



Review of Part 3 of the Future Drought Fund Act

Interim report

This is an interim report prepared for further public consultation and input. The Commission will finalise its report after these processes have taken place.

The Productivity Commission acknowledges the Traditional Owners of Country throughout Australia and their continuing connection to land, waters and community. We pay our respects to their Cultures, Country and Elders past and present.

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.

Further information on the Productivity Commission can be obtained from the Commission's website (www.pc.gov.au).

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Opportunity for comment

The Commission thanks all participants for their contribution to the review and now seeks additional input for the final report.

You are invited to examine this interim report and comment on it by written submission to the Productivity Commission, preferably in electronic format, by 11 July.

Further information on how to provide a submission is included on the inquiry website:

www.pc.gov.au/inquiries/current/future-drought-fund

The Commission will hold further discussions with participants and prepare a final report after further submissions have been received. The Commission will forward the final report to Government in September 2023.

Commissioners

For the purposes of this inquiry and interim report, in accordance with section 40 of the *Productivity Commission Act 1998* the powers of the Productivity Commission have been exercised by:

Joanne Chong Commissioner

Malcolm Roberts Commissioner

Terms of reference

I, Jim Chalmers, pursuant to Parts 2 and 3 of the Productivity Commission Act 1998, and section 32A of the Future Drought Fund Act 2019 (the Act), hereby request that the Productivity Commission (the Commission) undertake an inquiry into the effectiveness of Part 3 of the Act.

Background

The Future Drought Fund, established by the *Future Drought Fund Act 2019* (the Act) provides secure, continuous funding for programs, grants and arrangements that support Australian farmers and associated communities to prepare for, and become more resilient to, the impacts of future droughts. Building drought resilience is a complex and long-term endeavour. It requires tailored and practical support reflecting the unique circumstances and diverse needs and aspirations of different farmers, their communities and agricultural industries.

Under the Act, \$100 million is made available each year for drought resilience programs, arrangements and grants. The design and delivery of such programs, arrangements and grants is guided by a Drought Resilience Funding Plan and governed by Part 3 of the Act.

On 12 February 2020, the then Minister for Agriculture, Drought and Emergency Management made the *Future Drought Fund (Drought Resilience Funding Plan 2020 to 2024) Determination 2020* (the Funding Plan). This Funding Plan sets out a 4-year framework to guide the design and delivery of programs, grants and arrangements under the Act.

A first tranche of programs was announced on 1 July 2020, at the same time the first \$100 million became available. This has been built on with successive programs, announced in the context of federal budget processes. Programs are in varying stages of delivery.

As a new and enduring initiative, a range of foundational systems and processes have been established to support administration of Part 3 of the Act.

Under section 32A of the Act, the Commission must periodically undertake an inquiry into the effectiveness of Part 3 of the Act, including the Funding Plan that is in place. A referral for the first inquiry must be made by 12 February 2023. Under the Act, this inquiry process is followed by a requirement to establish a new Funding Plan by 12 February 2024.

Scope of the inquiry/research study

In accordance with section 32A of the *Future Drought Fund Act 2019* (the Act), the Inquiry must undertake an assessment of the effectiveness of Part 3 of the Act, including:

- the *Future Drought Fund (Drought Resilience Funding Plan 2020 to 2024) Determination 2020*
- programs, arrangements and grants made under Part 3 of the Act
- processes and systems to administer, govern and evaluate programs, arrangements and grants made under Part 3 of the Act.

As also required by section 32A, the Commission should have regard to economic, social and environmental outcomes in assessing these matters.

In undertaking the Inquiry, the Commission should also:

- Consider the effectiveness and appropriateness of the Funding Plan in guiding progress towards the objective of drought resilience.
- Consider the effectiveness, efficiency and appropriateness of the programs, arrangements and grants in delivering against the Funding Plan and objective of drought resilience.
- Consider the effectiveness, efficiency and appropriateness of Part 3 of the Act, including its administration through the systems and processes established to develop, deliver, govern, monitor and evaluate programs, arrangements and grants.
- Provide specific and practical advice to inform the development of a new Funding Plan; the development, delivery, monitoring and evaluation of future programs, arrangements and grants; and the processes and systems to administer the Fund.

In addition to these general evaluation questions, the Commission is asked to also consider:

- Opportunities to enhance proactive collaboration in planning and delivering drought resilience initiatives, including with state and territory governments.
- Opportunities to enhance engagement with, and benefits for, First Nations peoples.
- The merits of longer planning and program timeframes in building resilience.
- The merits of broadening the scope of the Fund to support resilience to climate change for the agriculture sector and communities dependent on agriculture.

Process

The Commission is to undertake a public consultation process as part of the Inquiry.

The Commission may elect to engage directly with stakeholders, including representatives from the farming sector. It is also specifically requested that the Commission consults with Future Drought Fund Consultative Committee and, the Australian, state and territory governments.

The final report must be provided within 8 months of the receipt of these terms of reference.

The Hon Jim Chalmers MP

Treasurer

[Received 10 January 2023]

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Executive summary

Key points

- * **The Future Drought Fund (FDF) continues the policy shift, from in-drought assistance to building resilience to drought before drought occurs. The FDF can play an important role in protecting Australian agriculture and regional communities from the effects of a changing climate.**
- * **While it is too early to assess the FDF's impact on drought resilience, significant change is unlikely given the Fund's initial focus on short-term programs. However, early lessons are being learnt.**
- * **The FDF would be improved by:**
 - better articulating what the Fund is intended to achieve, how and when it will be achieved, and the roles of key participants
 - prioritising the FDF's objectives
 - having a greater focus on supporting natural resource management through investments that achieve environmental and economic objectives
 - providing a detailed investment plan that sets investment priorities for the Fund, to facilitate better planning, sequencing and coordination of FDF programs
 - investing more in longer-term programs that support transformational change
 - establishing systems for sharing information about Fund programs and their outcomes.
- * **Drought is just one of the risks from climate change that farmers and agricultural communities face. The FDF should more explicitly recognise the need for resilience to climate change, not just resilience to drought.**
- * **The FDF should have fewer, better integrated programs. Key program considerations include:**
 - the *Drought Resilience Adoption and Innovation Hubs* need defined goals and time to demonstrate their value. There should be a review during the next Drought Resilience Funding Plan to decide whether funding should continue
 - improvements are needed to boost uptake of the climate information tools. The Commission is considering whether funding should continue for both climate tools, or if they should be integrated
 - there may be scope for the *Farm Business Resilience* program to deliver more public benefits, particularly by promoting measurable improvements in natural resource management
 - many institutions undertake agricultural innovation. It is unclear how the FDF should complement this. If there is a role for the FDF, *Drought Resilience Innovation Grants* could be targeted to identified challenges.
 - the value of some Regional Drought Resilience Plans is doubtful. Changes are needed to ensure that plans are effective and implemented
 - more work is required to identify if and how the FDF should best contribute to building social resilience through its community grant programs.
- * **The governance arrangements for the FDF are appropriate. However, processes can be simplified, while strengthening oversight of delivery outcomes.**
- * **There has been little engagement with Aboriginal and Torres Strait Islander people to date. Changes across Fund objectives, design, development, delivery, partnerships and decision making would be required to improve outcomes for Aboriginal and Torres Strait Islander people, and the wider agricultural sector.**

Background

Announced in 2018, the Future Drought Fund (FDF) provides \$100 million each year from 2020 to ‘enhance the public good by building drought resilience’ in the agricultural sector, the agricultural landscape and communities.

The Productivity Commission is tasked with assessing the effectiveness of Part 3 of the *Future Drought Fund Act 2019* (the Act). This interim report shares our initial findings and recommendations for participant comment. The final report will provide advice to the Australian Government on the development of a new Drought Resilience Funding Plan, future programs, arrangements and grants, and the administration of the Fund. The Commission is seeking additional input for the final report due in September 2023. You are invited to respond to this interim report by making a written submission or brief comment by 11 July 2023.

Introduction

The FDF continues the policy shift in national drought policy away from in-drought support to promoting preparedness and resilience. The FDF will play an important role in protecting Australian agriculture and regional communities from the effects of a changing climate.

While it is too early to fully evaluate the success of the FDF and its programs, our interim findings highlight that the initial programs were not well coordinated, were rolled out too quickly and were too focused on short-term objectives. It is unlikely that this mix of short-term programs will produce significant long-term change.

To meet its objectives, the FDF needs a clear, detailed strategy that sets out long-term investment priorities and ensures programs reinforce each other. This strategy should reflect the fact that more frequent and severe droughts are just one of the challenges caused by a changing climate. It is also vital that the FDF does more to engage and build partnerships with Aboriginal and Torres Strait Islander people, who should be given the opportunity to define their own goals for participation with the Fund and the outcomes.

A more strategic FDF, based on fewer, better coordinated programs is more likely to achieve the objectives of the Fund.

Drought resilience and the Future Drought Fund

Achieving drought resilience

The concept of drought resilience is broad, complex and means different things to different people. The FDF *Drought Resilience Funding Plan 2020 to 2024* (Funding Plan) defines drought resilience as:

... the ability to adapt, reorganise or transform in response to changing temperature, increasing variability and scarcity of rainfall and changed seasonality of rainfall, for improved economic, environmental and social wellbeing.

Definitions of resilience vary but they generally emphasise the ability to *absorb* adverse shocks or to *adapt* and *transform* in response to adverse events and risks.¹

¹ International bodies, countries, and even agencies within countries often define resilience differently depending on their organisational objectives and contexts. However, they commonly emphasise that resilience is the capacity or ability of an individual, community or system to prepare and plan for, absorb, recover from, and more successfully adapt and transform in response to adverse events.

The Funding Plan adopts a 'triple bottom line' approach of improving the economic, environmental and social dimensions of resilience – all three in combination are intended to deliver a holistic approach to building drought resilience (box below).

Elements of the Drought Resilience Funding Plan 2020 to 2024

Vision

The Fund's vision is an innovative and profitable farming sector, a sustainable natural environment and adaptable rural, regional and remote communities – all with increased resilience to the impacts of drought and climate change.

Aim

The Fund aims to enhance the public good by building drought resilience in Australia's agricultural sector, the agricultural landscape, and communities.

Strategic priorities

The Fund has three inter-connected strategic priorities:

- economic resilience for an innovative and profitable agricultural sector
- environmental resilience for sustainable and improved functioning of farming landscapes
- social resilience for resourceful and adaptable communities.

Objectives

The Fund's three objectives to achieve the strategic priorities will enhance the public good by building drought resilience through programs that will:

- grow the self-reliance and performance (productivity and profitability) of the agricultural sector
- improve the natural capital of agricultural landscapes for better environmental outcomes
- strengthen the wellbeing and social capital of rural, regional and remote communities.

Across these three priorities, the FDF funds activities that support research, development, extension, adoption and commercialisation, capacity building and planning. Since the Fund's establishment, 19 programs have been rolled out supporting these objectives and activities. The table below outlines the full list of programs funded over the course of the first Funding Plan. Some programs have been completed and others are commencing. These programs are categorised under four main themes: Better Climate Information; Better Planning; Better Practices; and Better Prepared Communities.

FDF programs and funding allocation, as of 30 June 2022

Theme	Program	Total Allocated (\$m)
Better Climate Information	Climate Services for Agriculture – a tool that makes localised climate information accessible and useful for understanding climate risk and building resilience.	29.0
	Drought Resilience Self-Assessment Tool – a tool that provides farm-scale analysis by enabling farmers to self-assess resilience in personal, financial, and environmental domains.	9.9
Better Planning	Farm Business Resilience – provides subsidised learning to support farmers by improving their strategic decision-making skills.	76.0
	Regional Drought Resilience Planning – develops drought resilience plans across Australian agricultural regions.	40.9
Better Practices	Drought Resilience Adoption and Innovation Hubs – bring together regional stakeholders to develop local solutions to drought issues.	66.0
	Hub Projects – funding to carry out cross-Hub collaboration projects.	4.1
	Adoption Officers – included in Hubs, officers work with farmers to support adoption activities.	9.0
	National Enabling Activities – a range of activities to support knowledge transfer, collaboration and impact assessments.	8.0
	Drought Resilience Innovation Grants – grants for innovation projects at different stages of development, including early-stage proposals, feasibility testing for new products, processes and services and large-scale innovation projects.	34.0
	Natural Resource Management Drought Resilience Program – Grants^a – grants for building the capacity and resilience of soils and agricultural landscapes through innovative NRM practices, systems and approaches.	7.8
	Natural Resource Management Drought Resilience Program – Landscapes^a – grants for NRM bodies to put in place practices or systems that improve natural resource management.	5.6
	Drought Resilience Soils and Landscapes^b – grants to trial and demonstrate scaling-up of natural capital management practices.	23.1
	Adoption of Drought Resilient Practices – grants for adoption activities of proven and existing resilience practices that have potential to be adopted at a large scale.	14.3
	Drought Resilience Long-Term Trials – long-term grants to investigate innovative and transformational cropping, grazing and mixed farming practices.	20.0
	Drought Resilience Commercialisation Initiative – a pilot program that supports the commercialisation of drought resilient practices and technologies.	10.0
Better Prepared Communities	Drought Resilience Scholarships – scholarships for farmers to increase knowledge of tools and practices in the context of climate change.	1.6
	Drought Resilience Leaders^a – provides leadership development, community extension grants and mentoring opportunities for agricultural communities.	7.4
	Networks to Build Drought Resilience^a – funding to support connectedness and collaboration in agricultural communities by providing small-scale grants for activities such as professional, social and community events, training for network members, and investment in infrastructure.	3.8
	Helping Regional Communities Prepare for Drought Initiative^c – grant program: to support community organisations to strengthen community networks, capabilities and facilities; to improve their leadership skills; and to support individuals and organisations to be connected and support each other to build drought resilience. Extension of Drought Resilience Leaders and Networks to Build Drought Resilience programs.	29.6
Total		400.0

a. Funding ended by 30 June 2022. b. Commenced after the two Natural Resource Management grant programs.

c. Commenced after the Drought Resilience Leaders program and Networks to Build Drought Resilience program.

The Funding Plan also recognises that building drought resilience may require farmers and communities to make incremental, transitional and transformational changes.

- **Incremental change:** the ability to preserve or restore a system (including its basic structures and functions) by preventing, preparing for or mitigating the impacts of an event or risk. The key objective is to maintain the system in its current state. For agricultural systems, incremental change could mean taking actions that maintain the current methods of production by farm businesses in a region, such as diversifying income with off-farm employment or using farm management deposits to make tax deductible deposits during good periods and withdraw them during bad periods.
- **Transitional change:** the ability to maintain the essential functions and structures of a system by modifying or changing some of its characteristics in response to future adverse events or risks. Unlike incremental change, transitional change alters aspects of a system to maintain its core functions. For agricultural systems, transitional change could mean changing aspects of a production system (such as seed varieties or agronomic practices) to continue the production of certain commodities in a region.
- **Transformational change:** the ability to undertake wholesale change of a system when adverse events or risks make the current system untenable. Transformational change does not seek to maintain current systems in any way but rather looks to establish new systems more appropriate to the changed risk landscape. For agricultural systems, transformation could involve farms in a region shifting out of certain production systems such as particular grains or oilseeds, or adopting new production systems such as grazing or carbon farming.

Why is a Future Drought Fund needed to build drought resilience?

Farmers may underinvest in drought resilience

The Fund aims to 'enhance the public good by building drought resilience in Australia's agricultural sector, the agricultural landscape and communities'. There is a role for government to support farmers and communities build drought resilience where it addresses genuine risks of underinvestment and makes the community better off. The strongest case for taxpayer support for drought resilience arises when it provides additional public benefits such as economic and social stability or environmental protection.

Farmers and communities may underinvest in building drought resilience because they do not have the resources or information needed, or if the benefits are widely dispersed and are unable to be captured by the individual or community to justify the cost of investment. For example, there may be barriers preventing farmers accessing accurate and timely weather and climate data or obtaining knowledge of best practices. Or farmers may have poor incentives to undertake more sustainable farming practices despite wider spillover benefits.

There may also be a case for governments to support some programs that primarily benefit private parties, for example agricultural extension schemes. However, the hurdle for justifying support primarily benefitting private parties is high given the risk that funds are invested in activities that producers would have undertaken anyway. Importantly, programs should only be funded where the overall benefits to the community outweigh the costs.

Another potential benefit is a reduced need for in-drought support from governments in the future. While better preparedness and drought resilience should reduce the need for in-drought support, these assumed future savings cannot be guaranteed. On this basis, the expectation of future savings may be a weaker economic justification for public investment in drought resilience, compared to instances when investment addresses genuine risks of underinvestment and generates spillover benefits to the community that otherwise would not have occurred.

Finally, the extent of change needed (incremental, transitional or transformational) to build resilience is also an important consideration for determining the degree of government support. While there may be a role for government support in all three forms of change, the case is likely to be greater for transformational change. This is because the barriers that farmers and communities face to undergo transformational change are significantly larger and more complex than incremental change. The size and complexity of the task to transform practices could mean individuals and communities may be unable to act without support, even if there are overall benefits for doing so.

The need for drought resilience is even greater given climate change

Farmers and agricultural communities have always faced challenges with climate extremes, from drought and floods to bushfires and heatwaves. Managing these risks is a fundamental part of farming in Australia.

Australian farmers and regional communities have demonstrated their ability to absorb and adapt to change, whether technological, social or environmental. However, the risks associated with climate change likely demand, over time, transitional and transformational change to maintain the wellbeing of regional economies and communities.

Climate change will continue to increase the frequency and severity of drought as well as other extreme climate conditions (for example, more frequent extreme heat waves and more severe flooding). Over time, the effects of drought and climate change are likely to challenge even the most prepared farmers and communities.

How has the FDF performed?

The FDF is a positive step in the evolution of Australia's drought policy. It continues the policy transition from in-drought support to investing in activities that enhance long-term preparedness, sustainability, resilience and risk management.

Inquiry participants support the FDF, especially its long-term funding commitment, its focus on the 'triple bottom line', and its support for local collaboration and priority setting. Despite doubts about aspects of the Fund, participants see the FDF as a valuable initiative.

It is too early for a comprehensive assessment of the Fund's effectiveness. Funding only commenced in July 2020 and many programs are still in their infancy or still to be rolled out. Formal evaluations of foundational programs have not been completed. That said, the first years of the FDF have produced important lessons for the design and delivery of the Fund and its programs, which should be considered as part of the next funding cycle. Key lessons include:

- short-term programs have high transaction costs, weaker public benefits and are unlikely to deliver long-term gains
- the high number of programs have confused stakeholders, increased risks of duplication and added administrative costs
- an overarching strategy guiding integration and sequencing of programs can maximise outcomes
- inconsistent application of the funding principles diminishes their value as a guide for the design and delivery of programs
- learning opportunities have been constrained by limited mechanisms for knowledge sharing.

FDF programs are broadly appropriate

The government's role in supporting farmers and communities to build drought resilience through the FDF is to support activities and make the community better off overall. To assess whether the suite of FDF programs were appropriate the Commission considered the rationale for Australian Government intervention, whether the programs align with the objectives of the FDF and whether the programs are appropriate given other related policies and programs.

The Commission has found that the FDF mostly supports activities that address genuine risks of underinvestment in resilience. However, there is scope to improve the design of some programs to realise greater net public benefits. For example, there may be scope within *the Drought Resilience Adoption and Innovation Hubs* and the *Farm Business Resilience* (FBR) program to provide a greater emphasis on improved natural resource management of farming landscapes, particularly where it will have positive environmental spillover benefits.

The Commission has also found that while the programs align with FDF objectives, as these objectives are very broad, it is unlikely the mix of programs were optimal to maximise the benefits to the community. The initial suite of programs and activities were focused on short-term initiatives typically delivering incremental changes where the chances of lasting impact are likely to be lower. For example, the foundational natural resource management programs provided one-year grants, which was inadequate time to implement real and measurable change.

Finally, although programs generally complement other Australian, state and territory initiatives, there are instances of overlap and confusion. The Commission has heard, for example, that Regional Drought Resilience Plans fill important gaps in some regions but in others they add a layer of complexity to existing plans and arrangements. Some states and territories have successful climate information tools that perform similar functions to *Climate Services for Agriculture* (CSA) and the *Drought Resilience Self-Assessment Tool* (DR.SAT).

Success of the Fund is undermined by a number of issues

Although the FDF programs will likely contribute positively to resilience, several interrelated issues with the design and implementation of the programs are likely to limit the success of the Fund, including:

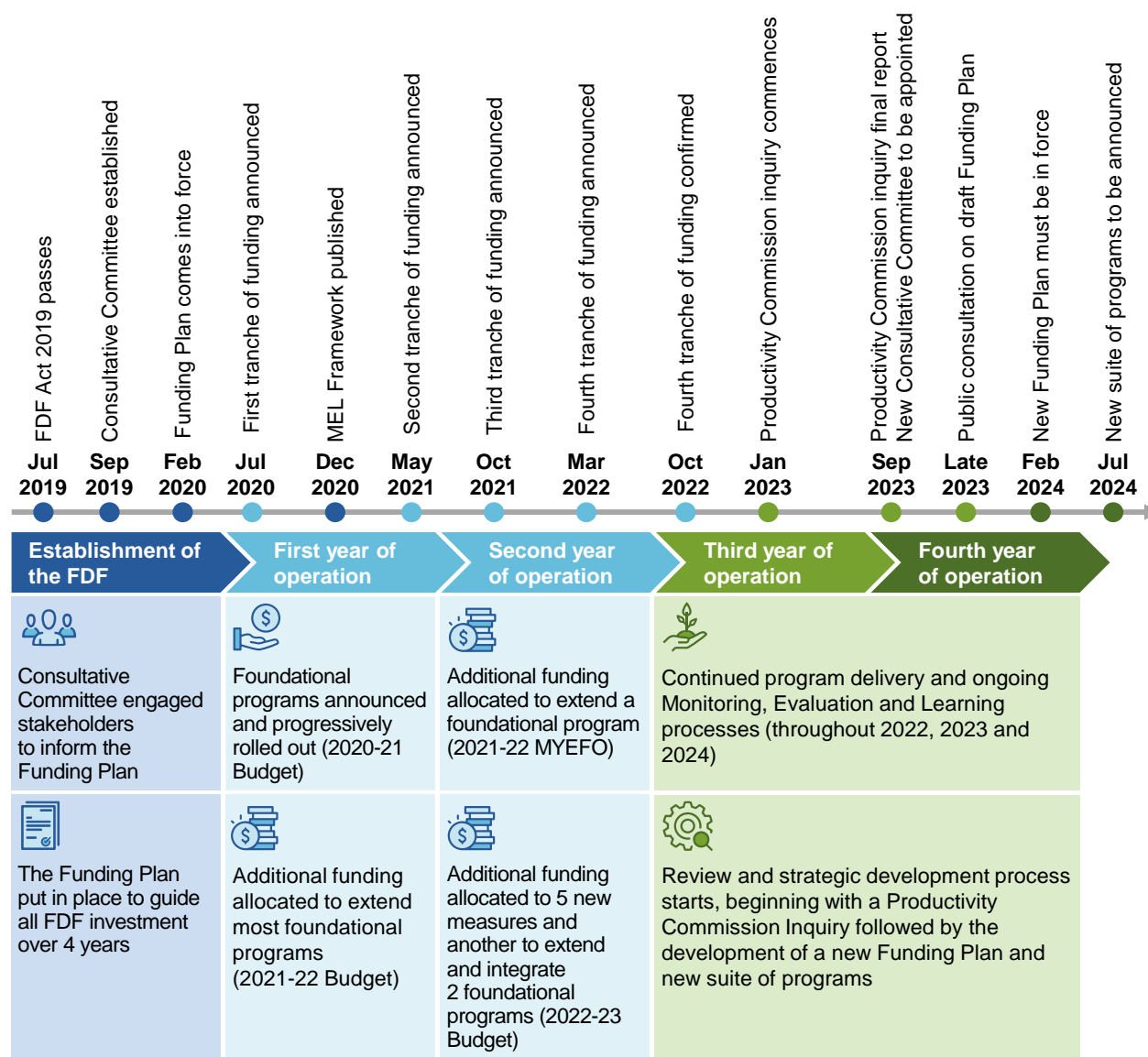
- the Funding Plan lacks a strategy to inform program design, selection, integration and sequencing
- short-term programs and too many programs created inefficiencies
- a lack of deliberate, timely mechanisms for participants across the FDF to share knowledge and learnings more regularly and directly.

Lack of a plan to integrate and sequence programs

The initial FDF programs were developed and implemented without a clear Fund-wide investment strategy. While the Funding Plan and its principles provide a guide for the activities eligible for investment, they do not set out an investment plan for the four-year cycle. Rather multiple programs were stood up – simultaneously – with only one year of funding allocated (figure below).

This fast roll out of programs meant the FDF initially could only support small scale, 12-month projects. As a result, projects did not reflect farming conditions (such as seasonal windows) or have the scale and duration to achieve meaningful and long-lasting change.

FDF timeline



Though programs were later extended, this approach contributed to significant inefficiencies with higher transaction costs for the Department, program partners and participants, and other stakeholders; and missed opportunities for better synergy, sequencing and coordination of programs.

For example, participants have pointed to a missed opportunity to integrate the climate information tools (DR.SAT and CSA) into the initial rollout of two key planning programs (FBR program and *Regional Drought Resilience Planning* (RDRP) program). This occurred because the three programs were rolled out at the same time. However, the Commission has heard some jurisdictions are now making efforts to integrate the tools.

Moreover, having multiple programs, particularly for a fund of the FDF's size, created confusion amongst FDF participants and contributed to efficiency and integration issues. The number of programs funded through the FDF has added complexity and confused participants. The Commission has heard that participants struggle to navigate the FDF, an issue compounded by a lack of accessible information on what activities are being (or will be) funded in specific locations.

This quick rollout of initial programs – and then the subsequent launch of new programs – worked against developing an effective monitoring, evaluation and learning (MEL) system and undermined the ability to design and deliver timely and effective MEL plans to track progress. Several MEL plans for individual programs do not provide a clear ‘line of sight’ between the activities being funded, the outputs that these activities deliver, the expected outcomes and the desired long-term drought resilience outcomes.

Limited sharing of knowledge across the FDF

Knowledge sharing is an important part of building drought resilience and a key rationale justifying public investment in a range of activities. Facilitating knowledge sharing across the FDF supports the diffusion of drought resilience knowledge among primary producers and communities and the application of this knowledge to build drought resilience.

However, the lack of formal mechanisms and difficulties in accessing and interpreting information on FDF outputs has constrained knowledge sharing between FDF participants within and between programs. Learning activities across the FDF appear to be mostly ad-hoc.

Improvements are being made

Despite these limitations there are promising signs that early lessons are being heeded. More recent programs (some still to be rolled out) are providing longer-term funding (for example, the *Drought Resilience Long-term Trials* program provides funding for up to six years) and brokering better connections across the FDF (for example, the *Helping Regional Communities Prepare for Drought Initiative* attempts to build off and leverage Regional Drought Resilience Plans).

