencing financial difficulties as a result of drought. IIS was introduced in September 2002 after the Commonwealth Government announced early assistance would be provided to farmers in the central north/north western region of New South Wales where a prima facie case for EC assistance had been demonstrated. With the announcement of the Commonwealth Government's drought package in September 2007, IIS also became available to farmers and small businesses in selected areas for which a case for EC assistance had not yet been established:

- IIS in *Prima Facie areas* — Once it is announced by the Minister for Agriculture, Fisheries and Forestry that an EC application has demonstrated a prima facie case for a full EC declaration, the application is referred to NRAC for advice and IIS is available. In this situation, the duration of support is for a period up to six months from when it is announced that an EC application has demonstrated a prima facie case, or until EC is declared (whichever occurs earlier).
- IIS in *Interim Assistance Areas* — Alternatively, if the Commonwealth Government declares an area to be an Interim Assistance Area, then IIS is available in that area for a period specified by the Government. The purpose of Interim Assistance Areas is to provide short term relief while state governments, farming organisations and communities consider the development of an EC application.

Centrelink delivers IIS on behalf of DAFF. Payments under IIS are at an equivalent rate to those of ECRP and SBIS and are subject to the same asset and income tests, although no ancillary benefits (such as health care card or youth allowance concessions) are available. The duration of any subsequent payments received under ECRP or SBIS is reduced by the number of months for which Interim Income Support has been received. However, for areas that have had their EC declaration extended well beyond two years, a reduction in the duration of ECRP or SBIS (with up to 6 months of IIS) is not likely to be of any practical consequence.

IIS applicants

After early October 2008, there were no longer any areas in Australia that were eligible to receive IIS. During 2007-08 there were around 30 Prima Facie areas that received IIS, but these have since been assessed by NRAC and have been declared EC areas. In addition, there were 14 Interim Assistance Areas declared in Australia by the then government in September 2007 and all received IIS for the twelve months to the end of September 2008, even though these end dates did not necessarily match production and income cycles for some farms. Six of these Interim Assistance Areas were in Western Australia, four in South Australia, three in Tasmania and one in New South Wales. As no applications were made for EC

consideration of an Interim Assistance Area, farmers and small businesses in these areas are no longer receiving assistance.

A total of $7.6 million was provided for Interim Income Support to farmers across Australia in 2007-08. $4.8 million of this was for 1562 farmers in Prima Facie areas and $2.7 million was for 338 farmers in Interim Assistance Areas (table B.5). A further $1.3 million was provided for IIS in Interim Assistance Areas from July to October 2008. Even though these areas did not progress to EC status, recipient farmers in these areas are not required to repay the $4 million in support that they received.

The number of small businesses receiving IIS was much smaller. In the three years that support has been available to small businesses, fewer than 150 businesses received a total of $560 000 in interim support.

Table B.5 **Interim income support, 2002-03 to 2008-09[a]**

		2002-03	*2003-04*	*2004-05*	*2005-06*	*2006-07*	*2007-08*	*2008-09 Jul-Oct*
Farmers in prima facie areas								
Claimants	no.	3 401	6 477	417	187	3 698	1 562	
Average amount	$'000	2.49	2.39	2.20	1.67	3.11	3.00	
Total amount	$'000	8 461	15 508	919	312	11 517	4 823	
Farmers in interim assistance areas								
Claimants	no.						338	312
Average amount	$'000						8.12	4.13
Total amount	$'000						2 745	1 289
Small businesses in prima facie areas								
Claimants	no.					69	34	
Average amount	$'000					2.77	3.11	
Total amount	$'000					191	106	
Small businesses in interim assistance areas								
Claimants	no.						24	20
Average amount	$'000						7.98	3.63
Total amount	$'000						191	72
Total IIS paid	$'000	8 461	15 508	919	312	11 708	7 865	1 362

a At the date of finalisation of this report, no areas had received IIS beyond October 2008.

Source: Centrelink (2008 unpublished).

Evaluation of IIS

A number of participants in this inquiry have indicated that the process of getting a region EC declared can be cumbersome and time consuming (chapter 5). To the extent that this is the case, IIS potentially enables government income support to be

provided to farmers and small business families with a considerable degree of flexibility and responsiveness and could minimise the cost to recipients of 'red tape'. Early access to formal income support may also enable access to other training and community support programs and could prevent family financial problems from escalating.

However, the provision of IIS could reinforce an impression that recipients are 'entitled' to support or create the expectation within the recipient communities that EC status will ultimately be confirmed. Such a view could be further supported by the continued availability of IIS for 6 months, even if the region is rejected for EC status. IIS also raises the potential for political intervention in the provision of EC support as assistance can be provided without due consideration of eligibility through the EC process. For example, none of the Interim Assistance Areas declared by the government in September 2007, were subsequently considered for EC status, and the Tasmanian Minister for Primary Industries and Water described the interim assistance areas in that state as an 'election stunt' (Llewellyn 2008).

B.3 Farm Help income support

Farm Help was established under the Agriculture – Advancing Australia package in 1997. The training and redevelopment aspects of the Farm Help program are discussed in appendix D. Farm Help also has an income support program that is intended to provide short term financial support to farm families who are experiencing severe financial difficulties meeting living expenses and are unlikely to obtain a loan from a financial institution. The assistance aims to help farmers while they take action to improve their long term financial prospects, either by improving the financial performance of their farm enterprise, finding alternative sources of off-farm income or re-establishing outside farming. Importantly, the availability of Farm Help income support is not linked to the existence of drought.

Farm Help income support is paid at the same rate as the Newstart Allowance for up to 12 months. Support is subject to income and assets tests and, as for Newstart allowance, the amount received starts to decline once total (farm and non farm) income exceeds $62 per fortnight. Unlike Newstart allowance, farmers do not have to satisfy an 'activity test' and farm assets are excluded from the asset test. Recipients are required to attend an initial professional advice session and develop a 'Pathways plan' (a plan to best position the farm family for a financially secure future) in conjunction with a Centrelink Rural Services Officer.

Applications for Farm Help income support closed on 30 June 2008, but some farmers may still be receiving payments until 30 June 2009.

Eligibility for Farm Help income support

To be eligible for Farm Help income support, the applicant must:

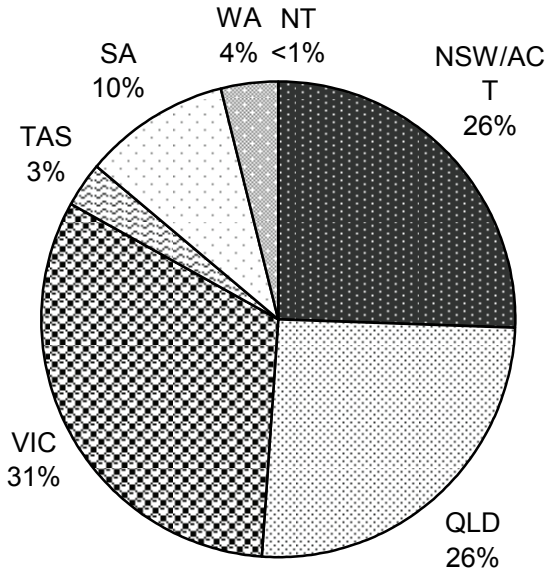
- for a continuous period of at least two years immediately before applying for the program
  - have been a farmer
  - have derived more than 50 per cent of gross income from the farm enterprise
  - have contributed more than 50 per cent of capital and working hours to the farm enterprise
- be unable to borrow against their assets
- be at least 18 years of age, an Australian resident living in Australia
- not, in any way, have lost management control of their farm (for example, through bankruptcy)
- satisfy the Farm Help income test (same as for Newstart) and assets test (same as for Newstart but applies to non farm assets only).

Farm Help income support recipients

Over the 12 years that the program operated, a total of about $107 million was provided in income support to 10 463 farmers (that is, an average of about $10 000 each). 31 per cent of recipients were located in Victoria and 26 per cent in each of New South Wales and Queensland (figure B.3). Use of the program has largely declined since the late 1990s, with increased use of other income support programs, such as ECRP (figure B.4).

SACES (2008a) reported that the demographic profile and length of farming experience of most Farm Help recipients is not dissimilar to ECRP recipients. One key difference between the two groups is that Farm Help recipients tend to operate smaller farms than ECRP recipients (who also had smaller farms than non recipients in EC declared areas). Boero Rodriguez, Watson and Mues (2006) similarly estimated that Farm Help recipients operate farms that are generally smaller and have a significantly lower market value than those of non-recipients (although only 2 per cent of farms within the scope of the ABARE survey received Farm Help).

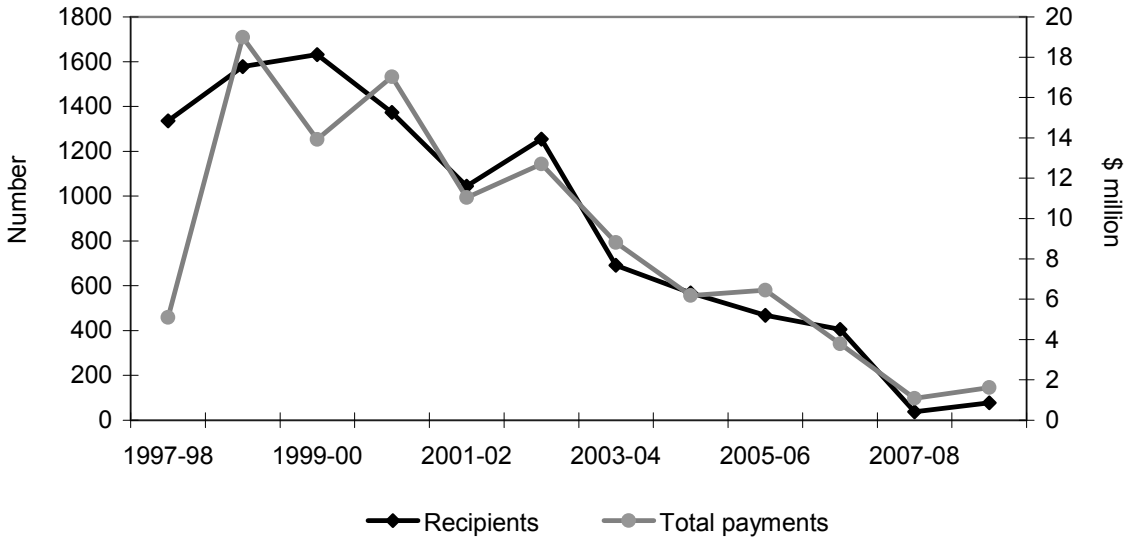
Figure B.3 **Farm help income support recipients by state, 1997-98 to 2008-09[a]**



a Figures for 2008-09 are based on recipient numbers at end November 2008; no new recipients could join the program after June 2008.

Data source: DAFF (2008 unpublished).

Figure B.4 **Farm help income support recipients and payments, 1997-98 to 2008-09[a]**



a Figures for 2008-09 are estimates based on expected numbers for the full financial year with clients expending their full entitlements.

Data source: DAFF (2008 unpublished).

The majority of farm families who have received Farm Help assistance do not have off-farm income or off-farm investments, and are therefore less likely to include off-farm income as a risk management strategy than non-recipients (Boero Rodriguez, Watson and Mues 2006). Furthermore, Farm Help recipients were more likely to have accessed other forms of government assistance (such as rural financial counsellors, ECIRS and the sugar industry reform package) than those farmers who did not receive Farm Help.

Evaluation of Farm Help income support

Given the eligibility criteria for Farm Help income support, the program is clearly aimed at helping the smallest, most vulnerable farms. Of particular concern is that the program targets those who are unable to borrow against their assets from commercial lenders. This means that the government is supporting families on farms which are commercially unviable in the long term and thereby making adjustment in the industry more costly to achieve.

A further shortcoming of Farm Help income support is that (in contrast to Newstart) there is no end of year 'reconciliation' to check that those farmers who received income support had income and asset levels during the year that were consistent with the eligibility criteria.

The necessity for recipients to complete a 'Pathway Plan' is one of the more beneficial aspects of the Farm Help income support program. SACES (2007) found that Pathways Planning prompted families to consider whether their financial position could be improved if they were to earn off-farm income. As a result, 22 per cent of survey respondents increased their reliance on off-farm income within a year and half of leaving the program. The sources of off-farm income were evenly divided between rural and non rural occupations. SACES (2008a) also noted that after participation in the Farm Help program, most recipients improved their financial position and increased their self-reliance.

B.4 Transitional income support

The Transitional Income Support (TIS) program was introduced under the government's Climate Change Adjustment Program in June 2008. TIS assists farm families to manage the impacts of climate change on their farm business by providing short term income support and advice and training opportunities. While there are some differences in eligibility criteria, TIS effectively replaces the income support and advice that was available under Farm Help. As is the case for Farm Help, provision of TIS is not related to drought.

TIS is taxable and is paid fortnightly by Centrelink at a rate equivalent to the Newstart allowance. Support is available for up to twelve months from 16 June 2008 to 30 June 2009.

Eligibility for transitional income support

Unlike ECRP, application for TIS is not conditional on the farm being located within an EC declared area — it is available to farmers Australia-wide. Income support under TIS can be back-dated for farmers in areas that are coming out of EC (if the application is made within 28 days of the end of EC) so that income support is continuous from the day the EC declaration ceases. To be eligible for TIS, a farmer must demonstrate that they have been, for a continuous period of at least two years immediately before applying:

- a farmer in Australia
- derived a significant amount of their gross income from farming and have contributed a significant amount of their labour and capital to the farm enterprise
- not received assistance from the Farm Help Advice and Training Scheme or Advice and Planning Grant after June 2008.

Assessment of eligibility for TIS requires several steps. Applicants who have total net assets (which includes both farm and non farm assets, debt and the principal residence) of more than $1.5 million or liquid assets (including FMDs) of more than $20 000 are immediately ineligible for income support. For applicants with assets below these thresholds, a financial assessment is then required.

The financial assessment is a determination of the financial circumstances of the applicant and farm business and takes into account non-farm assets, liquidity, debt to equity ratios and total net assets. Specifically:

- the farming family's estimated total income (farm and off-farm) for the next 12 months must be less than $39 988 (consistent with the personal income test for Newstart allowance); and
- the value of off-farm assets of the applicant and partner (including FMDs), less debt on these assets, must be below $243 500; and either
- the balance of cash held is less than current liabilities; or
- the farmer has a debt level that exceeds the level of equity in the farm.

The financial assessment forms a part of the required Farm Business Analysis and Financial Assessment. This assessment provides the farmer with an independent appraisal of their farm business and is intended to assist the farmer to decide what is

best for the future of the farm business and their family. Farm Business Analysis and Financial Assessments must be completed by a professional financial advisor. After successful completion of the Farm Business Analysis and Financial Assessment, the TIS applicant is directed to a rural financial counsellor to develop a Climate Change Adjustment Program (CCAP) Action Plan for their farm. The CCAP Action Plan maps out the process that the farm family will follow to adjust to the impacts of climate change and improve the family's long term financial security. The plan will establish goals, actions, timelines and expected outcomes. TIS recipients are provided with an advice and training grant of $5500 to access professional advice to assist them in developing the action plan.

Once the CCAP Action Plan is certified by a rural financial counsellor, payment of TIS commences (but can be back dated to the end of the EC period) and recipients become eligible for assistance to receive further advice or training pursuant to their Action Plan.

Farmers deemed by Centrelink to be in severe financial hardship will immediately receive TIS payments. The farmer then has three months to obtain the Farm Business Analysis and Financial Assessment and complete a CCAP Action Plan.

All farmers in receipt of TIS are obliged to take action to achieve financial self-reliance and increase preparedness for changing economic and climatic conditions. Rural financial counsellors have an ongoing role of case management of TIS recipients.

Transitional income support applicants

At mid December 2008, Centrelink had received almost 650 applications for TIS. There were 96 farmers receiving TIS payments and a further 154 farmers were approved to receive TIS, subject to the outcome of their Farm Business Analysis and Financial Assessment. The remaining 400 farmers were unsuccessful in their applications to obtain TIS. The main reasons for rejection of TIS applications were a failure to supply documentation, withdrawal of the customer (often following an EC extension decision), and liquid assets exceeding threshold levels for receipt of support (Centrelink 2008 unpublished). Amongst those who were unsuccessful in obtaining TIS, around 260 were nevertheless found to be eligible for advice and training grants under the CCAP (DAFF 2008 unpublished).

In total, the government paid $170 000 to farmers under the TIS program in the three months to the end of September 2008. There is no information available on the farm characteristics of TIS recipients, but virtually all TIS recipients were previously in receipt of ECRP (Centrelink 2008 unpublished).

Evaluation of transitional income support

Since its introduction in July 2008, there has been widespread criticism from farming groups of the accessibility of TIS. Of most focus is the $1.5 million threshold level for the net assets test. With regard to Queensland horticultural producers, Growcom stated that:

> … this test is totally unrealistic for horticultural producers. Just about any landholding in a horticultural production area would push growers over this limit — and it thus rules most growers out of eligibility for any assistance. (Growcom 2008, p. 1)

More generally, it was speculated by an agricultural consultant that:

> … as few as 1000 farmers will qualify for the new payments because the value of their land and farm assets is too high. (Paton 2008, p. 1)

However, ABARE data (2009 unpublished) indicates that there were close to 10 000 broadacre and dairy farms across Australia that had less than $1.5 million in farm net assets and less than $20 000 in liquid assets in 2007-08, in addition to around 1500 vegetable growers and 800 sugar growers (and this does not include farms in other agricultural industries).

The Western Australia Pastoralists and Graziers Association believe the funding is:

> … targeted at eastern states' farmers who are being phased out of years of dependency on federal assistance … probably its not going to have a huge impact in WA. (ABC News 2008, p. 1)

Compared with asset tests for other household income support programs, the $1.5 million threshold under the TIS is significantly higher, but recognises that farms may have high net assets but little or negative net income. Nevertheless, limiting assistance to manage climate change to farmers with smaller operations, could inadvertently delay a restructuring in farming industries that may be necessary to best adapt to climate change.

The necessity to undertake a financial assessment in order to be eligible for income support under TIS would potentially place considerable pressure on the applicant's financial advisor, who has the role of determining the extent of further support available to the applicant. The necessary skilled professional advice for the financial assessment may not be available in some parts of Australia.

As for Farm Help Income Support, TIS does not ensure that recipients operate farms which are commercially viable. However, and in contrast to Farm Help, the financial assessment in TIS does at least attempt to limit income support to those farm households which have insufficient liquid resources to support themselves or meet their immediate expenses.

A further shortcoming of TIS is that (as for Farm Help income support, and in contrast to Newstart) there is no end of year 'reconciliation' to check that those farmers who received TIS had income and asset levels during the year that were consistent with the eligibility criteria. This lack of reconciliation places additional importance on the accuracy of applicant's initial income estimates and may also be a problem if there are TIS applicants who received immediate support under hardship provisions and were subsequently found to be ineligible for TIS.

B.5 Small business income support

Agriculture-dependent small business operators who are either based within, or dependent upon, an EC (or Prima Facie or Interim) declared region, have been eligible to apply for small business income support since 7 November 2006. The eligibility criteria for small businesses were expanded on 25 September 2007 to allow small business operators in EC (or Prima Facie or Interim) areas, other than those that are agriculture-dependent, to also apply for income support.

Small business income support (SBIS) is intended to assist with day to day family and personal living expenses of small business owners, rather than operating expenses of the business.

As for ECRP, SBIS is paid fortnightly by Centrelink according to guidelines set by, and with funding provided through DAFF. Payment is at a rate equivalent to the Newstart allowance and is taxable. In addition to the basic income support, SBIS recipients and their families receive a Health Care Card and may also be eligible for concessions under the Youth Allowance and Austudy means test for dependent children. However, an individual cannot receive SBIS, ECRP and other income support (such as Farm Help) at the same time.

SBIS can be received continuously until either the end of the EC declaration in the relevant area or 30 June 2009, whichever is earliest. The continued eligibility of SBIS recipients is reviewed every six months and those who are engaged in casual employment are required to report income earned to Centrelink every fortnight.

Eligibility criteria for SBIS

To be eligible to receive SBIS, small business operators must demonstrate that:

- they have a right or interest in a small business, a current Australian Business Number and carry out commercial activities

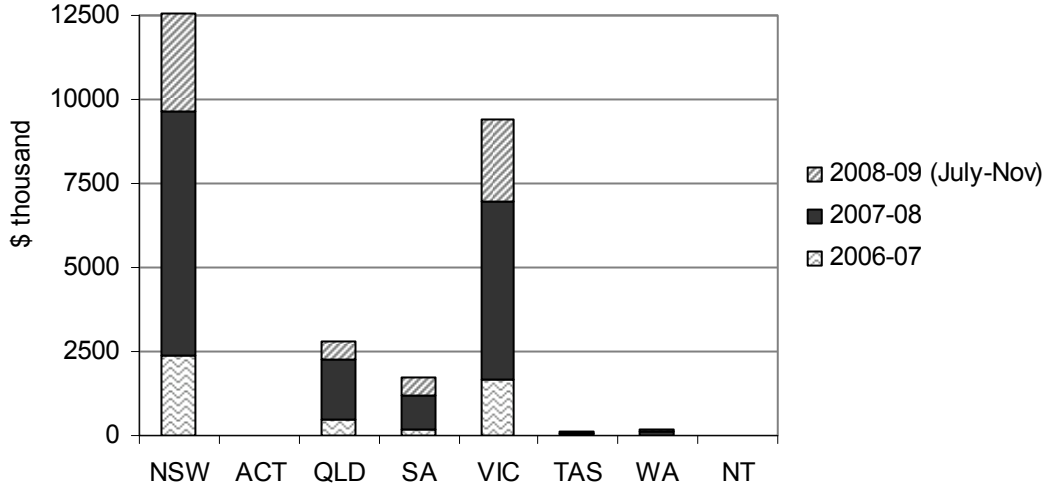
- are at least 18 years of age, are an Australian resident or have permission to permanently live in Australia
- they employ up to 100 full time equivalent staff
- under 'normal' circumstances, they contribute significant labour and capital to the small business and gain a significant part of their income from the small business
- their business is dependent on income from farmers, farm workers and their families because they
  - derived (in an earlier period of 'normal' turnover) at least 70 per cent of their income from the provision of goods or services to farming activities in an EC (or Prima Facie or Interim) declared region; or
  - are located in a town that is substantially reliant on-farm incomes, has a population of 10 000 or less and is located in an EC (or Prima Facie or Interim) declared area
- they have experienced a significant downturn in total business turnover as a result of the impact of drought on farms located in EC (or Prima Facie or Interim) declared areas
- they (and their partner) have received less than $20 000 from any non-business salary and wages during the financial year.

Income and assets tests similar to those for Newstart allowance apply, but assets essential to the running of the small business, superannuation and life insurance of the applicant, are not included.

SBIS applicants

The Commonwealth Government has provided income support of $27 million to the family owners of almost 1500 businesses over the three years that the SBIS program has been in operation (figure B.5). Most of these businesses (over 80 per cent) have received assistance for more than a year. The majority of the assisted small businesses are located in New South Wales (Riverina, Central North-North West and South West Slopes and Plains) and in Victoria (Mallee – Northern Wimmera, South Western Victoria and North East Victoria).

Figure B.5 **Small business income support payments by state, 2006-07 to 2008-09[a]**



a Estimates for 2008-09 payments are for the period July to November 2008 only.

Data source: Centrelink (2008 unpublished).

In each year that assistance has been offered, the main type of small business that received income support was contractors (table B.6). This group could include a wide variety of professions such as fencing contractors, plumbers and shearers and could correspond with the reduction in expenditure on hired labour by ECRP recipients (discussed in section C.1). To a significant, but lesser extent, other businesses affected include 'suppliers', 'other services and suppliers' and 'transport services'. DoTRS (2005) reported that these types of small businesses are most vulnerable to drought because they are not only dependent on farmers but also sell goods and services that can be 'done without' when funds are tight. In contrast, businesses such as financial services, accommodation services and manufacturing/wholesale, which received lower levels of support, could be expected to have a broader customer base and be less dependent on farm expenditure.