Next steps for the Future Drought Fund

The next Funding Plan is required to be in place by February 2024. The next Funding Plan is an opportunity to build on the foundations laid by the first Funding Plan, taking account of the lessons already noted. The Commission is considering several options for the next Funding Plan including:

- more explicit recognition of resilience and adaptation to climate change
- prioritising the objectives and outlining how the FDF will achieve them
- renewing the program theory
- providing an investment plan to guide selection of programs and activities
- clarifying the purpose and application of the funding principles.

More explicit recognition of climate change

The Commission was asked to assess the merits of consider broadening the scope of the Fund to support resilience to climate change. In practice, the FDF does fund activities that aim to build resilience to the changing climate. Indeed, the 2020 to 2024 Funding Plan refers to climate change in its vision.

Nevertheless, the Commission has heard there is merit in more explicitly acknowledging that the Fund should support farmers and communities build resilience to climate change. The Commission is inclined to agree with this view, noting that:

- the FDF already recognises a broader range of climate pressures than just drought, but in a way that is open to interpretation. More explicit recognition of climate change would clarify the scope of activities supported, and not supported, by the Fund

- some participants advise that, in their regions, drought is not a term that resonates (for example, the local concern is changing wet/dry seasons; or multiple dry years are no longer considered a 'drought' but the 'new normal'). These communities are expected to be more responsive to climate change. Conversely other participants believe that drought is still the risk uppermost in people's minds
- drought is only one climate risk that farmers and rural communities must manage. By encouraging participants to focus on drought (over other risks), the Fund could inadvertently undermine, or at least shift efforts away from, building resilience to other climate risks
- preparing for an event (such as the next drought) may promote a different outlook – and different responses – than adjusting to long-term trends that include increased variability and heightened climate extremes. This focus on planning for an event may diminish the prospects of the Fund stimulating essential, transformational change.

The Commission understands the concerns of some participants that more emphasis on climate change could lead to uncertainty about Fund priorities (for example, would it include mitigation initiatives) and decrease support for existing FDF activities. Many participants have suggested that drought requires a dedicated fund because it is different to other climate change risks such as flooding or increased storm activity – given its slower onset and uncertain duration. Moreover, given there are other policies that deal with emergency management there is a risk of overlap with disaster preparation, response and management activities that will need to be managed.

On balance, the Commission considers that the Fund should be focused on supporting farmers and communities *build drought and climate change resilience*. To address the concerns about a loss of funding for drought-related activities, the Commission will investigate options to tighten FDF objectives and priorities through an updated theory of change and a more detailed Funding Plan, with clearer funding principles.

Prioritising objectives to maximise public benefits

As mentioned, the FDF has ambitious economic, environmental and social objectives. With finite funding available on an annual basis, greater prioritisation is needed around the Fund's objectives to maximise outcomes.

Recognising that over the long term, agricultural landscapes with healthy natural capital are most productive, sustainable and resilient to shocks, one option raised by some inquiry participants is to give greater priority to activities that enhance environmental resilience, particularly where they result in flow on economic benefits.

The FDF already funds some activities that, to varying degrees, support natural resource management. However, the Commission considers support for improved natural resource management should be a greater priority in the next funding cycle. As far as possible, programs should support initiatives which generate more than just benefits for an individual landowner. For example, collaborative projects involving a critical mass of landowners in a catchment or other discrete area can create positive spillover benefits to the community. The Commission is considering this change for the following key reasons.

- Activities that improve the environment's capacity to cope with climate extremes are more likely to lead to long-term sustainability.
- Economic and social investments alone will not provide sustained resilience for farmers and communities if landscapes are not well-positioned to cope with a changing climate.
- The FDF is well-placed to invest in these activities given it can fund ongoing long-term landscape-scale projects.
- Economic resilience will still be supported by targeting activities which leverage the strong causal links between better natural resource management and supporting improved productivity and economic outcomes for farmers.

A greater share of FDF funding for natural resource management should also be accompanied by an updated theory of change, program logic and MEL framework, which demonstrate how the link between environmental and economic objectives will be achieved and measured.

Identifying the FDF's role in fostering social resilience

Social resilience is an important objective for building drought resilient communities. Improving social capital and connectivity can help communities withstand the negative impacts of drought.

To date, the FDF has funded activities focused on building local networks, enhancing leadership and funding small-scale community infrastructure like town halls and meeting places. However, there is a very broad range of activities that can contribute to social resilience, with little empirical evidence on what national government programs targeting social capital can translate into meaningful resilience for local communities. This is further complicated by the fact that social resilience is a complex, multi-faceted and subjective phenomenon that makes it difficult to determine precisely what factors impact social resilience for different communities at different points in time.

It is questionable whether the FDF, as a national initiative, is the best placed to support social resilience through all of these types of activities, given the broad range of actions needed to build social resilience and the inherent overlap with the responsibilities of state, territory and local governments, which are better placed to enact local place-based programs. In addition, many Australian, state, territory and local government policies and programs already contribute to building social resilience, making it unclear what gaps the FDF is addressing.

The Commission is considering whether the FDF, in the next Funding Plan, is best placed to contribute to the resilience of the agriculture sector and communities through prioritising funding towards economic and environmental resilience, and less on its suite of social resilience activities. This would not necessarily preclude programs such as leadership and professional networking activities to be considered in the future, but would ensure that any such projects are only funded if they demonstrate strong and enduring value from a *national* delivery model, and be integrated with programs that target economic and environmental resilience.

Prioritising levers for change, through a tighter program logic

The FDF's theory of change sets out a hypothesis of how economic, environmental and social resilience each contribute to realising the vision of the FDF. However, it could better describe how the strategic priorities of economic, environmental and social resilience are mutually reinforcing, and explicitly how the FDF's activities aim to achieve these priorities in an integrated way. There is little doubt that improving one form of resilience may have positive effects on one or both other forms. But being more targeted about the linkages would help policy makers and program developers to decide where the best (direct and indirect) results can be achieved. The FDF's theory of change could better:

- describe how FDF programs should work together within a broader agriculture system to drive incremental, transitional and transformational change
- consider the need to change systems to support transformational change, and articulate the rationale for prioritising key leverage points that would create maximum change
- articulate roles of key participants and their networks (for example, natural resource management groups, grower groups, RDCs and innovation institutions)
- be used to guide what the Fund should strategically invest in, and in what sequence, in the short, medium and longer term.

Providing a detailed investment plan

As outlined, establishing programs that are better planned, sequenced and coordinated, and provide funding for longer periods could better achieve long-term transformational change. The next Funding Plan should be accompanied by a more-detailed investment plan.

This investment plan should provide information on:

- the FDF's investment priorities
- the funding process, including how funding is to be delivered (for example, through a grant round or via a delivery partner)
- how funding is monitored and reported on
- the sequence and scale of FDF funding activities over the Funding Plan period
- the outcomes the funded activities are expected to achieve and how they contribute towards the FDF's objectives
- how the funded activities work together.

The investment plan should be contained in a separate document rather than as part of the Funding Plan. This will allow for flexibility in the timing of the investment plan development and for the investment plan to be adjusted if needed.

Improving the funding principles

The Funding Plan has 17 'funding principles' to provide direction and set rules for programs and grants. However, the purpose and audience of the principles are not consistent or clear.

While the wording in the Funding Plan implies the principles should apply to individual programs and grants, some are more applicable to the Fund as a whole (for example, 'support a range of activities or projects at a mixture of levels, such as the farm, regional or national level'). Some principles are ambiguous; for example, it is unclear what grant applicants would be expected to do to 'recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders'. In the case of the public good requirement, this principle appears to be interpreted generously.

The next Funding Plan should define which principles should be met collectively by the suite of FDF programs and which principles should apply to each arrangement and grant. The principles should also be streamlined, and unnecessary principles removed.

Governance

The governance arrangements for the FDF are appropriate, given the size of the Fund and likely program risks, but there are concerns about how some arrangements are working in practice.

There are doubts about the value of the Regional Investment Corporation (RIC) Board's advisory role. There is limited evidence that the RIC's Board's advice has led to better outcomes, in part because the Board only advises at the end of program design. Concerns have also been raised about the costs and delays to programs due to seeking advice. The Commission believes the RIC Board's role should be removed.

Separately, the legislated timing of the Productivity Commission inquiry may not allow sufficient time for the Department of Agriculture, Fisheries and Forestry to develop and finalise a new Funding Plan. The Australian Government must request the review to begin before the end of the third year of the Funding Plan and the final report must be provided to Government at least five months before the end of the Funding Plan.

The Department has indicated the five-month window leaves little time to appoint a new FDF Consultative Committee (due to occur in September), undertake engagement on a draft plan and finalise the Final Plan. The Minister is also required to publish the Productivity Commission review final report before determining a Funding Plan. The required time when the final report is to be provided to Government should be brought forward to at least eight months before the end of the four-year Funding Plan, to allow for sufficient time for Funding Plan development and finalisation and ample opportunity for public consideration of the Commission's final report.

Monitoring, evaluation and learning

Monitoring, evaluating, learning (MEL) and reporting on the performance of the FDF is essential to ensuring its success. MEL activities are needed to demonstrate progress towards drought resilience, support knowledge transfer, improve programs during implementation, and inform the development of new programs.

The FDF's MEL Framework outlines the rationale, scope and approach of monitoring and evaluating the FDF, its programs and its activities. Whilst some program MEL plans have been developed and MEL activities undertaken, the MEL system is not adequate to track overall Fund progress.

The development and implementation of a comprehensive MEL system was hampered by the quick roll-out of programs, and a lack of dedicated resource capability. MEL activities have focused largely on individual programs rather than the overall Fund. Further, the success measures and indicators for several programs focus on inputs or outputs, rather than outcomes, and as a result, assessments have provided limited understanding of how the program has contributed to drought resilience. The program theory has also had limited use in guiding what performance outcomes should be monitored.

The Commission is seeking views on how to improve the underlying program theory and MEL activities of the Fund.

Improving outcomes for Aboriginal and Torres Strait Islander people

Aboriginal and Torres Strait Islander people have been caring for lands, waters and seas for tens of thousands of years, as an integral part of culture and identity. Many Aboriginal and Torres Strait Islander people are directly or indirectly involved in agriculture, across locations, sectors, roles, and applying a diverse mix of Traditional, Western, and mixed agricultural practices. However, they remain underrepresented in the sector.

Many inquiry participants expressed interest in increasing participation of Aboriginal and Torres Strait Islander people in the Fund, including through applying Indigenous knowledges to build resilience. However, Aboriginal and Torres Strait Islander people have had limited roles in the FDF. Aboriginal and Torres Strait Islander participation was not prioritised during the setting of the objectives of the Fund, nor in its design, implementation, governance or decision-making mechanisms. The short-term nature of funding and narrow or strict grant requirements have posed additional barriers. Broader structural barriers such as the lack of clear protections for Indigenous Cultural and Intellectual Property, and mechanisms to ensure that Aboriginal and Torres Strait Islander people will benefit from sharing their traditional knowledges, have also impeded participation.

The next Funding Plan period represents an important opportunity to help foster strong, reciprocal and respectful partnerships with Aboriginal and Torres Strait Islander people, in ways that strengthen their

participation in decision making about the Fund. There is potential for the FDF to benefit Aboriginal and Torres Strait Islander people and the wider sector.

For the next Funding Plan, it will be important that Aboriginal and Torres Strait Islander people define their goals for participation in the Fund. The Department could consider establishing an appropriately resourced Aboriginal and Torres Strait Islander working group to work with the Department to improve the design and implementation of the Fund and several other actions relating to governance, MEL and funding streams.

Interim findings on key programs

The Commission has identified a number of interim findings and recommendations across all programs under the FDF. Outlined below are the findings and recommendations associated with the key programs.

Climate information tools – Climate Services for Agriculture and Drought Resilience Self Assessment Tool

CSA and DR.SAT are tools to provide better information to farmers about their climate risks. CSA is a digital platform providing historical, seasonal and future climate information enabling users to anticipate future climate conditions, draw comparisons with recent weather and consider what it could mean for the commodities they produce. DR.SAT is a resilience self-assessment tool designed to offer farm-scale information to assist farmers. It is intended to complement existing climate information tools and relies on data from the CSA platform.

Uptake of these tools has been modest given lack of awareness and limitations around user design and targeting. Moreover, it is unlikely that the tools have spurred significant on-farm change. There are also other climate information tools available to farmers, including tools tailored for specific sectors/commodities. There does not appear to be a compelling reason to have two separate, interdependent and at times overlapping tools. Based on participant feedback, the Commission is considering whether the FDF should continue funding for both CSA and DR.SAT or whether DR.SAT should be integrated into CSA.

Farm Business Resilience

The FBR program helps farmers develop their management skills and funds tailored Farm Business Plans. It subsidises learning and development opportunities in strategic business management, farm risk management and decision-making, natural resource management, and personal and social resilience. While it is too early to tell whether actions identified in plans are being implemented, participant feedback is positive. The program appears to be delivering largely private benefits but has the potential to generate returns for the wider community, especially if a greater priority is given to improved natural resource management.

Regional Drought Resilience Planning

The FDF funds Regional Drought Resilience Plans in partnership with the states and territories. Implementation has been affected by poor integration and sequencing, a lack of clear ownership and limited funding. In some cases, there are already existing/overlapping plans. Consequently, there is a high risk that the plans will not lead to tangible outcomes and could contribute to further confusion around regional priorities. We are considering how to improve the RDRP program through better integration with other FDF programs, stronger governance and public reporting.

Drought Resilience Adoption and Innovation Hubs

The eight drought Hubs are intended to bring together regional stakeholders to develop local solutions to drought issues. Besides this coordination role, Hubs receive FDF funding and funding from other sources to develop, extend, adopt and commercialise drought resilient practices and technologies.

While the Hubs are only newly established, stakeholders are sometimes uncertain about the role of their local Hub, partly because of limited public reporting on their activities. There are concerns that Hubs are duplicating or competing with established services and networks. Despite these concerns, Hubs are a valuable regional presence for the FDF.

Funding for Hubs should be extended beyond the end of this Funding Plan, however, continued funding for any individual Hub should be contingent on demonstrating adequate performance and governance in a review mid-way through the next funding cycle. Improvements are needed to ensure adequate accountability and clarity around the role of Hubs. The Department should provide a statement of expectations for each Hub. Each Hub could be required to publish a rolling forward work program identifying its priorities and performance benchmarks. A MEL plan for the Hubs program as a whole should be implemented. The Commission is also considering how to better integrate Hub priorities with the Regional Drought Resilience Plans.

Drought Resilience Innovation grants

The *Drought Resilience Innovation Grants* program supports the development and adoption of new and innovative technologies and practices to improve the drought resilience of farmers and communities. A variety of projects are being supported at different stages of development, including early-stage proposals, feasibility testing for new products, processes and services and large-scale innovation projects.

The Commission recognises there are a range of institutions undertaking agriculture innovation (such as universities, industry-led Research and Development Corporations and Cooperative Research Centres) and it is unclear where and how the FDF can and should complement this. The Commission is requesting further information on how the FDF can best add value in the existing innovation system.

To the extent there is a role for the FDF to support innovation, the Commission considering the merits of rescoping the program so that it better targets grants toward identified challenges.

Natural resource management grant programs

The FDF has run three separate grant programs to improve natural resources management. The grant programs evolved from funding small-scale projects over one year to longer-term demonstration programs over three years. This evolution is more likely to deliver more enduring, transformative outcomes that deliver net benefits to the community. The Commission is considering recommending that the next Funding Plan include a natural resource management grant program.

Better Prepared Communities programs

The FDF has run three separate grant programs to improve the social resilience of communities. While there has been some positive feedback on these programs, it is inherently difficult to assess the lasting value of activities supported by these programs. It is also difficult to identify the exact gap in existing programs (Australian, state and territory) which the FDF can and should fill. Some FDF activities, such as Regional Drought Resilience Plans and the Hubs, could (directly or indirectly) support local social resilience.

While the triple bottom line approach is important, the Commission is considering ways to better target the role of the FDF in building social resilience. The Commission is canvassing three options for the community grant programs:

- maintain current arrangements and improve integration with other areas of the Fund
- explicitly tie community grants to regional drought development plans
- focusing the FDF on economic and environmental programs with social capital developed within these programs.

Interim findings, recommendations and information requests

Future Drought Fund outcomes



Interim finding 1

The intent of the Future Drought Fund is sound, but it is too early to assess its impact

The Future Drought Fund (FDF) continues the shift in drought policy in Australia from in-drought assistance to building resilience to drought before drought occurs. It is too early to assess the impact of the Fund and its programs.

Most FDF programs have a sound justification and align with the FDF's objectives. However, some programs appear to be supporting activities which may be better delivered through other avenues.



Interim finding 2

Future Drought Fund design and delivery problems will continue to constrain progress unless addressed

While the suite of Future Drought Fund (FDF) programs will likely improve drought resilience, problems with the design and delivery of the FDF and its programs will continue to constrain progress, including:

- a lack of strategy to integrate and sequence programs
- too many disconnected and relatively small programs creating confusion and administrative costs
- barriers to knowledge sharing across the FDF.



Interim finding 3

The Funding Plan does not provide clear guidance on planning, strategic sequencing and prioritisation of programs

The vision, aim, strategic priorities and objectives of the Drought Resilience Funding Plan 2020 to 2024 are broadly appropriate and consistent with the *Future Drought Fund Act 2019* (Cth) and the National Drought Agreement.

However, the Funding Plan does not identify priorities or guide decisions about the mix of programs. Instead, the Funding Plan includes detailed lists of a wide range of the types of activities that could possibly be funded. The absence of an overall strategy has likely contributed to a lack of appropriate sequencing and integration of programs.

Many of the funding principles are ambiguous, could be strengthened and/or are not being applied in practice. It is also unclear whether they are intended to be applied across the suite of Future Drought Fund programs or apply to each arrangement and grant.

Next steps for the Future Drought Fund



Interim recommendation 1

Building resilience to climate change should be more explicitly recognised as an objective

The scope of the Future Drought Fund should be clarified to explicitly recognise building resilience to climate change.



Information request 1

Explicitly recognising climate change resilience as a priority for the Future Drought Fund could increase the types of activities eligible for funding. The Commission is seeking views on this proposed change, including:

- given the limited resources available to the Fund, what climate change resilience activities should and should not be funded?
- whether changes are needed to the governance arrangements of the Fund.

**Information request 2**

The Commission is seeking views on whether and how the Future Drought Fund can achieve greater environmental and economic resilience through more investment in natural resource management activities.

The Commission is also seeking views on:

- how existing programs could be adjusted, and what activities should be funded, to achieve mutually reinforcing environmental and economic benefits
- how these outcomes – and the causal links between actions and improved resilience – could be best measured
- how Future Drought Fund activities should interact with the National Landcare Program and other natural resource management programs.

**Information request 3**

The Commission is seeking views on how the Future Drought Fund can best support social resilience, considering the roles that state, territory and local governments play.

The Commission is also seeking views on:

- whether existing programs (outside the Better Prepared Communities theme) could be adjusted to better achieve flow on benefits for social resilience, and if so how
- how social resilience outcomes can be best measured.

**Information request 4**

The Commission is seeking views on:

- the extent to which the suite of programs, as well as individual program design and program monitoring, evaluation and learning plans, align with the theory of change and program logic
- how the program theory, and its use, can be improved to better guide investment, prioritisation, program design and monitoring, evaluation and learning in the next Funding Plan period.



Interim recommendation 2

Establishing a drought and climate change resilience knowledge management system

The Australian Government should establish a drought and climate change resilience knowledge management system to facilitate sharing of Future Drought Fund and other drought and climate change resilience knowledge.



Information request 5

The Commission is seeking views on its suggestions for the next Funding Plan. These suggestions include that:

- the Funding Plan should explain how the Future Drought Fund (FDF) and its programs align with the National Drought Agreement and other relevant policies
- the objectives and strategic priorities should be clarified, particularly those related to social resilience
- the principles should be revised to provide clear guidance on which principles should be met by the suite of FDF programs and which principles should apply to each arrangement and grant
- the Funding Plan should be accompanied by an investment plan that identifies priorities for funding and eligible activities, the sequencing of programs, and how the different programs work together.

Governance



Interim recommendation 3

The role of the Regional Investment Corporation Board should be removed

The Australian Government should amend the *Future Drought Fund Act 2019* (Cth) to remove the Regional Investment Corporation Board's legislated advisory role in the Future Drought Fund.



Interim recommendation 4

The timing of Productivity Commission reviews should be changed

The Australian Government should amend section 32A(2) of the *Future Drought Fund Act 2019* (Cth) to require the Productivity Minister to specify that the Productivity Commission must submit its report no later than eight months before the end of the 4-year period that began when the Drought Resilience Funding Plan came into force.

Monitoring, evaluation and learning



Interim finding 4

Monitoring, evaluation and learning activities have not adequately tracked performance

The development and implementation of a comprehensive monitoring, evaluation and learning (MEL) system was hampered by the quick roll-out of programs, and a lack of dedicated resource capability.

Monitoring and evaluation activities have largely focused on individual programs, with little work done to understand the overall progress of the Fund. Program-level indicators tend to focus on inputs and outputs rather than outcomes, and hence provide limited understanding of how programs are contributing to drought resilience.



Information request 6

The Commission has identified challenges with the implementation of Fund and program monitoring, evaluation and learning (MEL). We are seeking further views on:

- the clarity of MEL requirements for, and guidance provided to, program implementers
- what mechanisms might better integrate monitoring, evaluation and reporting with learning
- any other specific, practical changes that would improve how MEL is conducted across the Fund.



Information request 7

While there have been challenges with implementing monitoring, evaluation and learning, the Commission is interested in examples of monitoring, evaluation and learning being conducted effectively to track and improve Fund and program performance and outcomes.

In particular we are interested in any practical examples from across the Fund and programs, of:

- program *outcomes* that are being monitored and measured, and how data is being collected and analysed to do so
- longer-term monitoring of outcomes and impact after the conclusion of a program, project or activity
- learning activities deliberately undertaken during the course of program or activity implementation, to identify any challenges and other insights, and use these to change and improve implementation
- how attribution and contribution has been addressed in monitoring or evaluation
- monitoring and evaluation of:
 - partnerships
 - environmental resilience outcomes at landscape / multi-property scale
 - social resilience outcomes
 - knowledge uptake by the wider sector; specifically, monitoring of how knowledge generated by the Fund has been applied by people beyond those directly participating in a Fund program or activity.

Improving outcomes for Aboriginal and Torres Strait Islander people



Interim finding 5

Aboriginal and Torres Strait Islander people have had limited participation in the Future Drought Fund

The Department has recognised that there was limited engagement with Aboriginal and Torres Strait Islander people in the development of the Future Drought Fund. The participation of Aboriginal and Torres Strait Islander people in the Fund and its activities has been limited.

The Future Drought Fund has the potential to benefit Aboriginal and Torres Strait Islander people and the wider agricultural sector. For the next Funding Plan, it will be important that Aboriginal and Torres Strait Islander people define their goals for participation in the Fund.

The next Funding Plan period represents an opportunity to help foster strong, reciprocal and respectful partnerships with Aboriginal and Torres Strait Islander people, in ways that strengthen their participation in decision making about the Fund.



Information request 8

The Commission is seeking views about its suggested options to improve engagement with, and benefits for, Aboriginal and Torres Strait Islander people. We are interested in whether these options should be implemented, and if so, what would be needed to ensure their success in practice. Other suggested options are also welcome. The options, which are not mutually exclusive, include:

- establishing a Future Drought Fund Aboriginal and Torres Strait Islander working group to work with the Department of Agriculture, Fisheries and Forestry to improve the design and implementation of the Fund
- requiring the Consultative Committee to include Aboriginal and/or Torres Strait Islander representation
- developing a Future Drought Fund Aboriginal and Torres Strait Islander strategy
- providing specific funding and resources to Aboriginal and Torres Strait Islander organisations, the Hubs and other relevant organisations to advise on and undertake engagement
- improving guidance about how Hubs and other organisations can meaningfully engage with existing networks to foster strong partnerships with Aboriginal and Torres Strait Islander people
- embedding Aboriginal and Torres Strait Islander outcomes in the Monitoring, Evaluation and Learning Framework
- establishing a specific funding stream for Aboriginal and Torres Strait Islander people and organisations
- providing flexibility around some grant criteria, such as the requirement of co-investment.

Future Drought Fund programs



Interim finding 6

Investing in climate information services is appropriate, but funding two overlapping tools may be unnecessary

Providing information about climate risks is important to inform decision making. However:

- the uptake of the climate information tools has, so far, been modest
- there is an overlap between the target audience and information provided by Climate Services for Agriculture and Drought Resilience Self-Assessment Tool
- the effectiveness of the tools could be enhanced with improved user engagement
- the uptake of the tools could be increased through better coordination with the Drought Resilience Adoption and Innovation Hubs, Farm Business Resilience and Regional Drought Resilience Planning programs.



Information request 9

The Commission is seeking views on the future of both Better Climate Information programs.

- Should the Future Drought Fund continue funding both Climate Services for Agriculture (CSA) and the Drought Resilience Self-Assessment Tool (DR.SAT)? If so, what information should they provide to whom?
- Should DR.SAT be integrated with CSA? If so, what elements of DR.SAT should be incorporated into the consolidated tool?



Interim finding 7

The Farm Business Resilience program has untapped potential for delivering public benefits

Feedback on the Farm Business Resilience program has been positive. But the public benefits from the program are likely marginal compared to private benefits. Natural resource management is already a component of the program; however greater public benefits are likely if the program provides more support for on-farm environmental initiatives.



Information request 10

Healthy landscapes support productive farms and contribute to greater drought resilience. The Commission is considering options to enhance the Farm Business Resilience (FBR) program to better support farmers' natural resource management. We are seeking further information on:

- the extent to which the FBR program already supports natural resource management on individual farms, and how the program can be amended to also support landscape-scale environmental initiatives
- how the FBR program can be better used to improve environmental resilience, in tandem with economic resilience
- whether and how the FBR program can be better coordinated with other Future Drought Fund programs.



Interim finding 8 Regional Drought Resilience Plans could be improved

The Regional Drought Resilience Plans can help communities prepare for drought. However, plans are often affected by poor integration and sequencing with other Future Drought Fund programs, lack of ownership over who is responsible for their delivery and minimal funding to implement the identified initiatives. There is a risk that plans will not lead to tangible outcomes and could result in confusion and consultation fatigue.



Information request 11

The Commission is seeking views on how the Regional Drought Resilience Planning program can be improved, including through better integration with other Future Drought Fund (FDF) programs, stronger governance and public reporting.

The Commission is also seeking views on whether the Australian Government should reassess the value of the program and consider options for reallocating funds to other FDF activities.



Interim finding 9 There is scope to improve the Drought Resilience Adoption and Innovation Hubs

The Drought Resilience Adoption and Innovation Hubs are in their early stages. It is likely that many Hubs are contributing to drought resilience, but it is too early to assess their effectiveness.

There is scope to make improvements to better manage and assess Hub performance and overcome initial implementation issues around stakeholder engagement, integration with other Future Drought Fund programs and better targeting investment.