Since SBIS was introduced, a total of 743 recipients (50 per cent) have had their support cancelled. As for ECRP, the most common reason for cancellation of income support was that the EC end date in the relevant region had been reached, income precluded entitlement or that the customer failed to reply to correspondence from Centrelink. Most recipients have remained in operation during the past three years of drought with only 3 per cent of small business claimants having their assistance cancelled because they left or sold their business.

Table B.6 **Small business income support recipients and payments by industry, 2006-07 and 2008-09[a]**

	Proportion of all recipients			*Total gross payments*		
	2006-07	*2007-08*	*2008-09*	*2006-07*	*2007-08*	*2008-09*
	%	%	%	$'000	$'000	$'000
Accommodation services	0	0	1	0	35	58
Contractors	52	39	33	2 515	6 504	2 221
Consultants	1	2	2	40	197	96
Construction	0	1	1	0	68	50
Financial services	0	0	0	0	5	25
Hospitality	0	2	3	0	227	243
Irrigation services	4	4	4	189	663	242
Manufacturing/wholesale	0	0	1	0	81	50
Other services & suppliers	17	15	14	735	2 474	982
Retail services	0	3	5	0	263	308
Retail goods	0	7	10	0	594	583
Rural services	0	2	2	0	201	153
Suppliers	13	12	11	625	2 010	732
Transport services	14	13	13	617	2 198	847
Total	**100**	**100**	**100**	**4 721**	**15 521**	**6 589**

a Estimates for 2008-09 recipient numbers and payments are for the period July to November 2008 only.

Source: Centrelink (2008 unpublished).

Evaluation of SBIS

SBIS is evaluated here first from the perspective of how appropriate it is within the context of NDP, and second, by considering its effectiveness in terms of accessibility to the families of small businesses.

There may have been less need for assistance for small businesses during the latest drought (at least during the earlier years) than in previous droughts. From a survey of small businesses in drought areas, DoTRS (2005, p.2) reported that:

> Many of our interviewees shared the view that the current drought is having less of an impact on non-farm small businesses and communities that the devastating 1994 drought. The key factors seem to be: lower interest rates … higher land values … better farm management in general and better farm financial management in particular …

DoTRS (2005) indicated that EC support to farmers is filtering through to non farm small businesses and communities. They also reported that financial support for farmers on its own is 'not enough to mitigate all non-farm and community impacts'. In this respect it is not the purpose of government assistance to assume all the risks

of a particular change in the operating environment. If government assistance were to fill such a role then it could be expected that small businesses would have little incentive to act to mitigate the effect of drought on their business and families.

A related concern with the provision of SBIS is the extent to which longer term influences on business performance are labelled as 'drought' impacts. In its report on the social impacts of drought, the government's Expert Social Panel provided evidence that a reduction in the number of skilled labourers and a loss of small businesses can have a devastating consequence for regional communities (Kenny et al. 2008). While these changes in communities can be exacerbated by drought, they can also be a symptom of longer term underlying changes taking place within the community — such as an aging population, lack of diversity in employment opportunities and high dependence on a single industry (farming).

Levantis (2001) noted that the smaller the town, the more important is farm expenditure to the town economy (farm expenditure was estimated to represent at least one third of the economy in towns with fewer than 1000 people). Somewhat problematically though, the greater was the reliance of a town's economy on expenditure by farmers, the lower that town's population growth was found to be over the 10 years to 1996. To the extent that such longer term changes within communities are occurring, drought based assistance is unlikely to be an appropriate or well targeted government tool to best facilitate community development.

The objective of SBIS is to be accessible to the families of those small businesses who, because of drought, are unable to meet their day to day family and personal living expenses. Whether the program is effective in achieving this outcome is difficult to determine. What is apparent from the analysis presented in the previous section is that most SBIS recipients are small businesses that are likely to be dependent on farm expenditure (such as contractors and suppliers). Further, businesses which could be expected to have a broader customer base within communities (such as accommodation and financial services) and therefore may be less directly impacted by drought, have received little SBIS.

This potentially raises an equity issue between businesses within and between communities — there may be factors other than drought which have significant negative impacts on businesses but for which no government assistance is available.

Finally, and as for ECRP, the lack of an end of year reconciliation of income estimates with income outcomes provides an incentive for small businesses to underestimate incomes in order to receive ECRP.

B.6 Other community assistance

There are a number of community organisations, church groups and charities which provide emergency assistance to rural families in financial difficulty. Commonwealth, state, territory and local governments also have a range of programs, exemptions and special facilities in place to assist rural and regional communities in managing issues that may arise from their isolation or lack of access to infrastructure and services.

Farmhand Foundation

The Farmhand Foundation, in association with Australian Red Cross, raised and distributed $24.6 million to around 18 000 farm families between October 2002 to June 2003 (Farmhand nd). Most of these funds went to farmers in New South Wales ($11 million) and Queensland ($6.5 million) (ABC 2003). The intended uses of these funds were food, electricity and phone bills, vehicle maintenance, medical costs and stock feed.

Country Women's Association Emergency Drought Aid Fund

From November 2002 to June 2008, the Commonwealth Government provided funding support to the Country Women's Association (CWA) to establish an emergency drought aid fund. This funding was to enable grants to be made to rural families to help meet their household expenses and to assist community groups to run events that boost morale in drought declared regions.

Under the CWA scheme, farming families or local small businesses dependent on spending by farming families could apply for up to $2000 for one-off emergency payments covering non-farm expenses such as dental or medical costs, utility accounts, school bills, car expenses. Community groups or other not-for-profit organisations wanting to hold gatherings, outings or information sessions for drought affected communities could apply for up to $3000.

The CWA has also received funds for distribution to farmers from state governments and donations from the community and private companies (sub. 17, p. 1).

The initial Commonwealth Government donation of $1 million in December 2002 was distributed to each state and territory based on an estimate of the number of people affected by the drought. Funding ran out in New South Wales, Western Australia, Victoria and Queensland between February and April 2003 and unspent

funds from the Northern Territory and Tasmania were reallocated to these States. Some 90 per cent of the $1 million fund was spent between January and March 2003. This was much earlier than the expected 30 June 2004 end date (Australian National Audit Office 2005). A further $15 million was donated by the Commonwealth Government to the CWA during 2005-06, 2006-07 and 2007-08 to enable continued provision of emergency aid to drought affected rural families and communities.

Other drought related community initiatives

The Commonwealth Government has a range of other drought related initiatives that primarily operate as concessions to existing broader programs for drought affected farmers and farm workers. Some of these include:

- Employment initiatives for redundant rural workers in drought affected areas, such as access to Job Search Support, early access to intensive support and job search training, the Drought Force program for skilled unemployed people in EC or prima facie declared areas, and flexible arrangements for access to Newstart allowance.
- Taxation initiatives relating to lodgement and payment of income tax and activity statements, treatment of farm management deposits, landcare operations and profit from forced disposal of livestock.
- Social support initiatives. The Expert Social Panel, in its assessment of the social impacts of drought, provide details of a range of health and counselling services introduced for those in drought affected communities.

Other Commonwealth Government sourced regional assistance

Australian governments, at all levels, offer a vast range of assistance programs targeted at rural and regional areas, not only in times of drought, but on an ongoing basis. These programs are broadly intended to offset higher costs of providing services of a socially acceptable standard in regional areas and satisfy the governments' commitments to equity in provision of key communication, education and health services in particular. Community assistance is generally narrow in scope but can have the advantage of being well targeted at those groups most in need at a particular point in time. However, in times of drought, a community's capacity to provide this support is likely to be at its weakest (DoTRS 2005).

Commonwealth Government initiatives

The Commonwealth Government (through DAFF) provides businesses with grants under the 'International Agricultural Cooperation' program to improve market access and trade. Other programs are directed at natural resource management such as the National Landcare Program (replaced in 2008 with Caring for our Country — Landcare), 'Healthy Soils for Sustainable Farms' Program, the Environmental Stewardship program and National Water Initiatives. The Commission estimates that over $1.1 billion in non-EC assistance was provided to agricultural industries by the Commonwealth Government alone in 2006-07 — this does not include some major funding initiatives for irrigators (PC 2008b).

A number of regional development programs are also provided through the Commonwealth Government Department of Infrastructure, Transport, Regional Development and Local Government. For example, the $176 million Better Regions Program provides community infrastructure to enhance the liveability of regions and regional towns. Other programs administered by the department include the Regional Partnerships program and the Foundation for Rural and Regional Renewal.

Education is a key area of government support in regional areas. The Commonwealth Government provides financial assistance to schools directly affected by drought. Rural and remote government and non-government (primary and secondary) schools located in EC declared areas, in towns with a population of less than 10 000, can apply for assistance of up to a maximum of $10 000 per year for the duration of the EC declaration. The Commonwealth Government (through the Department of Education, Employment and Workplace Relations) also provides regional assistance through the 'Assistance for Isolated Children Scheme' (support for children in remote locations), the 'Country Areas Program' (additional funding for schools in geographically isolated areas), the Non-government School Term Hostels program (assists not-for-profit non-government school hostels to provide affordable alternatives to boarding schools), and regional and remote funding loading for non-government schools.

Regional health assistance is provided through the Department of Health and Ageing. As part of the 2008-09 Federal Budget, the Commonwealth Government announced the establishment of the National Rural and Remote Health Infrastructure Program. The program aims to improve access to health services by providing funding to rural and remote communities where the lack of infrastructure is a barrier to the establishment of new, or enhanced, health services. More than $46 million has been allocated over the next four years to the program.

C Exceptional Circumstances triggered business support

Australia's National Drought Policy (NDP) came into effect in 1992. The objectives of the policy are to:

- encourage primary producers and other sections of rural Australia to adopt self-reliant approaches for managing climatic variability
- maintain and protect Australia's agricultural and environmental resource base during periods of extreme climate stress
- ensure early recovery of agricultural and rural industries, consistent with long-term sustainable levels.

While self-reliance is a key objective, the NDP allows for short-term drought assistance and support. It states that there are 'rare and severe drought events — Exceptional Circumstances (EC) — that are beyond the ability of even the most prudent farmer to manage'. Support is therefore provided to individuals, farm businesses and farm dependent rural businesses experiencing such circumstances.

In this appendix, the appropriateness, effectiveness and efficiency of the support provided to farm businesses and farm dependent rural small businesses during severe drought events is analysed.

C.1 Available EC business support

Two main assistance measures have been developed by the Commonwealth Government to target farm and farm dependent small businesses that are experiencing an EC event: interest rate subsidies and an exit grant (only farm businesses) for those wishing to leave the industry. When the NDP was agreed in 1992, it was determined that business assistance during EC events would take the form of an interest subsidy so as to avoid ad hoc policy development during times of crisis (Drought Review Panel 2004).

EC programs

As a result of an EC declaration, primary producers (and small business in towns of less than 10 000 people who are reliant on primary production — termed farm dependent rural small businesses) can access a range of support measures (box C.1).

Box C.1 **Commonwealth Government support to farm and farm dependent rural small businesses tied to an EC declaration**

The Commonwealth Government's drought related policies include:

- EC interest rate subsidies
- EC exit package (farm businesses only)
- Early access to Farm Management Deposits funds (farm businesses only)
- Declared drought area incentives: additional commencement incentive for businesses employing apprentices
- Australian Tax Office provisions allowing farm businesses in drought affected areas additional time to lodge tax documents.

Source: DAFF (2008d).

Interest rate subsidies are provided to farmers and farm dependent rural small businesses that are viable in the long-term, but are currently in financial difficultly due to an EC event (DAFF 2008d). A subsidy of up to 50 per cent of the interest payable on new and existing loans (with the exception of new property purchases, which do not attract the subsidy if purchased within the last 12 months) is provided for in the initial year of an EC declaration, with provision for a subsidy of up to 80 per cent in the second and subsequent years. Payments are taxable and are capped at $100 000 in any 12 month period and $500 000 over five years. The subsidy is paid directly to producers and not to the institution to whom the debt is owed. The eligibility requirements of the scheme include:

- an off-farm (or out of small business) asset test of $750 000 applies. This excludes assets held in Farm Management Deposits (FMDs), bona fide insurance and superannuation (this is to be reduced to close to $500 000 post June 2009)
- farmers (and small businesses owners) must, under normal circumstances, have contributed at least 75 per cent of their labour to the enterprise
- they must have derived at least 50 per cent of their income from farming (or the small business).

This policy is 90 per cent funded by the Commonwealth Government, with the remainder funded by state and territory governments. EC interest rate subsidies have been available to farmers since 1993, and to small businesses since 2006, and are administered by state and territory government authorities.

For those farm businesses viewed as unviable whose owners want to leave the industry, an exit package is available. The EC exit package consists of an EC Exit Grant, an EC Advice and Retraining Grant, and an EC Relocation Grant. The Exit Grant provides a taxable one-off payment of up to $150 000 for farmers leaving the industry, and who are selling their farm enterprises (box C.2).

Box C.2 **Eligibility requirements for the EC exit package**

The EC Exit Package consists of a taxable one-off payment of up to $150 000 for farmers within an EC declared area who decide to sell their farm, along with retraining and relocation grants, both up to $10 000. In order to be eligible, the applicant has to have contributed a significant amount of labour and capital to the farm enterprise, and derived a significant amount of their income from the farm enterprise. Other requirements are that:

- the applicant must have owned or held an interest in the farm for at least five years, or inherited/taken ownership of a farm that has been in the family for at least five years
- the applicant or their partner must not have previously received a successful exit-grant, re-establishment grant or restructuring grant under previous Commonwealth Government packages
- the farm enterprise must not be involved in bankruptcy proceedings, involuntary mortgagee possession arrangements, or issued with an eviction order, or lost management control of the farm in any other way

The maximum amount of $150 000 can only be received if the applicant's net assets (including the family home) are less than $350 000. For every $3 in assets above $350 000, the amount of the grant is reduced by $2 up to net assets of $575 000. Successful applicants must agree to exit the industry for at least five years, otherwise the grant must be paid back in full.

To access the retraining grant, the applicant must discuss exit advice, training needs and options with Centrelink. All of the elements of the EC Exit Package are administered by Centrelink.

Source: DAFF (2008e).

The EC Exit Package is also available more widely to all farmers under the Climate Change Adjustment Re-establishment Grant until 2012 (but the retraining grant is limited to $5500). An additional exit package for irrigators in the Murray-Darling Basin is also available under a recently announced exit grant package (box C.3). As with the EC interest rate subsidies, the rationale for the EC exit package has not been linked to the objectives of the NDP.

Box C.3 **Small block irrigators exit package**

The Commonwealth Government recently announced an exit package for small scale irrigators as part of the water buy back in the Murray-Darling Basin. The package is intended to be short term (applications close 30 June 2009) and is available to irrigators farming less than 15 hectares. It consists of:

- a taxable exit grant of up to $150 000
- up to $10 000 for advice and training (including skills development, direction setting plans, business advice and succession planning)
- up to $10 000 for the removal of permanent plantings and other irrigation production related infrastructure.

The program will not require irrigators to move off their land, but does require them to sell all of their water entitlement (must be at least 10 ML) to the Commonwealth Government. As at December 2008, the package was only available in South Australia (available to irrigators in Victoria, New South Wales and Queensland as of February 2009) and, despite many expressions of interest, no payments had yet been made.

C.2 Assessment of EC triggered business support

In this section, the appropriateness, effectiveness and efficiency of EC triggered business support measures are assessed.

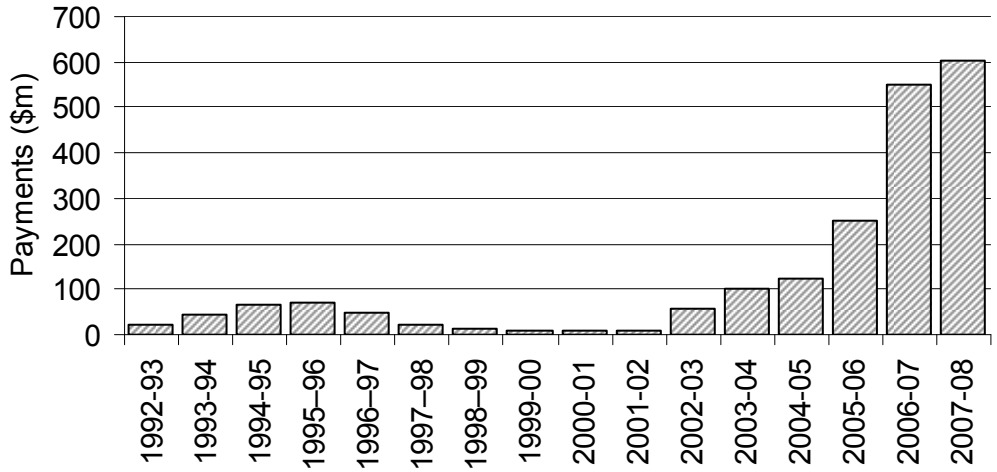
EC Interest Rate Subsidy for farmers

The EC Interest Rate Subsidy (ECIRS) has been in place since 1993. During this period, the eligibility criteria to gain access to the payment have changed several times, altering the potential number of farmers who are eligible. In particular, from October 24 2006 the maximum subsidy payable over 5 years increased from $300 000 to $500 000. Further, over the period from 25 September 2007 to 30 June 2009, the off-farm asset threshold was lifted from double the Newstart Allowance asset test for partnered homeowners of close to $500 000 (in 2008 — Centrelink (2008a)) to $750 000 (DAFF 2008e). As such, changes over time in the uptake of

the subsidy need to be interpreted with caution. Over this period total expenditure on ECIRS has increased significantly (figure C.1).

Prior to the current series of declarations, ECIRS payments reached a high of $69.4 million in 1995-96. In 2007-08, total payments were $604.1 million. As at December 2008, a further $155.3 million in payments have been made to 4758 farmers across Australia.

Figure C.1 **Total ECIRS payments to farmers, 1992–93 to 2007–08**



Data sources: DAFF (2008 unpublished); Manins et al. (2001).

The changes in ECIRS payments reflect, in part, the proportion of Australia's agricultural land that has been declared as experiencing an EC event. The proportion of agricultural land under an EC declaration fell from 30 per cent in 1992 to just under 1 per cent in 2000 (table C.1). Between 2002 and 2004 there was a significant increase in the area of land EC declared, which was matched by an increase in EC payments. However, since 2004 the proportion of agricultural land EC declared has remained at close to 50 per cent. As such, the significant increase in ECIRS payments in 2006-07 and 2007-08, while partly reflecting increased stress on a number of farm businesses because of the prolonged drought in some areas, appears to be largely driven by changes to the design of the scheme.

The average amount received per application in 2006-07 and 2007-08 increased, again reflecting, in part, the increasing generosity of the scheme (figure C.2).

Table C.1 **Agricultural land under EC declaration by state, 1992 to 2008**

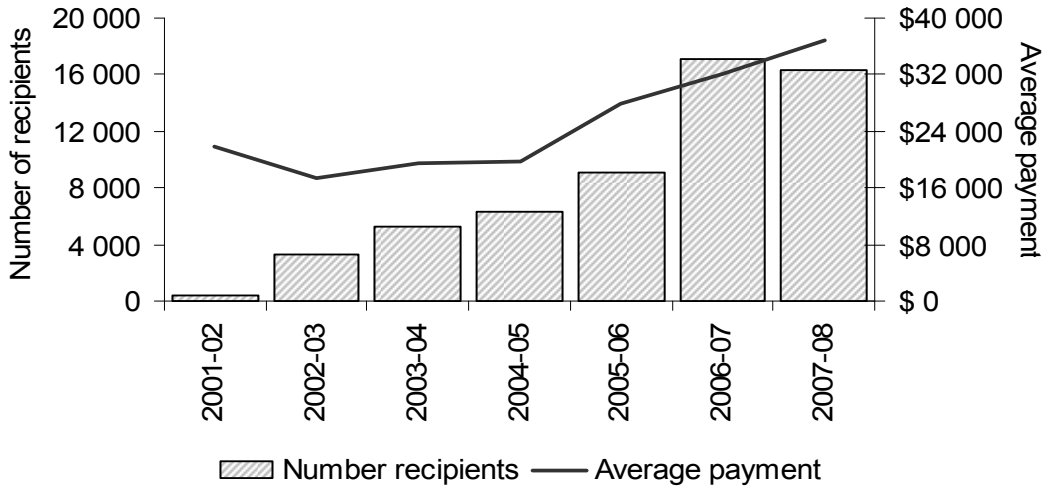
Per cent

	NSW	*Vic*	*Qld*	*SA*	*WA*	*Tas*	*NT*	*ACT*	*Australia*
	%	%	%	%	%	%	%	%	
1992	–	–	100	–	–	–	–	–	30
1993	–	–	100	–	–	–	–	–	30
1994	37	–	100	–	–	25	–	–	36
1995	53	18	100	4	–	25	–	–	39
1996	37	–	72	–	–	–	–	–	27
1997	31	4	64	–	–	–	–	–	24
1998	11	9	11	–	–	4	–	–	5
1999	6	13	6	–	–	4	–	–	3
2000	2	12	–	–	–	15	–	–	1
2001	–	3	2	–	2	11	–	–	1
2002	44	–	3	–	4	–	–	–	8
2003	96	38	50	24	43	–	–	–	44
2004	97	38	57	35	41	–	–	100	47
2005	97	63	59	35	37	–	–	100	47
2006	96	63	59	35	7	–	–	100	40
2007	98	100	61	97	20	47	26	100	57
2008	96	100	41	97	20	47	26	100	50
Average[a]	47	27	52	19	10	10	3	29	29

[a] Average for 1992 to 2008.

Source: DAFF (2008 unpublished).

Figure C.2 **ECIRS recipient numbers and average annual payments, 2001-02 to 2007-08**



Data source: DAFF (2008 unpublished).

In all states except Western Australia, the number of recipients has increased since 2001-02 (table C.2). New South Wales had the largest number of ECIRS recipients in 2007-08 (8245) while the Northern Territory had the lowest number of recipients (7). Recipients in the Northern Territory, however, received the largest average payment (over $90 000), reflecting the size of their land holdings and thus potential debt levels. This is also the first year that any part of the Northern Territory has been EC declared. Farmers in Western Australia received, on average, the second highest subsidy per recipient (just over $50 000), followed by those in New South Wales (close to $40 000).

Table C.2 **ECIRS payments by state, 2001-02 to 2007-08**

	NSW			*QLD*			*VIC*		
	Recipients	*Total paid*	*Average paid*	*Recipients*	*Total paid*	*Average paid*	*Recipients*	*Total paid*	*Average paid*
	no.	$m	$	no.	$m	$'000s	no.	$m	$'000s
2001-02	–	–	–	285	4	14 993	–	–	–
2002-03	1 320	22	16 836	994	16	16 536	820	13	16 345
2003-04	2 627	52	19 772	1 716	32	18 752	679	12	17 651
2004-05	3 009	68	22 536	2 316	37	16 112	751	13	17 866
2005-06	5 324	155	29 131	2 260	62	27 380	1 247	29	23 089
2006-07	9 686	303	31 250	3 372	113	33 412	3 726	124	33 184
2007-08	8 245	329	39 953	2 638	95	35 966	3 476	116	33 350
	WA			*SA*			*TAS*		
2001-02	172	6	32 842	–	–	–	–	–	–
2002-03	174	5	29 527	19	>1	13 455	–	–	–
2003-04	202	6	27 724	42	1	13 718	–	–	–
2004-05	212	5	25 004	56	1	12 134	–	–	–
2005-06	115	4	37 859	104	2	23 425	–	–	–
2006-07	80	3	33 985	375	10	27 620	–	–	–
2007-08	182	9	50 543	1 669	50	29 964	127	4	32 332

Source: DAFF (2008 unpublished).

Over the period July 2001 to December 2008 the proportion of ECIRS claims approved averaged 84 per cent. Across the states, New South Wales had the highest approval rate of 83 per cent, followed by Queensland and Victoria with 79 per cent and 75 per cent respectively. Western Australia had the lowest approval rate with 71 per cent. The primary reason for rejection in all states was that the applicant was deemed to be 'not in need' of assistance — 50 per cent of total rejections (8 per cent of total applications). This also varied across the states, with the proportion of applicants deemed not in need varying from 74 per cent of total rejections in Victoria (16 per cent of total applications) to 11 per cent of rejections in South Australia (3 per cent of total applications). New South Wales and Queensland also

had relatively low rejection rates due to an assessment of 'not in need' — 6 per cent of total applications in both states. Nationally, 1 per cent of applications were rejected on the basis of the farm not being viable.

Farmers within the mixed farming, beef, sheep and beef and dairy industry groups received the largest ECIRS payments over the period 2001-02 to 2007-08 (table C.3).

Table C.3 **Payments to industry by state and territory**
Total paid from 2001-02 to 2007-08

Industry group	*NSW*	*QLD*	*VIC*	*SA*	*TAS*	*NT*	*Australia*[a]
	$m	$m	$m	$m	$m	$m	$m
Beef	79.8	164.7	13.3	0.8	0.1	0.4	259.1
Cropping	112.0	12.0	53.2	5.6	–	–	182.8
Dairy	58.3	21.8	139.0	3.2	0.3	–	222.6
Fruit and grapes	30.0	7.1	16.5	7.1	–	–	60.7
Mixed	277.7	54.3	51.3	34.2	2.1	–	419.6
Other crops	60.1	43.2	2.7	1.7	–	–	107.7
Other livestock	8.0	6.7	–	0.7	–	–	15.4
Sheep	80.3	15.2	16.5	1.0	0.4	–	113.4
Sheep-beef	204.5	11.2	8.1	8.3	0.9	–	233.0
Other	1.4	0.6	0.3	0.1	–	–	2.4
Total	912.2	336.8	301.0	62.8	3.8	0.4	1 617.0

[a] Excludes Western Australia as industry data from ECIRS recipients is not collected. Excludes payments made in 2008-09 to applications received in 2007-08.

Source: DAFF (2008 unpublished).

The mixed farming, beef, sheep and beef and dairy industries accounted for over 70 per cent of total payments made in the states and territories which recorded recipient industry information. Relative to the total number of farmers in each industry group, dairy farmers and mixed agricultural enterprises received a greater share of payments.

Many recipients of the ECIRS have accessed support on multiple occasions, meaning it is difficult to gain a picture of how many producers have accessed the scheme by examining the number of recipients alone. Where data are available — New South Wales, South Australia, Tasmania and the Northern Territory — examining the number of applicants provides an indication of the coverage and uptake of the ECIRS program. In New South Wales, 25 per cent of all producers had accessed ECIRS payments over the period (table C.4). This proportion was greatest for those in the sheep-beef and mixed industry groups. Mixed agricultural producers also had the highest usage rates in South Australia and Tasmania.

Table C.4 **Total producers accessing ECIRS payments by industry group**
Selected states and territories 2001-02 to 2007-08[a]

Industry group	*NSW*	*SA*	*TAS*	*NT*
	%	%	%	%
Beef	9	2	–	3
Cropping	42	5	13	–
Dairy	45	15	1	–
Fruit and grapes	14	11	–	–
Mixed	54	40	89	–
Other crops	17	6	–	–
Other livestock	6	4	–	–
Sheep	23	3	4	–
Sheep-beef	55	19	8	–
Total	**25**	**13**	**3**	**1**

[a] Includes all farmers who accessed support payments over the period expressed as a proportion of producers in each industry group in 2006-07. As recipient classification is based on individual state agencies' classification, differences are likely to exist between these and those of the ABS. For other states and territories records by applicants are not available. Excludes payments made in 2008-09 in respect of applications received in 2007-08.

Sources: DAFF (2008 unpublished); ABS (*Agricultural Commodities, Australia 2006-07,* Cat. no. 7121.0).

With producers in Tasmania only having access to EC payments in 2007-08 and the relatively small number in South Australia receiving assistance, an examination of the behaviour of New South Wales producers offers the best opportunity to gain an insight into how long producers remain on ECIRS assistance. In New South Wales, the incidence of new ECIRS recipients was relatively high from 2002-03 to 2003-04 and again from 2006-07 to 2007-08 (table C.5). These increases are in line with actual rainfall results despite the proportion of New South Wales under an EC declaration remaining relatively unchanged at over 95 per cent throughout the whole period from 2003 onwards. For example, from the beginning of 2001 to the end of 2002 around 27 per cent of New South Wales experienced exceptionally low rainfall — in the 5th lowest percentile (Hennessy et al. 2008). From the start of 2003 to the end of 2005, less than 1 per cent of the state experienced exceptionally low rainfall, increasing to over 11 per cent over the period from beginning of 2006 to the end of 2007.

Table C.5 **Incidence of ECIRS recipients in New South Wales, 2002-03 to 2007-08[a]**

Number

Industry group	*2002-03*	*2003-04*	*2004-05*	*2005-06*	*2006-07*	*2007-08*
Beef	260	311	85	192	250	229
Cropping	91	292	118	173	324	184
Dairy	133	192	34	36	55	54
Fruit and grapes	19	55	28	25	213	165
Mixed	179	330	169	484	977	520
Other crops	11	29	42	191	162	135
Other livestock	20	24	7	22	24	36
Sheep	119	270	159	237	246	124
Sheep-beef	281	648	159	492	460	303
Total	**1 113**	**2 151**	**801**	**1 852**	**2 711**	**1 750**
Agricultural land EC declared (%)	95.5	96.8	96.8	96.2	98.2	96.0

a Excludes claims made in 2007-08 for which payments were received in 2008-09.

Source: DAFF (2008 unpublished).

While low rainfall is associated with an increase in the number of farmers accessing support measures for the first time, once accessed, many farmers remain on ECIRS assistance. Over the period 2002-03 to 2007-08, many farmers made claims in each year that their area was EC declared. Those that entered the scheme for the first time in 2002-03 made an average of four successful claims (table C.6).

Table C.6 **Successful ECIRS claims per farm business by year of first claim in New South Wales, 2002-03 to 2007-08[a]**

Average number per farm business

Industry group	*2002-03*	*2003-04*	*2004-05*	*2005-06*	*2006-07*	*2007-08*
Beef	3	3	3	3	2	1
Cropping	4	4	4	3	2	1
Dairy	4	3	3	3	2	1
Fruit and grapes	2	4	3	2	2	1
Mixed	4	4	4	3	2	1
Other crops	2	3	3	3	2	1
Other livestock	3	5	3	3	2	1
Sheep	4	5	4	3	2	1
Sheep-beef	4	4	4	3	2	1
Weighted average	4	4	4	3	2	1

a The number of farm businesses that made successful claims prior to 2002-03 is unknown. Excludes claims made in 2007-08 for which payments were received in 2008-09.

Source: DAFF (2008 unpublished).

This was repeated for those that entered in 2003-04. However, those in the sheep and other livestock industry groups made an average of five successful claims. For later periods, those that made their first ECIRS application remained on support for the entire reporting period. Over this period only 39 claimants had both successful and unsuccessful claims.

Is ECIRS appropriate?

The appropriateness of ECIRS assistance rests on whether it is tied to a valid rationale for government intervention. Given the NDP objectives, there appears to be little rationale for the provision of interest rate subsidies. However, as interest rate subsidies has been directed at farmers who are experiencing liquidity problems during severe drought events, it appears policy makers believe that there is some impediment to farmers accessing carry-on finance during these periods.

But given high equity levels of recipients (average of over 80 per cent), and according to the Australian Bankers' Association, the availability of credit to viable businesses in the rural sector both in times of drought and otherwise, it does not appear that significant barriers to accessing carry-on finance normally exist:

> During the drought individual banks have offered:
>
> - to provide carry-on finance to meet short term needs;
> - to restructure existing loans, to reduce annual payments or defer payments without cost;
> - to waive costs on accessing deposits including Farm Management Deposits;
> - no change in risk margins where interest rate subsidies are received …
>
> Banks have also increased their competitiveness for rural business/agribusiness during the past decade by increasing the range of products available. (sub. 76, pp. 2-3)

The Australian Bankers' Association concluded:

> There is no compelling case that there is a failure of rural credit financial markets that warrants Government intervention in the provision of financial services to agribusiness. (sub. 76, p. 3)

The Commission found no evidence that farmers' access to capital departed in any significant way from that faced by other small businesses, even with changes in economic cycles.

Interest rate subsidies also create a number of perverse unintended outcomes, to:

- build debt and/or not reduce debt when faced with drought risk as governments are likely to step in and subsidise costs (having financial reserves has been shown to be an important hedge against drought risks)

- be less responsive to drought conditions as financial support provided in times of drought increases the potential to spend money on additional variable inputs (such as fodder) to maintain production levels.

Overall, these incentives may mean farm businesses adopt less self-reliant strategies prior to droughts in the belief that governments will help to maintain the farm business during droughts.

Effectiveness of ECIRS assistance to farmers

Since 1993, governments have made significant payments to agricultural producers in the form of subsidies paid on the basis of the cost of their debt. Evidence from many participants is that these payments have assisted them to remain in the industry during EC events. As stated by AgForce:

> This assistance proved to be very popular amongst those able to access it. It provided significant relief to producers by providing bulk cash injection to enable them to continue business operations and stay on top of debt during times of extreme cash flow restrictions due to lack of crops and normal stock turnover. (sub. 80, p. 2)

Nevertheless, there is a separate question as to whether these subsidies have been effective in achieving the objectives of the NDP, including whether payments have encouraged a greater degree of self-reliance during, or preparedness prior to, exceptional circumstances.

There are numerous differences between farmers within EC areas who receive interest rate subsidies and those who do not and between those in EC areas and those in areas which have not been declared (table C.7). It should be noted, however, that factors not specific to individual farmers may explain the observed differences between ECIRS recipients and non recipients within EC declared regions, including:

- drought effects within EC declared regions are not uniform
- the large area of the country recently declared as experiencing exceptional circumstances means there is a wide variation in agricultural practices, expected crop yields, stocking rates and farm profitability, making comparisons difficult
- differences exist in administration of the eligibility criteria by the states and territories meaning similar farms experiencing an EC event can be receiving different levels of assistance (discussed later in this appendix).

Table C.7 **Farm characteristics of ECIRS recipients and non recipients**

Average annual data per farm, 2002-03 to 2007-08[a]

		Farms EC declared		
		Receiving ECIRS	*Not receiving EC support*	*Non-EC declared farms*
Physical				
Area of land operated	ha	4 241	5 655	7 320
Scale of operations	sheep eq.	7 431	7 063	10 710
Wheat yield per hectare sown	tonnes	1.1	1.4	1.7
Barley yield per hectare sown	tonnes	1.0	1.6	1.9
Sorghum yield per hectare sown	tonnes	2.4	2.8	3.0
Change in sheep numbers	%	-3.0	-3.0	*1.0*
Wool cut per sheep shorn	kg	4.3	4.4	4.3
Change in beef cattle numbers	%	2.0	*-1.0*	2.0
Milk production	litres	160 712	103 407	144 791
Receipts				
Total cash receipts	$	357 250	355 556	444 748
Costs				
Sheep and lamb purchases	$	9 356	6 489	8 440
Beef cattle purchases	$	27 231	37 807	16 826
Other livestock purchases	$	1 900	821	1 189
Seed	$	4 222	3 729	3 626
Fodder	$	38 365	30 580	22 026
Agistment	$	4 315	2 483	1 695
Fertilizer	$	19 706	21 077	45 755
Sprays	$	14 138	12 472	23 499
Fuel, oil and lubricants	$	23 187	18 954	23 800
Repairs and maintenance	$	25 358	23 327	30 982
Livestock materials	$	5 247	5 772	6 723
Shearing and crutching expenses	$	5 801	5 466	8 786
Administration expenses	$	10 933	9 569	11 882
Freight, handling and marketing	$	15 263	16 992	24 590
Rent and rates	$	14 757	13 613	15 600
Interest payments	$	43 517	23 915	31 926
Hired labour	$	10 062	13 508	15 453
Payments to sharefarmers	$	1 163	3 076	3 041
Other cash costs	$	38 781	42 732	48 380
Total cash costs	$	313 302	292 383	344 222
Farm financial performance				
Farm cash income	$	43 948	63 184	100 527
Farm business profit	$	-40 283	-19 769	16 432
Profit at full equity	$	10 244	10 117	56 928
Rates of return:				
- excluding capital appreciation	%	0.3	0.3	1.6
- including capital appreciation	%	6.8	6.5	8.6
Farms with negative cash income	%	30	30	26

[a] All estimates, except those italicised, have a relative standard error of less than the estimate.

Source: ABARE (2008 unpublished).

Despite this, it would be expected that, *on average*, farms within any specific EC regions would face similar climatic conditions and have similar productivity and profitability potential. Thus, observed *average* differences for those within EC regions do provide some insight into the types of farms receiving ECIRS assistance and those that do not. Although recipients and non recipients operate similar sized farms (the average size of non recipients is slightly larger on an area basis but smaller on a sheep equivalent basis) and generate a similar amount of on-farm cash receipts, there are some differences (table C.7):

- non recipients have higher average crop productivity levels (measured as yield per hectare) suggesting the possibility of better managerial ability of non recipients or that they are farming more productive land
- average total cash costs are lower for non recipients (in particular for fodder costs) suggesting a greater responsiveness to drought conditions and less effort to maintain production level in the drought circumstances, resulting in higher on-farm cash income.

The proportion of small (average size 1800 ha), medium (average size 2500 ha) and large (average size 9600 ha) farms in EC areas receiving ECIRS assistance — 14 per cent, 20 per cent and 22 per cent respectively — indicates that the small farms are less likely to receive the subsidy (ABARE 2008 unpublished).

Observed differences between debt structures of farm businesses provide an insight into how well the policy has been targeted and how interest rate subsidy payments may have altered behaviour (table C.8).

As the ECIRS is targeted towards those farmers who are currently experiencing financial difficultly due to drought, it would be expected that the liquidity ratio (liquid assets to debt levels partly represent the ability of producers to repay debts and remain operational) would be lower than that of non recipients, with average absolute debt levels being higher. This is seen to be the case with the average liquidity ratio for recipients at 9 per cent, compared to 52 per cent of non recipients, and average absolute debt levels of recipients close to twice that of non recipients (table C.8).

Despite this, the distribution of those earning positive or negative income against equity levels is relatively similar for recipients and non recipients — over 60 per cent of both groups have high equity and positive income. Also, land and improvement values are similar for recipients and non recipients at $2.6 million.

Table C.8 Debt and equity characteristics of ECIRS recipients and non recipients

Average annual data per farm, 2002-03 to 2007-08[a]

		Farms EC declared		
		Receiving ECIRS	*Not receiving EC support*	*Non-EC declared farms*
Farm capital and debt				
Capital value of livestock	$	297 020	316 106	406 708
Capital value of plant & equipment	$	280 834	270 139	354 454
Capital value land & improvements	$	2 565 687	2 572 538	3 065 687
Total capital value	$	3 159 981	3 173 753	3 841 776
Farm business debt at 1 July	$	531 925	279 028	380 950
Farm business debt at 30 June	$	577 514	304 636	422 156
Change in total farm debt	%	9	9	11
Equity ratio at 30 June	%	82	90	88
Distribution of farms by cash flow and equity ratio				
Low equity - negative income	%	8	3	4
Low equity - positive income	%	11	3	6
High equity - negative income	%	21	28	22
High equity - positive income	%	60	66	68
Farm liquid assets				
Liquid assets	$	51 441	159 150	154 572
FMDs at 1 July	$	9 508	26 649	26 873
FMDs at 30 June	$	10 023	27 434	31 130
Change in FMDs within year	%	*5*	*3*	16
Liquid assets to debt ratio	%	9	52	37
Off-farm income				
Investment income	$	4 807	12 527	11 251
Wage and salary income	$	13 933	20 411	16 232
Total off-farm income[b]	$	31 540	34 532	28 830
Farms with off-farm wages	%	42	39	37
Government assistance to farm business				
Total government assistance	$	31 652	1 443	1 084
ECIRS	$	26 262	0	0
Other government assistance	$	5 234	1 282	1 005
Forms of government assistance received				
Farms receiving ECRP	%	53	–	–
Farms receiving ECIRS	%	100	–	–
Capital additions and disposals				
Farms acquiring land	%	4	5	6
Farms selling land	%	3	4	6
Other				
Age of operator	years	50	51	50

[a] All estimates, except those italicised, have a relative standard error of less than the estimate. [b] Includes government household support payments.

Source: ABARE (2008 unpublished).

However, non recipients have higher equity levels compared to recipients — 90 per cent and 82 per cent respectively. They also have higher off-farm earnings (excluding government assistance) and FMD deposit levels than do recipients, suggesting they use non-farm income or investment income sources to manage liquidity problems during drought events in order to be self-reliant.

These characteristics, along with similarities in on-farm cash receipts and farm size, suggest that the liquidity problems experienced by ECIRS recipients may be related to the risk management approach taken. That is, non recipients appear to have diversified their income sources to a greater extent, and held lower absolute debt levels and higher FMD reserves, which has improved their ability to be self-reliant during EC drought events.

But such a risk management approach would not be possible for all producers. In particular, those in a start-up phase, or those who have recently expanded, would not necessarily be able to minimise debt levels, hold sufficient off-farm assets, or generate sufficient off-farm income to be self-reliant. That said, expansion or entry decisions should also be made with consideration to the potential risks, including droughts.

Overall, the characteristics of recipients and non recipients suggest that the targeting of the ECIRS has been effective — that is, those facing a current liquidity constraint are in receipt of assistance. Despite this, assessed against the objectives of the NDP, in particular the first objective of improving self-reliance, it appears that the ECIRS has been ineffective. Farmers in receipt of these payments appear to be, on average, less responsive to drought conditions in terms of altering their cost structures. Payments go to those who adopt a less self-reliant risk management approach. This suggests that the ECIRS program has provided assistance to farmers who may have been less effective in managing their operations for drought. It is unlikely that this form of assistance will encourage these producers to adopt more self-reliant strategies because payments are made as unconditional cash grants based solely on indebtedness — no requirement to undertake plans to improve viability.

Implementation of ECIRS assistance measures

A number of concerns were raised in relation to the implementation of the ECIRS program. Specifically, concerns were expressed over differences in the interpretation of the eligibility criteria between jurisdictions and over the complexity of the application process.

Some producers felt that the administering state body (usually the rural assistance authority or similar) in some states (such as Victoria) had a stricter interpretation of the eligibility criteria than others (for example, New South Wales). Such problems arise as each state has responsibility for implementing the ECIRS program despite it being mainly Commonwealth Government funded. Differences in applying the criteria have the potential to lead to different coverage and effectiveness in different states. For example, it would be possible for two otherwise identical farms in different states, both experiencing an EC event, to receive different levels of assistance.

In Victoria, for example, access to assistance was based on the financial need of the applicant and not only having met the eligibility criteria. This has the potential for some farmers to have an unsuccessful claim in Victoria, whose claim would be successful if located elsewhere given the same circumstances. As claimed by farmers Colin and Mary Fenton based on a farmer that operated in two states:

> We have knowledge of farmers who applied and received a knock back in Victoria for example and applied for support in NSW and gained the Exceptional Circumstances approval. (sub. 64, p. 1)

Indeed, consultations conducted by the Commission as part of this inquiry revealed differences in the interpretation of ECIRS eligibility criteria between jurisdictions. Such differences give rise to criticisms of ECIRS on equity grounds as well. They also lessen the potential for the policy to meet its objectives if less stringent interpretations mean that non-viable producers receive assistance, contrary to the intention of the program.

Another concern raised was over the inefficiencies of the program, in particular the complexity and resulting cost of accessing the subsidy. As payments are only made to those farmers who are viable in the long term, there is a significant reporting requirement placed on applicants. For example, as put by the Mid Lachlan Alliance of Councils:

> The time taken and cost incurred by farmers and farm businesses to prepare the necessary documentation is substantial but is viewed more as a means to an end with the complexity of the application requiring the services of an accountant. The time following submission to the best of our knowledge is measured in months rather than weeks. (sub. 38, p. 8)

Indeed, to overcome the reporting requirements governments have provided grants to the Rural Financial Counsellors Service and run extensive advertising campaigns to encourage farmers to not self assess but instead to seek professional advice. This has led to one government drought support program (the Rural Financial Counsellors) targeted at helping farmers access another program (the ECIRS). And, in the case of the Rural Financial Counsellors, this additional responsibility has

potentially detracted from their intended purpose. As stated by Rural Directions Pty. Ltd.:

> Without a network of rural counsellors in South Australia, many farmers would not have coped with the amount of paperwork required for different application pathways. This has tied up valuable counsellor time in administrative roles which has reduced the time allowed for other essential counselling services. (sub. 35, p. 7)

The complexity in its delivery has led to there being considerable compliance costs associated with the ECIRS assistance program.

The impact of ECIRS assistance on recipients

While having many drawbacks, ECIRS payments have provided valuable support to some. Despite this, the majority of farmers have not received any payments under the scheme. For example, in New South Wales only around 25 per cent of farmers accessed ECIRS at least once over the period 2001-02 to 2007-08 (table C.4). Further, while recipients had relatively poor liquidity positions, only a small proportion appear to be financially vulnerable — 8 per cent had low equity levels and negative incomes — with instead:

- 81 per cent of recipients having high equity levels (table C.8)
- the average recipient having net farm assets of well over $2 million (table C.8).

Coupled with subsidy payments averaging $37 000 in 2007-08, the ECIRS payments are unlikely to represent the difference between viability and non-viability of recipient businesses.

It is interesting, therefore, to examine the effect that ECIRS payments have had on the 'average' recipient. Based on ABARE farm survey data, the characteristics for the average broadacre and dairy ECIRS recipient in 2005-06 is given in table C.9. For a hypothetical average farm, working forward four years and assuming cash costs (including household costs), income and asset values change in line with average ECIRS recipients for subsequent years, those in receipt of the average ECIRS payment over the period would see their average equity ratios fall from 88 per cent to 86 per cent.

In the absence of ECIRS payments, many farmers would likely build any shortfalls into debt. Indeed, a survey of ECIRS recipients found that almost 50 per cent said they would borrow more money to maintain farm operations if there were no ECIRS scheme (SACES 2008a). Assuming that all farmers build any shortfalls into debt (with costs, incomes and capital appreciation remaining as above) the average farm would see its equity ratio fall — from 88 per cent to 83 per cent — but remain within levels considered high. Such averages, however, mask any distributional

effects. It is likely that for many of those 8 per cent of farms that have low equity levels and negative incomes any shortfalls would not be able to be built into debt, resulting in some of these farm businesses exiting.

Table C.9 **Impact of ECIRS for the 'average' recipient**
Base year 2005-06[a]

		2005-06	*Year 2*	*Year 3*	*Year 4*
Income					
Total farm cash receipts	$	336 283	321 123	466 134	..
ECIRS	$	27 906	31 630	36 666	..
Total other income	$	33 306	35 421	30 124	..
Total income	$	397 495	388 175	532 925	..
Expenses					
Total farm cash costs	$	275 412	297 521	418 772	..
Household expenditure	$	60 000	61 752	63 852	..
Assets					
Capital value land & improvements	$	2 440 146	2 629 312	2 884 020	3 025 993
Total farm-related capital value	$	3 040 028	3 258 389	3 509 902	3 660 836
Farm business debt	$	373 633	412 695	471 902	520 379
Net equity	$	2 666 395	2 845 694	3 038 000	3 140 457
Equity ratio	%	88	87	87	86
Equity ratio without ECIRS	%	88	86	85	83

[a] Equity ratios without ECIRS payments assume any shortfall is built into debt levels.