Interim recommendation 5

Improving the Drought Resilience Adoption and Innovation Hubs

Funding for the Drought Resilience Adoption and Innovation Hubs should be extended in the next Funding Plan. However, the Australian Government should:

- state what its expectations are for the Drought Resilience Adoption and Innovation Hubs program and individual Hubs
- commission a performance review of the Hubs during the next Funding Plan, with future funding contingent on demonstration of adequate performance and governance
- implement a monitoring, evaluation and learning (MEL) plan for the Hubs program as a whole and ensure individual Hub MEL plans align accordingly.



Interim finding 10

The role of Drought Resilience Innovation Grants

The Drought Resilience Innovation Grants support the development of new or improved products, services or processes which build drought resilience. However, many institutions participate in agriculture innovation (including universities, industry-led Research and Development Corporations and Cooperative Research Centres). It is unclear how and where the Future Drought Fund can best add value.

There may be opportunities to adjust the program to better target grants toward a small number of pre-identified major resilience challenges.



Information request 12

The Commission is seeking views on whether the Future Drought Fund should be supporting agriculture innovation and if so, what types of innovation it should fund.

If Innovation Grants continue, the Commission is considering whether the Innovation Grants program could be improved by adopting a 'challenge-oriented' approach whereby the Australian Government outlines specific resilience challenge and invites applicants accordingly. The Commission is requesting feedback on:

- whether this approach is worthwhile
- whether similar approaches have been effective in other jurisdictions
- what the process should be to identify and define challenges
- how to scope and stage a 'challenge-oriented' approach appropriately, given funding limits.



Interim finding 11

There are issues with relevance, overlap and measurement of the Better Prepared Communities programs

While social resilience is important, the Future Drought Fund (FDF) may not be best placed to support all community resilience activities.

While program delivery partners have given positive feedback, the Better Prepared Communities theme has several challenges.

- The programs focusing on professional networking and information sharing may overlap with work being done (or that could be done) by Drought Resilience Adoption and Innovation Hubs or through implementation of regional development plans.
- While there has been some evidence of better integration and communication between the Helping Regional Communities Prepare for Drought program and other areas of the FDF, this may be insufficient to ensure activities targeting social resilience and community needs are efficiently implemented.
- There is no focus on longer-term outcomes for social resilience. The current emphasis on delivering activities and improving the quantum of social networks creates challenges in understanding the effectiveness of these programs.



Information request 13

The Commission is seeking views on the appropriateness of programs delivered under the Better Prepared Communities programs (Networks to Build Drought Resilience, Drought Resilience Leaders and Helping Regional Communities Prepare for Drought).

The Commission is considering ways to better target the role of the Future Drought Fund (FDF). The Commission is seeking views on the following three options:

- maintain current arrangements and improve integration with other areas of the Fund
- explicitly tie community grants to regional drought development plans
- focus the FDF on economic and environmental programs with social capital developed within these programs.

Interim report

1 What is this inquiry about?

The Future Drought Fund (FDF) is an investment fund established by the Australian Government in 2019. The FDF provides \$100 million from its investment returns each year to support farmers and communities to build drought resilience. Additional investment returns are re-invested into the Fund until it reaches a balance of \$5 billion.²

What has the Productivity Commission been asked to do?

The *Future Drought Fund Act 2019* (Cth) (the Act) requires the Productivity Commission to undertake an inquiry into the effectiveness of Part 3 of the Act every four years. Part 3 deals with arrangements and grants (payments) made under the Act that relate to drought resilience.³ As part of the assessment, the Commission was asked to consider:

- the effectiveness and appropriateness of the *Drought Resilience Funding Plan 2020 to 2024* (Funding Plan) in guiding progress towards the objective of drought resilience
- the effectiveness, efficiency and appropriateness of the programs, arrangements and grants in delivering against the Funding Plan and the objective of drought resilience
- the effectiveness, efficiency and appropriateness of the systems and processes established to develop, deliver, govern, monitor and evaluate the programs, arrangements and grants
- how the Funding Plan, the development, delivery, monitoring and evaluation of future programs, arrangements and grants, and the processes and systems to administer the Fund could be improved.

Section 32A of the Act requires the Commission to consider the economic, social and environmental outcomes in its assessment.

The Commission was also asked to consider:

- opportunities to enhance proactive collaboration in planning and delivering drought resilience initiatives, including with state and territory governments
- opportunities to enhance engagement with, and benefits for, First Nations people
- the merits of longer planning and program timeframes in building resilience
- the merits of broadening the scope of the Fund to support resilience to climate change for the agriculture sector and communities dependent on agriculture.

Conduct of the inquiry and consultation

Terms of Reference for the inquiry were received on 10 January 2023, and a call for submissions was released on 19 January 2023.

The Commission has consulted with participants to prepare this interim report, including the FDF Consultative Committee and the Australian, state and territory governments as required under the terms of reference. The Commission received 56 submissions and five brief comments from interested parties. Meeting participants and participants who made submissions are listed in appendix A. The Commission has greatly benefited from the consultations and thanks the participants for their contributions to the inquiry.

This inquiry is the Commission's first assessment of the FDF. The final report will provide advice on the development of a new Funding Plan, future programs, arrangements and grants, and the administration of

² The balance of the FDF was \$4.5 billion as at 31 December 2022 (DoF 2023).

³ References to the Future Drought Fund in this paper are a shorthand way of referring to the arrangements and grants (payments) made under the Act rather the investment vehicle that is the Future Drought Fund.

the Fund. This interim report sets out the Commission's preliminary analysis and interim findings on key issues. The Commission is seeking additional input for the final report due in September 2023 and will undertake further consultation with participants. You are invited to respond to this interim report by making a written submission or brief comment by 11 July 2023.

What is the Future Drought Fund?

The FDF is the main Australian Government program targeted towards building drought resilience. The purpose of the FDF is to 'enhance the public good by building drought resilience' (Future Drought Fund Act 2019 (Cth), s. 3).

The FDF reflects an evolution in national drought policy over the last decade away from in-drought support to promoting preparedness and resilience to drought (DAFF, sub. 42, p. 6). It meets the Australian Government's obligations under the National Drought Agreement, which includes 'establishing and operating a Future Drought Fund, to enhance drought preparedness and resilience' (COAG 2018, p. 4).

The FDF is innovative in that it provides sustained funding for building drought resilience over the long-term. The FDF's vision, strategic priorities, intended impacts and long-term outcomes, activities and programs are outlined in the FDF's program logic (figure 1).

The FDF is governed by the *Future Drought Fund Act 2019* (Cth), which establishes the FDF, processes under which arrangements and grants are made, and the governance of the FDF.

The FDF's programs, arrangements and grants are guided by the four-year Funding Plan, which sets the framework for expenditure under the FDF. The Drought Minister must request advice before allocating funding.

- The FDF Consultative Committee advises on a draft Funding Plan. Once the Funding Plan is established, the Consultative Committee advises on whether the design of the programs comply with the Funding Plan.
- The Regional Investment Corporation Board advises on individual grants or arrangements.

As of June 2023, the FDF has funded a total of 19 programs throughout the first Funding Plan.⁴ The programs support a diverse range of activities, including research, development, adoption, commercialisation, capacity building and planning. These programs are designed to meet the Fund's three strategic priorities and fall under four themes: better climate information; better planning; better practices; and better prepared communities.

Most programs intend to target multiple strategic priorities simultaneously. Out of the 19 programs, 11 aim to achieve all three strategic priorities, while four programs concentrate on two strategic priorities. Only four programs are dedicated to a single priority, with one targeting economic resilience and three targeting social resilience (section 2).

The FDF has a Monitoring, Evaluation and Learning (MEL) Framework, which outlines the rationale, scope and approach of monitoring and evaluating the FDF and its activities (section 5).

⁴ Throughout the report, 19 programs will be used to refer to the total programs funded throughout the first Funding Plan.

Figure 1 – Future Drought Fund Program Logic

Vision	An innovative and profitable farming sector, a sustainable natural environment and adaptable rural, regional and remote communities – all with increased resilience to the impacts of drought and climate change		
Strategic priorities	Economic resilience for an innovative and profitable agriculture sector	Environmental resilience for sustainable and improved functioning of agricultural landscapes	Social resilience for resourceful and adaptable communities
Impact	Agricultural businesses are self-reliant, productive and profitable	Agricultural landscapes are functional and sustainable, with healthy natural capital	Agricultural communities are resourceful, adaptable and thriving
Long-term outcomes	<p>(EC1) More primary producers adopt transformative strategies and technologies to reduce financial exposure to drought</p> <p>(EC2) More primary producers adopt risk management practices to improve their sustainability and resilience</p>	<p>(EN1) More primary producers preserve natural capital while also improving productivity and profitability</p> <p>(EN2) More primary producers adopt whole-of-system approaches to NRM to improve the natural resource base, for long-term productivity and landscape health</p>	<p>(S1) Stronger connectedness and greater social capital within communities, contributing to wellbeing and security</p> <p>(S2) Communities implement transformative activities that improve their resilience to drought</p>
Activities	Online climate and drought data • Digital tools • Natural Resource Management • Research & adoption • Knowledge & Innovation Hubs • Community networks • Leadership training • Farm business planning • Regional drought plans		
Programs	Climate Services for Agriculture • Drought Resilience Self-Assessment Tool • Farm Business Resilience • Regional Drought Resilience Planning • Drought Resilience Adoption and Innovation Hubs • Hub Projects • Adoption Officers • National Enabling Activities • Drought Resilience Innovation Grants • Natural Resource Management Drought Resilience Program – Grants • Natural Resource Management Drought Resilience Program – Landscapes • Drought Resilience Soils and Landscapes • Grants to Support the Adoption of Drought Resilient Practices • Drought Resilience Long-Term Trials • Drought Resilience Commercialisation Initiative • Drought Resilience Scholarships • Drought Resilient Leaders • Networks to Build Drought Resilience • Helping Regional Communities Prepare for Drought Initiative		

Source: DAWE (2020c, p. 13).

What is the FDF trying to achieve and why is that important?

The FDF is intended to build drought resilience. The concept of drought resilience is broad, complex and can mean different things to different people. The Funding Plan defines drought resilience as:

... the ability to adapt, reorganise or transform in response to changing temperature, increasing variability and scarcity of rainfall and changed seasonality of rainfall, for improved economic, environmental and social wellbeing. (Drought Resilience Funding Plan 2020 to 2024, p. 3)

Similarly, drought resilience is defined under the FDF Act as the resilience to, preparedness for, responsiveness to, management of exposure to, adaptation to the impact of, and recovery from drought, as well as the long-term sustainability of farms and communities affected by, or at significant risk of being affected by, drought (Future Drought Fund Act 2019 (Cth), s. 5).

Definitions of resilience vary but they generally emphasise the ability to absorb adverse shocks or to adapt and transform in response to adverse events and risks (Mitchell 2013).⁵

The Funding Plan adopts a 'triple-bottom line' approach of improving the economic, environmental and social dimensions of resilience – all three in combination are intended to deliver a holistic approach to building drought resilience (box 1).

Box 1 – Economic, environmental and social resilience

The Future Drought Fund focuses on building the economic, environmental and social resilience of farmers and communities. The themes, long-term outcomes, activities, programs, and therefore investments, under the Future Drought Fund should contribute to at least one of these three forms of resilience.

Economic resilience

Economic resilience focuses on building the self-reliance and performance (productivity and profitability) of the agricultural sector in times of drought. For example, farmers undertaking strategic business planning and risk management will improve their self-reliance and ability to mitigate their exposure to drought, such as through diversification of farm income.

Environmental resilience

Environmental resilience focuses on improving the natural resource base for long-term productivity, landscape health and sustainability by supporting primary producers' understanding of the state of their natural capital and raising awareness of best practice natural resource management techniques. This creates incentives for primary producers to better preserve their natural capital and improve their management of natural resources through drought.

⁵ Definitions differ according to the field of study and context (OECD 2020). International bodies, countries, and even agencies within countries often define resilience differently depending on their organisational objectives and contexts (OECD 2014). For example, the Intergovernmental Panel on Climate Change takes a relatively narrow definition of resilience: 'the capacity of interconnected social, economic and ecological systems to cope with a hazardous event, trend or disturbance, responding or reorganising in ways that maintain their essential function, identity and structure' (Pörtner et al. 2022, pp. 2920–2921). However, the definitions typically emphasise that resilience is the capacity or ability of an individual, community or system to prepare and plan for, absorb, recover from, and more successfully adapt and transform in response to adverse events.

Box 1 – Economic, environmental and social resilience

Social resilience

Social resilience focuses on strengthening the wellbeing and social capital of communities and empowering communities to develop skills and adopt innovative approaches to drought resilience. One example is to improve the leadership skills of community leaders and share information and knowledge on drought preparation and planning within the community to encourage communities to proactively plan and prepare for drought.

Source: DAWE (2020c); Drought Resilience Funding Plan 2020 to 2024.

The Funding Plan also recognises that building drought resilience may require farmers and communities to make incremental, transitional and transformational changes.

- **Incremental change:** the ability to preserve or restore a system (including its basic structures and functions) by preventing, preparing for or mitigating the impacts of an event or risk. The key objective is to maintain the system in its current state. For agricultural systems, incremental change could mean taking actions that preserve the current methods of production by farm businesses in a region, such as diversifying income with off-farm employment or using farm management deposits to make tax deductible deposits during good periods and withdraw them during bad periods.
- **Transitional change:** the ability to maintain the essential functions and structures of a system by modifying or changing some of its characteristics in response to future adverse events or risks. Unlike incremental change, transitional change alters aspects of a system to maintain its core functions. For agricultural systems, transitional change could mean changing aspects of a production system (such as seed varieties or agronomic practices) to continue the production of certain commodities in a region.
- **Transformational change:** the ability to undertake wholesale change of a system when adverse events or risks make the current system untenable. Transformational change does not seek to maintain current systems in any way but rather looks to establish new systems more appropriate to the changed risk landscape. For agricultural systems, transformation could involve farms in a region shifting out of certain production systems such as particular grains or oilseeds, or adopting new production systems such as grazing or carbon farming (Mitchell 2013).

The benefits of building drought resilience

The FDF's aim is to 'enhance the public good by building drought resilience in Australia's agricultural sector, the agricultural landscape and communities' (Drought Resilience Funding Plan 2020 to 2024, p. 5). The term 'public good' is used to indicate anything that improves overall community wellbeing (and should not be confused with the technical economic term of public goods as discussed in section 2). The strongest case for taxpayer support for drought resilience arises when it provides benefits beyond primary producers that otherwise would not have occurred (section 2), which could include:

- economic and social stability – the effects of drought on agriculture have significant flow on effects and costs to rural and regional communities, such as reduced social cohesion, mental health issues, unemployment and population loss. Building the resilience of farmers and communities to drought mitigates these impacts.
- environmental protection – many measures to build drought resilience provide environmental outcomes that benefit the wider community. Promoting sustainable land and water management and other farming practices can lead to improved soil health, increased biodiversity and enhanced ecosystems beyond the farm.

Another potential benefit is a reduced need for in-drought support from governments in the future. While better preparedness and drought resilience should reduce the need for in drought support, these assumed future savings cannot be guaranteed. On this basis, the expectation of future savings may be a weaker economic justification for public investment in drought resilience, compared to instances when investment addresses genuine risks of underinvestment and generates spillover benefits to the community that otherwise would not have occurred (section 2).

The case for building drought resilience is even greater given climate change

Farmers and agricultural communities have always faced challenges with climate extremes, from drought and floods to bushfires and heatwaves. Managing these risks is an inescapable part of farming in Australia.

Australian farmers and regional communities have demonstrated the ability to absorb and adapt to change, whether technological, social or environmental. However, the risks associated with climate change likely demand, over time, transitional and transformational change to maintain the wellbeing of regional economies and communities.

Climate change will continue to increase the frequency and severity of drought as well as other extreme climate conditions (for example, more frequent extreme heat waves and more severe flooding). Over time, the effects of drought and climate change are likely to challenge even the most prepared farmers and communities (box 2).

Box 2 – Effects of climate change

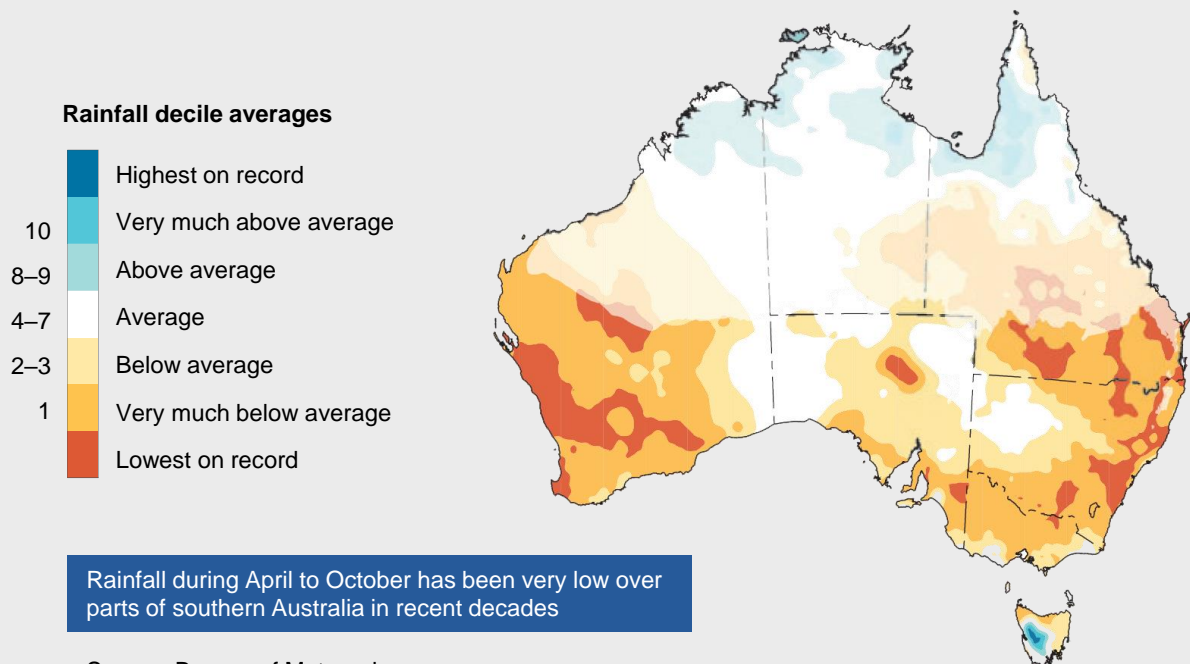
Climate change has already had significant effects on climate conditions with Australia already experiencing higher temperatures, more extreme heat events and fire seasons, flooding and severe drought. Most changes are projected to continue and worsen over time, but the effects of climate change are highly variable across regions in Australia.

The average temperature in Australia has warmed by 1.2 to 1.7 degrees Celsius since national records began in 1910. The warming in Australia has resulted in an increase in extreme heat events. For example, in 2019 there were 33 days when the national daily average maximum temperature exceeded 39 degrees, which was greater than the number of days experienced in 1960 to 2018 combined. Temperatures are projected to warm further with even greater frequency and severity of extreme heat events, which will contribute to increased risk of extreme bushfire events.

Rainfall in Australia is naturally highly variable. But climate change is changing the long-term trends in rainfall. In southern Australia, the change has been to drier conditions. For example, April to October rainfall in southwest Australia has decreased by about 15% from 1970 to 2021. In contrast, rainfall has increased across most of northern Australia. The intensity of heavy rainfall events has also increased by over 10% in some regions. Many regions in southern and eastern Australia are projected to experience further declines in rainfall. Intense heavy rainfall events are projected to become more frequent and in some regions account for a greater proportion of total rainfall.

Box 2 – Effects of climate change

April to October rainfall deciles between 2000–21



Source: Bureau of Meteorology

The frequency of tropical cyclones has decreased since 1900 and is projected to continue to decline but are more likely to be of high intensity, which is associated with weather events such as extreme rainfall and flooding.

Climate change is also projected to have a wide variety of other effects such as on pests and diseases, biosecurity, as well as the risk of multiple extreme events occurring simultaneously or successively.

The effects of climate change have already significantly affected the agricultural sector. For example, Hochman et al. (2017) estimated climate change has reduced wheat yields in Australia by 27% from 1990 to 2015, and Hughes et. al (2022) estimated that average Australian farm profits decreased by 23% as a result of climate change over the last 20 years.

Source: CSIRO and BOM (2022b); PC (2023); Pörtner et al. (2022).

Australia's recent experience of drought and other climate events highlight the significant risks of climate change on the economy, environment and communities. The 2017 to 2019 drought was one of the worst drought events experienced by many states and territories, and was followed by the extreme 2019 to 20 bushfires, and more recently the severe flooding that affected many regions.

Wittwer and Waschik (2021, p. 932) estimated the net present value of the national welfare loss caused by the 2017 to 2019 drought and 2019 to 2020 bushfires to be \$53 billion and \$10 billion, respectively, the latter of which excludes the loss of human lives, flora and fauna.

Over time, the effects of drought and climate change are likely to challenge even the most prepared farmers and communities. The increase in frequency and severity of drought and other climate events are likely to result in

even greater economic, environmental and social costs to the community. Consequently, there is a need for greater focus on building the resilience of farmers and communities to future drought and climate conditions.

Structure of the report

The rest of the interim report is structured as follows:

- Section 2 assesses how the FDF has performed and the key issues the Commission has identified.
- Section 3 considers how these issues can be addressed and other improvements that can be made to the FDF.
- Section 4 assesses the governance arrangements of the FDF and how they can be improved.
- Section 5 assesses the monitoring, evaluation and learning approach of the FDF and how it can be improved.
- Section 6 looks at how outcomes for and engagement with Aboriginal and Torres Strait Islander people can be improved.
- Section 7 provides an assessment of the individual FDF programs.

2 How has the Future Drought Fund performed?

In May 2013, under the Intergovernmental Agreement on National Drought Program Reform, governments ended exceptional circumstances support and confirmed that farm businesses should prepare for drought rather than rely on in-drought assistance (Australian, state and territory Governments 2013). The FDF was established to provide a long-term pool of funding for investing in drought preparedness, sustainability resilience and risk management for farming businesses and communities.

Inquiry participants support the FDF, especially its long-term funding commitment, its focus on the 'triple bottom line', and its support for local collaboration and priority setting. Despite doubts about aspects of the fund, participants see the FDF as a valuable initiative.

It is too early for a comprehensive assessment of the FDF's effectiveness. Funding only commenced in July 2020 and many programs are still in their infancy or yet to be rolled out, and formal evaluations of foundational programs are yet to be completed. That said, the first years of the FDF have produced important lessons for the design and delivery of the Fund and its programs.

These lessons should guide the Fund's evolution over the next funding cycle (2024–28) (section 3). This section provides a high-level assessment of:

- the appropriateness of the FDF programs
- key problems, including that:
 - there has been a lack of a strategy to guide the integration and sequencing of programs
 - short-term programs have high transaction costs, weaker public benefits and are unlikely to deliver long-term gains
 - the high number of programs has confused stakeholders, increased risks of duplication and added administrative costs
 - learning opportunities have been constrained by limited mechanisms for knowledge sharing
 - the level of collaboration has been mixed
- the Drought Resilience Funding Plan, including the funding principles.

Individual programs are discussed in section 7.

FDF programs are broadly appropriate

To assess the appropriateness of the suite of FDF programs, the Commission considered three key questions.

- Is there a sound rationale for Australian Government intervention?
- Does the suite of programs/each program align with the objectives of the FDF?
- Is the suite of programs/each program appropriate given other drought-related policies and programs?

Rationale for government intervention

There are many reasons why farmers and communities may underinvest in drought resilience activities compared to what would maximise community wellbeing (box 3). The government's role in supporting farmers and communities to build drought resilience through the FDF is to support programs and initiatives that make the community better off.

There are some cases where governments have a role in supporting programs that provide largely private benefits where it does not impose excessive costs on other parties, but the hurdle for justifying this type of support is high given the risk taxpayer funds are invested in activities that might have been undertaken anyway. Accordingly, the strongest case for government support for building drought resilience is activities that provide spillover benefits that are external to producers and would not have occurred otherwise.

Box 3 – The rationale for supporting drought resilience

Market failures can mean farmers and communities have limited incentives, resources or information to adequately invest in drought resilience activities, even when there are clear net public benefits.

Public goods

There will typically be underinvestment in research relevant to drought resilience given it is often hard to stop others from copying knowledge (non-excludable) and it is not desirable to price goods that can be used by one party without diminishing the use by any other parties (non-rivalrous). For example, trials around better farming practices could yield benefits but are not worth the risk of investment given benefits cannot be sufficiently privately captured.

Environmental externalities

Farm management practices can have negative (or positive) external effects on other producers and the environment. For example, some farm management practices can result in nutrient enrichment of lakes and rivers with resulting algal blooms, decline in ecosystems and loss of habitat (Davis and Koop 2006; Mosley et al. 2023). Primary producers have limited economic incentives to address these external effects, which can justify regulation, provision of information and other initiatives.

Information failures

There are often barriers preventing farmers and communities from accessing the information needed to manage risks and build resilience. However, the existence of information failures alone is not sufficient to justify subsidies, as consultants and other advisers often fulfill the function of overcoming information failures and sometimes the costs of overcoming them exceed their value. Nonetheless, in certain areas, government is a preferable source of knowledge, especially given the public good nature of the generalisable knowledge relating to natural resource management.

Box 3 – The rationale for supporting drought resilience

Examples include access to accurate and timely weather and climate data, knowledge of best practices and the time or capacity to understand the nature of future risks and the potential implications for investment decisions. The main impacts of improving the diffusion of best practice farm management by overcoming information asymmetries will often be private. However, to the extent that these benefits would not otherwise have been realised, these are still benefits relevant to government policy and the public good.

Coordination failures

Drought resilience often requires coordinated action at various levels, from individual farmers to regional and national governments. In the absence of effective coordination mechanisms, market participants may fail to adequately invest in or implement resilience measures.

Moral hazard

In some cases, government support may disincentivise farmers to build resilience to drought. The Commission, and many other inquiries and reviews, have previously outlined that various in-drought support programs (such as transaction-based subsidies and interest rate subsidies) create perverse incentives and unintended outcomes. They can disincentivise farmers from becoming self-reliant and impede structural adjustment (for example, Agriculture and Food Policy Reference Group 2006; Matthews et al. 1997; PC 2009).

It is difficult for governments to credibly commit to not providing in-drought assistance to farmers in crisis. However, to the extent support to build primary producers' resilience improves their management practices and that these reduce the prevalence of crisis among producers during drought, the degree of assistance needed in times of drought could be expected to fall. Whether the costs of such pre-emptive subsidies pays off by reducing future in-drought payments is an empirical question (and a difficult one to assess).

Another consideration is the degree of change needed to build resilience. While there is a role for government across incremental, transitional and transformational change, the case is likely to be greater for governments to support transformational change.