Source: PC estimates using ABARE (2008 unpublished).

Impacts on small communities

ECIRS payments also flow through to rural communities. Many participants believe these payments have been vital in maintaining many small towns and communities during the latest drought. But the extent to which payments flow through to small communities is dependent on the spending behaviour of recipients.

Expenditure by farmers in smaller rural towns, those with a population less than 5000, represents a significant component of their economies compared with larger towns and cities. On average, an estimated 29 per cent of farmers' expenditure occurred in towns with a population of less than 5000 (Levantis 2001). Assuming that ECIRS recipients' spending behaviour followed this pattern and further that they spend half of all their payments, the remainder paying back debt, a total of $91.9 million would flow to towns with populations less than 5000 within EC areas (based on payments received during 2007-08 of $633.6 million including small business interest rate subsidy payments — see following section). This equates to approximately $74 per person living in these towns (based on ABS Census data and

the proportion of agricultural land under an EC declaration giving an estimated 1.2 million people living in towns of less than 5000 people within EC areas).

But not all of these expenditure would remain within the local economy as income for residents or those in the wider region. Much would be 'transferred' out to cover the cost of goods sold amongst other things. In many cases only a retail margin remains within the town. If it is assumed that 50 per cent stays within the town (likely an overestimate) subsidy payments in 2007-08 could have resulted in an average income boost of about $37 per resident of towns with a population of less than 5000 within EC areas. However, given the uneven distribution of ECIRS recipients across Australia, for some small towns increased expenditures would be greater, whereas for others it would be significantly less.

EC exit package

As of 5 December 2008, only 98 applicants have received the exit package from a total of 469 processed claims. Of the remaining claims, 262 were rejected and 109 are in the assessment stage (table C.10). A total of $12.8m has been paid out in exit grants with an additional $108 000 paid in advice and relocation assistance.

Table C.10 **Characteristics of successful and unsuccessful exit package claimants**

December 2007 to December 2008

		Successful	*Unsuccessful*
Average age	years	53	52
Average payment	$	130 956	–
Average assets	$	346 941	671 501
Average liabilities	$	94 244	295 232
Average net assets	$	252 697	376 268
Average time on EC assistance	months	17	18
Applicants	no.	98	262

Source: DAFF (2008 unpublished).

Of those who received exit assistance, 64 of the 98 had also received other EC assistance (ECIRS and/or EC Relief Payment) for an average of 17 months prior to leaving the industry. Not surprisingly given the assets threshold, most EC recipients had low average asset and net asset levels prior to leaving the industry — of around $347 000 and $253 000 respectively. Among those who were unsuccessful in their claims, average asset and net asset levels were higher recognising that assistance reduces to zero for those with net assets exceeding $575 000.

For those farmers who were unsuccessful in receiving the exit package, most were refused on the ground that they did not supply information to support the claim (32 per cent). Following this, the main reason for an unsuccessful claim related to:

- not being a farmer for at least 5 years — 16 per cent
- not deriving sufficient income from farming over the period examined — 13 per cent
- asset levels being too high — 11 per cent.

Close to half of all Exit Package recipients had operated horticultural activities. Other recipients were spread relatively evenly across other agricultural industries.

While recipients were spread amongst a wide range of EC areas, the River Murray and Lower Lakes EC area had the greatest number of recipients — 10 from the total 98. Of those from this area with information recorded on industry, all had been involved in horticultural activities prior to exiting the industry. On a state by state basis, close to half of the recipients were based in Victoria (46), with the majority of the remainder coming from New South Wales (28) and South Australia (20).

Given the similarities, any criticisms made of the EC exit package are likely to equally apply to the Climate Change Adjustment Re-establishment Grant.

Is EC exit assistance appropriate?

Where assets are site-specific or 'lumpy', as for most agricultural producers, exit decisions may be delayed due to expected large capital losses (Industry Commission 1996). Further, information barriers may exist that mean farmers have little information on alternative uses of farm assets or potential alternative job opportunities (McColl et al. 1997). These characteristics create impediments to industry adjustment and, to the extent that they exist, may provide a rationale for government intervention.

However, the Industry Commission (1996) concluded that whilst the above factors could impede adjustment, it is not clear that they present significant obstacles. The Industry Commission examined data on bankruptcies and land sales in the sector and found no indication of significant barriers. Moreover, it points out that where barriers exist it is likely that they also apply to other industries.

Importantly, as financial incentives alone are unlikely to overcome the cultural barriers to adjustment, it is likely that exit grants are an inappropriate means to facilitate rural adjustment. This view was also put forward by the mid-term review of the Rural Adjustment Scheme (RAS) which concluded that grants are not the best

approach (McColl et al. 1997). Instead exit assistance programs should focus on the provision of complementary information and advice to address impediments to movements of people and resources.

Effectiveness of exit assistance for farmers

EC exit assistance has had very little usage, with only smaller farmers, with low asset levels, being able to access these payments. Thus, EC exit assistance has done little to facilitate adjustment within the industry in times of drought. Further, given the similarities with the Climate Change Adjustment program, the problems faced by the EC exit package are equally likely to apply.

There are a number of reasons why EC exit assistance has been ineffective. First, it is likely that the asset limits within the eligibility requirements exclude many farmers who may otherwise wish to exit. As put by accountants Carrigan & Co Pty. Ltd.:

> We believe that the reason why there has been little take up is simple — it is virtually impossible to have net assets under $350,000 and not have already been forced to sell by your bank. We argue that a farmer would need to have at least $500,000 to $700,000 in equity to even contemplate remaining 'on the farm'. Most farmers with lesser equity than this will have already quit the industry or have been advised to quit by their bankers. (sub. 32, p. 4)

Despite industry variations in the equity levels required to remain viable, current asset caps have likely had a significant impact on potential coverage of the scheme — especially since average total capital asset value for those farmers experiencing hardship and receiving the EC Relief Payment is close to $2.3 million.

A number of non-financial factors are also likely to limit the effectiveness of the EC exit package. When considering exiting from the industry, farmers not only face the decision of changing occupations, but more often also need to move away from the family home, lifestyle and the community in which they have lived. These factors make the exit decision complex. As stated in one submission:

> … relocation out of area is proving to be a major sticking point for many … They wish to exit farming and have indicated they are pleased the grant is available to assist them to do so but do not wish to move from the local area to which many have a long term attachment, family, friends etc. (confidential submission)

Also, as put by the Mid Lachlan Alliance of Councils:

> Current exit programs funded by the Federal Government whilst contained within a sound policy framework are insufficient to induce farm families to leave farms and re-establish elsewhere. Further they do not account for the strong connection land holders

> have with the land. Generally this professional loyalty runs very deep, spanning generations throughout the good and bad cycles of farming. (sub. 38, p. 5)

Many farmers also do not see themselves as having the necessary skills for being able to find work in other industries. For these, retraining grants and recognition of prior learning is likely to have been effective in aiding the transition out of farming.

The complexity of the exit decision has been argued to be the reason why, in part, previous schemes aimed at encouraging rural adjustment have not been successful (Botterill 2001). Farmers' attitudes in terms of 'country mindedness', where there are non-economic attributes to working on the land which are valued highly, are believed to be a major impediment to the effectiveness of exit schemes:

> Country mindedness has important implications for farm adjustment policies. Hardship and adversity are seen as character building and part of the moral value of farming. Farming is regarded as a way of life with intrinsic, non-monetary values. Alternative lifestyles are regarded with suspicion and distaste. Under these circumstances, it would seem that offering a reestablishment grant is not the inducement the policy-makers intend it to be. (Botterill 2001, p. 12)

As a result, policies offering economic incentives which disregard non-economic factors are unlikely to be successful (Kerridge 1978; Botterill 2001).

It is also possible that other EC related programs, such as the EC Relief Payment and ECIRS, inhibit the effectiveness of the exit package. Where drought assistance measures enable non-viable farmers to remain on the land longer than they would have otherwise, they impede adjustment. Even with the provision of income support payments, there is the potential for drought assistance to work counter to any exit assistance measures (O'Meagher 2005; Cockfield and Botterill 2006).

Assistance to farm dependent rural small businesses

Between October 2006 and December 2008 a total of 2052 farm dependent rural small businesses had received a payment through the interest rate subsidy assistance package. In total, over this period $60.5 million was paid at an average of just under $30 000 per recipient (table C.11). Over the two and a half financial years of operation, the number of successful claims remained steady.

Most claimants were from New South Wales (close to 65 per cent of claims and assistance paid) followed by Victoria and Queensland. In the remaining states and territories only 62 successful claims have been made. In terms of business types, most claimants operated businesses that provided rural services such as contractors and farm supplies (73 per cent). Following this, 16 per cent of claimants had transport related businesses and 2 per cent were retail businesses.

Table C.11 **Recipient numbers and payments of interest rate subsidies to small businesses**

October 2006 to December 2008

Year	*Recipients*	*Total amount paid*	*Average amount received*
	no.	$ m	$
2006-07	759	23.7	31 242
2007-08	984	29.5	29 999
2008-09[a]	309	7.3	23 781
Total	2 052	60.5	29 523

[a] Figures from July 2008 to December 2008.

Source: DAFF (2008 unpublished).

A number of small businesses have also been unsuccessful in their claim for assistance — 815 over the period. The main reason for rejection was that the businesses were deemed to be not in need of financial assistance (49 per cent). A further 10 per cent were unsuccessful as their businesses were not farm dependent. Only 6 per cent of unsuccessful claimants were denied assistance because they were deemed unviable.

Apart from broad usage data there is little information collected on the financial status of recipients and non recipients. As such, no comparisons can be made between those businesses that are managing drought conditions without assistance and those that receive help.

Appropriateness, effectiveness and efficiency of assistance to rural dependent small businesses

Small business assistance has only been in place since 2007. As with the interest rate subsidy paid to farmers, small business assistance is intended to target those viable businesses experiencing temporary financial difficulty due to an EC event.

Despite a number of businesses accessing EC small business assistance, given the short time in operation there is little available evidence on the characteristics of participants, making an assessment of effectiveness difficult. What evidence is available suggests that the programs have not been a useful tool to help manage drought. For example, a study into the effects of drought on small businesses in the New South Wales town of Wee Waa by Spanswick et al. (2008), found that for those who accessed drought support:

> … over 50% of businesses who accessed this service did not find it useful … One business commented that drought relief seemed to offer no benefit to well run businesses that were doing it tough. (Spanswick et al. 2008, p. 3)

Spanswick et al. (2008) found that business adopted a range of drought management strategies including:

- tighter inventory control
- reduced expenditure and tighter cash flow management
- maintaining good communication with bank or other financial lending institution
- diversifying their business
- reduction in staff numbers and the use of more flexible management options.

These strategies, often developed in consultation with their accountant or bank, were viewed as useful strategies for managing the downturn in income brought about from drought conditions.

Despite this, a number of submissions argued that assistance should be provided to maintain small business in towns during times of severe drought. For example, as put forward by Centroc:

> If government genuinely wishes to maintain rural communities, strategies must be put in place to support their future including research and development to facilitate sustainable farming, training and drought financial assistance measures … The government via drought support measures provides an important means of survival for not only farm families but the Australian agriculture sector. This also extends to rural contractors and businesses that all form part of the agriculture economy and who without their support and service provision the farming process would be incomplete and in some cases obsolete. (sub. 105, p. 2)

But such concerns are generally based on the notion that governments should provide support to rural communities in order to maintain their functioning and social fabric in the face of broader external factors which are inducing change. While it is likely that droughts or other exceptional circumstances exacerbate the forces of change, it is not the usual cause of long-term adjustment. Whether or not government intervention could be justified, such policies should not comprise part of a national drought policy, and indeed, lie outside the objectives of the current NDP.

A lack of data on the characteristics of small business recipients makes it difficult to assess these measures against the NDP objectives. However, as with the ECIRS paid to farmers, it is unlikely that the nature of interest rate subsidy payments made to small businesses, paid as unconditional grants, would be effective in helping develop better drought management strategies in order to improve self-reliance. Further, it is unlikely that appropriate rationales exist for the provision of this type of support in times of drought. Indeed, attempts to pursue objectives of maintaining rural communities through drought policy would likely lead to the delivery of ad

hoc support to different communities at different times and do nothing to alleviate the longer term structural change pressures that are affecting most communities.

Summing up

EC support provided to farm businesses and farm dependent rural small business:

- appears to be well targeted and thus has been effective in providing support to those that whom policy makers intended to help. While little information is available for small businesses, the ECIRS payment has been received by those farmers who are experiencing liquidity problems.
- has been ineffective in achieving the goals of the NDP and has been delivered in the absence of appropriate rationales for government intervention. In particular, the ECIRS has done little to promote self-reliance and may have even created incentives for producers to be less self-reliant in the face of climate variability.
- while government support to promote industry adjustment may be appropriate, the EC exit package has been poorly designed and subsequently ineffective. Moreover, there is little justification for the use of exit grants to encourage such adjustment. Instead, government policies should focus on alleviating impediments to the movement of labour and resources through, for example, training and recognition of prior learning.

D Preparedness programs

Various government measures available to farmers are intended to assist them to deal with income volatility, improve their financial risk management or implement plans to increase preparedness. These measures are not specific to drought and are intended to provide assistance more broadly. In this appendix, an assessment of the appropriateness, efficiency and effectiveness of these measures is presented.

D.1 Farm Management Deposits

Farm Management Deposits (FMDs) are financial tools used to overcome the effects of income variability and help to manage risks. They can be used to prepare for periods of income deficit.

The scheme allows farmers to make interest bearing deposits of pre-tax income into FMD accounts offered by financial institutions. Deposited sums are deducted from taxable income in the year they are deposited and then included in the year in which they are withdrawn. There is typically a 12 month minimum waiting period after a sum is deposited before it may be withdrawn, along with a number of other eligibility requirements (box D.1).

The FMD scheme commenced in April 1999 as a part of the Agriculture — Advancing Australia (AAA) policy package. It replaced the Income Equalisation Deposits and Farm Management Bonds schemes. The primary objective of the scheme at the time was to provide a commercial tax-linked risk management tool, as stated by the then Minister for Agriculture, Fisheries and Forestry:

> The FMD scheme, and associated website, fulfils an election promise to offer primary producers a single, fully commercialised, tax-linked deposit scheme that guarantees freedom of choice and pays interest on the full deposit … FMDs are an exceptional risk management tool, offering primary producers freedom to choose a financial product and institution to suit their needs. (Vaile 1999)

Box D.1 **Eligibility criteria for farm management deposits**

Criteria for FMDs are set out in Schedule 2G, Division 393 of the Income Tax Assessment Act. Key criteria of the scheme include:

- FMDs are only available to individual primary producers and not to companies or trusts. However, beneficiaries receiving primary production income from a trust can make deposits.
- The minimum size allowed for an FMD is $1000, while the maximum amount that an individual may hold as an FMD is $400 000. Where a farm business is operated as a partnership, each partner may hold up to $400 000 in an FMD.
- FMDs are tax deductible in the year of deposit and assessable in the year of withdrawal. However, a depositor's tax deductibility entitlement can not exceed taxable primary production income for the year.
- Tax deductible deposits can only be made in years where off-farm income (including interest on FMDs) does not exceed $65 000.
- An FMD must be held for a minimum of 12 months. The only exception is where an Exceptional Circumstances (EC) certificate is held and the deposit was made prior to EC declaration.
- An individual may hold FMDs at only one financial institution at a time.

The thresholds on deposit size and off-farm income were initially $300 000 and $50 000 respectively. They were raised in 2006 following the 2006 review of FMDs. The 2006 review recommended that they be increased to maintain their real value. In the case of the deposit limit, the report noted that a $365 000 limit (in 2006) would be equivalent, but that the increasing scale of farm businesses meant that there might be scope for a higher limit. The review also recommended that the off-farm threshold be increased to $65 000.

Sources: DAFF (2006); McGauran (2006).

The scheme was enthusiastically endorsed on its introduction by the industry. For instance, the National Farmers' Federation stated:

> We believe that FMDs will provide an effective risk management tool which will help offset two of the great unknowns in our business — commodity price movements and the weather. We strongly believe that FMDs will also be effective in promoting greater self-reliance … [and] one of the less obvious benefits will be another incentive for the financial sector and farmers to include risk management in farm financial planning … (NFF 1999)

The FMD scheme is administered under the *Income Tax Assessment Act 1936*. Eligible financial institutions offering FMD accounts are required to report details on FMD holdings to the Commonwealth Department of Agriculture, Fisheries and Forestry (DAFF) on a quarterly basis.

Interactions with other tax arrangements

FMDs are not the only provision primary producers can use to manage their taxation in the presence of variable incomes. Tax averaging arrangements and other taxation smoothing measures have been designed to address the disproportional taxation burden placed on primary producers with variable income.

The tax measures available to primary producers provide benefits by potentially reducing their overall tax liability through tax averaging and income smoothing. It is generally accepted that in the presence of a progressive income tax there will be inequity in the taxation of people whose incomes fluctuate between tax periods compared with people who earn the same average income without the fluctuations. The people whose incomes fluctuate pay more tax than those who earn stable incomes. This is often referred to as period inequity. Income variation does not raise the same issues in the case of companies, because of the flat tax rate.

While climatic variation can have large impacts on inter-year income variations, it is not the only cause. Price movements for both outputs and inputs (for instance, fuel and fertilizer) are also major contributors to variation in farm incomes.

There is considerable overlap between the operation of FMDs and that of the other taxation measures available to primary producers. The main area of overlap is with tax averaging. Tax averaging allows the current taxable income of primary producers to be assessed for income tax at the tax rate applicable to their average income in the current year and the four preceding years. The scheme is designed to ensure that primary producers do not pay more tax than people on the same average, yet steady income — that is, address period inequity. Primary producers using tax averaging pay less tax when their income is above their five year average income, but pay additional tax in years when income is lower than the five year average, than if they did not use tax averaging. By reducing the tax rate applicable to primary producers in high income years and increasing it in low income years, tax averaging reduces the potential tax saving, and interest income, to such producers from depositing money in FMDs, nevertheless, FMDs can also contribute to reducing period inequity.

There is also potential for overlap with other taxation concessions, although these are relatively minor. Forced disposal of livestock provisions allow a primary producer who disposes of stock because of drought (amongst other things) and will use the proceeds for the purpose of replacing the livestock to elect to either spread the income over five years, or defer the income and use it to reduce the cost of replacements in any of the five years, with any remaining profit included in assessable income in the fifth year. In the case of double wool clip provisions, where the sale of two wool clips in a single year arises because of early shearing

caused by drought (or fire or flood), the grower may elect to defer the income from the second shearing to the following year (ATO 2008a).

Removing period inequity

Tax averaging is the main provision available to address period inequity for Australian primary producers. However, it is unclear that the tax averaging scheme for primary producers fully removes the period inequity in taxation. According to Jeffery (1981, p. 141), the starting point for appropriately addressing period inequity needs to be:

> … the identification of the fundamental cause of period inequity: period inequity will be incurred if a given total taxable income is so distributed between normal assessment periods that the total amount of taxable income, which is eligible to be taxed at negative and/or lower positive marginal rates of taxation, is not taxed at those rates.

Period inequity can be addressed by:

- *Taxation rate adjustment.* This is the approach taken in taxing the approximately 80–90 per cent of Australian primary producers who opt for tax averaging. Tax payable in the current year is calculated by applying the average tax rate applicable to the average taxable income in the most recent five years (including the current year) to the current year's taxable income. Although this tax rate adjustment does reduce the tax payable over several years by farmers with fluctuating incomes to a level closer to the tax paid by farmers earning the same average income without the fluctuations, Jeffery found that its ability to achieve period equity is 'restricted and indeterminate … rather than removing the influence of the distribution of a given total taxable income between normal assessment periods (characteristics of the taxable income stream) from the amount of taxation payable, the amount of tax payable under the tax rate adjustment schemes is influenced by that distribution' (Jeffery 1981, p. 159).
- *Income transfer measures*. These involve the transfer of taxable income, either directly or in effect, between normal assessment periods. In an evaluation of four income transfer measures — taxation loss transfers, Income Equalisation Deposits (forerunner to FMDs), block averaging and cumulative assessment — Jeffery (1981) concluded that only block averaging and cumulative assessment offered satisfactory solutions to period inequity, and that only cumulative assessment passed an extra test of complying with five constraints for meeting the overall objectives of personal taxation.[1] The theoretical superiority of cumulative assessment — which involves taking a lifetime approach to income — had been accepted earlier by others (Vickrey 1939; Asprey 1975).

[1] The five constraints are consistency, simplicity, compatibility, rate-neutrality and immediacy.

While Australia's tax averaging for primary producers is not entirely effective at redressing period inequity, it is a practical compromise that reduces the effect of fluctuating incomes on tax payable over a run of years in the presence of a progressive income tax schedule.

Additional benefits from FMDs in addressing period inequity

In an assessment of FMDs for a review in 2006, it was noted that tax averaging was not completely effective in reducing the average tax burden over time of individuals with variable taxable income and that the FMD scheme provides an additional benefit through allowing primary producers to shift real income from above average years to future years, while only eventually having to pay tax on the nominal amount of income originally deposited (DAFF 2006).[2]

Tax averaging provisions affect the time-flow of the benefits from investing in FMDs. In the year of an FMD deposit primary producers benefit because their taxable income in the year of the deposit is reduced. But, where depositors also use tax averaging, the reduction in income in the deposit year also acts to reduce tax payable in the subsequent four years, compared with what it would otherwise be. Conversely, when a withdrawal is made, the FMD holder increases their taxable income for that year, and must therefore pay more tax. However, with tax averaging, the effect of the withdrawal will also be to increase tax payable over the subsequent four years as well (compared with what it would otherwise be).

For the relatively small number of primary producers that do not practise tax averaging, the return from investing in FMDs may be larger than for those who use tax averaging (DAFF 2006). That said, it is unclear whether or not primary producers are better off to formally cease income averaging for tax purposes, and use FMDs to spread their income over time in a more tax effective manner. If producers did this, the caps on FMDs could be binding for some high income producers. Overall, it appears the potential for FMDs to contribute to period equity may be greater for primary producers who do not engage in tax averaging. However, period equity may be enhanced also for those producers who use tax averaging.

National overview of FMD use

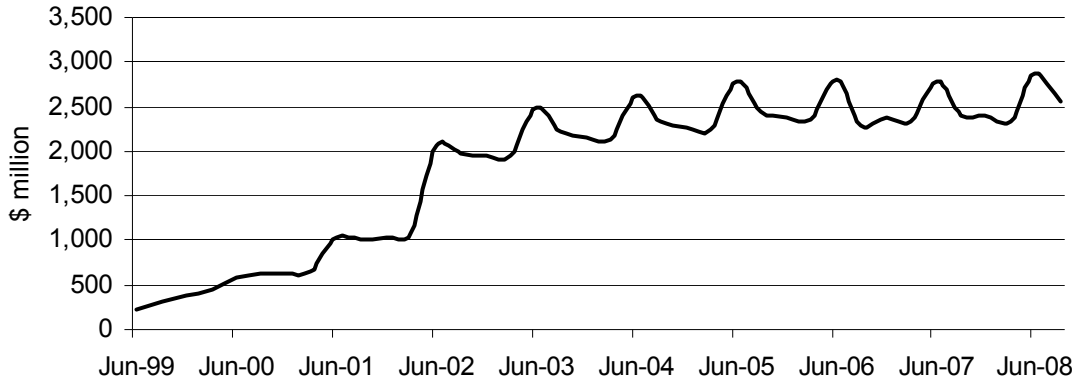
As at June 2008, aggregate FMD holdings totalled almost $2.9 billion. Total deposits grew substantially in the June quarter of 2002 after a relatively slow start

2 Tax is payable also on interest income earned on FMDs.

following their inception in 1999. Since June 2002, deposits have slowly increased. Further, at the aggregate national level, there has been no apparent large-scale withdrawal of deposits in response to either the 2002 or 2006 drought events or the years in between or since (figure D.1).

Deposits follow a distinct annual pattern where deposits peak in the June quarter. This is a function of the tax-based operation of the scheme, whereby deposits peak at the end of the financial year, allowing deferral of tax liability, and withdrawals are highest in the first quarter of the next financial year.

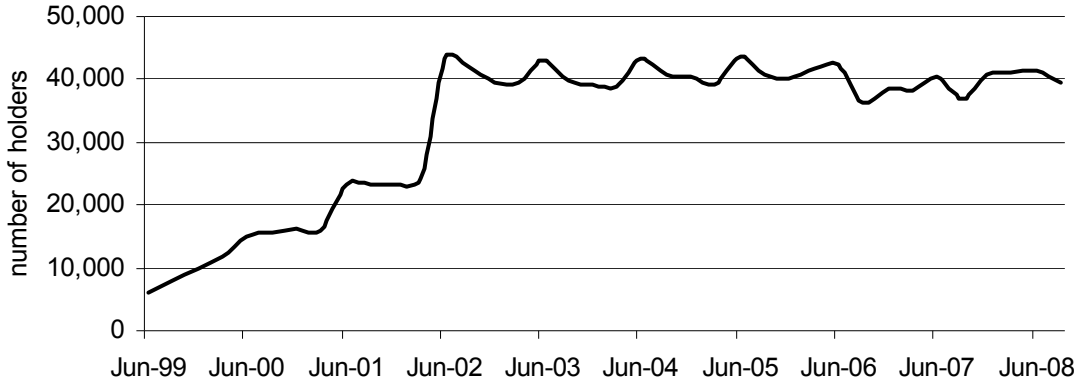
Figure D.1 **Total Farm Management Deposit holdings, June 1999 to September 2008**
Australia



Data source: DAFF (2008h).

The trend in the total value of FMDs is mirrored by similar changes in the number of deposit holders (figure D.2). Early growth in the total value of FMDs was driven mostly by an increasing number of farmers utilising them. The number of holders has remained fairly stable since June 2002, although a slight decline is noticeable since 2006, potentially indicative of the effect of the recent prolonged drought. With an average of around 40 000 deposit holders since June 2002, penetration of the scheme is relatively modest. ABARE 2006 farm survey results indicated that a significant number of farms had multiple FMD holders and that overall, around 30 000 farms had FMDs (DAFF 2006).

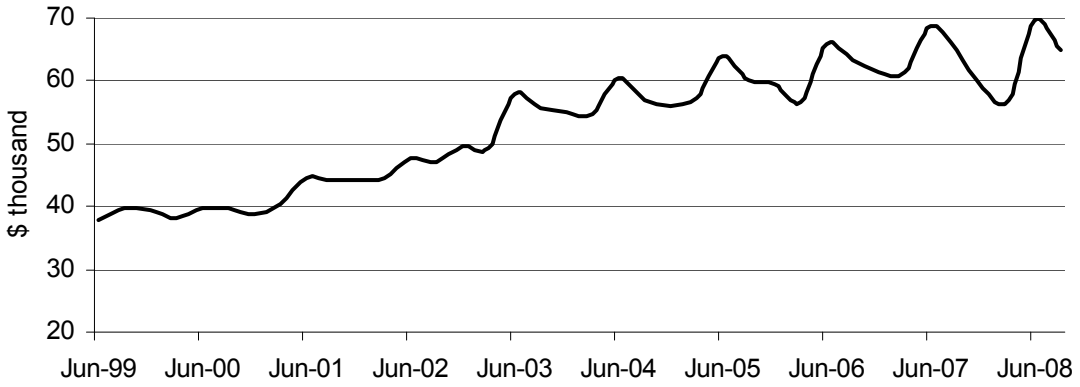
Figure D.2 **Total number of Farm Management Deposit holders, June 1999 to September 2008**
Australia



Data source: DAFF (2008h).

Average FMD amounts have been trending upwards since the inception of the scheme, peaking at an average of $70 000 per holding in June 2008 (figure D.3). A similar pattern of June quarter peaks is observed in average FMD holdings. Over the life of the scheme, June quarter average holdings have increased by an average of 11 per cent from the preceding March quarter.

Figure D.3 **Average Farm Management Deposit holding, June 1999 to September 2008**
Australia

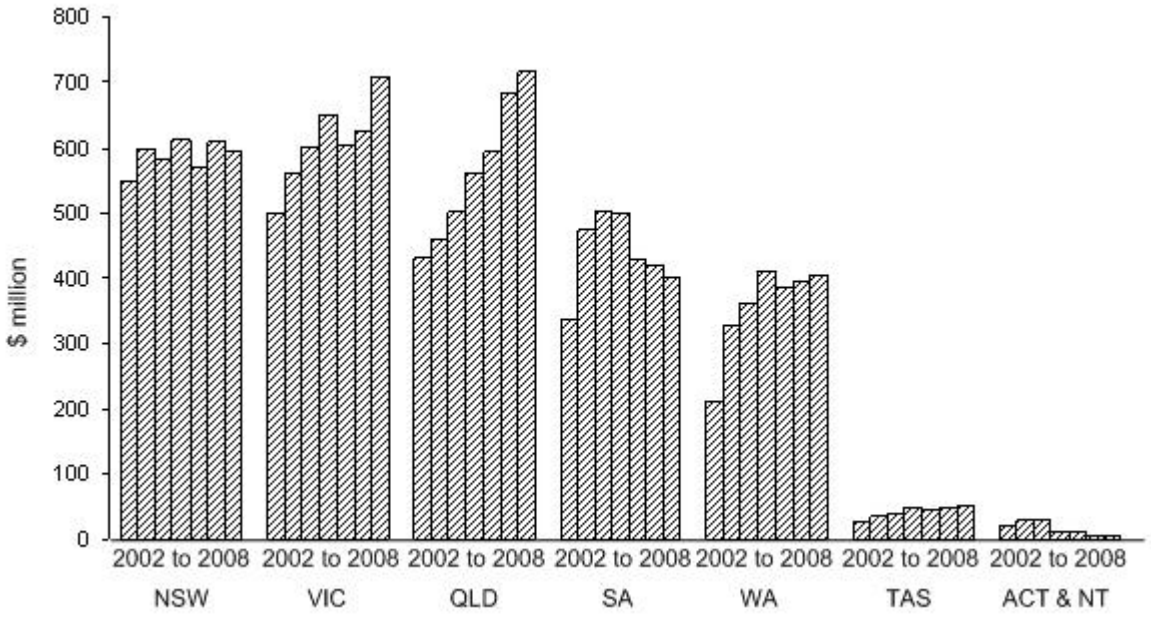


Data source: DAFF (2008h).

There have been some differences in the value of FMD holdings by state. These changes reflect the relative magnitudes of the agricultural sectors in each

jurisdiction, as well as changes in production and income over time (a function of relative seasonal conditions and commodity prices). At June 2008, Queensland had the highest holdings of FMDs, followed by Victoria and New South Wales (figure D.4). Total holdings in Queensland have continued to increase considerably since 2002. In contrast, in New South Wales, total holdings have remained relatively stationary over the period. Deposit holdings in South Australia dropped significantly in 2006 and have continued to fall since then.

Figure D.4 **Total Farm Management Deposit holdings by State, June 2002 to June 2008**



Data source: DAFF (2008h).

The difference in deposit holding behaviour between the states appears to be driven by the deposit holding behaviour of different agricultural sectors within each state (table D.1) and the conditions they are experiencing. For instance, the growth in FMD holdings in Queensland has been in the horticulture, sugar and other crops sectors, as well as fairly stable holdings in the cattle sector. In contrast, total holdings in the southern states generally declined during the drought in 2006 due to the considerable rundown in total FMD holdings in the grains sector. The large jump in Victorian holdings in 2008 can be attributed to the increases in the dairy and mixed farming sector — a consequence of high grain and milk prices.

Table D.1 **Farm Management Deposit holdings by industry**

Numbers as at June of each year

	2002	*2003*	*2004*	*2005*	*2006*	*2007*	*2008*
Horticulture							
total holdings ($m)	184	226	264	296	297	383	394
number of holders	3 346	3 371	3 712	3 896	4 377	5 346	5 291
Sugar							
total holdings ($m)	31	38	43	51	68	96	101
number of holders	980	1 126	1 119	1 132	1 431	1 719	1 595
Crops							
total holdings ($m)	76	91	107	111	103	153	142
number of holders	1 458	1 365	1 562	1 439	1 492	2 649	2 340
Grain							
total holdings ($m)	544	714	663	650	558	464	460
number of holders	10 643	11 029	10 144	9 588	9 114	6 727	6 884
Grain–Sheep/Beef							
total holdings ($m)	419	508	542	572	468	507	583
number of holders	8 999	8 352	8 490	8 680	7 944	7 265	8 979
Beef							
total holdings ($m)	302	312	352	406	439	437	398
number of holders	5 524	5 418	6 110	6 342	6 912	6 695	6 252
Sheep–Beef							
total holdings ($m)	132	158	184	192	170	167	170
number of holders	2 775	2 939	3 120	3 104	3 084	3 059	3 089
Sheep							
total holdings ($m)	121	161	170	171	160	156	143
number of holders	3 121	3 523	3 329	3 148	3 271	3 033	2 879
Pigs							
total holdings ($m)	na	na	13	15	18	16	13
number of holders	na	na	217	225	244	202	178
Intensive livestock							
total holdings ($m)	111	123	127	141	146	153	128
number of holders	2 112	2 101	1 938	2 031	2 432	2 444	2 080
Dairy							
total holdings ($m)	139	128	133	164	188	179	226
number of holders	4 153	3 315	3 256	3 667	3 984	3 652	4 123
Forestry and Fishing							
total holdings ($m)	16	20	21	21	21	70	120
number of holders	289	338	312	310	335	1 146	2 068
TOTAL							
total holdings ($m)	2 074	2 480	2 619	2 792	2 797	2 782	2 879
number of holders	43 400	42 877	43 309	43 562	42 365	40 574	41 355

a Total is less than the sum of industry figures because some holders are counted in more than one industry.

Sources: DAFF (2008h, 2008 unpublished).

The appropriateness of FMDs

In considering the appropriateness of the FMD scheme it is necessary to consider the rationales for government intervention. The National Drought Policy (NDP) implies that there is some market failure in self-reliance and preparedness. This might be due to a range of factors such as missing insurance markets to mitigate risk and a lack of information on predicting droughts. Analysis of farm financial performance suggests that liquidity is an important determinant of farm profitability and self-reliance, including during droughts. If there are market failures that mean that farmers are not establishing sufficient financial reserves, then there may be a reason for government to provide incentives to increase those reserves. That said, there is no evidence of significant impediments to farmers building financial reserves.

However, to the extent that FMDs contribute to greater financial performance, in turn leading to greater self-reliance in coping with climate variability, then the program may reduce reliance on more remedial government assistance measures.

FMDs may also contribute to achieving period equity in the taxation of primary producers — as noted earlier in this appendix. Any contribution in this area could be more significant for those primary producers who do not practise tax averaging, but there could be period equity benefits also for the majority who use tax averaging.

Assessing the effectiveness of FMDs

This section considers the effectiveness of FMDs in helping achieve the objectives of the NDP.

While it appears that farmers use FMDs to improve self-reliance and preparedness with respect to drought, it is clear that farmers use FMDs for a variety of reasons. The 2006 FMD review identified a number of reasons why farmers used FMDs, including to:

- earn interest on otherwise taxed income
- pay a lower eventual tax rate in situations where there is an expectation that tax rates will be lowered in the future
- leverage up the effects of Exceptional Circumstances (EC) interest rate subsidies
- obtain flexibility in superannuation planning
- obtain a commercial option to make better timed expenditure decisions (DAFF 2006).

In the *National Farmer Survey 2006*, ABARE asked farmers who held FMD accounts reasons why they used FMDs (table D.2). The most common reasons were tax management and income smoothing. While tax minimisation was cited by farmers in the survey as the main reason for using FMDs, most holders also viewed FMDs as an important risk management tool. Eleven per cent of FMD holders said that FMDs were their most important risk management strategy.

In the 2006 survey, around two-thirds of farms holding FMDs reported having made a withdrawal from their accounts at some stage, although this was higher in the cropping sector and more generally, in New South Wales. The most common reason cited for making a withdrawal from FMDs was for general expenses, or working capital — a reason given by 77 per cent of respondents. Other reasons were varied. For instance only 11 per cent cited debt reduction as a purpose of FMD withdrawals and only 10 per cent cited capital purchases. Interestingly, tax management, which was cited as the most common reason for deposits, was given as a purpose of withdrawal by only 7 per cent of respondents. Early access provisions for farms in EC areas do not appear to have been heavily utilised, with only 5 per cent of farms who made withdrawals, doing so under the early access provisions (Boero Rodriguez, Watson and Mues 2006).

Table D.2 **Characteristics of FMD use**

	Per cent of farms that held at least one FMD account
	%
Reasons to use FMDs	
Tax management	50
Income smoothing	31
Business strategy	12
Personal savings	1
Retirement savings	1
Other	5
Importance of FMDs in risk management	
Most important	11
Highly important	37
Important	35
Of minor importance	12
Not important	2
Debt increased while holding an FMD	17
Have made a withdrawal from FMD	66

Source: Boero Rodriguez, Watson and Mues (2006).

The most common reason for farmers to not hold FMDs, given by 60 per cent of farmers without FMDs, was insufficient surplus cash (Boero Rodriguez, Watson and Mues 2006). However, the next most frequent reason, given by 28 per cent of respondents without FMD accounts, was that they did not know enough about the scheme. Eighteen per cent of respondents said that the reason they did not use the scheme was because they used tax averaging. It appears that only a relatively small number of farmers did not use the scheme because of the eligibility restrictions. Four per cent of respondents said that their business structure did not allow them to use FMDs, while 3 per cent cited too high off-farm income as a reason for not using FMDs.

FMDs and drought

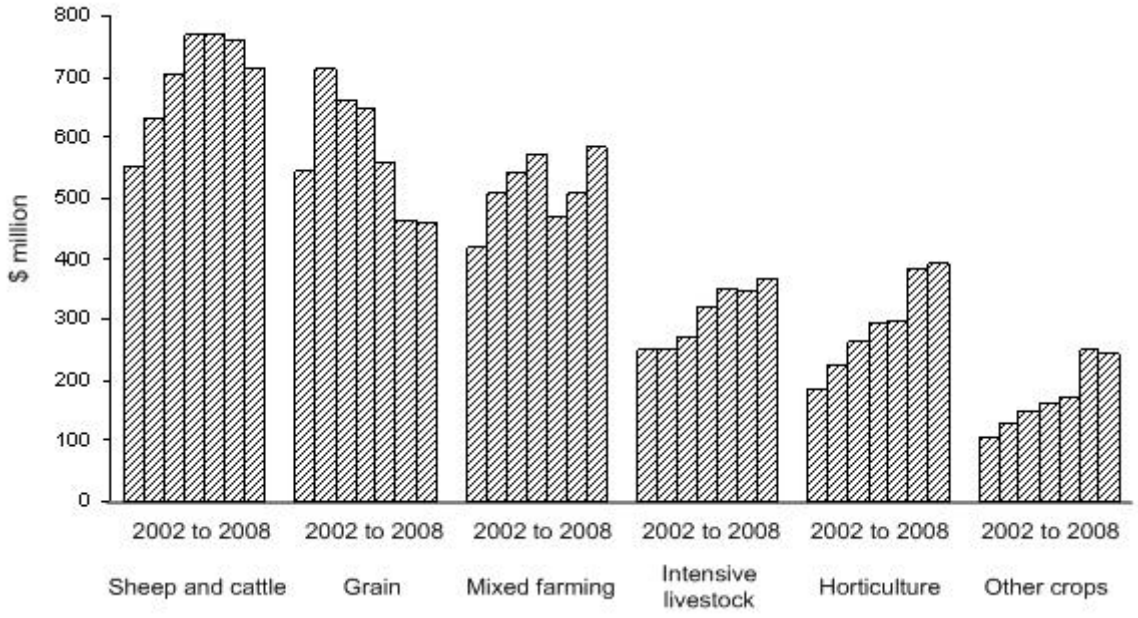
The FMD scheme appears to be being used as a financial tool to manage risk such as that presented by drought. While national aggregate data for the FMD scheme appears to mask any correlation between drought and FMD draw downs, sectoral data shows a much more dynamic use of the scheme (table D.1). An examination of annual holdings for selected industries (figure D.5) illustrates that the pattern of usage for the livestock and grain sectors is consistent with expectations of how the scheme would be used over the course of a drought.

For livestock enterprises, many producers have been selling livestock as an active destocking response to drought, thus generating additional income from the disposal. This income may then be kept in an FMD account in order to rebuild numbers post-drought and is indicative of the scheme being used for risk management purposes. Of course, some farmers may draw down FMDs during the drought to purchase fodder or meet other expenses and so the aggregate changes in FMD holdings may be less distinct.

Similarly for grain farmers, it appears that FMDs have been used as an active risk management tool. It is expected that FMDs would increase in a good year and then be drawn down during a poor year. Such behaviour is consistent with current FMD use, with a considerable draw down of FMD holdings in 2006 and subsequent years in the grain sector. Successive poor, or failed crops, coupled with high input prices for fuel and fertilizer appears to have increased reliance on FMD holdings to finance new plantings and maintain farm operations.

Figure D.5 **Total Farm Management Deposit holdings, June 2002 to June 2008**

As at June — selected industries[a]



[a] Sheep and cattle includes beef only and sheep only farms; Mixed farming includes farms producing grain and sheep and/or cattle; Intensive livestock includes dairy and pigs; Other crops includes sugar.

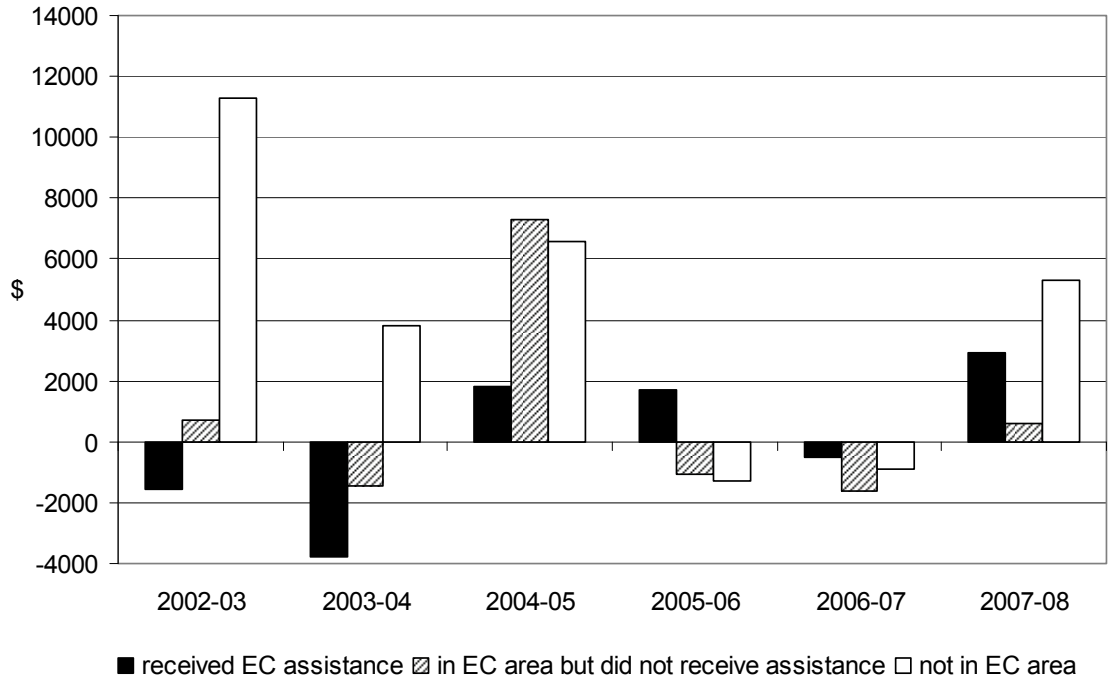
Data sources: DAFF (2008h, 2008 unpublished).

At an individual farm level, those with FMD holdings typically have superior financial performance to those who do not. In its 2005-06 survey, ABARE found that those farms with FMDs typically had: higher turnover; higher farm cash incomes; higher farm business profits; and a lower proportion of farms recording negative farm cash incomes. In its 2005-06 survey, ABARE found that farms with FMDs, on average, received significantly less other government assistance, such as the EC interest rate subsidy and the EC relief payment. To further analyse the relationship, they then compared only farms in EC-declared areas during 2005-06. The differences between farms with and without FMDs in EC areas were broadly in line with the differences nationally (Levantis and Martin 2007).

In EC areas, those farms increasing their FMD holding during the year did not have substantially better financial performance than those decreasing or maintaining their FMD holdings. This was attributed to a range of factors including: slightly higher cash incomes; lower additions to farm capital; increases in debt; and higher government assistance. While most respondents who did not make withdrawals from FMDs during 2005-06 indicated that this was because they had sufficient income to meet their needs, 20 per cent indicated that they did not draw down FMDs because they had received other government assistance (Levantis and Martin

2007). This appears to be consistent with changes in average FMD holdings for farmers who receive assistance versus those who do not (figure D.6).

Figure D.6 **Change in FMD holdings by EC status, 2002-03 to 2007-08**
Average change within year [a]



[a] Based on ABARE farm surveys for broadacre and dairy farms.

Data source: ABARE (2008 unpublished).

Views on the FMD scheme expressed by participants in the inquiry process, both in submissions and through industry visits and meetings, were generally in favour of the scheme. The two particular issues raised in respect of FMDs related to access, thresholds and eligibility criteria. For instance, one participant, in the horticulture industry, said:

> To mitigate risk in our business we utilise the Farm Management Deposit (FMD) scheme … However, the current $400 000 cap per partner is horrendously insufficient for our business. … The aim of our business would be to have enough reserves to completely support our business through a disaster year, and increased FMD allowance would be an effective way to do this. (Plunkett Orchards, sub. 13, pp. 1–2)

Similarly, the Western Australian Farmers Federation said:

> … FMDs are by far the key mechanism utilised to enable farmers to prepare for severe drought. … however, the upper limit on FMDs is considered inadequate to meet the average operational costs of Western Australian farming systems. (sub. 26, p. 7)

And AgForce stated that FMDs are a 'vital tool', but:

> The scheme needs further refinement in terms of ceiling limitations and also those with Trust and Company structures instead of simple partnerships. (sub. 80, p. 5)

The effectiveness of FMDs may also be constrained by the eligibility thresholds and criteria. A number of participants commented on the restrictiveness of the cap on contributions, and it is likely that for some individuals, $400 000 might be an insufficient financial buffer to completely offset losses in a bad year. But given the average deposit is only $70 000, this is unlikely to be an issue for most FMD holders.

In addition, the scheme was found to be meeting its objectives as a risk management tool when reviewed in 2006 (DAFF 2006) and the Corish Report considered that FMDs are a vital risk management tool available to farmers and recommended that they be retained subject to assessment that they were meeting objectives (Agriculture and Food Policy Reference Group 2006).