Climate change will increase the frequency and severity of climate events that will be increasingly difficult for farmers and communities to manage (section 1). Regions that are expected to experience severe changes in climate conditions will need transformational change – rather than incremental and/or transitional change – to adequately overcome future climate risks (CSIRO 2008; Fedele et al. 2019; Kates, Travis and Wilbanks 2012; OECD 2020; Roggema, Vermeend and Dobbelsteen 2012).

While transformational change is the most effective change to build resilience in these regions, it is hard for farmers and communities to implement alone. Compared to incremental and transitional change, undertaking transformational change involves greater risk, governance and institutional barriers, as well as other behavioural and cultural barriers. Transformational change also requires significant coordination and planning across stakeholders (Fedele et al. 2019; Kates, Travis and Wilbanks 2012; OECD 2020; PC 2012).

There is a role for government intervention given the barriers that farmers and communities face to undergo transformational change are significantly larger and more complex than incremental change. The size and complexity of the task to transform practices could mean individuals and communities may be unable to act without support, even if there are overall benefits for doing so. In some cases, the process of

transformational change may involve a few substantial changes to the system, but in other cases, smaller sequential transformations to the system may be more appropriate.

To assess the rationale of the FDF programs, the Commission is considering the extent to which a given program aims to address a market failure. As outlined in table 1, most programs within the first Funding Plan appear to fund activities in areas that could address genuine risks of underinvestment in resilience measures. However, there are cases where the rationale for government support is marginal. In these cases, program design could be improved and funding could be better targeted to improve public benefit outcomes (section 7).

Table 1 – How FDF programs could address market failures

Program	Market failures that could be addressed
CSA and DR.SAT	Accessible climate information has public good characteristics and reduces information barriers by allowing users to better understand the risks of climate change affects to them.
Farm Business Resilience	This program reduces information barriers by providing education and advice to farmers on how best to prepare for future climate change risks. Some elements of the program (such as modules related to natural resource management) have greater public benefit outcomes than others (such as succession planning). Nevertheless, the benefits of the program are largely private, which makes the issue of 'additionality' particularly important. Given the significant private benefits, governments could seek to recover more of the costs through co-contributions provided it does not undermine the spread of good management practices.
Regional Drought Resilience Planning	Regional planning can help overcome coordination failures between different industries, sectors and governments.
Hubs and associated programs	Hubs can help overcome information barriers and broader coordination failures. They also support public good research and development.
National Enabling Activities	This program invests in activities that address information barriers by supporting knowledge transfer (Science to Practice Forum, Knowledge Management scoping study) and coordination failures (Drought Resilience Research and Adoption Investment Plan).
Innovation Grants	Innovation provides spillover benefits from the resulting knowledge beyond the innovator, who therefore tends to underinvest.
NRM and Soils and Landscapes grants^a	Grants have the potential for public good outcomes to the extent sustainable management of natural resources, including at landscape scale, provides environmental spillover benefits beyond the farm gate.
Drought Resilience Leaders, Networks to Build Drought Resilience, and Helping Regional Communities Prepare for Drought Initiative	Building networks and leadership can promote knowledge sharing and diffusion of best practices, which provides spillover benefits as well as improve community wellbeing and mental health.
Drought Resilience Commercialisation Initiative	The initiative offers commercialisation planning services that appear to provide primarily private benefits to innovators. There is also weaker rationale for government support at the commercialisation stage, which provides opportunities for large potential private returns.

Program	Market failures that could be addressed
Long-term Trials of Resilient Farming Practices and Extension and Adoption of Drought Resilience Farming Practices Grants	Research on the effectiveness of drought resilient farming practices provide spillover benefits to other farmers and possibly to the broader community such as improved environmental outcomes. There is also a strong rationale to support extension and adoption, which is necessary to maximise the value of the research outcomes and uptake of drought resilient farming practices.
Drought Resilience Scholarships	This scholarship provides for a 14 week program to travel, learn new best practices, and study and research drought resilience (Nuffield Australia nd). It provides significant private benefit but the educational and research outcomes as well as diffusion of international best practices could provide spillover benefits to the community.

a. NRM and Soils and Landscapes grants include the following programs: 'Drought Resilient Soils and Landscapes', 'NRM Drought Resilience Program – Landscapes' and 'NRM Drought Resilience Program – Grants'.

Source: Commission assessment.

Programs align with the FDF's objectives

The FDF's objectives are:

- economic resilience for an innovative and profitable agricultural sector
- environmental resilience for sustainable and improved functioning of farming landscapes
- social resilience for resourceful and adaptable communities (discussed in more detail below).

Taken individually, the programs align with the FDF's objectives insofar as they are likely to contribute to one or more outcomes that boost economic, environmental or social resilience (table 2), which are broadly defined. Moreover, the FDF Consultative Committee has assessed all current programs and the Regional Investment Corporation (RIC) has assessed all FDF arrangements and grants (made under current FDF programs) as not being inconsistent with the 2020–24 Funding Plan.

However, this still leaves significant scope for improvement in program design and funding arrangements (section 7). Being consistent with a broad objective or objectives is a start, but the specific objective that any program aims to realise must have a strong rationale, and any program also needs to have an expected benefit that exceeds its likely costs.

Table 2 – Alignment of FDF programs with the Funding Plan objectives^a

	Economic	Environmental	Social
Better Climate Information theme			
Climate Services for Agriculture (CSA)	✓	✓	✓
Drought Resilience Self-Assessment Tool (DR.SAT)	✓	✓	✓
Better Planning theme			
Farm Business Resilience (FBR)	✓	✓	✓
Regional Drought Resilience Planning (RDRP)	✗	✓	✓
Better Practices theme			
Drought Resilience Adoption and Innovation Hubs	✓	✓	✓
Hub Projects	✓	✓	✓
Adoption Officers	✓	✓	✓
National Enabling Activities	✓	✓	✓

	Economic	Environmental	Social
Drought Resilience Innovation Grants	✓	✓	✓
Natural Resource Management Drought Resilience Program – Grants	✓	✓	✗
Natural Resource Management Drought Resilience Program – Landscapes	✓	✓	✗
Drought Resilience Soils and Landscapes	✓	✓	✗
Grants to support the Adoption of Drought Resilient Practices	✓	✓	✗
Drought Resilience Long-term Trials	✓	✓	✓
Drought Resilience Commercialisation Initiative	✓	✗	✗
Drought Resilience Scholarships	✓	✓	✓
Better Prepared Communities theme^b			
Drought Resilient Leaders	✗	✗	✓
Networks to Build Drought Resilience	✗	✗	✓
Helping Regional Communities Prepare for Drought Initiative	✗	✗	✓

a. Assessment based on program MEL plans and grant funding. b. Better Prepared Communities theme is primarily aligned with social objectives, however programs may overlap with other objectives.

Source: Commission assessment.

Moreover, while each program individually may align with the Fund's objectives, it is unlikely the mix and design of programs are optimal to maximise benefits to the community. The initial suite of programs and activities were focused on short-term initiatives and largely weighted toward incremental change. For example, the *Drought Resilience Natural Resource Management* programs were rolled out quickly and ran for only a little over 12 months, limiting their potential (section 7).

There is an opportunity to develop a strategy to provide a more structured way of identifying, linking and sequencing programs to achieve the objectives of the next Funding Plan (discussed below).

Finally, while individual programs align with FDF objectives, deficiencies in the purpose, design and application of the Funding Plan's funding principles (discussed below) mean it is not possible to assess whether an individual program is meeting all principles.

Some FDF programs overlap or compete with other programs

It is arguable whether the suite of FDF programs aligns effectively with other related policy and programs. FDF programs generally either fill policy gaps or complement existing Australian, state and territory policies. However, there are instances where FDF programs overlap other programs. And how well FDF programs are integrated with drought and other relevant policies and programs tends to vary by state and program.

The Commission has heard, for example, that in some regions Regional Drought Resilience Plans fill important gaps and help overcome coordination problems, but in other regions they add a layer of complexity to existing plans and arrangements. As well, some states and territories have successful climate information tools that perform similar functions as *Climate Services for Agriculture* (CSA) and the *Drought Resilience Self-Assessment Tool* (DR.SAT). For example, the Queensland Department of Agriculture and Fisheries (sub. 54, p. 3) noted:

The Climate Services for Agriculture (CSA) and DRSAT online tools aim to provide climate and drought preparedness information for all areas in Australia and for multiple commodities. At a broad level, some of the information replicates existing long standing online information (e.g., Queensland's Long Paddock website which has been operational since 1995). Queensland

delivers historical climate data (e.g., SILO) which is widely used for modelling, research and applications; and bespoke property scale information services such as the FORAGE service.

Another related consideration when assessing the appropriateness of a program is whether the FDF is the best avenue to fund it. A program may have a sound rationale for government intervention and align with the FDF's objectives but still be better funded by a different level of government or a different portfolio within the Australian Government.

In particular, there may be a weaker justification for FDF involvement in programs under the *Better Communities Theme* given some of the funded activities fall more clearly in the remit of state or local government and/or have tenuous links to drought resilience. For example, under the *Networks to Build Drought Resilience Program* several small-scale community projects (such as community hall/centre upgrades, a showground sign and toilet blocks) and events (community dinners and networking breakfasts) received funding (FRRR 2023). Notwithstanding the importance these initiatives may have in building local social connections more generally, it is questionable as to whether the FDF should be the source of funding (section 3).

Finally, it is unclear which gaps in research and development funding the FDF is filling through the *Drought Resilience Innovation Grants* program, given the myriad of existing government programs that provide support for research and development in general, and agricultural research and development in particular. The agricultural innovation space is crowded, with Rural and Research Development Corporations (RDCs), Cooperative Research Centres, universities, the Australian Government (such as through the National Agricultural Innovation Agenda), and state and territory governments among others. Given that this is already a highly congested policy space, there is a risk that FDF activities may be creating further overlap with other Australian, state or territory government programs.



Interim finding 1

The intent of the Future Drought Fund is sound, but it is too early to assess its impact

The Future Drought Fund (FDF) continues the shift in drought policy in Australia from in-drought assistance to building resilience to drought before drought occurs. It is too early to assess the impact of the Fund and its programs.

Most FDF programs have a sound justification and align with the FDF's objectives. However, some programs appear to be supporting activities which may be better delivered through other avenues.

Problems with program design and delivery have likely impacted outcomes

It is too early to determine the extent that programs – individually or collectively – are improving resilience. Some foundational programs are yet to complete final reporting and evaluation, while other programs are in the design and early implementation phases. As outlined in section 5, monitoring evaluation and learning has not yet been sufficiently embedded to comprehensively track progress. Therefore, to assess the effectiveness of FDF and its programs, the Commission considered the likely outcomes of the programs given feedback on their design and implementation.

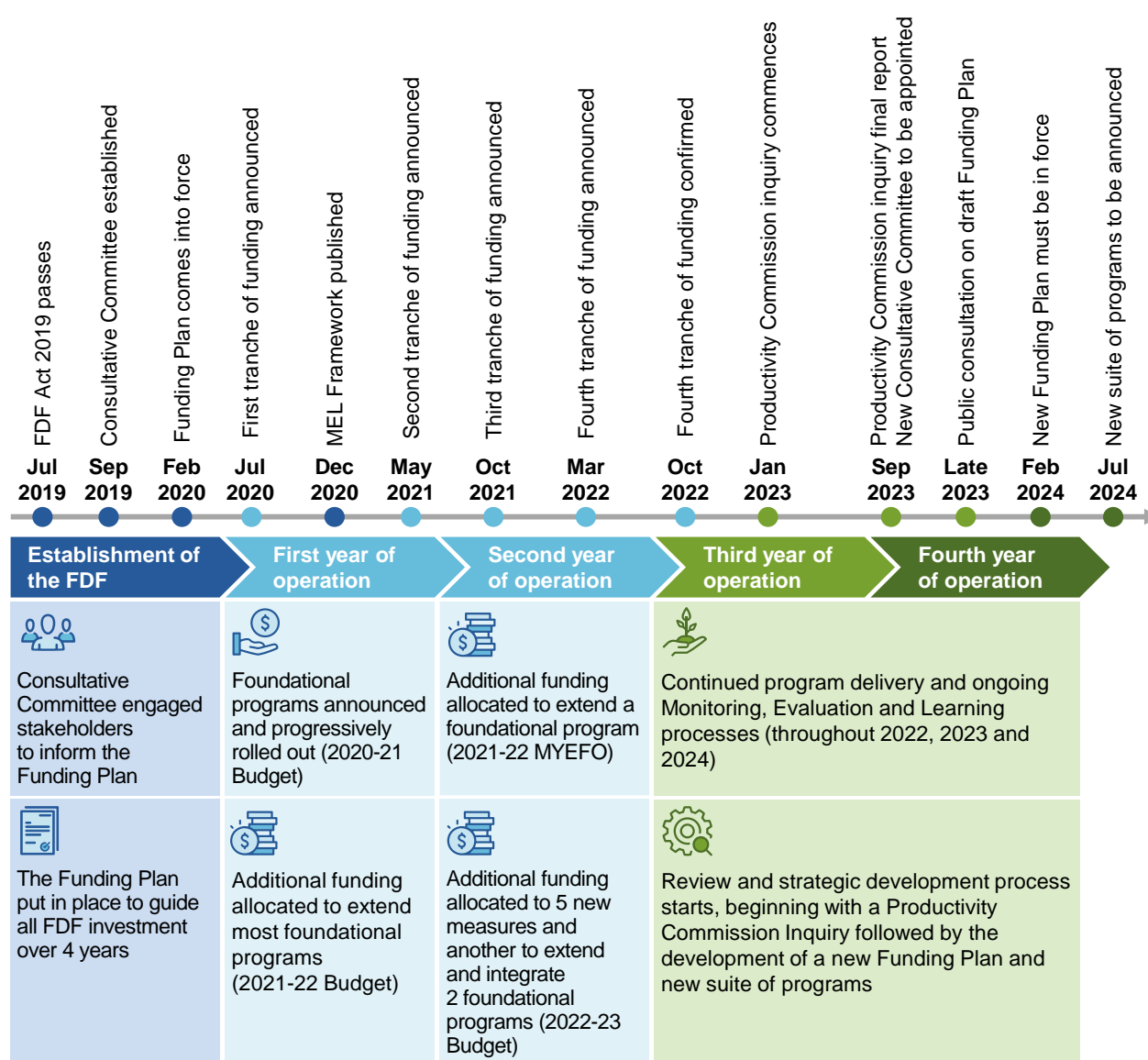
Most programs will make some positive contribution to resilience outcomes. However, a lack of a strategy to guide program integration and sequencing combined with a proliferation of short-term programs implemented quickly, with limited collaboration and knowledge sharing, have limited prospects of sustainable long-term change and improved resilience.

Lack of plan to integrate and sequence programs

The initial FDF programs were developed and implemented without a Fund-wide investment strategy. While the Funding Plan and its principles provide a guide for the activities eligible for investment, they do not set out an investment plan for the four-year cycle (discussed in more detail below).

An incremental approach was taken, with foundational programs stood up – simultaneously – with only one year of funding (figure 2). Though programs were later extended, this approach meant there were missed opportunities early in the cycle to integrate and sequence programs.

Figure 2 – FDF timeline



Source: Adapted from DAFF (sub. 42, p. 15).

For example, the Rural Economies Centre of Excellence (sub. 38, p. 4) pointed to the missed opportunities to use the Regional Drought Resilience Plans to inform the priorities and design of subsequent programs.

There is a logical 'hierarchy' between programs that has not been evident in the roll-out of the various FDF programs. As an overarching plan that articulates drought resilience responses designed for the region, the RDRPs should have commenced either at the very start of the FDF roll out and then informed the other investment programs or been done at the end of the rollout of FDF programs.

The FDF Consultative Committee (sub. 3, p. 5) reiterated this point noting:

Whilst an adaptive approach to program development and implementation has its benefits, we have heard a clear message from our stakeholders that it has caused confusion with 'too many activities happening' without evidence of a clear coordinating strategy behind it. It also results in instability as stakeholders don't have visibility to what could be next. It means that early planning cannot take place, which compounded by short application timeframes, may have resulted in lower quality projects.

Short-term programs risk short-term impacts

Building drought resilience is a long-term goal that requires sustained effort, as behavioural change, capacity building, research, and trialling of new practices all take time to yield meaningful results. Extension and adoption of these practices, as well, demand a concerted effort over time.

Since July 2020, the FDF has released four tranches of funding, including three that extended foundational programs (figure 2). These short-term funding arrangements, characterised by one- or two-year funding cycles, have been identified as a barrier to achieving lasting, meaningful outcomes. Short-term programs do not provide the time for the development and execution of sustainable strategies, nor does it reflect real-world farming conditions. In relation to the *Natural Resource Management Drought Resilience Program*, which received 12 months of funding in 2021-22, the Department of Agriculture, Fisheries and Forestry (DAFF) (sub. 42, p. 8) noted:

By 30 June 2022, more than half of the projects required extensions due to the impacts of COVID-19, and floods. A combination of these factors delayed the ability of grantees to complete face-to-face activities and, to measure, monitor and evaluate their projects. Further, it was difficult to align project activities with relevant seasonal windows, particularly if a seasonal planting window was missed due to adverse weather conditions. Short timeframes also created significant challenges to achieving drought resilience outcomes. For example, project outcomes may have been masked by the impacts of significantly higher than normal rainfall events and floods.

Moreover, insufficient time to set up the required systems to deliver these programs has been a major challenge. This has undermined the ability to plan and coordinate with delivery partners, including state governments. The lack of time has hampered the development of strong partnerships and affected the execution of these programs.

One of the most effective ways to improve the experience of FDF programs for communities would be to increase the timeframes for groups to design, deliver and report on their projects, and to have the flexibility to fund projects, when groups are ready. (FRRR, sub. 37, p. 11)

A longer planning and program timeframe is strongly supported. From an administrative perspective longer timeframes assist with planning, funding arrangements, governance and attracting and retaining staff working on the projects in regional communities. Western Australia is also aware longer timeframes are more reflective of the speed of change of natural systems and would be better aligned to the long-term outcomes identified in the Monitoring Evaluation and Learning Plan outcomes as set out in the FDF program plans. (DPIRD (WA), sub. 46, p. 7)

The timing of the short-term programs has also impeded DAFF's ability to establish a robust architecture around the programs, most notably the MEL plans. Without a solid MEL framework in place, it is difficult to assess the impact of the programs and make necessary improvements to ensure their effectiveness.

Too many disconnected programs created confusion

The number of programs funded through the FDF has added complexity, confused participants and increased administration costs. The Commission has heard that participants struggle to understand and navigate the FDF, an issue compounded by a lack of easily accessible information on what activities are being (or will be) funded in each location. For example, the TAS Farm Innovation Hub (sub. 39, pp. 2–3) noted:

While a strength of FDF is its complementary programs, the number of programs has created confusion among stakeholders and unnecessary duplication by program delivery partners. In Tasmania, the FDF programs compete for the same target audience and rely on many of the same organisations and producers for co-design and implementation ... Better coordination and mapping of state-based FDF funded programs and projects at the outset would have assisted in coordinating programs and on-ground activities.

Similarly, Lu Hogan and Lewis Kahn (sub. 5, p. 3) highlighted:

There are currently multiple programs of activity being funded under the FDF. Many are overlapping in their objectives, attempt to engage with the same audience/target market and compete with existing funded activities delivered by state departments and RDCs.

These concerns are also acknowledged by DAFF (sub. 42, p. 10):

Stakeholders have noted the complexity of the FDF, and that in some cases this has caused confusion and undermined participation. While efforts have been made to promote opportunities and connect stakeholders and investments, stakeholder feedback highlights that more could be done to support a seamless journey into and through the FDF and other drought resilience investments.

Nevertheless, improvements have been made with early lessons about the time it takes to enact meaningful change and the importance of better connections between programs being incorporated. For example, six-year funding is available under the *Drought Resilience Long-term Trials* program and the *Helping Regional Communities Prepare for Drought Initiative* (Helping Regional Communities) attempts to build off and leverage Regional Drought Resilience Plans (section 7).

The level of collaboration has been mixed

Effective collaboration between DAFF, delivery partners and other stakeholders is essential if the FDF is to realise its potential. However, there is evidence that collaboration could be improved (for example, AgForce Queensland, sub. 45, p. 4; Lu Hogan and Lewis Kahn, sub. 5, p. 2; Rangelands NRM Coordinating Group, sub. 50; RECoE, sub. 38, p. 4; TAS Farm Innovation Hub, sub. 39, pp. 2–3).

For example, the Queensland Department of Agriculture and Fisheries (sub. 54, p. 7) argued there was little consultation between the Australia Government and states and territories on the Regional Drought Resilience Planning (RDRP) program, despite states and territories being delivery partners and expected to make a co-contribution:

For some programs, such as the [FBR program] and the RDRP that require co-funding and delivery by state and territory jurisdictions, the Australian Government has made announcements without prior engagement regarding these programs. This means that post announcement, the

relevant state and territory governments must first decide if it will participate in the program, how it will fund its contribution and then formalise a Federation Funding Agreement with the Australian Government. The inevitable result is there has been a considerable delay from when the Australian Government first announces a measure until it is implemented.

The Victorian Department of Energy, Environment and Climate Action (sub. 55, p. 5) also noted the impact of limited collaboration on industry:

Governments, industry, and community groups undertake business and budget planning processes over diverse timescales. Unilateral announcements of new programs under the Fund, and changing parameters within existing programs, often meant that industry and grower groups have had short timeframes to prepare and submit applications, often with limited resources to cover the many calls to develop projects.

That said, inquiry participants have also stated that the FDF has led to improved collaboration in the sector. The Farm System Group Alliance (sub. 15, p. 3) said ‘collaboration has increased between the agencies, institutions and organisations involved within the hub’.

There are barriers to knowledge sharing across the FDF

Knowledge sharing is an important part of building drought resilience and a key rationale justifying public investment in a range of activities. Facilitating knowledge sharing across the FDF supports the diffusion of drought resilience knowledge among primary producers and communities and the application of this knowledge to build drought resilience.

The Funding Plan recognises the importance of knowledge sharing as it includes a funding principle to ‘ensure that all new knowledge is shared and freely made available in the public domain’ (Drought Resilience Funding Plan 2020 to 2024, p. 5). There have been a range of activities implemented to encourage knowledge sharing. For example, there is an annual Science to Practice Forum, a national community of practice for the *Drought Resilience Adoption and Innovation Hubs* (TNQ Hub, sub. 33, p. 1) and a learning network is being established under the new Helping Regional Communities program (section 7).

However, the lack of more formal mechanisms for knowledge sharing and difficulties in accessing and interpreting information on FDF outputs has constrained opportunities for knowledge sharing between FDF participants within and between programs.

While there exists governance mechanisms that allow sharing across states for the RDRP and FBR programs, the Western Australian Department of Primary Industries and Regional Development (sub. 46, p. 6) argued ‘the sharing of information and approaches between those working on Regional Drought Plans could have accelerated the states and territories planning and delivery in the pilot years’.

Learning activities across the FDF appear to be mostly ad-hoc. Participants across the FDF lack deliberate and timely mechanisms to share knowledge and learnings more regularly and directly. The Drought Resilience Funding Plan Mid-Term Evaluation noted:

External delivery partners identified that there are additional opportunities to share knowledge and resources within and between programs and in the public domain, but that clear, consistent and operationalised mechanisms to facilitate this are not yet in place. (Grosvenor 2023, p. 47)

The lack of structured mechanisms to share knowledge within and between programs reflects a more general issue of a lack of coordination and integration across the FDF (discussed above). The Commission heard coordination tended to happen “informally” as a result of personal networks and relationships’, with the lack of coordination leading to the ‘loss of valuable program learning opportunities’ (RECoE, sub. 38, p. 5).

In many cases, information about FDF programs and projects is not publicly available. Some participants noted it was difficult to find information about FDF programs as well as Hub programs (NLN, sub. 18, p. 2; DEECA (Vic), sub. 55, p. 6). There are some reports funded under the FDF that are not publicly available preventing the sharing of knowledge to stakeholders.

Even where information on outputs from FDF programs is publicly available, learning is constrained by the way information is delivered (Nous 2022). As Nous (2022, p. 17) said, ‘the breadth and comprehensiveness of drought resilience knowledge is not the issue for target groups, it is the clarity on what knowledge is available, relevant, and applicable’. The Southern Queensland and Northern New South Wales Drought Resilience Adoption and Innovation Hub (sub. 24, p. 5) raised the importance of trusted networks and informal networks to ‘access and help make sense of the knowledge that is available’.

The lack of structured mechanisms to support knowledge sharing across the FDF and difficulties in finding and interpreting FDF outputs limits the learning opportunities that would support program implementation, building drought resilience and improve the effectiveness of the FDF.



Interim finding 2

Future Drought Fund design and delivery problems will continue to constrain progress unless addressed

While the suite of Future Drought Fund (FDF) programs will likely improve drought resilience, problems with the design and delivery of the FDF and its programs will continue to constrain progress, including:

- a lack of strategy to integrate and sequence programs
- too many disconnected and relatively small programs creating confusion and administrative costs
- barriers to knowledge sharing across the FDF.

The Funding Plan is not a plan

Drought Resilience Funding Plans are legislative instruments made by the Drought Minister for up to four years. The Funding Plan sets out the framework for how FDF funding is allocated and all FDF programs must comply with the Funding Plan. The current Funding Plan is in effect from 2020 to 2024.

The Funding Plan also sets out the FDF’s vision, aim, strategic priorities and objectives, and includes a set of funding principles for all grants and programs. The Funding Plan plays a significant role in influencing the design and selection of FDF programs.

The effectiveness of the 2020 to 2024 Funding Plan is discussed below.

The 2020 to 2024 Funding Plan involved significant consultation

Before a Funding Plan is put in place, the Drought Minister must:

- publish a draft plan, a notice inviting submissions, and any Productivity Commission review of the previous plan
- consider any submissions received
- request advice on the draft plan from the Future Drought Fund Consultative Committee (Future Drought Fund Act 2019 (Cth), s. 32).

The Department and Consultative Committee undertook significant consultation for the 2020 to 2024 Funding Plan. Over 690 people and organisations participated via 73 in person roundtables and public meetings, and 243 survey responses or written submissions (DAFF 2023a).

The top priorities raised through online surveys and submissions were farm business planning, community initiatives, research adoption and extensions, and farming youth and leadership training (DAFF 2023a). Submissions largely supported the funding principles, the triple-bottom line approach and the focus on building long-term drought resilience.

Suggestions to clarify or change parts of the Funding Plan differed across submissions. Several submissions noted that the FDF should: collaborate with organisations that already undertake drought resilience work (such as natural resource management (NRM) groups, Landcare groups, and catchment authorities); be administered in a simple and accessible way for farmers; and facilitate better data collection and information-sharing. Several submissions also discussed water management and infrastructure (DAFF 2023d).

Following the feedback, several changes were made to the draft funding plan (table 3).