While not exclusively a drought oriented measure, FMDs are generally effective in addressing the objectives of the NDP. FMDs provide an option to better time deductible expense decisions. The incentive created by the scheme is to maintain a financial buffer, or reserve of funds available for future expenditure needs. By promoting the maintenance of financial buffers, the scheme promotes a more self-reliant approach to risk management, consistent with the first objective of the NDP. Further, this financial buffer can assist farmers maintain their operations during drought and assist with recovery though provision of a source of funds to engage in recovery activities, such as rebuilding livestock numbers or planting crops.

Eligibility and other constraints on the effectiveness of FMDs

A number of issues potentially constrain the effectiveness of FMDs. The FMD scheme provides an incentive to retain financial reserves in a tax effective manner to deal with income variability. As such, it can only be utilised by farms that have traded profitably in previous years. The scheme is therefore unavailable to farmers who are unviable, regardless of seasonal conditions, or those who have not traded profitably since the scheme's inception, including due to ongoing drought.

The presence of alternative assistance measures reduces the extent to which the scheme is drawn down in response to drought. The largest impact arises from interaction with interest rate subsidies. While the nature of the scheme can create incentives to borrow additional money to fund expenditure, rather than withdraw funds from an FMD account, this is exacerbated by the provision of interest rate

subsidies. As such, it is likely that in the absence of competing forms of assistance, reliance on FMDs to manage for risks, such as drought, would be higher.

The efficiency of FMDs

Eligibility thresholds are applied because the scheme is not costless. It results in foregone tax revenue as users defer payment of tax upon deposit and can use the scheme to smooth cash flow over time, potentially resulting in a lower overall tax liability. The cost of the scheme in recent years, in terms of annual forgone tax revenue, was estimated to range between $75 million (in 2006-07) and $245 million (in 2003-04), for 2008-09, forgone tax revenue was estimated at $100 million (Department of the Treasury 2007, 2009). Annual costs are sensitive to deposits and withdrawals in the given year. Expanding or removing the caps on deposit limits and/or off-farm income would increase the cost of the measure, although this may be offset to some extent by a decrease in the cost arising from tax averaging, which involved average annual forgone tax revenue of just over $100 million between 2003-04 and 2006-07.

Given that average deposits in the scheme are well below the cap, and that high off-farm income is cited by relatively few as a reason for not using FMDs, expansion of the thresholds is unlikely to improve the effectiveness of the scheme in helping most farmers mitigate the effects of drought.

In an operational sense, the FMD scheme relies heavily on financial institutions, so the administration costs to government are likely to be relatively small.

Summing up

- While aggregate FMD holdings have not declined markedly during drought periods, closer sectoral analysis shows usage consistent with expectations. In particular, there have been significant drawdowns of FMD holdings amongst grain farmers as a consequence of drought.
- To some degree, the use of FMDs in response to drought has been tempered by the availability of other measures, including interest rate subsidies and tax averaging provisions.
- Overall, FMDs appear to be an effective tool for farmers to manage risk, including with respect to severe drought, and are consistent with the objectives of the NDP.
- FMDs may also contribute to achieving period equity for primary producers.

- The rationale for government provision of FMDs is mixed. The scheme is not costless to government and the ability to defer tax liability provides a substantial benefit to eligible farmers that is not available to other taxpayers. However, it is less distortionary than other forms of assistance such as interest rate or transport subsidies and does not alter business decisions as much as those assistance measures.
- Unlike EC triggered assistance, availability of the scheme is continuous and utilisation is not dependent on drought declaration. In this respect it is a more appropriate method of assisting farmers achieve self-reliance.

D.2 Grant programs

Grants are a common form of government assistance provided to farmers and there are numerous different grant-based drought related programs. They fall into two broad categories. The first is grants for training, advice or counselling. This includes programs such as the Professional Advice and Planning Grant and the Rural Financial Counselling Service. Elements of the Farm Help and FarmBis programs (both now discontinued) as well as the new FarmReady program also fall into this category. Essentially these programs are aimed at increasing human capital or achieving social outcomes. The second broad category of grants is aimed at improving the physical or tangible capital base and includes the Irrigation Management Grant.

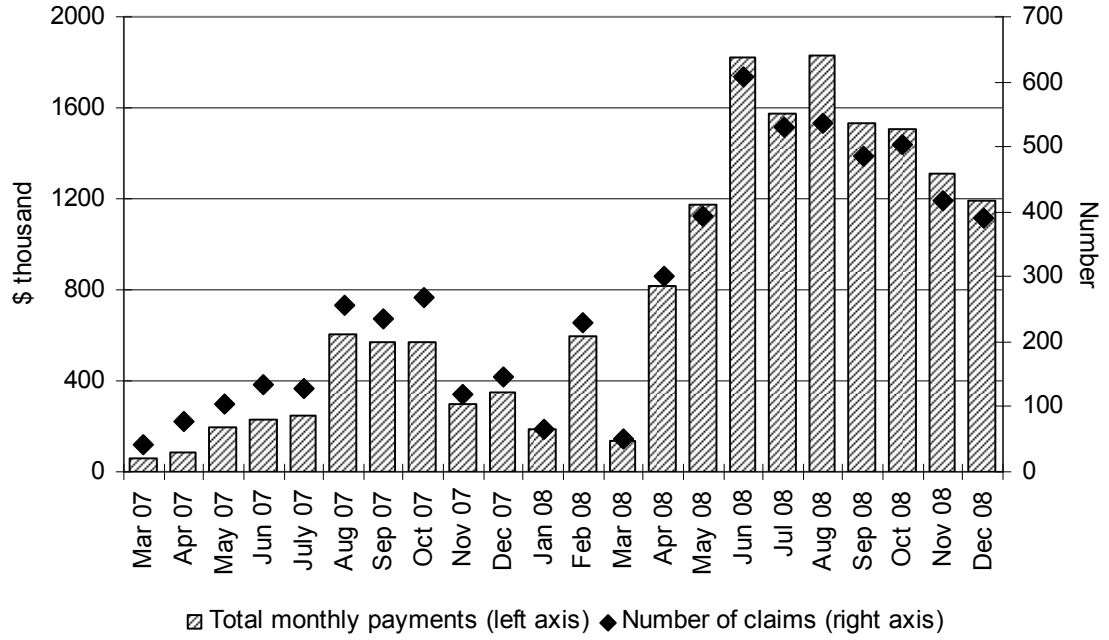
Professional advice and planning grants

Professional Advice and Planning Grants (PAPG) of up to $5500 (including GST) are provided by the Commonwealth Government and allow farm businesses affected by drought to obtain professional advice to aid in drought management and recovery. Grants may be used for purposes such as obtaining advice on farm viability and the development of a farm business plan incorporating a drought management and recovery plan. Previous recipients of the grant can access an additional $2200 to re-evaluate their plans after a minimum of six months. In order to be eligible to receive a grant, a farmer must be located in an EC declared area (farmers located in prima facie declared areas may not apply) and meet the various eligibility criteria, which are similar to that for EC interest rate subsidies. The farm must meet the farm financial viability assessment and if the applicant has not had an assessment within the previous 12 months for an interest rate subsidy, then this must be obtained. An initial portion of the grant may be used for this purpose, with funding for the remainder of the grant contingent on the viability assessment. The grant is administered by Centrelink.

The PAPG was introduced in October 2006, as part of a range of extended drought assistance measures and was initially available to farmers in areas that had been EC declared for at least three years (McGauran 2006). Changes to the grant were announced in September 2007, removing the three year requirement. Additionally, farmers could apply up to 12 months after the expiry of an EC declaration. The PAPG is available till June 2009 (DAFF 2008j).

Since the inception of the scheme, around 7700 farmers have been granted access to the PAPG. However, not all of those have actually accessed grant monies. Up to December 2008, approximately 4300 farmers utilised grant funds for professional advice. Further, most recipients have not yet utilised the full grant amount. Of those who have utilised the grant, the average payment was $3909. In total, almost $16.9 million has been provided under the scheme. Initial use of the PAPG scheme was quite low, as noted in the draft report. However, there has been a considerable increase in the use of the scheme more recently, with over half of the total funds, or almost $9 million, provided in the second half of 2008 alone (figure D.7).

Figure D.7 **Monthly utilisation of PAPG**[a]



[a] Aggregate of monthly claims is higher than total number of recipients as recipients can make multiple claims up to allowable grant limit.

Data source: DAFF (2009 unpublished).

Appropriateness of the PAPG

The rationale for government intervention through planning and advice style grants appears to be mixed. The benefits from advice provided by consultants are largely private in nature, with few community wide benefits. It could be expected that farmers would invest optimally in consultancy services on the basis of the return that these will generate for their businesses. That said, it is likely that there are some information failures in the market for education, training and advice, in the form of a lack of awareness of the training and advice available, as well as the likely benefits such advice would yield. Hence to the extent that grants have an educational outcome, assistance through grants could provide positive net community benefits and therefore be an appropriate form of government assistance.

Effectiveness of the PAPG

The PAPG scheme is consistent with the objectives of the NDP. The Commission received submissions that the PAPG had been useful in helping some farmers to undertake planning activities, such as developing a drought management plan. For instance, one participant submitted that they had used the grant to develop a drought management strategy and gain advice on diversifying their income stream to include off-farm assets to overcome cash-flow constraints (D. and T. Allen, sub. 20). Similarly, Centrelink provided examples of grant recipients who had utilised the grant and as a result had implemented changes to their enterprise that were expected to return the farm to profitability or increase that profitability.

However, there was also comment made to the Commission that grants for advice were potentially of limited value, for reasons such as:

- farmers already possessing knowledge or plans
- a lack of suitable consultants in their area and/or
- increases in consultant fees where a grant is available.

A further concern, expressed by some, was that the timing of the grant — during rather than prior to a drought — limited its effectiveness in meeting the NDP objective of improving self-reliance.

Limited effectiveness of the PAPG in improving self-reliance of the farming sector may also be evidenced by the relatively low utilisation of the scheme compared with that of other programs available to drought affected farmers.

Rural Financial Counselling Service

The Rural Financial Counselling Service (RFCS) program was initially established in 1986. Since 1997 it has been an element of the AAA package, but is now a stand alone program, and is scheduled to receive funding until 30 June 2011. Although not specifically a drought assistance measure, the RFCS program are often in high demand during times of drought. The RFCS provides free and impartial (and confidential) financial counselling to farmers, fishers and agriculture-dependent small businesses.

The stated list of services that rural financial counsellors can provide includes:

- help clients identify financial and business options
- help clients negotiate with their lenders
- help clients adjust to climate change through the Climate Change Adjustment Program, identify any advice and training needed and develop an action plan
- help clients meet their mutual obligations under the Transitional Income Support program
- give clients information about government and other assistance schemes
- refer clients to accountants, agricultural advisers and educational services
- refer clients to Centrelink and to professionals for succession planning, family mediation and personal, emotional and social counselling (DAFF 2008l).

It is specifically stated that rural financial counsellors can not provide family, emotional or social counselling, or financial advice and succession planning services. In these cases they are only permitted to provide information and referrals (DAFF 2008l).

The RFCS program provides grants to state or regional level organisations to provide the counselling. As at June 2008, the program was delivered by 14 service providers with approximately 120 counsellors (some are part-time, equivalent to around 110 full-time equivalents). Use of the program has increased over time, with approximately 14 000 clients in 2007-08 (table D.3). While not a drought specific program, it would appear that drought has a considerable impact on use of the program, with higher use of the scheme in more severe and widespread drought years.

Table D.3 **Rural Financial Counselling Service client numbers, 2001-02 to 2008-09** [a]

Year	*Total clients*	*New clients*	*Existing clients*
	No.	%	%
2001-02	6 225	37	63
2002-03	10 236	50	50
2003-04	8 246	31	69
2004-05	7 933	30	70
2005-06	8 332	25	75
2006-07	12 287	47	53
2007-08	14 241	52	48
2008-09 (Jul-Dec)	6 596	na	na

na Not available. [a] Numbers likely to be overestimated because if a client sees more than one counsellor they may have duplicate entries in the database.

Source: DAFF (2008 unpublished).

In 2007-08, the service cost to the Commonwealth Government was $16.5 million. In addition, contributions are made by state governments. In general, each state contributes around $20 000 per counsellor in their state, although some states provided additional funding. In 2007-08, states contributed a total of an estimated $2.8 million. In addition, Queensland funds a similar farm financial counselling service, which operates in addition to the RFCS and covers separate areas of that state.

The program has undergone substantial review. It was subject to an audit in 2003, followed by a review in 2004. The 2003 audit determined that none of the service providers fully complied with their funding agreement. It identified issues such as: poor corporate governance; provision of services outside boundaries of funding agreement; poor budgeting; inefficient provision of services; and inconsistent counsellor qualifications (Acumen Alliance 2006).

The subsequent 2004 review considered that there was a 'continuing need for a Rural Financial Counselling Service', but it did make a number of recommendations. A key recommendation was for an alternative funding approach, rather than requiring local communities to provide matching funding. This was in recognition of the fact that disadvantaged regions most in need of the service were missing out. It also contributed to institutionalisation of services in particular areas and a lack of mobility to service areas of greatest need. The review also recommended changes including: improved counsellor supervision; a move away from social or welfare needs to an adjustment focus; and a re-skilling of counsellors, as required (AAA Rural Financial Counselling Service Review Committee 2004).

In response, in October 2005, the Primary Industries Ministerial Council agreed to restructure the program, addressing issues raised in the 2003 audit and 2004 review. The key changes to the program were new arrangements with service providers — reducing the number of service providers from 68 to 16, now 14. In addition the annual budget for the program was substantially increased, removing the need for matched community funding. Counsellor numbers have also been increased by 50 per cent since the implementation of the new arrangements.

There has also been recent expansion in the role of the RFCS, with responsibility for providing mandatory case management to recipients of the Transitional Income Support and Climate Change Adjustment Program.

Appropriateness of the RFCS

As with grants for training and advice, the largely private benefits from financial counselling mean that the rationale for government intervention is mixed. However, it is likely that there are some information market failures and that government intervention though the rural financial counselling service could provide net community benefits. To maximise the benefits from RFCS, the program needs to be responsive and transitive. The largest benefits to clients will be in their early stages of use of the program as information gaps are filled and/or they receive some basic financial skills. Beyond this point, counsellors should refer clients to appropriate services, such as commercial financial planning services (these could be funded by grants) to avoid duplication of services.

Effectiveness of rural financial counselling

While not a drought specific service, the objectives of the program are not inconsistent with the NDP objectives. The RFCS is popular and was considered to be an effective service by many participants in this inquiry. For instance, AgForce submitted:

> Continuation of Rural financial counsellors is imperative. These counsellors provide significant services to clients and can in the future place further emphasis on climate variability planning to help producers become more proactive in this area. (sub. 80, p. 9)

Similarly, the NSW Government considered the RFCS to be effective:

> NSW considers the program to be equitable, needs driven and cost effective. It is very highly regarded in the community and achieves significant penetration of the farm sector. This Program is considered to be an effective means of facilitating improved farm businesses risk management and adjustment across rural NSW. (sub. 90, p. 6)

However, there are potential issues that can reduce the effectiveness of program. Many such issues were identified in the 2003 audit and 2004 review and subsequent changes to the program appear to have addressed many of these. But it appears some issues remain. With only 120 counsellors, gaps in coverage remain. There is also a relatively high retention rate of existing clients, although expansion of the service in the last two years has resulted in substantial numbers of new clients (table D.3). It is likely that the effectiveness of the service diminishes over time for regular clients.

The effectiveness of the program is also affected by cross-over and duplication between the RFCS and other services that are available, including: other state-funded counsellors and drought support workers, charitable organisations and other commercially available services, including those that might be accessed using government grants.

Other training assistance programs

Farm Help

Farm Help was a short-term financial measure to assist farm families who were experiencing severe financial difficulties and were unable to attain a loan from a financial institution to meet their living expenses. It was part of the AAA package. Assistance under Farm Help was aimed at assisting farmers while taking action to improve their long-term financial prospects, either through improving the financial performance of their farm, finding off-farm income or exiting the industry. One element of the program was an Advice and Training Grant. This could be used to obtain advice, undertake training and purchase appropriate computer software. First time applicants were eligible for a grant of up to $5500. Those re-entering the Farm Help program could access an additional grant of up to $2500. The deadline for applicants to utilise the grant is April 2009 (DAFF 2008g).

Over the 11 years to 2007-08, the grant was utilised by over 9400 recipients, with total expenditure of almost $22 million. Use of the scheme declined over time. For instance, just over 100 recipients utilised the grant in 2007-08.

FarmBis

This program provided subsidies for a wide range of training activities. FarmBis originally commenced in 1998 and was available in all states and territories. In 2005, a new version of the program was launched under the AAA policy. The AAA FarmBis program was not offered in New South Wales or the ACT. Additionally,

Victoria ceased offering the program at the end of June 2007. While the AAA FarmBis program was jointly funded by the Commonwealth and state governments, in July 2007 the Commonwealth commenced a fully funded national FarmBis program in states where AAA FarmBis was not offered. It was intended to extend the national FarmBis program to all states and territories, but the scheme was subsequently abolished prior to the introduction of FarmReady (DAFF 2008f).

FarmBis provided a partial subsidy for approved training activities. Under the second FarmBis round between July 2001 and December 2004, across all jurisdictions, just over 72 000 people undertook almost 147 000 training activities. Total cost to governments over this period was $102 million, of which $82 million was paid to participants, representing an average of $1136 per participant, or $558 per training activity.

The subsequent AAA FarmBis scheme was utilised by a total of almost 30 000 participants. Lower participation may be partially attributed to the program being unavailable in some states. Total Commonwealth and state government expenditure on AAA FarmBis totalled $41 million over three and a half years, comprising about $11 million in program provision, $3 million in targeted industry initiatives and $27 million in payments for approved learning activities. Average payments for learning activities under AAA FarmBis were similar to those provided under the previous version at $912 per participant or $554 per training activity.

The national FarmBis program operated relatively briefly and was only utilised in New South Wales, Victoria and to a very limited extent, South Australia. In all, 880 participants utilised the scheme for 1064 training activities. The average funding provided under this scheme was similar to that under other FarmBis programs at $792 per person or $655 per training activity.

FarmBis appears to have been a quite popular program and has received strong support from many inquiry participants at public hearings and roundtables, as well as in written submissions. For instance, AgForce said:

> One of the main assistance measures which receives a very high level of support has been the FARMBIS program. … This program needs to be reinvigorated and supported at both levels of Government. (sub. 80, p. 5)

There was a reasonably consistent message from participants that FarmBis had encouraged a broader range of farmers to undertake training activities than would have occurred otherwise. Similarly, a mid-term review of FarmBis found that for the most part, FarmBis had opened up training to rural and regional areas and that it had catalysed significant levels of repeat participation (PWC 2006). This suggests that FarmBis was an effective form of assistance in addressing the impediments to farmers accessing information and training.

FarmReady

This program was introduced as part of the Australia's Farming Future package. It was announced in July 2008 as a program to provide assistance for training to help farmers deal with the effects of climate change (Burke 2008d). Two types of grant are available under FarmReady. The first is a reimbursement grant of up to $1500 per year for primary producers and indigenous land managers to attend approved courses. Up to an additional $500 per year is available to cover costs associated with course attendance, such as child care and travel costs in certain circumstances. While the program has a 'climate change adaptation' focus, the range of approved learning areas is relatively broad and covers a range of farm training activities. The stated key learning areas include:

- understanding the implications of climate variability and change
- integration of new techniques for sustainable production, as a result of climate change
- natural resource planning and adaptive management, as a result of climate change
- farm business management and risk assessment
- development of research and analytical skills
- strategic planning
- holistic management
- financial management
- human resource management (DAFF 2008i).

Learning areas for FarmReady have a climate change and/or farm planning focus and funding does not cover courses covering production, technical or operational topics unless there is a link to climate change adaptation (DAFF 2008i).

The second type of grant available under FarmReady is an industry grant of up to $80 000 per year for eligible industry, farming and natural resource management groups to develop strategies to improve industry self-reliance and preparedness to adapt to climate change. Industry grants may be offered for projects such as:

- identifying strategies to combat climate change issues
- industry specific training plans
- climate change communication campaigns
- facilitating uptake of best management techniques (DAFF 2008i).

Calls for applications for the first round of industry grants were made in December 2008 and closed on the 17 February 2009 (Burke 2008b).

The FarmReady program has only just become available and so there was no training undertaken through the program in 2008. The program has strong parallels with the discontinued FarmBis, although with a narrower scope for training courses. The available reimbursement is well above the average grant that was provided under FarmBis. However, the FarmReady program has been allocated $26.5 million over four years, which equates to significantly less average annual funding than that expended on FarmBis programs.

Climate Change Adjustment Program Advice and Training Grants

This is a grant of up to $5500 delivered under the Australia's Farming Future program. In the first instance, recipients of the grant must obtain a farm business analysis and financial assessment. Recipients are then required to develop a climate change adjustment action plan. Additional grant funds can be used for advice or training activities identified in the action plan. Advice or training must be, either directly or indirectly, related to adjusting to the impacts of climate change (DAFF 2008c).

Because these grants have only been offered since July 2008, there is little information on their utilisation. As at December 2008, there were 640 applications for the grant. Of these, 261 were granted access, with 86 claims for payment lodged. So far, applications for the grant have come from those applying for Transitional Income Support (TIS), as TIS applications include an application for the grant as well. However, the grant is not restricted to TIS applicants.

Irrigation Management Grant

Irrigation Management Grants (IMGs) were introduced on 25 September 2007 in response to the on-going effects of substantially reduced water allocations in the Murray-Darling Basin (MDB). In a media release, the then Minister for Agriculture, Fisheries and Forestry said:

> The Government recognises that this is an unprecedented situation for most irrigators and that there is a need for immediate financial assistance … These grants will be made available to MDB irrigators to help them respond to significantly reduced water allocations. (McGauran 2007b)

The IMG is a taxable grant of up to $20 000 available to irrigators in the MDB. Claims are made to Centrelink. Grants will be paid up till 30 June 2009, but applications close on 31 March 2009.

To receive a payment, a farmer must identify an eligible activity. Eligible activities that are covered by the grant are:

- piping, troughs and associated activities for stock and domestic water
- fixed water charges
- sinking/extending/refurbishment of bores (and pumps)
- pruning activities to minimise the impact of low water allocations
- reconfiguring irrigation systems
- equipment replacement to maintain irrigation systems (including computer software, piping and pumps)
- costs associated with implementing water efficient crop options and
- laser leveling (DAFF 2008k).

It is not available for other farm costs such as purchasing vehicles, purchasing water or fodder, or refinancing.

To qualify for the grant, the applicant must meet certain criteria. They must establish that they have been a farmer for at least two years prior to application. They must also have had an irrigation enterprise as at 25 September 2007. To qualify as an irrigator they must hold an active entitlement to an irrigation water source in the MDB, or demonstrate that in the last three years they have derived income from, or would have if not for reduced allocations, an irrigation activity. Irrigators only qualify for irrigation from a regulated water source, and not where irrigation water has been used purely for stock and domestic purposes.

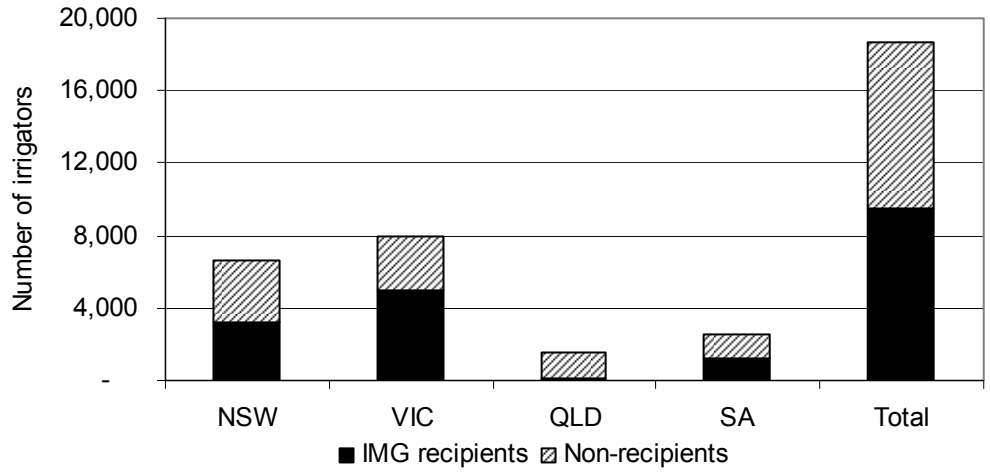
The asset test limits for the grant are the same as for the EC interest rate subsidy. However, there are no off-farm income limits. The grant is only available once per enterprise and applicants who own multiple enterprises can only apply once. It is not restricted by business structure and is available to sole traders, partnerships, companies and trusts.

Use of IMGs

From the program's inception until mid-December 2008, a total of 11 645 claims for the IMG were lodged. Of these, 9497 irrigators were granted the IMG, including 4923 recipients in Victoria, 3196 in New South Wales, 1229 in South Australia and 125 in Queensland. A further 1714 applications were rejected. In the case of those receiving the grant, the average grant paid was $18 611, resulting in total payouts under the scheme of almost $177 million.

It was estimated that there were 18 634 agricultural businesses irrigating in the MDB (ABS 2008f) in 2005-06. This would suggest that the grant has been accessed by just over half of the irrigators across the MDB. However, the grant has not been taken up uniformly across the states (figure D.8). In New South Wales, approximately 48 per cent of irrigators have utilised the scheme, and in South Australia, 49 per cent, which is similar to the basin-wide average. Take up of the scheme has been considerably higher in Victoria, where approximately 62 per cent of irrigators have accessed the grants. At the other end of the spectrum, only 8 per cent of irrigators in the MDB in Queensland have accessed the grant.

Figure D.8 **Irrigators in the Murray-Darling Basin[a]**



a Includes IMG recipients up to mid-December 2008.

Data sources: ABS (2008f); Centrelink (2008 unpublished).

Appropriateness of IMGs

In assessing the appropriateness of the grant, it is necessary to consider the rationales for government intervention and whether there are any market failures that may warrant government intervention. In terms of improving self-reliance and maintaining the agricultural resource base and capacity to recover, there would appear to be little evidence of market failure. In contrast to investments in human capital (through education and training), there would seem to be virtually no information barriers or rural credit market constraints (Australian Bankers Association, sub. 76) that prevent irrigators from undertaking financially worthwhile infrastructure improvements. While there are considerable community wide issues with respect to water use efficiency that might justify government intervention, these are not specifically targeted by the grant. Overall, there would seem to be no rationale for government intervention with respect to market failures.

How effective have IMGs been?

The stated purpose of the grants is to help irrigators cope with the effect of cuts to water allocations. To this end, grants are permitted to be used on a range of infrastructure projects, which are primarily aimed at improving on-farm water use efficiency. However, grants may also be used to pay fixed water charges.

The grant was viewed as an effective form of assistance by some participants to this inquiry. For instance, Murray Dairy stated:

> This grant has not only allowed farmers to increase on-farm efficiencies but also provided work to small business that would traditionally have little work during drought. (sub. 70, p. 5)

In the context of assisting with the short-term effect of water shortages, the grant is no doubt beneficial for irrigators, given its generosity and fungibility and so the grant is potentially effective in improving the survival of farmers in the face of climate variability and climate change. Projects that improve water use efficiency may assist farmers to maintain productivity in face of lower water availability. In this regard the grant could be effective in addressing all three of the NDP objectives as it provides assistance in maintaining agricultural production and could improve the productivity of water when allocations increase.

The effects of the grant will ultimately depend on how the grant is used. If grants are used to pay bills that a farmer would otherwise have had to pay or used to undertake capital works that would have been undertaken regardless, then the grant will not affect irrigator behaviour, but merely represent an income transfer from taxpayers to the irrigator. Because of the broad range of expenditure options, where the benefit of any option is captured largely by the private irrigator, grant receipts are highly fungible. As a result, the effectiveness of the program in meeting specific objectives is likely to be diminished.

Interaction with other assistance measures

There is some interaction between assistance measures and it is common for farmers to receive assistance under more than one program. In the 2007-08 financial year, Centrelink estimated that a total of 9558 irrigators in the MDB accessed one or more of the drought assistance programs — EC relief payments, IMGs and exit payments — that they administer (table D.4).

Table D.4 **Drought assistance received by irrigators in the Murray-Darling Basin, 2007-08**

Program	*Number of recipients*
IMG only	4 433
IMG and EC relief payment	2 997
IMG, EC relief payment and exit grant	2
EC relief payment only	2 108
EC relief payment and exit grant	10
Exit grant only	8
Total	**9 558**

Source: Centrelink (2008 unpublished).

Of the 7432 irrigators that received the IMG in 2007-08, 2999, or 40 per cent, also received the EC relief payment. Of these, two recipients also subsequently accessed the exit grant as well. It also seems that there were over 2000 irrigators in the MDB who accessed income support, but not the IMG. It is unclear why this might be the case. Possible reasons could be a lack of awareness of the grant program, a lack of suitable projects, or irrigators could still be planning the best use of the grant.

There also appears to have been considerably greater take up of the IMG than the Professional Advice and Planning Grant (PAPG). Of the 9558 irrigators in the MDB who received Centrelink administered assistance, 1630 also accessed the PAPG. Of IMG recipients, 1480 (20 per cent) also accessed the PAPG. While this may partially reflect differences in eligibility criteria, it is also likely to reflect the greater discretion available to the recipient over how the funds are spent in the IMG.

Summing up

- Overall, the appropriateness of grant based assistance measures is mixed and depends on the type of outcome being targeted by the grant.
- The rationale for government intervention through grant programs is generally weak. This is because the benefits from assistance are largely private in nature, meaning that individual farmers have an incentive to invest optimally in the training, professional advice, or capital works being targeted by the grant.
- However, it is possible there are some information market failures with respect to education and training. In this case, grants for training and professional advice that are well targeted, area appropriate and have an educational outcome may provide net community benefits and be worthwhile.
- The effectiveness of current training and advice programs varies. The PAPG appears to be effective in some cases, but this is tempered by relatively low

levels of utilisation. On the other hand, the RFCS is seen as an effective program and has higher utilisation rates.

- While the IMG has been relatively popular, in terms of the NDP, its effectiveness is reduced by its broad scope and highly fungible nature. Further, there are no market failures to justify the grant as the benefits are largely private in nature, with no specific community wide benefits.
- Provision of education services may not always be effective if they do not address farmers' requirements. Additionally, such services can also 'crowd out' provision of training and consultancy services by the private sector. As such, grants or subsidies for training or education, such as the discontinued FarmBis or FarmReady may be more appropriate methods of providing assistance to farmers to improve their self-reliance and preparedness.

E State and territory drought policies and measures

Many state and territory governments have drought policies that operate along side the National Drought Policy (NDP) and deliver a wide array of drought assistance measures to farmers, farm households and small businesses in rural areas. While this appendix does not provide a comprehensive catalogue or assessment of all measures delivered to drought affected businesses, household and consumers, details of the main drought related policies and measures are analysed. Many of the measures delivered by state and territory governments involve small amounts of funding, have limited coverage and operate over relatively short time frames. Other measures also delivered in part by state and territory governments such as the Exceptional Circumstances (EC) Interest Rate Subsidy (ECIRS) and the Rural Financial Counselling Service are discussed in appendixes C and D respectively.

E.1 State and territory government drought policy platforms, objectives and measures

A number of state and territory governments have drought policies and measures directed at assisting farmers and rural communities experiencing hardship caused by drought. Some of these policies repeat the objectives of the NDP while others have their own objectives.

Under these policies are a vast array of assistance measures that vary in generosity, coverage and purpose. They can be broadly categorised into seven main groups:

- transport and other transaction subsides — payments made to farmers to reduce production costs during drought events
- business subsidies and grants — direct government outlays to support farmers or businesses within rural towns
- waivers of rates and other government charges — exemptions for farmers and businesses in rural areas from normal government fees and charges, which reduce government revenues

- environmental measures — measures aimed at preventing the degradation (or improving the quality) of natural assets during drought
- concessional business loans — financial assistance to farmers and small businesses in rural areas involving some mutual responsibility
- household and community support measures — measures aimed at providing support to farming families experiencing hardship due to drought conditions and to maintain the fabric of rural communities under stress due to drought
- drought related training, research, development and extension — activities to improve the ability of the farming sector to prepare for and cope with drought.

As well as drought assistance policies and measures, each state and territory government provides a range of programs and initiatives to facilitate sustainable economic, social and environmental outcomes for regional Australia. These include business investment and development programs, regional economic development schemes, community economic development and the payroll tax incentive scheme. For example, Regional Development Victoria provides the 'Small Towns Development Fund', the Queensland Department of Tourism, Regional Development and Industry provides a program for 'Building Rural Leaders' and the South Australian Department of Trade and Economic Development has a 'Regional Development Infrastructure Fund' and 'Rural Town Development Fund'.

Similarly, local governments often have an economic development role and undertake measures to promote communities, provide infrastructure, protect rural environments, and conserve or manage cultural heritage through a variety of mechanisms.

New South Wales

New South Wales does not have a documented drought policy beyond the NDP. Despite this, the state has implemented a range of additional government support programs in response to drought (box E.1). Some programs were of limited timeframe and are no longer operating. Since 2002, $396 million in drought assistance has been provided including:

- $131 million in transport subsidies
- $90 million for the state share of ECIRS
- $40 million in fee waivers
- $21 million in services to farmers
- $29 million on town water supply problems

- $11 million in payroll tax waivers (NSW Government, sub. 90).

Box E.1 **New South Wales drought assistance measures**

Transport and other transaction subsidies

- Transport subsidies — available for stock, water and fodder movements to farmers in state drought declared areas.

Business subsidies and grants

- Drought feedlot grant — A grant of $10 000 was made available by some Catchment Management Authorities for the establishment of drought feedlots. This grant is not currently offered.
- Business Improvement and Recovery Strategies — grant of up to $3000 for small businesses in regional areas dependent on agriculture sector and affected by drought to sustain their operations.

Waivers of rates and other government charges

- Since 2002, $40 million in fees has been waived. Includes fees such as western land lease fees, wild dog and pest insect levies, apiary site fees and some irrigation fees.
- Payroll tax concessions — available to eligible businesses with less than 200 employees. There have been 108 recipients since 2002 with concessions totalling $11 million.

Concessional business loans

- Special conservation scheme — low interest loans to undertake conservation works, including upgrading of water/irrigation infrastructure and fodder/grain storage. Expenditure on the scheme has totalled $55 million since 2002.

Household and community support measures

- Drought support workers — drought support workers provide support to families during drought, including providing information on available services and assisting in application processes. There are 10 drought support workers across the state.
- Farm family gatherings — organised community social events. Access to information and services is incorporated into the events. Up to June 2008, 2092 gatherings were conducted. An average of around $700 in additional cash costs were incurred by the NSW Government per event.
- Grant for tank water — up to $400 for low income rural households dependent on tank water.
- Department of Community Services (DoCS) Drought relief payment — up to $2000. Available to those unable to access Centrelink provided income support.

Sources: DPI (New South Wales) (2008); NSW Government (sub. 90).

Victoria

Victoria's drought-related initiatives pre-date its recently announced agricultural policy Future Farming. While the Future Farming policy has a broader focus which may encompass drought-related policies, it is unclear whether the current suite of drought-related initiatives will become part of this policy.

While no formal drought policy exists, the Victorian Government is reported to have two key objectives for its drought assistance. These are to provide:

- short term support to help families and communities cope with the temporary impact of exceptional circumstances
- longer term assistance for structural adjustment for farming and other businesses whose ongoing viability is threatened by adverse climatic conditions (SACES 2008b).

In recognition of the nexus between short-term emergency support and the incentives for preparing for future droughts and the management of natural resources by farmers, the Victorian Government has developed four drought assistance principles in designing measures:

- drought should be treated as a legitimate business risk that farmers and other businesses should prepare for
- drought relief measures should be environmentally sustainable
- drought related assistance should target household welfare and community resilience through support for social and economic infrastructure
- drought policy should aim to manage the long term structural adjustment process.

Despite this, a number of drought measures (box E.2) do not appear to be designed with these principles in mind. For example, some payments are targeted directly at farm business costs that should have been planned for if drought was viewed as a legitimate business risk. Further, Victorian drought policy is directly targeted at managing structural adjustment despite drought being only one factor that places pressure on farm businesses and rural communities.

Box E.2 **Victoria drought assistance measures and costs, 2006-07**

Business subsidies and grants ($7.3 million)

- Regional Infrastructure Development Fund 'Water for Industry' program — subsidies for public water businesses and private firms to reduce potable water use, costing $1.9 million.
- Water tank rebate — a one-off rebate on water storage infrastructure for household and livestock use in the Grampians Wimmera Mallee during 2006-07, costing $1.836 million.
- Pumping of the Waranga Basin — 87 billion litres of water was pumped from the Waranga Basin for use in the Goulburn system at a cost of $2.52 million ($30/ML).
- Drought apprenticeship retention bonus — $1500 cash grant for businesses in EC areas to retain apprentices (total cost of $1.02 million).
- Regional Industry Investment Program — support for businesses relocating to, or expanding capital works in, EC areas. No uptake of the allocated $5 million.
- On-farm productivity grants — grants of up to $3000 to assist farmers to undertake on-farm works that will improve productivity and mitigate the future impacts of drought (allocated funding of $10 million in 2007-08).

Waivers of rates and other government charges ($44 million)

- Rebates on fixed water rates — rebates of up to $5500 on the fixed component of water bills for those receiving less that 50 per cent of their allocation (total cost of $34.5 million).
- Municipal and family shire rate rebate — 50 per cent rate subsidy for farmers receiving the EC Relief Payment, costing $9.5 million.

Environmental measures ($10.5 million)

- Drought employment program — Catchment Management Authorities provide employment on projects to restore natural assets on private land, costing $10 million.
- Stock containment facilities — subsidies to farmers to build stock containment infrastructure to minimise soil erosion, costing $0.5 million.

Household and community support measures ($35.76 million)

- Communication strategy — information provided to rural communities on how to manage drought and what programs are available to assist them (allocated funding of $1.5 million in 2007-08).
- Small town development fund — grants of up to $250 000 for projects in regional towns in EC areas, costing $2.9 million.

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Box E.2 **(continued)**

Household and community support measures (continued)

- Local Infrastructure Works Program — grants to local councils and shires in EC areas to undertake minor works and local infrastructure projects, costing $16.8 million.
- Roads projects — fast track the upgrade of six roads in EC areas, costing $5.358 million.
- Rural skills connect — funding for 10 pilot projects aimed at finding workers for businesses experiencing skill shortages, through engaging farmers and workers laid-off due to drought (allocated finding of $3.25 million in 2007-08).
- Tourism marketing campaign — grants to drought-affected regional tourism campaign committees (allocated funding of $0.3 million in 2007-08).
- Drought relief for community and country sport and recreation (various programs) — grants to maintain sport and recreation-related infrastructure costing $4.652 million.
- Tackling rural poverty and supporting families through drought initiatives — funding grants to kindergartens in drought-affected regions for Christmas hampers and toys, assistance for back to school costs and the development and enhancement of local information and referral networks, costing $1.241 million.
- Mental health and drought counselling — to improve early intervention, coverage and outcomes from mental health programs, costing $3.225 million.
- School and kindergarten fee relief packages — fee subsidies and grants to schools in drought-affected regions ($0.834 million spent on kindergarten fee relief).
- Building resilient communities — grants for community events and programs to assist drought-affected communities with drought recovery and to build community resilience, costing $0.75 million.
- Planning for change — grants provided to local councils in drought-affected areas to assist community engagement in planning and regional adjustment (allocated funding of $0.6 million in 2007-08).
- Sustainable farm families — workshops and information to improve awareness of health, wellbeing and safety issues facing farm families (allocated funding of $1.35 million in 2007-08).

Drought related training, research, development and extension ($2.9 million)

- One-to-one extension services — information and advice to farmers in drought 'hot-spots', costing $0.5 million.
- Future farm planning — information and planning advice for farmers to improve decision making, costing $0.65 million.

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Box E.2 **(continued)**

Drought related training, research, development and extension (continued)

- Rural futures forums — information for communities and industries to improve adjustment decisions (allocated funding of $0.83 million in 2007-08).
- Goulburn and Murray Irrigation horticulture assistance — one-to-one advice for horticulturalists to improve decision making (allocated funding of $1.2 million in 2007-08).
- Drought recovery program — advice to help farmers recover from drought through evaluating current circumstances, planning for the future and the implementation of plans (allocated funding of $1.2 million in 2007-08).
- Business continuity program — information provided to farm and non-farm businesses in EC areas to improve business decision making, delivered through workshops, forums and one-to-one meetings, costing $1.75 million.
- Business transitioning program — workshops, forums and one-to-one business counselling to drought-affected non-farm businesses (allocated funding of $1 million in 2007-08).

Source: SACES (2008b).

Queensland

Queensland's drought policy, Drought — Managing for Self-Reliance, was adopted in 1992 and reiterates the objectives of the NDP. The primary aim of the policy is:

> To achieve a level of self-reliance within Queensland's rural industries such that the risk of drought is adequately covered by sound property planning and management practices. (Queensland Government, sub. 77, p. 3)

The Queensland Department of Primary Industries and Fisheries (DPIF) delivers its drought assistance measures through the Drought Relief Assistance Scheme (DRAS). The DRAS, which has been in place since the 1960s, was to be phased out after the development of the NDP and Queensland's drought policy in 1992, but has instead been retained subject to annual review.

The main measure delivered under the DRAS is a transport subsidy — freight subsidies for fodder and water during drought, and freight subsidies for livestock returning from agistment, or for restocking properties recovering from drought.

A number of other drought assistance measures are also available from other departments and agencies within the Queensland Government (box E.3). These range from the provision of carry-on finance for drought-affected producers (Queensland Rural Adjustment Authority) to publicly funded research and development (Environmental Protection Agency).

Box E.3 Queensland drought assistance measures

Transport and other transaction subsidies

- Transport subsidy — freight subsidies paid to farmers in State drought-declared regions for: the transportation of fodder and water; stock going to and from agistment; and restocking.

Business subsidies and grants

- Small business emergency assistance scheme — an interest rate subsidy of up to 50 per cent (capped at $10 000 per annum) on interest payments on new and existing loans incurred by locally owned small businesses in, dependent on, or adjacent to EC declared areas.

Waivers of rates and other government charges

- Irrigators fixed water charges rebate — a rebate of up to $10 000 per financial year on fixed water charges incurred by producers over the period 1 July 2006 to 30 June 2008 in areas that have previously had, or currently have, low water availability.
- Hardship provisions for rent or lease instalments on state land — deferral allowances for those businesses experiencing hardship and unable to pay rent on lease instalments on state land.
- Transport concessions — concessions for primary producers such as payment options for vehicle inspection fees, drought road train permits and increased vehicle height limit when transporting machined baled hay.
- Electricity tariff concessions — concessions to primary producers declared as experiencing drought conditions (state-based declaration).

Concessional business loans

- Drought carry-on finance — provides subsidised finance for primary producers affected by drought (up to $100 000). As at the financial year ending 2007-08, 150 loans were in place at a value of $5.492 million with $93 840 remaining to be repaid.
- Drought recovery loan scheme — formally the drought crop loan and drought restocking loan, the recovery loan allows producers to borrow amounts up to $200 000 (capped at $60 000 to purchase crop materials and $100 000 for non-breeding stock purchases) at concessional rates. At the end of the 2007-08 financial year, 67 loans were in place, initially worth $4.034 million with $41 247 remaining to be repaid.

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Box E.3 **(continued)**

Household and community support measures

- Hardship provisions for rent or lease instalments on state land — reduced rent payments on state land for families experiencing hardship.
- Transport concessions — farming families in drought-affected areas that drive their children to school or connect with a school bus may be eligible for an increase in the school transport allowance.

Drought related training, research, development and extension

- 'Long Paddock' — decision-support information services to better manage climatic risks and opportunities.

Sources: DPIF (2008a, 2008 unpublished).

Western Australia

There is no specific drought policy in Western Australia and there have been relatively few state drought assistance measures (box E.4). While there is no state drought declaration process, state assistance under the 2007 Dry Season Assistance scheme was based on shire boundaries.

Box E.4 **Western Australia drought assistance measures**

Business subsidies and grants

- 2007 Dry Season Assistance Scheme — grants of up to $8000 for eligible farmers in specified shires, funds for rural counselling services, funds for councils or community organisations to undertake community activities and financial advice for small businesses. Announced in August 2007 and applications closed March 2008. In total, $4.3 million in grants was paid to 507 recipients.

Drought related training, research, development and extension

- Farm Training WA — state funded scheme to replace FarmBis. Funded for one year commencing 1 July 2008 ($1.5 million).

Source: RDBC (2008).

South Australia

While the South Australian Government has a set of objectives to help guide the development of drought assistance measures, it does not have a formal drought

policy of its own. Instead, the NDP is used as the overarching policy. Based on the three NDP objectives, the South Australian Government has five core objectives that underpin its drought assistance measures:

- Achieving self reliance by farmers in managing risks stemming from normal climatic variability by increasing the focus on drought preparedness;
- The provision of appropriate assistance to producers experiencing conditions of exceptional circumstances;
- Ensuring that the provision of this assistance is equitable, efficient and timely and is based on the best science and information;
- Facilitating the maintenance and protection of Australia's agriculture and environmental resource base during periods of increasing climatic stress; and
- Facilitating the early recovery of agricultural and rural industries, consistent with long-term sustainable levels. (South Australian Government, sub. 91, p. i)

A range of assistance measures are delivered by the South Australian Government which are detailed in box E.5.

Box E.5 **South Australian drought assistance measures**

Business subsidies and grants

- Farm debt mediation — $2000 grant for farmers in drought-affected areas for an independent mediator to negotiate with their bank.
- Planning for recovery grants — grants of up to $14 000 for those receiving ECIRS for expert support in preparing ($4000) and completing ($5000) farm plans, and to undertake immediate farm works ($5000).
- Computers for drought — subsidised provision of ex-government computers and training for ECIRS recipients.
- Drought apprenticeship retention program — payments for employers in drought-affected regions for apprentices and trainees enrolled in selected rural, horticultural trades that support agricultural production.

Waivers of rates and other government charges

- Mortgage stamp duty relief — mortgage stamp duty exemptions for producers needing to extend finance as a result of drought.
- Water transfer fee exemptions — River Murray licence holders who buy water in 2008-09 to top-up their water access to a level that does not exceed their water allocation can apply to have the $335 application fee waived.
- Ex gratia payments — payments made to offset 50 per cent of the natural resource management water levy for River Murray licence holders.

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Box E.5 **(continued)**

Waivers of rates and other government charges (continued)

- Freeholding perpetual leases — the postponement of payment deadlines for farmers in drought-affected areas who are part of the accelerated freeholding project.

Household and community support measures

- Energy and school costs concessions and remissions — concessions and remissions for energy costs and school fees for families impacted by drought.
- Community counselling — confidential emotional counselling provided to individuals in drought-affected communities.
- Mental health support — a 24 hour emergency assistance and information service directed at primary producers affected by drought.
- Community support grants — grants of up to $5000 for rural communities to stage activities that build resilience and help in coping with the drought.
- School expenses — $150 per student for drought-affected families with access to benefits through the School Card to assist with educational expenses.
- Young farmer package — a rural leadership program targeting up to 20 leaders in drought-affected regions to assist them to become mentors for their community.