Table 3 – Substantial differences between the draft and final Funding Plan

Funding Plan section	Change from draft to final
Background information	<ul style="list-style-type: none"> • Added definition of drought resilience • Added explanation of the Plan's purpose as a framework for spending decisions • Added description that spillover benefits should be for society and the economy
Principles	<ul style="list-style-type: none"> • Added explanation of what the principles apply to • Removed principle 'as far as practicable, evaluate the expected return on investment for all funded programs and projects' • Removed requirement to improve the coordination or integration of state government policies, frameworks and programs
Vision, aim and objectives	<ul style="list-style-type: none"> • Vision broadened to include resilience to the impacts of climate change • Aim broadened to include enhancing the public good in agricultural landscapes and communities
Strategic priority – economic resilience	<ul style="list-style-type: none"> • Added description that investment includes public and private partnerships • Added action about adapting overseas solutions for Australia
Strategic priority – environmental resilience	<ul style="list-style-type: none"> • Added actions about: improving soil health, land cover, water and biodiversity; supporting landholders to undertake voluntary environmental resilience assessments; promoting commercial opportunities and technologies that improve natural capital; and encouraging private sector investment in environmental management • Removed action about exploring new commodities and markets
Strategic priority – social resilience	<ul style="list-style-type: none"> • No major changes

Source: Department of Agriculture (2019b); Drought Resilience Funding Plan 2020 to 2024.

It is important that the development for the next funding plan also provides opportunities for stakeholders to provide feedback, including through in person and online options.

Aspects of the Funding Plan's objectives and strategic priorities could be improved

Most inquiry participants supported the Funding Plan and agree that the vision, aim, strategic priorities and objectives are appropriate (box 4).⁶ For example:

The Drought Resilience Funding Plan (2020-2024) is a good document. It is clear, concise and set the right high-level objectives and actions. (SFS, sub. 43, p. 1)

The Funding Plan is a well-considered document and the funding principles, vision, aim, strategic priorities, and objectives are appropriate. (NACC NRM, sub. 21, p. 2; NRM Regions Australia, sub. 51, p. 4; NRM WA, sub. 13, p. 2)

Box 4 – The Draft Resilience Funding Plan 2020 to 2024 vision, aim, strategic priorities and objectives

Vision

The Fund's vision is an innovative and profitable farming sector, a sustainable natural environment and adaptable rural, regional and remote communities – all with increased resilience to the impacts of drought and climate change.

Aim

The Fund aims to enhance the public good by building drought resilience in Australia's agricultural sector, the agricultural landscape, and communities.

Strategic priorities

The Fund has three inter-connected strategic priorities:

- economic resilience for an innovative and profitable agricultural sector
- environmental resilience for sustainable and improved functioning of farming landscapes
- social resilience for resourceful and adaptable communities.

Objectives

The Fund's three objectives to achieve the strategic priorities will enhance the public good by building drought resilience through programs that will:

- grow the self-reliance and performance (productivity and profitability) of the agricultural sector
- improve the natural capital of agricultural landscapes for better environmental outcomes
- strengthen the wellbeing and social capital of rural, regional and remote communities.

Source: Drought Resilience Funding Plan 2020 to 2024, p. 5.

⁶ For example: Ag Excellence Alliance (sub. 19, p. 1); Agforce Queensland (sub. 45, p. 1); GGA and SW WA Hub (sub. 30, p. 2); GrainGrowers (sub. 12, p. 1); Hydro Tasmania (sub. 40, p. 3); Lu Hogan and Lewis Kahn (sub. 5, p. 1); NACC NRM (sub. 21, p. 2); NFF (sub. 17, p. 8); Northern Hub (sub. 11, p. 3); NRM Regions Australia (sub. 51, p. 4); NRM WA (sub. 13, p. 2); NRMQR (sub. 23, p. 2); Rangelands NRM Coordinating Group (sub. 50, p. 3); RDA Central West (sub. 14, p. 2); Riverine Plains (sub. 29, p. 3); PIRSA (sub. 53, p. 3); SQNNSW Hub (sub. 24, p. 4); TAS Farm Innovation Hub (sub. 39, p. 1); TMI (sub. 6, p. 1); TNQ Hub (sub. 33, p. 1); University of Adelaide (sub. 32, p. 2); University of Melbourne (sub. 48, p. 1); Vic Catchments (sub. 20, p. 1); Vic Drought & Innovation Hub (sub. 28, p. 3).

The Commission considers that the vision and aim are appropriate for the current and future funding plans. The vision is appropriately ambitious and is consistent with the FDF Act and the National Drought Agreement. The aim follows on from the vision and is consistent with the intent of the Fund.

While the vision is appropriate, it should be noted that it includes increased resilience to the impacts of climate change. The Commission is recommending the FDF's scope be clarified to explicitly recognise building resilience to climate change (interim recommendation 1 and section 3).

Given the FDF's focus on economic, environmental and social outcomes, the strategic priorities and objectives were appropriate for the 2020 to 2024 Funding Plan. However, the Commission is considering whether environmental resilience (and particularly where it supports economic resilience) should be a greater priority in the next Funding Plan. In addition, it appears stakeholders often have wide ranging views on what social resilience is, and what activities targeted at social resilience fit in the scope of the FDF. The next Funding Plan should provide greater clarity about social resilience. These issues are discussed in more detail in section 3.

The Funding Plan is silent on other drought policy

Good governance requires clarity on roles and responsibilities. This extends not just to clarifying roles in relation to one another within the FDF, but also making clear the role of the FDF in relation to other policies. Without clarity at this highest level, there is more likely to be confusion, duplication and/or gaps in the broader policy landscape.

The Funding Plan does not articulate how the FDF fits into the broader agriculture policy landscape and how it aligns with other drought and climate change policies and programs. For example, the Australian, state, and territory governments have in place a joint, overarching National Drought Agreement which sets out their respective roles and responsibilities. The FDF is one of the key responsibilities of the Australian Government in the current National Drought Agreement (due to expire in June 2024) (COAG 2018). The Funding Plan makes no mention of this.

The next Funding Plan should articulate how the FDF aligns with other drought and climate change policy and programs.

The Funding Plan lacks an investment strategy

While the 2020 to 2024 Funding Plan's vision, aim, strategic priorities and objectives are broadly appropriate, the Funding Plan provides little in the way of an actual plan.

In addition to the vision, aim, strategic priorities, objectives and principles, the Funding Plan also provides detail on how the strategic priorities could be achieved. But rather than setting out a 'plan' for how the \$100 million a year will be spent, priorities will be achieved, and programs will be selected, integrated and sequenced, it provides detailed lists of all the possible activities that could be undertaken to achieve each priority. The Funding Plan outlines what *could* be done, not what *should* be done.

For example, under the economic resilience strategic priority there are 12 broad activities from 'support the collection, management, public accessibility and application of data and information to improve farm and agri-business decision-making, risk assessment and management' to 'promote approaches that overcome barriers to developing innovative infrastructure or creating new lines of business' (Drought Resilience Funding Plan 2020 to 2024, pp. 6–7).

While this broad approach provides flexibility about investment options, it also gives stakeholders little information about what the FDF will invest in in coming years and why. This information is not available in the public domain. This makes it more difficult for stakeholders to plan their drought resilience activities and to

provide feedback to the Department where planned activities could be improved. It also reduces transparency and accountability.

This issue has also been raised in other reviews. The Drought Resilience Funding Plan Mid-Term Evaluation found:

There is currently limited tactical planning at the FDF level to ensure programs in development can leverage and [complement] the work and outcomes of other programs while addressing existing gaps. While there is some understanding about how the program suite works together and steps are being taken to action these linkages, program planning tends to occur primarily at the individual program level. (Grosvenor 2023, p. 31)

The Senate inquiry into the *Federal Government's Response to the Drought, and the Adequacy and Appropriateness of Policies and Measures to Support Farmers, Regional Communities and the Australian Economy* also found 'a deliberative, transparent process for developing and prioritising projects and funding is required' (SRRATRC 2021, p. 17).

The planned *Drought Resilience Research and Adoption Investment Plan* may have at least partially filled this gap. However, this plan was intended to identify national priorities for drought resilience related research and adoption to guide not just future FDF investments, but also Hub activities and research undertaken by non-FDF entities, such as the CSIRO and RDCs (DAWE 2021, p. 8). As such, it was unlikely to be a perfect substitute for an FDF-specific investment plan. In any event, it appears the plan will not be released (DAFF 2022b, p. 30).

The purpose of the funding principles needs to be clarified

The Funding Plan includes 17 funding principles (box 5) that apply:

- in relation to any arrangements and grants made to a person or body under section 21 of the Future Drought Fund Act 2019; and
- where such arrangements and grants relate to a program of further arrangements and grants to be made by the person or body for the purposes set out in that section, in relation to those further arrangements and grants. (Drought Resilience Funding Plan 2020 to 2024, p. 4)

While we heard from several inquiry participants that they did not actively refer to the principles, most inquiry participants noted their general support for the funding principles.⁷ For example:

DAF considers overall the funding principles of the Drought Resilience Funding Plan are appropriate and are consistent with the objectives of the National Drought Agreement (NDA). (DAF (Qld), sub. 54, p. 2)

The funding principles of the FDF are well documented, clear and succinct ... (Ag Excellence Alliance, sub. 19, p. 1)

... the principles of the FDF are well aligned with the coal face and community embedded practice that regional boards have undertaken for decades. (Name withheld, sub. 34, p. 1)

⁷ For example: Ag Excellence Alliance (sub. 19, p. 1); Agforce Queensland (sub. 45, p. 1); Qld DAF (sub. 54, p. 2); GGA and SW WA Hub (sub. 30, p. 2); GrainGrowers (sub. 12, p. 1); Hydro Tasmania (sub. 40, p. 3); Livestock SA (sub. 26, p. 2); Lu Hogan and Lewis Kahn (sub. 5, p. 1); NACC NRM (sub. 21, p. 2); NFF (sub. 17, p. 8); NRM Regions Australia (sub. 51, p. 4); NRM WA (sub. 13, p. 2); NRMQR (sub. 23, p. 2); Riverine Plains (sub. 29, p. 3); PIRSA (SA) (sub. 53, p. 3); TAS Farm Innovation Hub (sub. 39, p. 1); TMI (sub. 6, p. 1); TNQ Hub (sub. 33, p. 1); University of Melbourne (sub. 48, p. 1); Vic Drought & Innovation Hub (sub. 28, p. 3).

Box 5 – Drought Resilience Funding Plan 2020 to 2024 funding principles

The arrangements and grants will:

1. be consistent with the Vision, Aim, Strategic Priorities and Objectives outlined in this Plan
2. ensure only projects and activities that enhance the public good by building drought resilience are funded. Projects and activities must deliver significant benefits that can be accessed or shared by many (rather than be captured solely by individual businesses or industries solely for commercial gain)
3. not provide in-drought assistance
4. not duplicate or replace existing Commonwealth, state, territory or local government funding programs, and will aim to improve the coordination or integration of existing Commonwealth Government policies, frameworks and programs where they meet the Fund's purpose
5. be delivered in accordance with Commonwealth guidelines where applicable including the Commonwealth Grants Rules and Guidelines 2017, the Commonwealth Procurement Rules 2019 and the Federal Financial Relations Act 2009
6. consider the incremental, transitional and transformational opportunities needed to strengthen drought resilience and encourage innovative proposals
7. support a range of activities or projects at a mixture of levels, such as the farm, regional or national level
8. deliver programs through a user-based lens and, where possible, a community-led, co-design, and/or end-user approach
9. ensure eligibility for programs is streamlined and, where possible, minimise the burden of regulation on businesses, community organisations and individuals
10. recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders
11. where appropriate, use or collaborate with existing community networks, Indigenous organisations and communities, natural resource management organisations, industry and farmer groups
12. use a structured and, where appropriate, contestable process to identify the best value and highest quality ideas, talent and projects
13. as far as practicable, require co-investment to maximise program outcomes
14. consider proposals favourably that have enduring outcomes and avoid creating barriers to change or adaptation
15. consider potential qualitative and quantitative outcomes and expected public benefits as part of the assessment process for all programs and projects – not necessarily in monetary terms – and articulate why the funding is needed to achieve these benefits
16. ensure there are no ongoing operational or maintenance dependencies from the Fund when considering proposals for new or existing infrastructure
17. ensure that all new knowledge is shared and freely made available in the public domain.

Source: Drought Resilience Funding Plan 2020 to 2024, pp. 4–5.

However, it is the Commission's view that while many principles have merit, when considered together, the application of the funding principles is not clear. The Funding Plan implies that all projects receiving funding must be consistent with the funding principles. However, some principles are designed to be achieved collectively by multiple FDF projects and cannot be met by individual arrangements and grants. For example:

- 6) consider the incremental, transitional and transformational opportunities needed to strengthen drought resilience and encourage innovative proposal
- 7) support a range of activities or projects at a mixture of levels, such as the farm, regional or national level
- 10) recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders.

There are also principles that are less focused on the ideal program elements and outcomes, and more focused on elements of the process used to select programs. For example:

- 8) ensure eligibility for programs is streamlined and, where appropriate, minimise the burden of regulation on businesses, community organisations and individuals
- 12) use a structured and, where appropriate contestable process to identify the best value and highest quality ideas, talent and projects.

The purpose of the funding principles needs to be clarified. It is appropriate that the Funding Plan includes both requirements that the FDF and program streams need to meet as a whole and requirements that each arrangement or grant needs to meet. This is discussed in more detail in section 3.

There are issues with some of the principles

Besides the inconsistent application of the principles, there are issues with several principles. Some are unnecessary, unclear and/or not being met in practice. Table 4 provides an overview of the Commission's interim findings on the principles. More information on how the principles have been met in practice can be found in section 7 and suggestions for improving the principles are discussed in section 3.

Table 4 – Commission's early views on the funding principles

Principle	Commission's initial findings
1) be consistent with the Vision, Aim, Strategic Priorities and Objectives outlined in this Plan	<ul style="list-style-type: none"> • No issues.
2) ensure only projects and activities that enhance the public good by building drought resilience are funded. Projects and activities must deliver significant benefits that can be accessed or shared by many (rather than be captured solely by individual businesses or industries solely for commercial gain)	<ul style="list-style-type: none"> • The FDF should only invest in activities where there is a clear role for government - where there is a market failure, such as externalities, information failures or perverse incentives. • Inquiry participants generally supported this principle. However, some raised concerns it could lead to worthwhile projects not being funded. • The principle could be read as implying building drought resilience in and of itself enhances the public good. • It appears the principle has not been applied consistently across the Fund.
3) not provide in-drought assistance	<ul style="list-style-type: none"> • No issues.

Principle	Commission's initial findings
4) not duplicate or replace existing Commonwealth, state, territory or local government funding programs, and will aim to improve the coordination or integration of existing Commonwealth Government policies, frameworks and programs where they meet the Fund's purpose	<ul style="list-style-type: none"> • Avoiding duplication and improving coordination and integration are essential to an effective FDF. However, there is a potential tension between duplication utilising existing networks and organisations and requiring co-investment that will need to be managed. • There are instances where this principle has not been met in practice.
5) be delivered in accordance with Commonwealth guidelines where applicable including the Commonwealth Grants Rules and Guidelines 2017, the Commonwealth Procurement Rules 2019 and the <i>Federal Financial Relations Act 2009</i>	<ul style="list-style-type: none"> • All non-corporate Commonwealth entities are required to comply with these rules and regulations. The principle is unnecessary, but the requirement should be made clear elsewhere.
6) consider the incremental, transitional and transformational opportunities needed to strengthen drought resilience and encourage innovative proposals	<ul style="list-style-type: none"> • The Fund is investing in programs that are expected to lead to incremental, transitional and transformational change. • This principle is more appropriately applied when considering the suite of FDF programs. • As discussed above, the greatest role for government is likely to be in supporting transformational change.
7) support a range of activities or projects at a mixture of levels, such as the farm, regional or national level	<ul style="list-style-type: none"> • The Fund is supporting a range of activities at different levels. • This principle is more appropriately applied when considering the suite of FDF programs.
8) deliver programs through a user-based lens and, where possible, a community-led, co-design, and/or end-user approach	<ul style="list-style-type: none"> • This principle is important, but many FDF activities do not appear to be consistent with this principle. • It is not clear if 'deliver' includes program design, for which co-design and collaboration are important.
9) ensure eligibility for programs is streamlined and, where possible, minimise the burden of regulation on businesses, community organisations and individuals	<ul style="list-style-type: none"> • No issues.
10) recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders	<ul style="list-style-type: none"> • It is not clear what this principle is trying to achieve. 'Recognise' is vague and it is not clear what programs need to do to meet this principle. It could lead to 'box ticking' rather than genuine engagement or partnerships.
11) where appropriate, use or collaborate with existing community networks, Indigenous organisations and communities, natural resource management organisations, industry and farmer groups	<ul style="list-style-type: none"> • An important principle. There is evidence the FDF has contributed to bringing organisations together, however there are many instances where collaboration could be improved. • The principle should refer to 'collaborate and partner' rather than 'use or collaborate'.
12) use a structured and, where appropriate, contestable process to identify the best value and highest quality ideas, talent and projects	<ul style="list-style-type: none"> • No issues.
13) as far as practicable, require co-investment to maximise program outcomes	<ul style="list-style-type: none"> • Requiring co-investment could improve outcomes and reduce FDF investment into activities that generate private benefits.

Principle	Commission's initial findings
	<ul style="list-style-type: none"> • Inquiry participants have raised examples of where the co-contribution requirement may not be appropriate, including for not-for-profit organisations and Aboriginal and Torres Strait Islander organisations
14) consider proposals favourably that have enduring outcomes and avoid creating barriers to change or adaptation	<ul style="list-style-type: none"> • Favourably considering proposals that avoid creating barriers is not strong enough. • Principle could be streamlined.
15) consider potential qualitative and quantitative outcomes and expected public benefits as part of the assessment process for all programs and projects – not necessarily in monetary terms – and articulate why the funding is needed to achieve these benefits	<ul style="list-style-type: none"> • No major issues but could be streamlined and made clearer that it is not about the decision-making process and is about the requirements that arrangements and grants must meet.
16) ensure there are no ongoing operational or maintenance dependencies from the Fund when considering proposals for new or existing infrastructure	<ul style="list-style-type: none"> • It is not clear what is meant by 'infrastructure' (for example, does it mean physical infrastructure or take a broader definition) and, therefore, the implications of this principle are unclear. • Some inquiry participants raised concerns that this principle limits longer-term funding for programs like the Hubs and CSA.
17) ensure that all new knowledge is shared and freely made available in the public domain.	<ul style="list-style-type: none"> • It does not appear this principle is being met. • There is a lack of deliberate and structured mechanisms for FDF participants to share knowledge and learnings regularly and directly (discussed above). • There is a tension between this principle and the FDF's commercialisation focus.

Source: Commission assessment; Drought Resilience Funding Plan 2020 to 2024, pp. 4–5.

Principle 2 – enhancing the public good

Inquiry participants had varied views on principle 2. Some inquiry participants strongly supported this principle (for example, PIRSA (SA), sub. 53, p. 3; SQNNSW Hub, sub. 24, p. 5; Vic Drought & Innovation Hub, sub. 28, p. 3). The University of Melbourne (sub. 48, p. 1) said 'it will be important for the Fund to retain a focus on innovations that support the public good, as that is where market failures occur'.

However, other inquiry participants argued the principle is leading to important projects not being funded (AgForce Queensland, sub. 45, p. 6; GrainGrowers, sub. 12, p. 1). For example, the National Farmers' Federation (sub. 17, p. 9) argued:

The interpretation and application of this principle is prohibiting valuable industry projects from being funded by the FDF. The NFF is not suggesting that the FDF should fund projects which benefit individual businesses or industries solely for commercial gain. However, the NFF suggest that the interpretation of this funding principle should enable the support of projects which provide benefits for groups of producers and/or communities in certain farming regions.

The Local Government Association of Queensland (sub. 22, pp. 8, 9) recommended the principle be amended to 'allow for innovative on-farm pilot projects that support peer-to-peer learning opportunities', and while these projects may initially produce private gains, they should be funded 'as long as those projects are utilised as case studies to increase greater public benefit through adoption rates'.

The Commission has received few examples of important projects that would deliver public benefits not being funded. As well, projects that delivery short-term private benefits should not be funded solely on the basis that they *may* delivery public benefits over the longer term.

That said, it appears that this principle has not been applied consistently across the FDF. For example, Grosvenor (2023, p. 24) noted:

While grant guidelines include requirements for enhancing the public good, it is referred to inconsistently and some address it more directly than others. There was some limited feedback that questions related to public good were often poorly answered by grant respondents.

The Commission's view is the FDF should only invest in activities where there is a clear role for government – that is, where correcting for market failures, such as externalities, information failures or perverse incentives leads to an increase in net public benefits (section 1).

Principle 4 – avoiding duplication and improving coordination and integration

While avoiding duplication and improving coordination and integration is essential to the Fund's effectiveness, as discussed above and in section 7 there are several cases where this principle has not been met. This was also noted by inquiry participants (for example, DPIRD (WA), sub. 46, p. 2; Rangelands NRM Coordinating Group, sub. 50, pp. 3–4; RECoE, sub. 38, p. 4). The Local Government Association of Queensland (sub. 22, p. 9) stated:

The LGAQ and its members believe the Funding Plan's objectives are based on the principle that state, territory and federal government funded drought programs are mutually exclusive with little duplication. Unfortunately, in practice this approach has had the opposite effect, with drought funding across agencies creating a patchwork quilt of funding providers and programs, with little to no cross-departmental coordination.

The Drought Resilience Funding Plan Mid-Term Evaluation noted that coordination work is in its early days and 'there are opportunities to better integrate the program suite through an increased focus on portfolio management' (Grosvenor 2023, p. 25).

Principle 13 – co-investment

Used well, requiring a co-investment could improve funding outcomes and minimise FDF investment into activities that generate private benefits. However, some inquiry participants have raised practical issues with this principle. For example, the Farming Systems Group Alliance (sub. 15, p. 3) and Ag Excellence Alliance (sub. 19, p. 2) argued that non-for-profit organisations have limited ability to provide a co-contribution. Requiring co-investment could also be a barrier to Aboriginal and Torres Strait Islander organisations and people participating, due to limited resources (section 6).

The Commission agrees that this principle should not create barriers to people and organisations participating in the FDF where co-investing would be understandably difficult. The principle only requires a co-investment where it is practicable, and there are cases where a co-investment has not been required.

Principle 16 – no ongoing operational or maintenance dependencies

Some inquiry participants raised concerns with the principle that there should be no ongoing operational or maintenance dependencies from the Fund when considering proposals for new or existing infrastructure. For example, the CSIRO (sub. 8, p. 4) said:

Care needs to be taken that the adherence of Principle 16 in the funding plan ... does not limit funding of programs across multiple funding rounds if that will provide the time and resources to facilitate the desired outcome of improved drought resilience.

It is not clear what is meant by 'infrastructure'. Depending on the definition, programs that will likely provide long-term benefits and are unlikely to be provided by the private market, such as CSA and the Hubs, may be ineligible for longer-term funding. The short-term funding for these programs has led to a range of issues (discussed in further detail above and in section 7).



Interim finding 3

The Funding Plan does not provide clear guidance on planning, strategic sequencing and prioritisation of programs

The vision, aim, strategic priorities and objectives of the Drought Resilience Funding Plan 2020 to 2024 are broadly appropriate and consistent with the *Future Drought Fund Act 2019* (Cth) and the National Drought Agreement.

However, the Funding Plan does not identify priorities or guide decisions about the mix of programs. Instead, the Funding Plan includes detailed lists of a wide range of the types of activities that could possibly be funded. The absence of an overall strategy has likely contributed to a lack of appropriate sequencing and integration of programs.

Many of the funding principles are ambiguous, could be strengthened and/or are not being applied in practice. It is also unclear whether they are intended to be applied across the suite of Future Drought Fund programs or apply to each arrangement and grant.

3 The next steps for the Future Drought Fund

The next Funding Plan is required to be in place in February 2024. This provides an opportunity to build on the foundations laid by the first Funding Plan, applying the lessons learnt in the Fund's first four years. The Commission is seeking views on several options to improve the FDF, including:

- more explicit recognition of resilience and adaptation to climate change
- prioritising the objectives and outlining how the FDF will achieve them
- renewing the program theory
- developing an investment plan to guide selection of programs and activities
- improving opportunities for learning and knowledge transfer
- having fewer programs, that are better integrated, delivered at greater scale, with longer timeframes and that prioritise transformational change
- clarifying the purpose and application of the funding principles.

More explicit recognition of climate change

The current scope is ambiguous

The terms of reference ask the Commission to 'consider the merits of broadening the scope of the Fund to support resilience to climate change for the agriculture sector and communities dependent on agriculture'.

The scope of the FDF is set by the FDF Act and the Funding Plan. However, there are inconsistencies between the Act and the Funding Plan. In the Act, drought resilience is defined as:

- (a) resilience to drought; or
- (b) preparedness for drought; or
- (c) responsiveness to drought; or
- (d) management of exposure to drought; or
- (e) adaptation to the impact of drought; or
- (f) recovery from drought; or
- (g) long-term drought-related sustainability of farms and communities that:
 - (i) have been affected by drought; or
 - (ii) are being affected by drought; or
 - (iii) are at significant risk of being affected by drought (Future Drought Fund Act 2019 (Cth), s. 5)

However, the Funding Plan defines drought resilience more broadly as:

... the ability to adapt, reorganise or transform in response to changing temperature, increasing variability and scarcity of rainfall and changed seasonality of rainfall, for improved economic, environmental and social wellbeing. (Drought Resilience Funding Plan 2020 to 2024, p. 3)

The hazards identified in the Funding Plan's definition are generally more closely aligned to climate change than drought. The Funding Plan's vision also mentions climate change:

The Fund's vision is an innovative and profitable farming sector, a sustainable natural environment and adaptable rural, regional and remote communities—all with increased resilience to the impacts of drought and climate change. (Drought Resilience Funding Plan 2020 to 2024, p. 5)

Should the Fund explicitly target climate change resilience?

Most inquiry participants supported including climate change resilience in the scope of the Fund.⁸ Many argued that the FDF already funds activities that assist with adaptation to climate change. Lu Hogan and Lewis Kahn (sub. 5, p. 3) noted:

At the UNE hosted Armidale Node of the Hub for SQNNNSW we have already moved towards providing solutions to climate change and climate variability not just drought.

In practice, the distinction between preparing for drought and supporting climate change adaptation can be fine. Enhancing on-farm natural capital, for example, can address both risks (NRM WA, sub. 13, p. 4). As well, drought is only one of many climate-related risks for farmers and regional communities (Lu Hogan and Lewis Kahn, sub. 5, pp. 2–3). The Commission stated (2009, p. 167) in its review of government drought support:

... 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

⁸ For example: ALCA, sub. 16, p. 2; ATSE, sub. 7, pp. 1–2; CSIRO, sub. 8, p. 4; DEECA (Vic), sub. 55, p. 4; FRRR, sub. 37, p. 12; FSGA, sub. 15, p. 2; GGA and SW WA Hub, sub. 30, p. 5; Hydro Tasmania, sub. 40, p. 3; Institute for Water Futures, sub. 25, pp. 5–6; La Trobe University, sub. 35, p. 3; LGAQ, sub. 22, p. 10; Lu Hogan and Lewis Kahn, sub. 5, pp. 2–3; NACC NRM, sub. 21, p. 4; NLN, sub. 18, p. 4; NRM Regions Australia, sub. 51, p. 2; NRM WA, sub. 13, p. 4; NRMQR, sub. 23, p. 4; DAF (Qld), sub. 54, p. 6; Rangelands NRM Coordinating Group, sub. 50, p. 7; Riverine Plains, sub. 29, pp. 8–9; SFS, sub. 43, p. 6; Southern NSW Innovation Hub, sub. 56, p. 5; TAS Farm Innovation Hub, sub. 39, p. 2; Tasmanian Government, sub. 52, p. 2; TMI, sub. 6, p. 3; TNQ Hub, sub. 33, pp. 2–3; University of Adelaide, sub. 32, p. 3; University of Melbourne, sub. 48, p. 1; Vic Drought & Innovation Hub, sub. 28, p. 4.

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.

Moreover, climate change is expected to make these events, including drought, more frequent and severe (section 1). Ensuring the wellbeing and resilience of regional industries and communities will require adaptation to the full spectrum of climate-related impacts.

Including climate resilience will also foster a more holistic approach to building resilience. If the Fund maintains its priority on drought over other risks, there is a possibility that less valuable drought-specific proposals may be funded instead of other activities that may have better resilience outcomes. The Mulloon Institute (sub. 6, p. 3) said:

This would potentially drive a more holistic view of farm management and enable a focus on landscape scale repair (including landscape rehydration) that addresses both drought resilience and climate change.

In addition, adaptation to drought may not always align with adaptation to climate change. By focusing exclusively on drought, the Fund could inadvertently undermine, or at least shift efforts away from, building resilience to climate risks. Preparing for an event (such as the next drought) may promote a different outlook – and different responses – than adjusting to long-term trends that includes increased variability and heightened climate extremes. This focus on planning for an event may diminish the prospects of the Fund stimulating essential, transformational change. La Trobe University (sub. 35, p. 3) said ‘the current focus on “Drought” constrains consideration of the broader climate exposure risk of the sector’.

Businesses and communities are trying to build resilience to all future risks, not just drought. Explicit recognition of climate resilience would shift the focus of the FDF from preparing for a singular event to adapting to the ‘new normal’. At the community level, people are already considering drought within broader discussions around climate change (FRRR, sub. 37, p. 12; Tasmanian Government, sub. 52, p. 2). Recognising climate resilience would also acknowledge the varied impacts climate variability has on communities, including that for many communities the term ‘drought’ does not resonate (for example, multiple dry years are not considered ‘drought’ but rather a new normal), and potentially enhance community engagement with the FDF.

Focusing solely on drought amidst so much Climate Variability weakens the relevance and effectiveness of our communications and programs when we are not addressing a current climate problem. (FSGA, sub. 15, p. 2)

However, the Commission notes some inquiry participants have concerns about including climate change resilience. The National Farmers’ Federation (sub. 17, p. 7) and Livestock SA (sub. 26, p. 4) stated that an expansion in scope must be accompanied by an expansion in funding. And GrainGrowers (sub. 12, p. 2) said:

GrainGrowers supports expanding the funding principles to support resilience to climate change more broadly, on the proviso this expansion is facilitated by additional funding on top of the current allocation. It would be [detrimental] if current funding was split between several purposes and the value to industry diminished as a result.

The Rural Economies Centre of Excellence (sub. 38, p. 7) argued the Fund’s focus should remain on drought and stated:

Our experience in working with communities across Queensland would suggest that “drought” has provided an excellent focal point for community engagement and interaction. Drought-affected communities understand what they are being asked about, what the key issues/problems are and are keen to articulate a wide variety of proposed resilience actions. For many people in Australia’s rural and regional areas, drought is not a concept, it is visceral and part of their lived experience.

AgForce Queensland (sub. 45, p. 4) also raised concerns that broadening the Fund's scope could 'come at the cost of the focus on our agricultural sector and the primary goal of minimising the triple bottom line impacts of drought'.

Other concerns raised with the Commission included:

- it could lead to more uncertainty about the Fund's priorities and intended outcomes
- many communities already understand and are engaged with 'drought'
- climate change is a politically contentious issue for some communities
- drought is distinct from other climate impacts, given its slower onset and uncertain duration, and it requires a dedicated response
- it could lead to duplication with other government policies and programs that address disaster preparation, response and management.

The FDF should recognise resilience to climate change as a priority

The Commission supports clarifying the scope of the FDF to include building resilience to climate change. While the Funding Plan's vision already includes resilience to climate change, it does so in a way that is open to interpretation. The aim should be updated and other changes to the Funding Plan considered, to explicitly recognise building climate change resilience as within scope and provide information about the types of climate change resilience activities that will be funded.

The Commission understands the concerns of some inquiry participants that more formal recognition of a broader set of risks beyond drought, could lead to uncertainty about Fund priorities (for example, would it include mitigation activities) and may decrease support for existing FDF activities. The Commission is seeking more information on how the next Funding Plan should define what activities will and will not be funded, given the limited resources available to the Fund.

To address some of the concerns of inquiry participants about uncertainty, the Commission is seeking views on options to tighten FDF objectives and priorities through an updated theory of change and a more detailed Funding Plan, with clearer funding principles to ensure activities remain targeted and effective (discussed below).



Interim recommendation 1

Building resilience to climate change should be more explicitly recognised as an objective

The scope of the Future Drought Fund should be clarified to explicitly recognise building resilience to climate change.



Information request 1

Explicitly recognising climate change resilience as a priority for the Future Drought Fund could increase the types of activities eligible for funding. The Commission is seeking views on this proposed change, including:

- given the limited resources available to the Fund, what climate change resilience activities should and should not be funded?
- whether changes are needed to the governance arrangements of the Fund.

Prioritising objectives

The Fund's vision and aim are ambitious and broad. With finite funding greater prioritisation is needed around the Fund's objectives to maximise outcomes. The Commission is considering the following priorities for the next Funding Plan. More broadly, any future changes made to the objectives should be considered in conjunction with input from the proposed Aboriginal and Torres Strait Islander working group (section 6).

Prioritising environmental actions that also improve economic resilience

One option raised by some inquiry participants is to give greater priority to enhancing environmental resilience (for example, NRM Regions Australia, sub. 51, p. 2; NRM WA, sub. 13, p. 2; TMI, sub. 6, p. 3). The argument is that, over time, agricultural landscapes with healthy natural capital are productive, sustainable and resilient to shocks.

In recent history, the focus of government extension services in agriculture has shifted from supporting agricultural production to environmental outcomes through programs such as Landcare. As highlighted in the Commission's 2009 inquiry into Government Drought Support, production-oriented extension activities provide benefits that largely accrue to private farmers. Services that promote environmental outcomes benefit the community more broadly, so government provision is more justified (PC 2009, pp. 188–191).

Agricultural production systems rely on the natural capital of landscapes and the ecosystem services that flow from them. Services include biological pest control, pollination, provision of water, as well as soil structure and fertility. Natural capital also provides less tangible ecosystem services such as biodiversity and carbon sequestration, which are distinct public goods (Power 2010). Australian farmers are important landscape stewards and actively manage natural capital, delivering both private and public benefits.

In addition, conventional agricultural practices have been a major contributing factor to environmental degradation globally (Garibaldi et al. 2017). In recent times, there has been an increased emphasis on the sustainable intensification of agricultural landscapes, increasing the productivity of landscapes while also improving ecological and social conditions, through initiatives such as climate smart agriculture. However, there are obstacles to the uptake of such practices (Damon, Zivin and Thirumurthy 2015; Michler et al. 2019; Zhang et al. 2007).

Other reasons to consider a stronger focus on environmental outcomes include:

- activities that improve the environment's capacity to cope with greater climate extremes may be more likely to lead to sustainable long-term impacts
- economic and social investments alone will not provide sustained resilience for farmers and communities if landscapes are not well-positioned to cope with a changing climate
- the FDF is well-placed to invest in these activities given it can fund long-term landscape-scale projects
- economic resilience will still be supported by targeting activities which leverage the strong causal links between better natural resource management and supporting improved productivity and economic outcomes for farmers.

The Commission recognises the FDF already funds activities that, to varying degrees, to improve natural resource management. However, the Commission is considering whether the next Funding Plan should increase its focus on these activities, particularly where there is a strong link between improved environmental outcomes and greater productivity for farmers. As far as possible, programs should support initiatives which generate more than just benefits for an individual landowner. For example, collaborative projects involving a critical mass of landowners in a catchment or other discrete area can create positive spillover benefits to the community.



Information request 2

The Commission is seeking views on whether and how the Future Drought Fund can achieve greater environmental and economic resilience through more investment in natural resource management activities.

The Commission is also seeking views on:

- how existing programs could be adjusted, and what activities should be funded, to achieve mutually reinforcing environmental and economic benefits
- how these outcomes – and the causal links between actions and improved resilience – could be best measured
- how Future Drought Fund activities should interact with the National Landcare Program and other natural resource management programs.

Identifying the FDF's role in fostering social resilience

The effects of drought – economic, environmental and social – extend well beyond the farm gate. A perennial criticism of past in-drought assistance was the dearth of support for regional communities. The FDF addresses this point through its triple bottom line of economic, environmental and social resilience.

Social capital can help communities build social resilience and withstand the impact of drought (box 6). However, most of the research describes the importance of social resilience rather than identifying how governments can foster it. Past work by the Commission noted the lack of empirical research into the effectiveness of government social capital programs (PC 2009, p. 413), and this is still the case.

Box 6 – Forms of social capital that support individual and community resilience

Social connections and community participation

Various studies have identified the positive impact on social resilience from strong connections among family, friends and community. For instance, McManus et al. (2012) measure social resilience using perceptions of community spirit in two rural regions of New South Wales that experienced significant drought. They find social and community life did not decline in part because farmers actively sought social participation, often motivated by relative isolation in rural areas. This comes largely from informal connections with neighbours and family and also formal connections through participation in sporting, volunteering and environmental groups.

Other studies have highlighted the importance of shared cultural, economic or recreational interests for social networks (Buikstra et al. 2010), as well as being valued within a community and people building informal support networks from knowing each other (Hegney et al. 2007).

Caldwell and Boyd (2009) interviewed farming families impacted by drought and found the main collective coping strategies were largely informal – including support from family, involvement in community groups like the local football club, debriefing with community at the local pub and strong social connections from growing up in an area.

Box 6 – Forms of social capital that support individual and community resilience

Leadership

Local leadership is often brought up as an important factor for drought resilience and broader disaster management in communities. This is typically based on perceptions that community leaders provide vision and encouragement for the community to proactively adapt to the challenges of drought (Kulig, Edge and Joyce 2008; Buikstra et al. 2010; Dale, Ling and Newman 2010; Raheem et al. 2019). However, studies have not investigated the extent to which provision of formal leadership training can produce local leaders and the extent that they arise naturally from strong community engagement and opportunities to lead.

Professional networks

Research often highlights the importance of social capital for resilience in terms of professional networks in the agriculture sector. For instance, the OECD (2020) argues that social capital in the form of professional networks between producers, industry organisations and government can be important to ensure resilience policy is effectively communicated and targeted. The OECD notes various international research finds the adaptive capacity of farmers is enhanced by extended networks outside of local social groups that enable sharing of resources, knowledge and innovations (for example, Darnhofer 2010; Tompkins and Adger 2004; Wreford, Ignaciuk and Gruère 2017). Research sometimes refers to this as 'bridging capital' because it reflects the extent that a community has exposure and links to outside resources and ideas to support adaptation and transformative practices (Kerr 2018).

In Australia, Dowd et al. (2014) find that strong external networks and weak social/community ties tend to be associated with more transformational change in the agriculture sector because individuals are more exposed to innovative practices and have less pressure to adhere to traditional practices and norms imposed by peers and industry connections.

The research also points out that social resilience is a complex concept and it is difficult to determine precisely what factors enhance social resilience for different communities at different times (Schlosberg et al. 2018).

The absence of empirical evidence does not necessarily mean there is no role for government involvement; however, it creates challenges for governments designing programs, not the least being what factors need to be targeted, monitored and measured. There is a clearer argument for government support through health and social services, such as mental health care (Buikstra et al. 2010; Polain, Berry and Hoskin 2011; Vins et al. 2015; PC 2020).

The National Rural Health Alliance (sub. 27, p. 2) noted that young farmers who are financially constrained and geographically isolated are more likely to experience severe impacts on their mental health from drought. They highlighted several barriers to mental health services for rural farmers:

This population group already faces barriers to help-seeking and accessing care due to sociocultural factors, availability of health services, and structural barriers such as travel and cost. These drivers of inequity are an important consideration for mitigating against some of the mental health impacts of drought.

However, the FDF is not the only source of funds to support these services. There are many possible ways to build social resilience – and many are addressed by Australian, state, territory and local government policies and programs, raising the question of what gaps the FDF should fill.

The Australian, state and territory governments support infrastructure, community projects and strategic planning for regional development. As at May 2017, it was estimated that the Australian Government committed \$20.9 billion in expenditure on regional programs, that included programs targeting health services, infrastructure, jobs, investment and community wellbeing (PC 2017, p. 68). The Australian Government funds a range of regional development policies with similar objectives to those of the FDF's *Better Prepared Communities* theme:

- The Growing Regions Program will invest \$600 million over three years in critical regional infrastructure and community projects across regional and rural Australia. The objectives of the fund are to support community infrastructure where there are identified gaps, contribute to community socio-economic outcomes and align with regional priorities (DITRDCA 2023c).
- The Strong and Resilient Communities Program will invest \$63 million over five years to strengthen the capacity of communities experiencing disadvantage to become more resilient and inclusive (DSS 2022).
- The Investing in Our Communities Program and the Priority Community Infrastructure Program will allocate \$349.9 million and \$1 billion respectively, over five years. Both programs are intended to build resilient communities through social and community facilities; improving community amenities, accessibility and liveability; and supporting economic opportunity (DITRDCA 2023a, 2023b).
- The Building Resilient Regional Leaders Initiative (pilot) will invest \$5 million over two years for current and emerging regional leaders to develop leadership and resilience skills to support their local communities through future economic challenges (DITRDCA 2022).

On the other hand, it is possible that the Fund will prioritise drought-impacted communities or drought-related activities that would otherwise be overlooked through broader competitive grant processes. It is also possible that the focus on drought creates significant differences in the activities of these programs. For instance, general leadership training may not adequately cater to drought-related leadership skills and knowledge that the Drought Resilience Leaders program can deliver. Nonetheless, overlap is clearly present, and it remains unclear whether the FDF is providing enough value-add to justify these additional activities.

Given the FDF's limited funds, and the range of government policies and programs affecting social resilience, the Commission is seeking views on the role of the FDF in building social resilience. The next Funding Plan should also clarify what activities will and will not be funded to build social resilience.



Information request 3

The Commission is seeking views on how the Future Drought Fund can best support social resilience, considering the roles that state, territory and local governments play.





The Commission is also seeking views on:

- whether existing programs (outside the Better Prepared Communities theme) could be adjusted to better achieve flow on benefits for social resilience, and if so how
- how social resilience outcomes can be best measured.

There are opportunities to strengthen the theory of change

The FDF's theory of change sets out a hypothesis of how economic, environmental and social resilience each contribute to realising the vision of the FDF (figure 3). The theory of change and the program logic (figure 1) forms the program theory for the FDF.

Figure 3 – Theory of change

If ...	Then ...	Has the impact of ...	To create transformational change ...	Contributes to the vision of ...
				
<p>If there is more drought resilience RD&E and new technologies are developed and made more accessible ...</p> <p>If primary producers have more of the data and information (including climate forecasts) they need for farm and agribusiness decision-making ...</p> <p>If primary producers and agribusinesses have increased business planning and risk management capability ...</p>	<p>Then more primary producers will adopt transformative technologies and approaches and so will be able to respond effectively to drought.</p> <p>Then their risk assessment and management will be more accessible, tailored and useable.</p> <p>Then their strategic business planning and risk assessment will be more effective, and will mitigate their financial exposure to drought.</p>	<p>Agricultural businesses are self-reliant, productive and profitable</p>	<p>Healthy businesses interact with and contribute to a complex wider agricultural system and economy</p>	<p>An innovative and profitable farming sector, a sustainable natural environment and adaptable rural, regional and remote communities – all with increased resilience to the impacts of drought and climate change.</p>
<p>If primary producers better understand the state of their natural capital and have increased awareness of best practice NRM techniques and services ...</p> <p>If primary producers implement drought plans and adaptive and transformative approaches to manage natural capital ...</p>	<p>Then, given they have an incentive to act, they will be better positioned to preserve and enhance their natural capital.</p> <p>Then they will better manage natural resources through drought, and the natural capital of agricultural landscapes will be improved for better environmental outcomes.</p>	<p>Agricultural landscapes are functional and sustainable, with healthy natural capital.</p>	<p>Environmental management is connected across landscapes, with primary producers collectively responding to feedback and maintaining diversity across whole systems'.</p>	
<p>If community leaders exercise their leadership skills confidently and if community members participate in social and professional community networks and interagency partnerships ...</p> <p>If information and knowledge on drought preparation and planning is shared in communities and led by community leaders ...</p>	<p>Then there will be greater connectedness, purpose and stronger social capital within communities that supports drought planning and efforts to build drought resilience.</p> <p>Then communities will proactively plan and prepare for drought in well-informed and innovative ways.</p>	<p>Agricultural communities are resourceful, adaptable and thriving.</p>	<p>Agricultural communities respond to drought cohesively and effectively, drawing on social capital, collective preparedness, and inclusive community networks.</p>	

Source: DAWE (2020c, p. 11).

Moving into the next Funding Plan provides an opportunity to strengthen the theory of change and incorporate changes to the scope and objectives of the FDF in the theory of change, such as those recommended by the Commission.

The theory of change could better describe how strategic priorities of economic, environmental and social resilience are mutually reinforcing, and explicitly describe how the FDF's activities aim to achieve these priorities in an integrated way. There is little doubt that improving one form of resilience may have positive effects on one or both other forms. But being more targeted about the linkages would help policy makers and program developers to decide where the best (direct and indirect) results can be achieved.

The FDF's theory of change could also better:

- define the intended outcomes of the FDF and its activities
- describe how FDF programs should work together within a broader agriculture system to drive incremental, transitional and transformational change
- consider the need to change systems to support transformational change, and articulate the rationale for prioritising key leverage points which would create maximum change
- articulate roles of key participants and their networks (for example, natural resource management groups, grower groups, RDCs and innovation institutions)
- be used to guide what the Fund should strategically invest in, and in what sequence, in the short, medium and longer term
- outline the assumptions between activities and outcomes – for example, what is assumed to also need to occur for primary producers to use information generated to inform their practices?

Given the likely benefits of a well-developed theory of change and the flow on effects to program design and identification, sequencing of programs, prioritisation of resources and monitoring and evaluation, sufficient time, resources and capability should be dedicated towards developing the next theory of change.



Information request 4

The Commission is seeking views on:

- the extent to which the suite of programs, as well as individual program design and program monitoring, evaluation and learning plans, align with the theory of change and program logic
- how the program theory, and its use, can be improved to better guide investment, prioritisation, program design and monitoring, evaluation and learning in the next Funding Plan period.

Providing a detailed investment plan

While the Funding Plan includes objectives and strategic priorities, it does not explain how funds should be allocated across the various themes and programs to achieve these outcomes (section 2). Without a clear strategy integrating programs and directing funds to the most productive activities, there is a risk that the FDF will be a loose set of programs, largely operating in isolation.

The next iteration of the Funding Plan should be accompanied by an investment plan describing the FDF's investment priorities and future funding activities. Having a detailed investment plan in an accessible public document will ensure that all stakeholders understand the FDF's past and present funding activities, and help stakeholders understand how FDF funds are distributed across objectives and programs, improving transparency and accountability.

The investment strategy should provide information on:

- the FDF's investment priorities
- the funding process, including how funding is to be delivered (for example, through a grant round or via a delivery partner)
- how funding is monitored and reported on
- the sequence and scale of FDF funding activities over the Funding Plan period
- the outcomes the funded activities are expected to achieve and how they contribute towards FDF's objectives
- how the funded activities work together.

The investment plan should be contained in a separate document rather than as part of the Funding Plan, as it does not need to be a legislative instrument. This will allow for the investment plan to be adjusted if needed.

The Investment Plan of the Medical Research Future Fund – another Australian Government investment fund – may be a useful model for the FDF (box 7).

Box 7 – The Medical Research Future Fund's 10-year Investment Plan

The Medical Research Future Fund (MRFF) is a \$20 billion Australian Government investment fund that was established in 2015. It provides about \$650 million a year for medical research and innovation.

A variety of strategies and frameworks determine what the MRFF funds. At a high level, the MRFF's Strategy, Priorities and funding principles outline how the Australian Government should direct MRFF funding. The MRFF Strategy and Priorities are developed every few years by an independent advisory board who consult with the public.

The MRFF outlines its investment strategy in greater detail in its 10-year Investment Plan. Some features of the 10-year Investment Plan include:

- information on the amount of funding each MRFF initiative will receive each financial year over the next 10 years
- information on the amount of funding each MRFF initiative has received to date
- description of how the 10-year Investment Plan aligns with the MRFF's Strategy and Priorities
- description of which MRFF initiatives relate to specific MRFF priorities
- brief descriptions of what the funding for each MRFF initiative will be used towards
- information on the number and value of activities supported to date for each MRFF initiative.

Source: DHAC (2022); DoH (2022).

Improving opportunities for learning and knowledge sharing

As discussed in section 2, learning opportunities across the FDF have been constrained because of a lack of structured and deliberate mechanisms to encourage knowledge sharing within and between programs, as well as difficulties in accessing and interpreting available information.

There should be more formal mechanisms to enable and encourage the sharing of knowledge and learnings across the FDF on a regular basis. Multiple mechanisms are needed to promote different types of learning and target different groups of people.

The Drought Resilience Funding Plan Mid-Term Evaluation highlighted continuing informal mechanisms and establishing new formal mechanisms to support knowledge sharing and capability uplift, including internal knowledge sharing, coaching and mentoring, peer to peer learning and communities of practice (Grosvenor 2023, p. 41). It found knowledge sharing to support adoption needs to be an ongoing focus:

A clear strategy and mechanisms for identifying, collating, sharing (and achieving use) of the different types of knowledge products generated by the FDF would enhance the delivery of the Funding Plan ... (Grosvenor 2023, p. 47)

There is merit in developing a clear strategy that encourages different mechanisms for knowledge sharing. One key mechanism that should be established is a knowledge management system. Nous Group (2022, p. 4) found 'the drought resilience knowledge ecosystem is complex' and 'there is a desire among all stakeholders for more streamlined knowledge pathways, in the form of a single repository, helping to understand what knowledge is available, relevant, and applicable'.

Nous Group (2022) provided advice on potential options for a drought resilience knowledge management system to improve the flow of FDF and non-FDF knowledge.⁹ Similarly, National Landcare Network (sub. 18, pp. 1, 2) suggested a Hub portal to collate and synthesise Hub programs, initiatives and priorities to improve awareness and engagement.

To the extent the complexity of drought and climate change resilience and FDF information acts as a barrier to applying drought and climate change resilience knowledge, a central platform with all FDF and/or non-FDF knowledge could reduce informational barriers to building drought resilience.

A central platform could also support program managers in better program design and implementation by improving the sharing and accessibility of knowledge and lessons from other programs or program managers. It could potentially be used to facilitate the implementation of other mechanisms to further promote knowledge sharing across the FDF.



Interim recommendation 2

Establishing a drought and climate change resilience knowledge management system

The Australian Government should establish a drought and climate change resilience knowledge management system to facilitate sharing of Future Drought Fund and other drought and climate change resilience knowledge.

Future FDF programs

The next FDF Funding Plan should have fewer programs, that are better integrated, delivered at greater scale and with longer timeframes. The suite of programs should also prioritise activities that are most likely to generate the greatest public benefit – that is, those that support longer-term transformational changes and generate the greatest spillovers.

Guided by these findings and the program-by-program evaluation in section 7, the Commission is considering the following for the 2024 to 2028 Funding Plan (figure 4):

⁹ The report was provided as advice to the Department and was considered among a number of other inputs in order to inform considerations about knowledge management options.

- continuing funding for the Better Climate Information theme. However, we are requesting further information around the feasibility of integrating DR.SAT into CSA
- continuing funding for the *Farm Business Resilience Plans*, but more explicitly integrating them with other FDF programs and having a stronger focus on natural resource management
- reforming the RDRP program to improve integration with other FDF programs, governance and public reporting
- continuing funding for the Hubs, but with improved guidance for the Hubs, a review of Hubs' effectiveness and a MEL plan for the Hub program as a whole
- extend funding for *National Enabling Activities* including funding for the Science to Practice Forum and a knowledge management system
- rationalise and reform grant programs, including:
 - assuming there is a role for innovation, reforming the Drought Resilience Innovation Grants program to target it towards *specific* resilience problems
 - continue funding for *Extension and Adoption of Drought Resilience Farming Practices Grants*
 - continue funding for Drought Resilience Long-term Trials
 - continue funding for the Drought Resilience Soils and Landscapes grants
 - let funding lapse for *Drought Resilience Scholarships* and *Drought Resilience Commercialisation Initiative*.
- reforming the *Helping Regional Communities Prepare for Drought Initiative*. The Commission is seeking views on how to better target the program.