Drought related training, research, development and extension

- Technical advice and information workshops — to assist farmers and irrigators to manage their farms, finances and families through the drought and to recovery.
- Labour market transition program — training for people in regional areas who derive 75 per cent of their income from primary production to obtain licences to drive forklifts, front end loaders, heavy vehicles and dump trucks.
- Research and development to reduce the impact of drought on River Murray horticulture and broadacre farms — several research and development programs ranging from improved drought tolerance of wheat and lucerne to improved water use efficiency.

Sources: South Australian Government (sub. 91); Government of South Australia (2008).

Tasmania

Tasmania does not have an explicit drought policy and state assistance provided to farmers is done of the basis of Commonwealth EC declarations. Additional state funded direct drought assistance to farmers has been relatively minor in Tasmania with small numbers of programs (box E.6). However, the Tasmanian Government does have high level Drought Task Force and has developed a 'Drought Proofing Tasmania Strategy', which is aimed at providing water security for rural

communities and allowing growth in irrigated agriculture (DPIW 2008). In March 2008, a Tasmanian Irrigation Development Board was announced to oversee development of large scale irrigation projects. Public funding of $220 million has been allocated, comprising $140 million from the Commonwealth and $80 million from the Tasmanian Government.

Box E.6 **Tasmania drought assistance measures**

Business subsidies and grants

- Assistance to support essential breeding stock — initially a grant of up to $5000 per farm for farmers in EC areas and receiving either ECIRS or EC Relief Payments for purchases of fodder or water between March and June 2008. Extended in July 2008 to a total of $10 000 per farm and available until 30 September 2008. About $2.3 million was provided to 257 applicants through the scheme.

Household and community support programs

- Support grants — a total of $350 000 available to provide one-off grants to community organisations providing drought support programs. Announced in April 2008.

Drought related training, research, development and extension

- Increase in extension services and provision of information by DPIW on issues such as drought feeding of livestock.

Sources: DPIW (sub. 85, trans., p. 24–42).

Australian Capital Territory

Despite reporting that the ACT is reviewing its policy on drought declarations and assistance (sub. 101), no public enunciation of the existing policy is available. However, the ACT has two assistance measures (box E.7).

Box E.7 **ACT drought assistance measures**

Waivers of rates and other government charges

- There has been a waiver of land rates and stock levies while the ACT has been drought declared.

Drought-related training, research, development and extension

- Two workshops directed at rural lessees affected by drought were conducted in 2007-08, covering sustainable grazing practices and post-drought recovery strategies.

Sources: ACT Government (sub. 101); TAMS (2008).

Northern Territory

The Northern Territory's drought policy has three objectives reflecting those of the NDP. The broad objectives are to:

- encourage primary producers and those associated with the rural industries to adopt self-reliant approaches in managing risk, especially climatic variability
- facilitate the maintenance and protection of the agricultural and environmental resource base of the Northern Territory during periods of increasing climatic stress
- facilitate the early recovery of rural industries consistent with long-term sustainable levels. (DPIFM 2008, p. 1)

Along with transport subsidies, the Northern Territory Government has concessional loan and grants available to producers with properties declared as being in severe drought (box E.8). There has been no uptake of these measures in the past three years.

Box E.8 **Northern Territory drought assistance measures**

Transport and other transaction subsidies

- Transport subsidy — paid to farmers with drought-declared properties to help with the cost of transporting breeding stock to and from agistment.

Business subsidies and grants

- Drought grants — grants up to the value of the concessional benefit of a loan are available to help producers with additional costs imposed by droughts but, unlike loans, allow producers to make their own financial arrangements in sourcing finance.

Concessional business loans

- Drought loans — loans of up to $60 000 per producer per year are available to those with properties declared as being in severe drought (loan term of five years).

Source: DPIFM (2008).

E.2 State and Territory drought declarations

Three state and territory governments have also retained their own formal drought declarations that trigger support — New South Wales, Queensland and the Northern Territory. In all three, a declaration allows producers to access transport subsidies. Both Queensland and the Northern Territory have a producer or local community initiated declaration process, but for New South Wales, assessments are made by Rural Lands Protection Boards. In all cases, there is potential for differences to exist between what would be characterised as an EC drought and what a state or territory

government would declare as a drought that warrants (its) government assistance. Tasmania, South Australia, the ACT, Western Australia and Victoria do not have separate drought declarations.

In Queensland, areas, shires or individual farms experiencing a severe climatic event (one that is likely to occur no more than once every 10 to 15 years) can be drought declared and access assistance measures. For areas and shires, an assessment is made by the Local Drought Committee, which then recommends to the Minister for Primary Industries and Fisheries whether an area should be drought declared. The Minister makes a declaration based on this recommendation. For individual farms, owners outside declared areas who believe their property is affected by drought must apply to the Queensland Department of Primary Industries and Fisheries to have their properties declared as an 'Individually Droughted Property' (IDP). The criteria used to assess conditions for the area and individual applications are the same, but applied more broadly to assess areas (box E.9).

Box E.9 **Criteria for Queensland drought declarations**

The criteria for drought declarations in Queensland vary by enterprise type. All enterprises (and areas) must, however, meet the rainfall criteria — low rainfall must represent a one in 10 to 15 year event. For IDP applications, individuals must demonstrate that they have responded to drought conditions and been self-reliant to some degree.

For livestock dominated enterprises, the following are considered in assessing an application or area:

- the amount and distribution of rainfall over the previous 12 months, and its effectiveness during the previous two summer pasture growth seasons
- availability of pasture and water relative to neighbouring holdings
- the fat score of breeders and non-breeder animals (not applicable to dairy cattle)
- whether or not the drought-like conditions have been caused by overstocking (an IDP declaration will not be made if there has been overstocking)
- the degree of drought-induced forced sale and agistment movement (stock numbers should generally be reduced in line with the deteriorating seasonal conditions)
- the amount of drought feeding undertaken — hand-feeding without which the stock would perish.

For cropping, horticultural or sugar enterprises, the rainfall criteria applies and an assessment is made of the soil moisture level of the property, crop yields (expected reductions) and the availability of irrigation water. Additional criteria are applied to sugar enterprises regarding planting decisions, rainfall timing and whether the crop is required to be ploughed out.

Source: DPIF (2008b).

Once applications are received they are processed within ten working days. For individuals, they are notified as to the outcome of their application after this period, with the declaration remaining in place for 12 months unless revoked or replaced by an area declaration. In contrast, area declarations are open-ended, and continue until the area is revoked by the Minster. Revocations occur following widespread rainfall and under the recommendation by the Local Drought Committee that the area has come out of drought.

Declarations of severe drought in the Northern Territory, which trigger the availability of assistance, are made on an individual property basis. While the objectives of the NDP are reiterated in the Northern Territory's drought policy, the definition of a severe drought differs to EC definition used by the Commonwealth. A severe drought is defined as a property declared to be in drought in at least two out of three consecutive years (box E.10). As with Queensland, a severe drought is one that is expected to occur no more than once every 10 to 15 years. Declarations last for one year and run from 1 January to 31 December.

Box E.10 **Drought declarations in the Northern Territory**

Farmers with pastoral properties who believe their property is experiencing drought must apply annually to the Northern Territory Department of Primary Industries, Fisheries and Mines (DPIFM) to gain a declaration. Applications must be made between 1 April and 30 April in the year the declaration is sought. Applications must include:

- proposed turnoff numbers in the year of application
- details of turnoff for the previous seven years
- summary of drought management arrangements proposed for the property, including the recovery period
- type and level of assistance sought
- proposed use of funds sought.

In assessing applications, DPIFM will assess the severity of the drought and the extent to which producers have managed their stock numbers to take account of seasonal conditions. DPIFM take into account whether property owners have access to other properties (either by ownership or commercial arrangement) and assess the conditions in all properties when making a drought declaration. Severe drought conditions for an individual property are declared by DPIFM when a property has been drought declared for at least two of the past three consecutive years.

Source: DPIFM (2008).

E.3 Evaluation of drought assistance measures

Available information on assistance measures varies greatly. Given data limitations, many measures can only be evaluated in terms of their appropriateness in line with the rationales for government intervention discussed in chapter 5. Where possible, the effectiveness of other measures is also examined by using available data and by drawing upon existing reviews. It should be noted that many of the measures used by state and territory governments operate over relatively short timeframes (minimising the potential for perverse incentives), involve relatively small amounts of money or are accessed by a relatively small proportion of the community.

Transport and other transaction subsidies

Several state and territory governments initially introduced transport subsidies for stock, fodder and water in order to maintain flocks and herds and to promote animal welfare outcomes. For example, the Queensland government's Drought Relief Assistance Scheme (DRAS) with transport subsidies intended to:

> … maintain as far as possible the livestock resource of a property during drought, and assist in the return and restoration of that resource after drought. (Queensland Government, sub. 77, p. 14)

Similarly, New South Wales' transport subsidy scheme (transportation of stock, fodder and water) is intended to:

> … assist farmers to ensure their livestock have access to adequate feed and water and thereby alleviate immediate animal welfare concerns and pasture and environmental degradation. (NSW Government, sub. 90, p. 6)

The Northern Territory also runs a transport subsidy schemes with similar objectives, although the scheme also aims to help reduce grazing pressure on drought-affected properties through encouraging agistment. In Tasmania, a recently introduced but now closed subsidy scheme for farm inputs (such as water, fodder along with agistment costs) was available to maintain essential breeding stock. Details of the schemes are provided in box E.11.

Transport and other input subsidies have been used widely by producers in New South Wales and Queensland, but significantly less so by producers in the Northern Territory. In New South Wales for example, the subsidies are viewed by the NSW Government as:

> … popular with farmers, in part due to their low administration costs, general accessibility to a wide range of farm businesses, and the timeliness of their provision. (sub. 90, p. 6)

Box E.11 **Transport subsidy schemes**

Queensland's DRAS provides freight subsidies on fodder and water during drought events, and freight subsidies for restocking and returning from agistment at the end of a drought for two years from the date a state drought declaration is revoked. In any financial year, the maximum amount claimable is $20 000, but this may be extended to $40 000 with approval.

The NSW Government provides a 50 per cent rebate on transportation costs for the movements of water for domestic use, water and fodder for stock, stock to and from agistment and stock to sale or slaughter. To be eligible, claimants must own the stock and operate an agricultural holding or farm business entity. Payments are capped at $20 000 in any one calendar year for water and fodder for stock, stock to and from agistment and stock to sale or slaughter movements and at $5000 a year for domestic water movements. Operators of intensive livestock enterprises, such as piggeries, are not eligible for the subsidy.

In the Northern Territory, a freight subsidy of up to 100 per cent of actual costs of transporting breeding stock up to a distance of 1500 kilometres is available. Payments are capped at $20 000 per year and available to farmers in Territory drought declared areas.

Sources: Tasmanian Department Primary Industries and Water (sub. 85); DPI (New South Wales) (2008); DPIF (2008b); DPIFM (2008).

As a result, an estimated 1 in 6 farmers in New South Wales have accessed the scheme over the period 2002 to 2008 (sub. 90). In total, the three remaining jurisdictions with transport subsidies provided over $186 million in assistance (table E.1).

Table E.1 **Transport subsidies, 2002-03 to 2007-08**

	New South Wales		*Queensland*		*Northern Territory*	
	Claims	*Amount*	*Claims*	*Amount*	*Claims*	*Amount*
	no.	$'000	no.	$'000	no.	$'000
2002-03	23 701	26 012	5 409	7 676		
2003-04	20 046	20 803	5 380	12 395		
2004-05	17 617	18 773	2 186	5 594		
2005-06	14 785	14 794	2 972	6 176		
2006-07	30 432	30 615	6 250	13 484	9	172
2007-08	18 702	19 336	4 796	10 476	4	64
Total	125 283	130 333	26 993	55 801	13	236

Sources: Unpublished data obtained from NSW Department of Primary Industries; Queensland Department of Primary Industries & Fisheries and Northern Territory Department of Primary Industry, Fisheries and Mines.

In Queensland in 2006-07, over 87 per cent of freight subsidies were directed to the haulage of fodder, with around 9 per cent paid to farmers sending stock for agistment. A similar pattern was observed in New South Wales, with the majority spent on the transport of fodder (71 per cent) and agistment (11 per cent). New South Wales also pays subsidies on stock transported for sale, which accounted for 11 per cent of total expenditure. The Northern Territory only provides subsidies for transport to agistment.

Are transaction-based subsidies appropriate?

There is little or no valid rationale for the provision of transport subsidies. In some instances, attempts to justify such subsidies have been based on animal welfare grounds or as attempts to limit environmental degradation by making it cheaper to move stock from drought-declared areas. However, such justifications cannot be supported for the following reasons.

- Animal welfare outcomes are likely to be more effectively achieved through improved responsiveness to environmental conditions (such as early destocking). Further, from a policy perspective, the prevention of animal cruelty is likely to be more effectively achieved by direct policy targeting, such as through the use of regulations.
- By their nature drought declarations must be ex post and this can create incentives to hold stock to access transport subsidies. Accordingly, such payments are more likely to make environmental outcomes worse.

In terms of the rationales associated with improving self-reliance — reducing information barriers, supporting drought-related research and development, and correcting for market imperfections — transport subsidies are an inappropriate policy response.

Effectiveness of state-based transport subsidies

Little information is collected on the outcomes achieved by transport subsidies. Some participants to this inquiry were of the view that such payments were useful in providing farmers with greater flexibility in managing their business in times of drought. For example, as argued by the NSW Farmers' Association:

> The transport subsidy has been very beneficial to farmers providing valuable assistance to mitigate effects of drought on livestock … it is felt that the subsidy is assisting farmers to make decisions and supporting the welfare objectives of the subsidy. (sub. 98, p. 20)

Despite this, the effectiveness of these provisions has been questioned by previous reviews of drought policy (chapter 4) and also by those governments that provide this assistance. As suggested by the Queensland Government, transaction-based subsidies have the potential to alter behaviour in unintended ways by:

- encouraging producers to maintain higher stocking levels during drought (potentially leading to environmental degradation)
- encouraging the maintenance of stock through agistment whereas it may have been better to dispose of stock
- encouraging the purchase of fodder and other inputs during drought rather than building fodder storages
- increasing the demand for fodder during droughts which has a detrimental effect on other industries and producers in other states that do not receive the subsidies (sub. 77).

In addition, the NSW Government suggested that along with distorting incentives for current production decisions, such payments could have a longer term impact on sustainable production through creating permanent changes to production decisions (sub. 90). These comments were also echoed by the South Australian Government (sub. 91). Further, whether such payments provide material gains to those farmers who take advantage of them is also questionable. However, as the NSW Government notes, some of this gain is likely to be capitalised into the cost of transport services and fodder (sub. 90).

In terms of the NDP objectives, it is unlikely that the provision of these subsidies encourages producers to become more self-reliant. Payments encourage producers to be less reactive to changes in climatic conditions and thus they are likely to have greater exposure to climate risks.

Transport subsidies can also work against the objective of maintaining and protecting the environmental resource base during drought events. As noted by some, it enables producers to maintain their livestock even though their farm and region is in drought which in turn increases potential for environmental degradation through effects such as increased soil erosion.

Business subsidies and grants

Business subsidies or grants are used by most jurisdictions. They are typically aimed at specific infrastructure projects, such as water storage, or at costs that are exacerbated by drought, such as the costs of feed and water cartage.

There is typically no valid rationale for the provision of this type of business assistance. This is because the benefits of the grant are largely private in nature and there are few impediments to farmers accessing credit for worthwhile investments, given the generally high levels of equity held by farmers. That said, in some circumstances there may be positive externalities from on-farm activities. In these cases a grant or subsidy may be an appropriate form of assistance if the assistance is well targeted and linked to specific public benefits, such as achieving environmental benefits (see below).

However, most of the business grants and subsidies provided by state governments are not targeted at addressing market failures. The benefits of grants for livestock feed, such as that undertaken in Tasmania, or for farm costs more generally, such as the that provided in Western Australia, are entirely private and there is therefore no rationale for their provision.

Further, most subsidies or grants offered by state governments are short-term contingency measures in response to the effects of drought. In this context, they are generally ineffective in improving self-reliance, and are therefore inconsistent with the first objective of the NDP.

Waivers of rates and other government charges

Waiving government charges is a relatively easily administered form of business assistance and hence, this form of assistance is used by a number of jurisdictions. They are typically aimed at waiving charges in relation to goods or services that are drought affected, such as rates or rentals on state-owned drought-affected land, or water charges where allocations are reduced.

Waving government charges is similar in effect to providing subsidies for other business expenses. Government charges are known business costs that are relatively stable. Many of these costs relate to the provision of service where there are fixed annual costs. For instance, in the case of water delivery, there are fixed costs for water delivery infrastructure that are incurred by government regardless of how much water is supplied in any year. As waivers do not address any market failure, there is no rationale for waivers of government charges as a form of assistance.

Government levies should be set to cover the average costs of service provision over the long run. While it is inappropriate to waive these in response to drought or other hardship, there may be scope to vary the way in which government charges are levied over time, provided that overall, fees meet the average cost of service provision over the long run. For instance, deferral of fees would be more a more appropriate assistance measure than a waiver.

Further, waivers are a relatively blunt form of assistance, which can reduce their effectiveness. One example is the Victorian water rebate scheme, which while an easily administered scheme, was poorly targeted, as rebates were made to recipients regardless of need. Further, such assistance measures do not align with the Victorian Government's drought assistance principles (SACES 2008b).

As with other business subsidies, fee and levy waivers do not improve self-reliance and are inconsistent with the principles of the NDP.

Environmental measures

Only Victoria has drought measures targeted at achieving environmental outcomes, with even these simultaneously aimed at other objectives. The Drought Employment Program is also targeted at providing employment opportunities for 'drought-affected rural Victorians' with stock containment also aimed at improving farm productivity. From a first principles viewpoint, such initiatives can have some merit.

Measures that seek to achieve environmental outcomes can lead to net community benefits if they are targeted towards correcting environmental externalities. If this is the case, it is possible that the benefits from intervention will exceed the costs of doing so. But depending on the environmental outcomes sought, it is questionable whether identified externalities only occur during droughts or whether to ameliorate the affects of the externality would require longer term sustained funding.

Assessments of the two Victorian schemes show mixed results. Grants provided to producers to build stock containment facilities in order to maximise vegetative cover and reduce soil erosion have reported significant environmental benefits (SACES 2008b). These grants were provided alongside technical advice from soil specialists. The drought employment program, on the other hand, was believed to be less successful. While it aimed at restoring and enhancing natural assets of community significance on private land, it was found that projects were selected to reflect employment priorities and were not necessarily those of environmental significance. Part of the reason this was believed to occur was related to funds initially been allocated to farmers to undertake works on their own properties. In the second round this was prohibited.

Concessional business loans

Concessional loans provided to farm businesses by state and territory governments have been targeted towards providing carry-on finance or to allow farmers to undertake productivity enhancing capital works. However, as with interest rate subsidies, concessional loans provided to maintain viable farm businesses during drought can only be justified if there is some failure in capital markets that restrict these businesses from borrowing. Given the availability of rural credit for viable farm businesses (Australian Bankers' Association, sub. 76) and high average equity levels, it is likely that such support measures cannot be justified on market failure grounds.

Despite this, concessional loans are more likely to achieve the goal of self-reliance than would other subsidies and grants, as producers are less likely to take on more risk than they otherwise would. Indeed, in the case of Queensland, concessional loans paid to farmers have mostly been paid back in full, with none of those holding outstanding amounts assessed as being at risk of default. In this sense, support for concessional loans can be viewed from a 'second best' perspective.

Household and community support measures

All state governments, with the exception of Western Australia, provide some form of drought-related household or community support. These measures are the most numerous among all the drought support measures provided and aim to achieve two broad objectives, to:

- ease the hardship faced by farming and rural households as a result of droughts
- promote rural community resilience and growth during droughts.

Household support

The underlying rationale for household support is to ensure that all households achieve some basic acceptable standard of living. This includes providing them with the capacity to access government services to a similar level to others also in receipt of support.

While welfare payments are predominately the domain of the Commonwealth government, state governments provide support through concessions for state government provided services (such as education, school related transport and energy). These concessions are provided directly to households and are targeted at maintaining farm family access to merit goods and those viewed as essential services. Concessions made to farming households during drought appear, in the

broad, to be well targeted to the household (relate to household and not business costs) and are not paid as cash grants. However, one notable exception to this is the NSW Government's DoCS Drought Relief Payment which consists of a one-off grant of up to $2000.

Community support

Rationales for rural community support relate to the building of social capital (or the capacity/infrastructure of local communities to do this), maintaining/expanding populations within rural communities and overcoming information failures surrounding government support programs.

In terms of social capital, governments have provided support in order for communities to develop or strengthen the informal links that exist with communities. To achieve these outcomes, governments have provided support to maintain local sporting clubs and facilities as well as to establish local groups. To date, little evaluation of these support measures has been done so their effectiveness is unknown.

In order to maintain or expand rural communities, some state governments have provided incentives for individual businesses to relocate into certain areas. However, these measures are rare and, most commonly, community support has been targeted at promoting information about support services for those within communities facing hardship. These range from mental health awareness programs to establishing organisations to coordinate and disseminate information.

Given the small scale of many of community support measures, and the lack of formal evaluation, it is difficult to assess the effectiveness of these measures. Measures to improve sporting facilities in Victoria, for example, are believed to have preformed well (SACES 2008b), but little information exists in terms of measures delivered by other states.

It is also difficult to assess the appropriateness of these measures. For example, in the communities that received support, did impediments exist to them building social capital? Does the broader community value maintaining/expanding populations in rural centre as an outcome in itself? The former relates to the under provision of what could be termed a local public good due to drought conditions, with the latter a societal preference — both of which are difficult to assess. Despite this, in relation to social capital, if failures are taken as given, then the provision of support (as broadly done by most state governments) appears to be appropriate as it is targeted towards these goods. Instead, where attempts are made to maintain or

expand rural towns, it is likely that the ad hoc nature of drought-related measures is inappropriate as the pressures for rural decline extend beyond drought events.

Drought-related training, research, development and extension

Drought-related extension and training measures are a common form of assistance by state governments. The extent of drought-specific research by states is less clear.

The rationale for government intervention through research and development and extension services was discussed in detail in chapter 8. As noted in that chapter, the case for government funding of research is likely to be greatest in the case of basic research or where there are clear spillover benefits. Similarly, because there is scope for government provided extension services to crowd out private service providers, government provision of extension services should be directed mainly to areas where private provision of services is unlikely to develop. It is also important to note that the provision of research, development and extension should be continuous, rather than reactive in response to drought.

Summing up

- While not all states and territories have stated drought policies, they all, to differing extents, provide drought assistance measures of various forms.
- Many of the measures delivered by state and territory governments involve small amounts of funding, have limited coverage and operate over relatively short timeframes.
- State-based transport subsidies are an inappropriate response to the rationales underpinning the NDP. Further they are likely to work against the rationales for intervention, placing producers in a less self-reliant position and potentially creating adverse environmental outcomes.
- Business subsidies are generally aimed at drought specific infrastructure or costs. By their nature, they are ex-post short-term contingency measures that are ineffective in improving long-term self-reliance.
- Waiving government charges has a similar effect to providing other forms of business subsidies. They are typically poorly targeted forms of assistance that do not consider the need for assistance or involve any form of mutual responsibility.
- Measures to achieve environmental outcomes can have net community benefits if they address environmental externalities. However, they need to be well targeted. Further, many externalities are likely to exist irrespective of drought.

- Concessional business loans are an alternative form of subsidy, but because of their longer-term nature and because producers still bear some risk they are more likely to encourage self-reliance than straight forward grants.
- Household and community support measures are generally well separated from business assistance. However, some are targeted towards hardships that are not created by droughts and thus should be provided outside of drought policies.

Training and extension assistance is an appropriate form of assistance for states to provide where market failures exist and provision by private service providers is not feasible.

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