Improving the funding principles

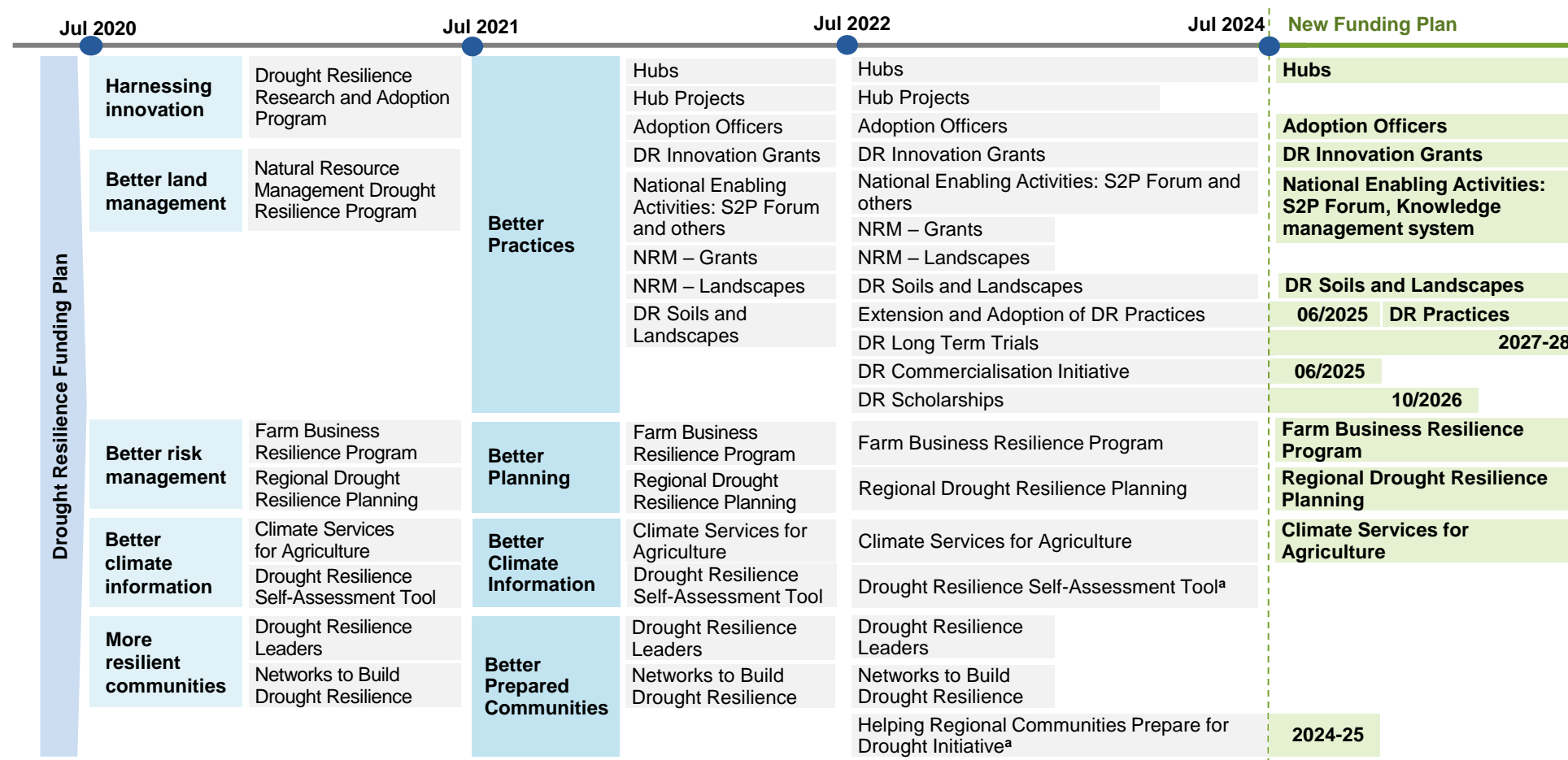
As discussed in section 2, the purpose of the funding principles is unclear. The Commission is therefore proposing the next Funding Plan separate the principles into two categories. The first would be used as guidance for the design of FDF programs; and the second would apply to each grant and arrangement. Where principles mention 'drought resilience' consideration should be given to replacing it with 'drought and climate change resilience'.

FDF-level guidance

Of the current funding principles, the Commission considers the following are appropriately considered when the Department is designing the suite of FDF programs:

- 6) consider the incremental, transitional and transformational opportunities needed to strengthen drought resilience and encourage innovative proposals
- 7) support a range of activities or projects at a mixture of levels, such as the farm, regional or national level
- 9) ensure eligibility for programs is streamlined and, where possible, minimise the burden of regulation on businesses, community organisations and individuals
- 12) use a structured and, where appropriate, contestable process to identify the best value and highest quality ideas, talent and projects.

Principle 6 should be amended to prioritise transformational change over incremental and transitional change. In addition, guidance or principles should be added to encourage fewer programs that are longer term in nature (discussed above).

Figure 4 – Past, current and future FDF programs

a. The Commission is seeking views on the future of these programs.

Source: DAFF (2022b); DAWE (2021).

Principles for each arrangement and grant

Of the current funding principles, the Commission considers the following are appropriately applied to each arrangement and grant:

- 1) be consistent with the Vision, Aim, Strategic Priorities and Objectives outlined in this Plan
- 2) ensure only projects and activities that enhance the public good by building drought resilience are funded. Projects and activities must deliver significant benefits that can be accessed or shared by many (rather than be captured solely by individual businesses or industries solely for commercial gain)
- 3) not provide in-drought assistance
- 4) not duplicate or replace existing Commonwealth, state, territory or local government funding programs, and will aim to improve the coordination or integration of existing Commonwealth Government policies, frameworks and programs where they meet the Fund's purpose
- 8) deliver programs through a user-based lens and, where possible, a community-led, co-design, and/or end-user approach
- 10) recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders
- 11) where appropriate, use or collaborate with existing community networks, Indigenous organisations and communities, natural resource management organisations, industry and farmer groups
- 13) as far as practicable, require co-investment to maximise program outcomes
- 14) consider proposals favourably that have enduring outcomes and avoid creating barriers to change or adaptation
- 15) consider potential qualitative and quantitative outcomes and expected public benefits as part of the assessment process for all programs and projects – not necessarily in monetary terms – and articulate why the funding is needed to achieve these benefits
- 16) ensure there are no ongoing operational or maintenance dependencies from the Fund when considering proposals for new or existing infrastructure
- 17) ensure that all new knowledge is shared and freely made available in the public domain.

However, further refinements should be made to these principles, including:

- principle 2, and the associated additional information on page 3 of the Funding Plan, should be simplified. The principle should be 'deliver a net public benefit' and the Funding Plan should provide guidance on what a public benefit is and the role of the FDF in investing in public goods, and addressing market failures such as environmental externalities, information asymmetries, coordination failures, and moral hazard
- clarifying and potentially strengthen principle 10
- principle 11 should be strengthened and refer to 'collaborate and partner' rather than 'use or collaborate'
- principle 13 should be revised to clarify co-investment should be required, as far as practicable, where projects are expected to deliver private benefits
- considering merging principles 14 and 15 into a single principle that requires programs to have a long-term net benefit
- clarifying the meaning and purpose of principle 16.



Information request 5

The Commission is seeking views on its suggestions for the next Funding Plan. These suggestions include that:

- the Funding Plan should explain how the Future Drought Fund (FDF) and its programs align with the National Drought Agreement and other relevant policies
- the objectives and strategic priorities should be clarified, particularly those related to social resilience
- the principles should be revised to provide clear guidance on which principles should be met by the suite of FDF programs and which principles should apply to each arrangement and grant
- the Funding Plan should be accompanied by an investment plan that identifies priorities for funding and eligible activities, the sequencing of programs, and how the different programs work together.

4 Are the governance arrangements fit for purpose?

Good governance is essential for a well-functioning FDF. Good public governance helps to ensure:

- programs achieve their intended outcomes
- organisations delivering the program can be held accountable
- public funds are put towards areas of public good
- closer coordination and integration of services
- reporting, evaluation and learning contributes to the continual improvement of activities.

The FDF governance is broadly appropriate

Overall, the governance arrangements for the FDF are appropriate (figure 5 and box 8), given the size of the Fund and likely program risks.

- The FDF Act sets out roles and responsibilities.
- The Drought Resilience Funding Plan sets the broad boundaries and criteria for funding support, including enhancing the public good (section 2).
- The Drought Minister (currently the Minister for Agriculture, Fisheries and Forestry) is responsible for the FDF and is accountable to Parliament and the community.
- The Department of Agriculture, Fisheries and Forestry is the appropriate department to administer the FDF.
- The FDF has a Consultative Committee of experts which advises the Minister (and the Department).
- The Monitoring, Evaluation and Learning (MEL) Framework outlines the rationale, scope and approach for monitoring and evaluating the FDF (section 5).
- An independent review of Part 3 of the FDF Act is legislated to precede the development of each new Funding Plan.

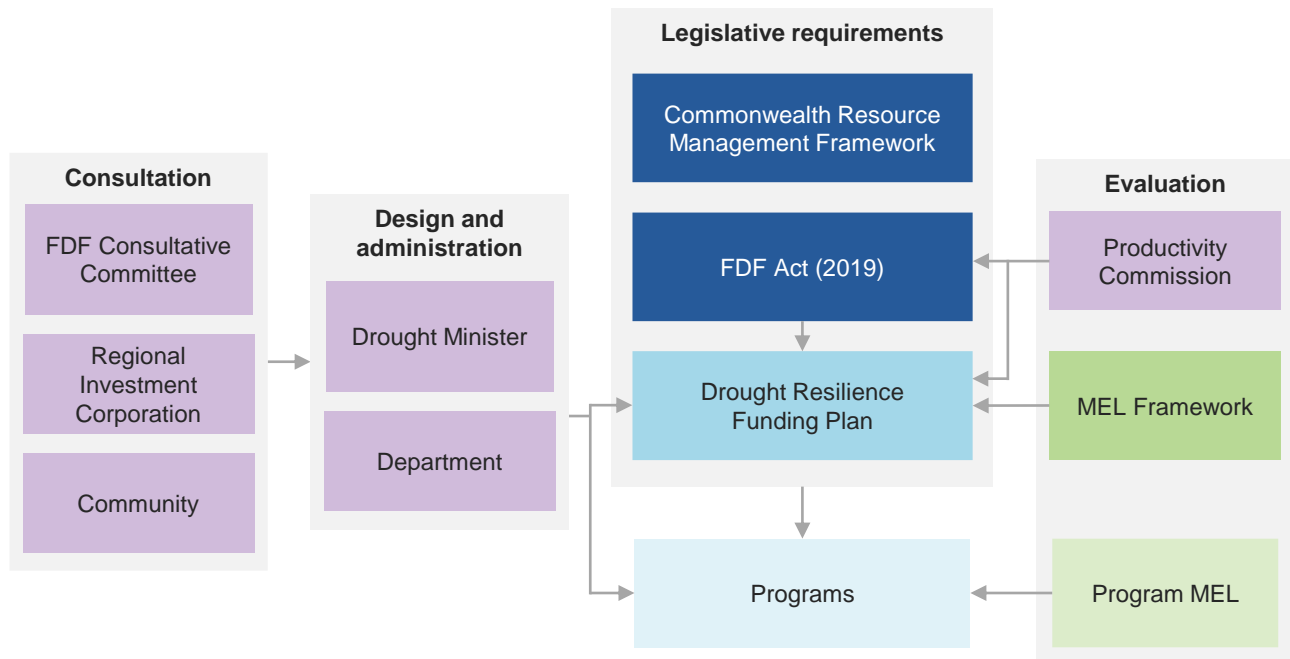
However, there are some concerns about how these arrangements are working in practice.

As discussed in section 2, the Funding Plan does not provide adequate strategic guidance and the prioritisation of activities and funding principles could be improved. In addition, the MEL Framework has limitations (section 5). Other issues are discussed below.

There is also the question of whether explicitly recognising climate change resilience as within the scope of the Fund should lead to changes in governance (information request 1). The Commission's initial

assessment is major changes should not be required. However, the mix of required skills for the FDF Consultative Committee may need to be reviewed to ensure they will facilitate sufficient climate change resilience expertise (discussed below).

Figure 5 – FDF governance



Source: DAWE (2020c); *Future Drought Fund Act 2019* (Cth).

Box 8 – Future Drought Fund governance, roles and responsibilities

Future Drought Fund Act 2019 (Cth)

The Future Drought Fund Act is the key piece of legislation governing the Future Drought Fund (FDF). It:

- establishes the FDF and Future Drought Fund Special Account (Part 2)
- sets out how the money in the FDF is to be invested (Part 4) and reported on (Part 5)
- outlines rules and responsibilities about how arrangements and grants are made (Part 3).

Part 3 is the focus of this inquiry. It covers:

- arrangements and grants relating to drought resilience (Division 2)
- advice to the Minister (Division 3)
- the development and review of the Drought Resilience Funding Plan (Division 4)
- the establishment and operation of the Agriculture Future Drought Resilience Special Account (Division 5)
- the channelling of state and territory grants through the COAG Reform Fund (Division 5A)
- the establishment and operation of the FDF Consultative Committee (Division 6).

Drought Minister

The Drought Minister (currently the Minister for Agriculture, Fisheries and Forestry) is responsible for the FDF. The Minister is required to create Drought Resilience Funding Plans, and make arrangements and grants and enter into agreements under the Act. The Minister can delegate some of these responsibilities to departmental staff.

The Department

The Secretary of the Agriculture Department (currently the Department of Agriculture, Fisheries and Forestry) is responsible for the Agriculture Future Drought Resilience Special Account, the account used to distribute money to programs. The Agriculture Department is responsible for the administration of the FDF, including the design and delivery of programs.

Future Drought Fund Consultative Committee

The FDF Consultative Committee advises the Drought Minister on drafts of Funding Plans and on the proposed design of programs and grants. The Consultative Committee has five members (including a chair) who are appointed by the Drought Minister. Consultative Committee members must have expertise or experience in relevant areas and there should be, as far as practicable, a balance of genders, knowledge, skills, and regions.

Regional Investment Corporation

The Regional Investment Corporation (RIC) is an Australian Government-backed loan provider for farmers and farm-related small business. The Drought Minister is required under the Act to seek advice from the RIC's board before making an arrangement or grant or entering an agreement under the FDF. Members of the RIC board are required to report any conflicts of interest.

Productivity Commission

The Act requires the Productivity Commission to assess the effectiveness of Part 3 of the Act and the Funding Plan. The report is to be submitted to government no later than five months before the end of each four-year Funding Plan.

Delivery Partners

Although delivery partners are not mentioned in the Act, they have been relied on extensively to deliver and monitor FDF programs. These partners include universities, grower groups, the Foundation for Rural and Regional Renewal, the Australian Rural Leadership Foundation, and Australian, state and territory government bodies. More detail on the administration of each program is in section 7.

Drought Resilience Funding Plan

Drought Resilience Funding Plans are legislative instruments made by the Drought Minister that are in effect for up to four years. The Funding Plan sets out a coherent and consistent approach to arrangements and grants at a strategic level, rather than specifying what programs should be made or who should be involved. All FDF programs must comply with the Funding Plan. The current Funding Plan is in effect from 2020 to 2024.

Monitoring, Evaluation and Learning Framework

The FDF includes a Monitoring, Evaluation and Learning (MEL) Framework for accountability and continual improvement. The MEL Framework outlines the scope for evaluating the FDF as a whole, demonstrating the progress and outcomes of FDF programs, and supporting learning across the FDF.

Source: DAFF (2022b); DAWE (2020c); Drought Resilience Funding Plan 2020 to 2024; *Future Drought Fund Act 2019* (Cth); RIC (2023).

The Regional Investment Corporation Board's role should be removed

The Drought Minister must seek advice from the Regional Investment Corporation (RIC) Board before making an arrangement or grant or entering into an agreement. When giving advice, the RIC Board must comply with the Drought Resilience Funding Plan (box 8).

The RIC is an Australian Government-backed specialist finance provider that provides loans to farmers and farm-related small businesses (box 8). The RIC Board members are appointed by the Minister for Agriculture and the Minister for Finance (Regional Investment Corporation Act 2018 (Cth), s. 17).

The RIC Board is intended to be an independent technical adviser. Although the Board's advice is not binding, it is a check on whether funds are being used appropriately, and therefore may strengthen public confidence in the FDF.

However, this requirement appears to be falling short of that rationale. The Independent Review of the RIC stated:

The original rationale for this advisory role, in terms of seeking to have suitable governance arrangements and transparency around the expenditure of the Fund, remains relevant and appropriate. However, in practice, the role is at best somewhat awkward and at worse problematic. (Tune 2021, p. 34)

The RIC Board's advice is timed to be a final check of program design. This timing does not allow the advice to significantly influence program design. In all cases, the RIC Board has found that the arrangements and grants are not inconsistent with the Funding Plan. In one case, the RIC Board did request more information before deciding. It is doubtful that the process is adding value worth the additional time cost.

Members of the RIC Board are required to have qualifications, skills or experience in one of: agribusiness and the financial viability of businesses within the agricultural sector; banking and finance; water infrastructure planning and financing; issues concerning rural industries and communities; economics; financial accounting or auditing; government funding programs or bodies; law; drought resilience; and any programs included in rules (Regional Investment Corporation Act 2018 (Cth), s. 17). While this means the Board has significant expertise in areas relevant to the FDF, it also means they are often involved in FDF-related activities. In most cases, at least one board member has had to abstain from voting due to conflicts of interest (RIC, sub. 47, p. i). There are also significant overlaps between the requirements for RIC Board membership and the Consultative Committee, bringing into question the value the RIC Board adds in addition to the Consultative Committee.

This role also imposes costs on the RIC board and staff as well as additional costs to the Department. These resources could be put to better use.

If the RIC Board continues to be involved in the FDF, changes should be made to enhance the value of their advice. One option is requiring earlier consultation between the Department and the Board, giving the Board more time and access to information to form their advice. However, the Consultative Committee already plays this role.

Another option is to remove the requirement to consult with the RIC Board from the Act. The RIC said in its submission that it could contribute to the FDF in non-legislated ways, including:

- RIC loans can help facilitate improvements the FDF is focusing on
- RIC data and insights can help inform FDF programs and activities (RIC, sub. 47, p. ii).

The role of the RIC Board should be removed from the FDF Act. This was also the recommendation of the Independent Review of the Regional Investment Corporation (Tune 2021). The Australian Government rejected this recommendation on the basis that the Board's role is still relevant and increases public

confidence (Australian Government 2021, p. 3). However, the Commission has not heard evidence that there is a lack of public confidence in the administration of the FDF or that the involvement of the RIC Board is seen as a safeguard.



Interim recommendation 3

The role of the Regional Investment Corporation Board should be removed

The Australian Government should amend the *Future Drought Fund Act 2019* (Cth) to remove the Regional Investment Corporation Board's legislated advisory role in the Future Drought Fund.

The timing of the Productivity Commission review should be amended

Under the FDF Act, the Productivity Commission is required to review Part 3 of the FDF during the life of each Funding Plan. The Australian Government must request the review to begin before the end of the third year of the Funding Plan and the final report must be provided to government at least five months before the end of the four-year Funding Plan (*Future Drought Fund Act 2019* (Cth), s. 32A).

The findings and recommendations from the review are intended to inform the design of the next Funding Plan. However, the timing of the review could diminish the value of the inquiry and unnecessarily compress the timeline for all the steps required to establish a new Funding Plan. As the Department of Agriculture Fisheries and Forestry (sub. 42, p. 11) advised:

The sequencing of these requirements has proven problematic, and this may impact the ability to meaningfully adopt findings from the Productivity Commission's Inquiry into forward planning processes. For example, immediately following the delivery of the Productivity Commission's final report, a new Consultative Committee will be appointed, public consultation on the new draft Funding Plan will occur, and then it will be finalised as a legislative instrument – due to the requirements of the FDF Act, this sequence of activities must be completed within a 5-month period.

Shifting the timing of the review earlier would allow sufficient time for public consultation after release of the Commission's report and for detailed planning of the next Funding Plan. This additional time could be locked in by amending the FDF Act to increase the minimum time between submission of the final report to government and the end of the Funding Plan from five to eight months. That said, it is important the Commission receives the terms of reference for the review at least eight months before the final report is due to government to ensure a thorough review.

The Australian Government could also consider removing the requirement for the review to be an *inquiry* from the Act. This would allow the Government to ask the Commission to undertake a *study*. The Australian Government is required to table and release the final report of an inquiry within 25 house sitting days of receiving the report (*Productivity Commission Act 1998* (Cth), s. 12), whereas studies are released by the Commission itself shortly after providing the report to government. Changing the review from an inquiry to a study could allow for the report to be released in a timelier manner. Otherwise, there is little practical difference between an inquiry and a study.



Interim recommendation 4

The timing of Productivity Commission reviews should be changed

The Australian Government should amend section 32A(2) of the *Future Drought Fund Act 2019* (Cth) to require the Productivity Minister to specify that the Productivity Commission must submit its report no later than eight months before the end of the 4-year period that began when the Drought Resilience Funding Plan came into force.

The Department plays a critical role

The Department of Agriculture, Fisheries and Forestry is responsible for designing, delivering, administering and overseeing the performance of the FDF (box 8). As discussed in section 2, the Department has rolled out many programs quickly. The rush of programs – many short term – caused problems for the Department, state and territory governments, delivery partners and stakeholders generally.

Despite these problems, the Commission has received positive feedback on the Department from inquiry participants, particularly around engagement. For example, the Tropical North Queensland Drought Resilience Adoption and Innovation Hub (sub. 33, p. 1) stated:

The TNQ Hub's interactions with the Department of Agriculture, Fisheries and Forestry (AFF) Future Drought Funds teams have been very positive and supportive. In particular, AFF visits locally have been very beneficial and have received positive feedback from Hub partners and demonstrate the importance of 'on the ground' engagement.

The Drought Resilience Funding Plan Mid-Term Evaluation found that the Department faced early implementation challenges, due in part to resourcing and capability issues, but that the situation was improving. The Mid-Term Evaluation also noted 'retention, attraction and burnout are likely to continue to pose risks to internal resourcing, consistent with broader market conditions'. It also found problems with internal capability, particularly related to monitoring, evaluation and learning, data management and analytics, and grants process, procurement and contract management (Grosvenor 2023, p. 39).

The Mid-Term Evaluation recommended the Department undertake several actions to effectively manage resourcing and improve capability, including to 'undertake a detailed review of internal resourcing levels and workload to identify what the right resourcing mix is to effectively deliver the full work program under current and future Funding Plans' (Grosvenor 2023, p. 40). The Department should complete the actions recommended by the Mid-Term Evaluation, where it has not already done so. Other changes canvassed by this review, including having fewer programs with longer-term funding, will likely reduce the administrative burden for the Department.

In addition, some issues with the FDF could indicate a need to strengthen the Department's oversight of programs. For example, as discussed in section 7, there might be issues with the oversight of the Hubs that warrant further investigation. Problems with the MEL Framework are limiting the Department's ability to monitor and evaluate FDF outcomes (section 5). Improving the MEL Framework should improve oversight, however, there may still be gaps.

The Consultative Committee is important

The FDF Consultative Committee plays an important role in the FDF as an independent adviser. The Consultative Committee advises the Drought Minister on the Drought Resilience Funding Plan and whether

the proposed design of FDF programs are consistent with the Funding Plan (box 8). Its roles and responsibilities include:

- providing initial advice to the Drought Minister about the draft Funding Plan
- consulting with key stakeholders on the draft Funding Plan
- reconsidering the draft Funding Plan following revisions based on stakeholder feedback and providing final advice on the Funding Plan to the Drought Minister
- providing advice to the Drought Minister about whether the proposed design of programs is consistent with the Funding Plan
- monitoring progress in implementing the Funding Plan
- reconsidering the Funding Plan if replaced outside of the four-year cycle
- considering the Productivity Commission's report when advising on subsequent Funding Plans (Department of Agriculture nd).

The Consultative Committee's advice on the Funding Plan is to consider:

- issues, challenges and barriers relevant to enhancing the drought preparedness and resilience of farm businesses and communities, including economic, environmental and social factors
- farmer and community views and perceptions of drought and drought resilience
- the optimal mix of investment options for the Commonwealth to enhance the drought preparedness and resilience of farm businesses and communities (Department of Agriculture nd).

The Consultative Committee is required to have relevant expertise and industry experience. Appropriate experience and expertise promotes good quality advice, both in terms of understanding issues and informing user-centred solutions. The Act requires that the Minister appoint members who have a background in at least two of the following:

- drought resilience measures
- climate risk
- the agriculture industry
- rural and regional community leadership and resilience
- rural and regional development
- applied research
- agricultural extension
- economics (Future Drought Fund Act 2019 (Cth), s. 36H).

The Minister must also ensure, as far as practicable:

- there is a balance of gender, knowledge and skills among members
- members represent a balance of different regions across Australia affected, or that could be affected, by drought (Future Drought Fund Act 2019 (Cth), s. 36H).

The Consultative Commission considers that the arrangements for the Committee are sound at this stage. We have received little evidence about how the Committee is working in practice, but that evidence indicates the Consultative Committee is a positive influence on policy development. Southern Farming Systems (sub. 43, p. 2) said:

The high-level governance arrangements are appropriate and effective, especially the advisory role of the Future Drought Fund Consultative Committee. It is a lean committee with high calibre people on it.

That said, the Australian Government should consider whether changes to the membership requirements are needed to reflect the Fund's role in building climate change resilience and improving outcomes for Aboriginal and Torres Strait Islander people (information requests 1 and 8). Including Aboriginal and/or Torres Strait

Islander representation on the Consultative Committee, for example, could be one way improve to FDF outcomes for Aboriginal and Torres Strait Islander people (section 6).

5 Is the monitoring, evaluation and learning approach fit for purpose?

Monitoring, evaluation, learning from and reporting on the FDF's performance is essential to ensuring its success. Tracking progress, including what outcomes have been achieved and who has benefited, is needed to ensure accountability for the spending of public money.

Effective monitoring, evaluation and learning (MEL) would assure Fund administrators, implementers and participants that programs and activities are being implemented as intended and achieving meaningful outcomes. Activities deliberately designed to generate insights and learnings should also inform Fund administrators and program implementers on how to improve the Fund and its activities over the course of their implementation.

The FDF's MEL Framework outlines the rationale, scope and approach of monitoring and evaluating the FDF and its activities (DAWE 2020c, p. 1). The MEL Framework defines monitoring, evaluation and learning as:

- monitoring is the continuous and systematic observation of how the programs are implemented, situational change in the problems that they are intended to address, and early indicators of outcomes
- evaluation involves an evidence-based assessment of the appropriateness, effectiveness, efficiency and impact of the programs
- learning is the generation and sharing of insights and information across the FDF to improve program delivery and inform future policy and program design to build drought resilience (DAWE 2020c, p. 2).

Why do monitoring, evaluation and learning?

There are many processes and activities that form a MEL system (box 9). Effective MEL is key to informing improvements in the management of the FDF and its programs over time because it:

- helps clarify and makes clear the intent of the program and the expected outcomes
- underpins the measurement of the FDF's impact
- supports better decision making and program implementation by better understanding the objectives of the program and identifying and resolving issues as they arise
- supports continuous learning by identifying what is going well and what could be done better to help program managers and implementers improve the program's performance over time. It also builds greater understanding of what best practice is in delivering that program
- holds organisations and delivery partners to account for their actions, priorities or programs.

Box 9 – What is a monitoring, evaluation and learning system?

Monitoring, evaluation and learning (MEL) encompasses all processes and activities put in place to: track how well a program is progressing towards outcomes; assess whether objectives have been achieved; identify reasons for success or lack of progress; test the assumptions underlying the theory of change; and apply insights generated to improve the design and implementation of activities.

Box 9 – What is a monitoring, evaluation and learning system?

A MEL framework and plan should document:

- key evaluation and monitoring questions
- performance indicators including activity, output, outcome and impact indicators
- what data (quantitative and qualitative) is needed, methods and frequency of data collection, and how data will be analysed
- the approach to determining the attribution or contribution of the program, where external initiatives are contributing to the same goals (including establishment of baselines)
- timing of monitoring activities, including approach to longitudinal evaluation or monitoring outcomes after the conclusion of a program or funded activity
- processes to reflect and learn from the implementation, progress and outcomes of the program.

A MEL strategy should be established during the design phase of the program. Stakeholders should be engaged to capture and reflect their views and needs in the design of MEL activities as well as to bring them onboard.

A MEL system also includes the financial resources and capability required to undertake monitoring and evaluation. For an effective system, the roles of managers and administrators in monitoring and evaluation needs to be clearly specified and understood, as well as how program implementers and participants will be involved in monitoring and evaluation activities.

MEL activities should also be timely and cost effective. The scale of effort and resources involved should reflect the value, impact and risk profile of the program.

Source: Better Evaluation (nd); Department of Finance (2022b); DFAT (2022); DJSIR (Vic) (2023).

Progress on FDF monitoring, evaluation and learning activities

The MEL Framework outlines processes for the Fund overall and its programs.

The FDF MEL processes include ongoing reporting to Ministers and the FDF Consultative Committee, annual reporting, evaluations and the Commission's legislated review. To inform the reporting and evaluations, DAFF manages six FDF MEL processes that were identified in the MEL Framework (table 5).

Table 5 – FDF MEL processes

Process	Timing	Scope and focus	Progress
Monitor drought resilience context	Periodic	Collect and analyse data against high-level indicators of drought resilience, as it becomes available.	The framework of indicators and methodology to measure drought resilience has not been finalised, hence no analysis on the high-level indicators of drought resilience has been conducted.
Monitor delivery of the Funding Plan	Ongoing	Monitor the delivery of programs, including grant applications, grant management, the delivery of activities and completion of milestones.	Ongoing program reporting and analysis. Some findings and outcomes are published in the

Process	Timing	Scope and focus	Progress
		Monitor stakeholder relationships and feedback, and the extent of coordination, planning and collaboration in support of programs.	FDF annual report (DAFF, pers. comm., 20 January, 2023).
Monitor program outcomes	Ongoing	Monitor programs' performance and outcomes to identify and understand the collective outcomes achieved by FDF activities.	Ongoing program reporting. There has been little work done to understand the collective outcomes of the FDF programs.
Evaluate Funding Plan implementation	Mid-point of the Funding Plan (2022)	<p>Conduct a process-focused evaluation, assessing the extent to which the Funding Plan's rationale remains relevant, the progress in delivery of programs, and early signs of progress towards desired outcomes.</p> <p>It will consider how well management, coordination and allocation has supported program delivery and outcomes, and identify opportunities to improve program management.</p>	The mid-term process evaluation of the Funding Plan was completed in February 2023 (Grosvenor 2023).
Evaluate Funding Plan outcomes	Towards the end of the Funding Plan (2024)	<p>Conduct an outcomes-focused evaluation of the performance of the Funding Plan, seeking to understand the outcomes collectively achieved (or not) by programs. This evaluation will consider outcomes in the light of data collected about long-term drought resilience trends (against the high-level indicators), and any analysis undertaken to understand the influence of programs on those indicators.</p> <p>It will identify what insights the Funding Plan's outcomes and the longer-term trends offer for the design of future Funding Plans, policy and programs. It will also document delivery across the full Funding Plan.</p>	The end-term evaluation is planned for late 2024 (DAFF, pers. comm., 20 January 2023).
Facilitate learning at the Funding Plan level	Ongoing	<p>Facilitate the sharing of knowledge and learning among programs, with steps that could include:</p> <ul style="list-style-type: none"> • identifying major innovations occurring that will be relevant to other programs and broker the relevant links between programs and with other relevant stakeholders • documenting and disseminate data, case studies and insights from different programs • facilitating discussion among program leaders and stakeholders about the factors observed to support or constrain program success, and facilitating collaborative problem definition and development of solutions. • Review risk mitigation and share lessons across programs. 	<p>Learning activities have primarily been done in an informal and ad-hoc manner with a lack of structured and deliberate mechanisms to support learning (section 2). However, there is evidence of learnings being incorporated into the design of newer programs.</p>

Source: DAWE (2020c, p. 25, 2021).

For each program, the approach to MEL should be based on the size and complexity of the program. Program managers within DAFF are expected to develop a program MEL plan that 'sets out the scope and approaches required to monitor, evaluate and learn from the program-funded activities and projects and report on them' (DAWE 2020c, p. 26). Program implementers are responsible for many of the MEL activities, such as developing project MEL plans and regularly reporting to DAFF. Program managers are expected to undertake or commission a mid-term process evaluation and commission an external end-of-program outcomes evaluation. Program MEL process for each program are outlined in table 6.

Table 6 – Program MEL processes

Program	Program MEL plan	Project MEL plans	Summary of progress
Farm Business Resilience	Complete	Part complete – due June 2023	<ul style="list-style-type: none"> • Foundational year state and territory outcome reporting and evaluation completed late 2022 • Extension state and territory outcome reporting underway (6 monthly to 2025) • Potential review of MEL plan and mid-term evaluation scope and timeframes to be confirmed
Regional Drought Resilience Planning (RDRP)	Complete	Part complete – due June 2023	<ul style="list-style-type: none"> • Foundational year state and territory outcome reporting and evaluation completed late 2022 • Extension state and territory outcome reporting underway (6 monthly to 2025) • Potential review of MEL plan and mid-term evaluation scope and timeframes to be confirmed
Climate Services for Agriculture (CSA)	Complete	N/A	<ul style="list-style-type: none"> • Interim MEL report completed July 2022 • Review of MEL plan completed (March 2023) • Mid-term evaluation focusing on processes in foundational program delivery was undertaken June 2022
Drought Resilience Self-Assessment Tool (DR.SAT)	Complete	N/A	<ul style="list-style-type: none"> • Progress report completed July 2022 • Review of MEL plan underway mid 2023 • Mid-term evaluation due to DAFF June 2023 • Final evaluation report due to DAFF April 2024
NRM Drought Resilience - Landscapes and Grants	Complete	Complete	<ul style="list-style-type: none"> • 46 final outcome reports for grants have been submitted (15 projects extended into June 2023, 5 outstanding) • 11 final outcomes reports for Landscapes have been submitted (3 projects in progress, no outstanding reports) • Mid-term evaluation covered under the Mid-Term Evaluation of the Funding Plan • No end of program outcomes evaluation planned
Networks to Build Drought Resilience	Complete	N/A	<ul style="list-style-type: none"> • Progress report completed October 2022 • Final program report submitted • Mid-term evaluation covered under the Mid-Term Evaluation of the Funding Plan • No end of program outcomes evaluation planned
Drought Resilience Leaders	Complete	N/A	<ul style="list-style-type: none"> • Progress report completed October 2022 • Final program report submitted

Program	Program MEL plan	Project MEL plans	Summary of progress
			<ul style="list-style-type: none"> • Mid-term evaluation covered under the mid-term evaluation of the Funding Plan • No end of program outcomes evaluation planned
Helping Regional Communities Prepare for Drought Initiative	Due post mid 2023	N/A	<ul style="list-style-type: none"> • Progress report completed October 2022
Drought Resilience Adoption and Innovation Hubs	None	Complete	<ul style="list-style-type: none"> • Annual MEL reporting complete August 2022 • Review of MEL plan from August 2023 • MEL data capture, up to 31 December 2022, completed February 2023 • For cross Hub projects, MEL annexures completed November 2022
National Enabling Activities	None	N/A	<ul style="list-style-type: none"> • No MEL plan or activities due to small and short-term nature of the investments. Outcomes are reported in the Annual Report
Drought Resilient Soils and Landscapes	Complete	Complete	<ul style="list-style-type: none"> • First report completed, submitted in February 2023 • Next progress report due July 2023
Drought Resilience Innovation Grants	Due early-mid 2023	Due early-mid 2023 ^a	<ul style="list-style-type: none"> • First report completed, submitted in February 2023 • Next progress report due July 2023
Extension and Adoption of Drought Resilience Farming Practices Grants Program	Due post August 2023	Due post August 2023	<ul style="list-style-type: none"> • Successful applicants notified May 2023, next steps include development of program and project MEL Plans
Drought Resilience Commercialisation Initiative	Due August-October 2023	N/A	<ul style="list-style-type: none"> • Drafting of the MEL plan has commenced and will be finalised following input from the delivery partner, once they have been selected
Long-term Trials of Drought Resilient Farming Practices	Draft due mid 2023	Draft due August-October 2023	<ul style="list-style-type: none"> • Drafting of the program MEL plan has commenced. • Project MEL plans to be developed once projects are selected and following finalisation of the program MEL plan
Drought Resilience Scholarships	Draft due mid 2023	N/A	<ul style="list-style-type: none"> • Program MEL plan drafting in progress May 2023

a. Project MEL plans are for innovation grant stream. For other grant streams, project MEL plans are not required due to risk based approach.

Source: DAFF (pers. comm., 20 January 2023, 31 May 2023).

Developing and implementing MEL activities has been challenging

The design and implementation of monitoring and evaluation activities has been hampered due to the speed with which the Fund and programs were commenced and the short-term focus of foundational programs.

The MEL Framework was not integrated well with the Funding Plan and was not reflected in the design of programs in the foundational phase.

As noted by Lu Hogan and Lewis Kahn (sub. 5, p. 1), the focus has been on “getting the funds out the door” rather than developing an overarching evaluation plan to demonstrate outcomes and benefits’. The MEL Framework, including the program theory, has also not been updated since it was released, so does not reflect the evolution of the FDF and its programs.

Ideally, MEL plans would be developed alongside the process of program design. However, for some programs, MEL plans were developed well into the implementation phase of the program. For example, Hub MEL plans were not in place until roughly one year after the Hubs were created. Because the goals and outcomes of the Hubs require clarity (section 7), this has limited the utility of the MEL plans to guide how progress is tracked.

As outlined in section 3, there are also a number of improvements to the overarching FDF program theory that would support more effective Fund and program design, and in turn, monitoring and evaluation. Clearly articulating the FDF’s vision, the impacts it intends to create and how the FDF is expected to lead to the intended change provides a clear and testable hypothesis. This can guide what monitoring and evaluation processes and activities are needed to measure the intended outcomes and impact (Better Evaluation nd; Center for Theory of Change nd). The roles of key FDF participants and groups are also required to enable effective MEL.

DAFF noted that resource capability and constraints posed a significant barrier to designing and implementing MEL activities. The mid-term evaluation stated:

The lack of capability combined with reported resource constraints led to a delay in the implementation of MEL activities. Meaning MEL plans were often not developed until the programs were well into implementation. (Grosvenor 2023, p. 39)

It is necessary for DAFF to have sufficient skills to design and implement MEL activities, and to provide clear guidance to delivery partners about MEL requirements.

The Department of Finance has recognised the need to support evaluation practices and capability building across the Australian Government and developed the Commonwealth Evaluation Policy and an evaluation toolkit (Department of Finance 2022b, 2022a). The aim is to embed a culture of evaluation and learning and provide guidance to improve evaluation practices and capability, including the quality of performance reporting.

Delivery partners also require suitable capability to implement the required MEL activities. While some delivery partners have progressed MEL activities successfully, several noted that it was challenging. Some participants noted the reporting requirements create an excessive burden.

The Monitoring Evaluation and Learning (MEL) reporting process is the greatest challenge we face and there is a need for the FDF to streamline the information gathering and reporting process. (Riverine Plains, sub. 29, p. 11)

Current review processes are time-consuming, repetitive, and largely ineffective without baseline and performance metrics. (NFF, sub. 17, p. 11)

The Rural Economies Centre of Excellence highlighted the duplication of reporting requirements. They noted the RDRP program requires extensive reporting to both the Australian and state governments and considered the multiple layers of reporting and MEL need to be streamlined (sub. 38, p 6). In some case, stakeholders highlighted that schedules were not always timed appropriately and have not changed when an extension has been granted (Grosvenor 2023, pp. 52–53).

Despite these challenges, progress is being made by DAFF and program partners to implement MEL activities.

Measuring drought resilience is difficult

There are inherent challenges in designing a MEL system to track resilience, which is a broad and complex concept (section 1). The distinction between 'drought resilience' and more general resilience to adversity is not always clear.

There are also many factors that influence drought resilience making it difficult to attribute changes in drought resilience to specific programs, including the FDF (DAWE 2020c, p. 17, 2021, p. 29).

Measuring drought resilience in the context of the FDF is also challenging given it has broad objectives across economic, environmental and social resilience. There is significant overlap between economic, environmental and social resilience, which adds to the complexity in measuring resilience across these dimensions (Nous 2020).

Economic resilience may be more easily measurable given the FDF's focus on on-farm productivity and profitability. Many studies, trials and evaluations have estimated and attributed the effects of different farm practices on profitability (for example, Bennett 2021; Collier et al. 2015; Hall et al. 2010; Rising and Devineni 2020). ABARES also estimates climate-adjusted total factor productivity and has done work on a farm business drought risk indicator (ABARES 2023; Hughes et al. 2020).

However, in many cases, there may be a trade-off between drought resilience and short-term profitability because of the costs incurred in the short term to build greater drought resilience for longer-term benefits. This highlights the need for a more holistic set of indicators across economic, environmental and social resilience.

Measuring environmental and social resilience can be more challenging. Social resilience is complex and multifaceted, and it is difficult to determine precisely what factors enhance social resilience for different communities at different times (section 3).

Similarly, it can be difficult to measure how activities affect the resilience of functional and sustainable landscapes. Participants noted the 'fundamental' impact of 'agricultural landscapes being functional and sustainable, with healthy natural capital ... is a difficult priority to measure due to complexity, issues of temporal and spatial scales, and challenges of attribution' (NACC NRM, sub. 21, p. 2; NRM Regions Australia, sub. 51, p. 2; NRM WA, sub. 13, p. 2; Rangelands NRM Coordinating Group, sub. 50, p. 3).

Tailored, longer-term monitoring and measurement approaches may be required to cover a wide range of different environmental outcomes across regions with diverse landscapes (Sayer et al. 2017; Sparrow et al. 2020).

The MEL system is not adequate to track overall Fund progress

There are limitations in the design and implementation of monitoring and evaluation activities at both the Fund and program level.

Monitoring and evaluation activities have focused on individual programs

The MEL Framework outlines activities for both the Fund and programs but monitoring and evaluation activities so far have focused largely on individual programs. Grosvenor (2023, p. 52) found there was little capacity to implement Fund-wide MEL processes:

Allocated monitoring and evaluation capacity has been largely absorbed to date with facilitating the establishment of individual program MEL Plans, which has resulted in overall FDF monitoring, reporting and learning approaches being yet to be implemented and a review of the MEL framework is outstanding.

A framework to measure drought resilience needs to be developed

Indicators to measure performance are an important part of a MEL system as they provide information on the effectiveness of programs. They can help improve understanding of the impacts of programs and what works or does not work, indicate progress and prompt change, and hold parties to account for the success or failure of their activities (Van Dooren, Bouckaert and Halligan 2015, pp. 120–121).

In the FDF, the MEL Framework sets out two types of indicators used to measure drought resilience.

- **High-level drought resilience indicators:** Indicators to enable monitoring of patterns in drought resilience over the long term. The MEL Framework identifies high-level indicators for each strategic priority (economic, environmental and social resilience). Many of the indicators do not measure drought resilience specifically but rather resilience more generally.
- **Funding Plan and program-level indicators:** Programs under the Fund are expected to have short- and medium-term outcome indicators as well as output indicators. It was also intended that DAFF develop indicators to measure the overall outcomes under the Funding Plan (DAWE 2020c, p. 21).

The high-level indicators broadly align with the type of indicators recommended by Nous in its report for the Department (Nous 2020). The 2020-21 FDF annual report identified a 'priority for 2021-22 is to further develop the framework, in consultation with stakeholders' with the aim of having 'a settled framework in place, with baseline data, for the next annual report' (DAWE 2021, p. 29).

The framework of indicators and methodologies was intended to measure baseline levels of economic, environmental and social resilience to drought, attribute changes in drought resilience to specific actions, support the evaluation of the FDF, and improve understanding of trends in drought resilience more generally to inform other policies, programs, and actions (DAWE 2020c, p. 17, 2021, p. 29). However, little progress has been made to understand the overall outcomes of the FDF and its impacts on drought resilience, and it is not evident the existing set of indicators will effectively support performance monitoring and evaluation.

While progress has been limited, the Commission acknowledges the practical difficulties in developing a framework of indicators to measure how the FDF is contributing to drought resilience (as discussed above). Nevertheless, identifying Fund-wide performance measures should be a priority moving into the next Funding Plan.

Both quantitative and qualitative measures, as well as a set of input, output and outcome measures linked to a clear theory of change should be developed (section 3).

Program assessments provide limited understanding of the effects on drought resilience

DAFF has acknowledged the program-level indicators provide limited understanding of their actual effects on drought resilience (DAFF 2022a, p. 14; DAWE 2021, p. 29). The National Farmers' Federation (sub. 17, p. 7) also noted the 'lack of appropriate performance metrics ... renders it difficult to effectively and practically assess programs in terms of their contribution to improving industry resilience and demonstrable value for money'.

Program MEL plans include 'success measures' that refer to intermediate outcomes (2–4 years), but it is common that the indicators actually used to measure progress tend to focus on counts of numbers of participants or outputs generated.

- For example, one of the success measures for the *Climate Services for Agriculture* (CSA) program is 'the climate information capabilities are used and valued by the target audience'. However, indicators for this success measure include 'increasing use/return web statistics' and 'increased reference in traditional and

social media', which only concerns the outputs of the CSA program rather than what it achieves and how CSA is being used (DAFF 2022a, p. 13).

- Similarly, the *Better Prepared Communities* programs measure success through attendance numbers and size of networks, which are unlikely to meaningfully capture the community's resilience to drought (section 7).

Another issue is data for some indicators have not yet been collected. In some cases, this is because the data is not ready for collection, but in other cases their absence is unexplained and progress is not reported. There appears to be limited documentation of what methods will be used to systematically collect data or how it will be analysed.

There are some emerging examples of program monitoring and evaluation practices that aim to measure outcomes. For example, the Commission has heard for the FBR program some states are developing approaches to monitor outcomes. However, as discussed below, approaches are inconsistent.

Monitoring and evaluation approaches lack consistency and comparability across programs

The data collected across programs is not always consistent and comparable. In the case of the Hubs there is a MEL plan for each Hub but there is no overarching plan for assessing the effectiveness of all the Hubs (section 7). While the MEL plans for each Hub have common indicators, there was no commonly agreed methodology. Consequently, different Hubs have used different data sources and methodologies to measure the same indicators, such as case studies, surveys, internal Hub records or outsourced reporting (DAWE 2022b, 2022f, 2022e, 2022c, 2022d, 2022a, 2022g, 2022h).

Similarly, the foundational FBR program was delivered by state and territory governments who had the same program outcomes, but the data collection methods and methodology varied significantly across states and territories. The variation was in part because some terms were not defined, which 'made it challenging to understand what was being counted, and when (e.g. what constitutes a completed plan, or a part participant)' (SA Government 2022a, p. 3).

There was also significant variation in the comprehensiveness of the evaluation of the foundational FBR program (notwithstanding some states and territories experienced challenges and delays with the foundational FBR program).

Some flexibility in terms of data collection and analytical methods are useful to enable project implementers to tailor to different contexts. However, there is also value in ensuring some consistency in outcomes measured and approaches to measure them across a program. This would enable comparability, and some participants have also noted they would value the guidance (Southern Farming Systems, sub. 43, p. 5).

Reporting of medium- to long-term outcomes is likely to be limited

Monitoring and reporting activities are not funded beyond the timeframe of a program. Ongoing reporting on outcomes beyond the program therefore relies on external stakeholders. Grosvenor (2023, p. 53) noted 'ongoing ... reporting is likely to be limited and/or ad-hoc'.

Programs are often short term, and the impact is likely to extend beyond the program funding cycle. As the Tasmanian Government (sub. 52, p. 5) highlighted, the effectiveness of programs 'may not be known until the individuals, businesses and communities need to respond to the next drought'. Indeed, if the programs are well designed, they can deliver long-term resilience benefits. However, this longer-term effectiveness is unlikely to be measured.

There is scope to undertake longer-term monitoring and reporting for some priority programs that are intended to deliver long-term outcomes. Longitudinal monitoring, which collects data from the same participants over time, would also provide insight into how responses and outcomes change in the short and long term.

Aboriginal and Torres Strait Islander engagement and outcomes are not addressed in the MEL Framework

As outlined in section 6, Aboriginal and Torres Strait Islander people were not adequately involved in the objective-setting or development of the Fund. There is little mention of Aboriginal and Torres Strait Islander engagement or outcomes approaches in the MEL Framework. Embedding Aboriginal and Torres Strait Islander outcomes in the MEL Framework and in program MEL plans is important to create accountability and transparency.

Learning could more systematically inform implementation

There were a number of issues with the design and implementation of programs in the foundational phase of the FDF (section 2), which provide important lessons to improve the FDF moving into the next Funding Plan (section 3). However, there is evidence lessons from the foundational phase of the FDF are already being incorporated in the design and implementation of recent programs.

For example, short-term programs created significant administration and implementation challenges and are inconsistent with the long-term nature of building drought resilience (section 2). The foundational *NRM Drought Resilience* programs did not provide adequate time or resources to deliver meaningful outcomes. The *Drought Resilience Soils and Landscapes* program addresses these issues by providing more time with the intent of landscape-scale changes. In addition, the *Long-term Trials of Drought Resilient Farming Practices Grants* program reflects a shift to longer-term investments to build drought resilience (DAFF, sub. 42, pp. 8–9; FDF Consultative Committee, sub. 3, pp. 3–5).

Participants also had concerns about the lack of coordination between the *Drought Resilience Leaders* (Leaders) and *Networks to Build Drought Resilience* (Networks) programs and the lack of integration with other programs. These concerns have informed the design of the *Helping Regional Communities Prepare for Drought* program, which integrates the networks and leadership activities and aims to align with the RDRP program and Hubs (section 7).

There are some examples of lessons being generated and shared, such as through the Science to Practice Forums (section 7). However, it appears opportunities to generate and apply learnings to improve program development and implementation tended to occur in an ad-hoc way rather than by design. In some cases, evaluations of programs were either not undertaken or not undertaken in a timely way to inform the development of related programs.

Full mid-term evaluations of the Networks and Leaders programs were not conducted. While a final report for both programs on program implementation and learnings was prepared in February 2023 (FRRR 2023), the report could not inform the design of the Helping Regional Communities Prepare for Drought program, which commenced in July 2022 (DAFF 2023e).

Learning has also been constrained by a lack of transparency and information sharing. Information on the FDF, its programs and program outcomes is difficult to find or in many cases is not publicly available (section 2). FDF MEL Plans and monitoring and evaluation reports are not available on DAFF's website. While this may be appropriate in some cases to facilitate a safe learning culture, it is important that reports can be used by stakeholders to inform learning and that learnings can be shared across different programs and jurisdictions.

The Commission heard that participants were not getting value out of the reporting and evaluations.

Of importance is the fact that the data we provide doesn't circle back to us, so we cannot then shape priorities to address gaps in farm knowledge or community resilience. ... Long evaluations without a clear value proposition back to the end user means not as many surveys are filled in, reducing the understanding the FDF can elicit from this valuable feedback mechanism. (Riverine Plains, sub. 29, p. 11)

There are however examples of improved information sharing. The Foundation for Rural and Regional Renewal (sub. 37, p. 11) noted that information sharing between programs had improved over time, although can be improved further. And the Hubs have established a national community of practice, which 'allow the national hubs to collectively engage in solutions to share and adopt administrative practices, reduce duplication and identify and share overlapping programs and target audiences' (TNQ Hub, sub. 33, p. 2).



Interim finding 4

Monitoring, evaluation and learning activities have not adequately tracked performance

The development and implementation of a comprehensive monitoring, evaluation and learning (MEL) system was hampered by the quick roll-out of programs, and a lack of dedicated resource capability.

Monitoring and evaluation activities have largely focused on individual programs, with little work done to understand the overall progress of the Fund. Program-level indicators tend to focus on inputs and outputs rather than outcomes, and hence provide limited understanding of how programs are contributing to drought resilience.



Information request 6

The Commission has identified challenges with the implementation of Fund and program monitoring, evaluation and learning (MEL). We are seeking further views on:

- the clarity of MEL requirements for, and guidance provided to, program implementers
- what mechanisms might better integrate monitoring, evaluation and reporting with learning
- any other specific, practical changes that would improve how MEL is conducted across the Fund.



Information request 7

While there have been challenges with implementing monitoring, evaluation and learning, the Commission is interested in examples of monitoring, evaluation and learning being conducted effectively to track and improve Fund and program performance and outcomes.

In particular we are interested in any practical examples from across the Fund and programs, of:

- program *outcomes* that are being monitored and measured, and how data is being collected and analysed to do so
- longer-term monitoring of outcomes and impact after the conclusion of a program, project or activity
- learning activities deliberately undertaken during the course of program or activity implementation, to identify any challenges and other insights, and use these to change and improve implementation
- how attribution and contribution has been addressed in monitoring or evaluation
- monitoring and evaluation of:
 - partnerships
 - environmental resilience outcomes at landscape / multi-property scale
 - social resilience outcomes
 - knowledge uptake by the wider sector; specifically, monitoring of how knowledge generated by the Fund has been applied by people beyond those directly participating in a Fund program or activity.

6 Improving outcomes for Aboriginal and Torres Strait Islander people

Aboriginal and Torres Strait Islander people have been caring for lands, waters and seas for tens of thousands of years as an integral part of their culture and identity. Their deep and enduring relationship with Country is central to spirituality, cultural vitality and resilience. Aboriginal and Torres Strait Islander people continue to actively manage land and resources for interlinked social, cultural, spiritual and economic purposes, including for the production of food and fibre.

However, since early colonial times, Aboriginal and Torres Strait Islander people have been dispossessed of their land and waters. Institutions that shaped systems of land and water rights have historically excluded Aboriginal and Torres Strait Islander people (Aboriginal & Torres Strait Islander Social Justice Commissioner 2009, p. 170; Mcnamara 2017) who have been denied opportunities to access and care for Country, or to generate wealth from productive uses of land (Terri Janke and Company 2022, p. 30). Under practices extending into most of the 20th century, Aboriginal and Torres Strait Islander people were compelled to work, many under duress, for private landholders on farming businesses, growing the agricultural sector (Standing Committee on Legal and Constitutional Affairs 2006). The legacy of dispossession has ongoing implications for Aboriginal and Torres Strait Islander people's economic, social and cultural wellbeing, and their participation in the agricultural sector.

Many participants in this inquiry expressed interest in strengthening the participation of Aboriginal and Torres Strait Islander people in the Fund, including through applying Indigenous knowledges to build resilience. The Fund has supported some emerging examples of partnerships and projects that benefit Aboriginal and Torres Strait Islander people and the wider agricultural sector. However, challenges have also been

experienced and acknowledged, and some Fund participants may be uncertain about the best ways to proceed. The next Funding Plan period represents an opportunity to help foster strong, reciprocal and respectful partnerships with Aboriginal and Torres Strait Islander people, in ways that strengthen their participation in decision making about the Fund.

DAFF has recognised that there was limited engagement with Aboriginal and Torres Strait Islander people when the FDF was being developed and rolled out, and that participation has since been limited. The Department commissioned Murawin Pty Ltd to conduct engagement and undertake work with the Hubs on Aboriginal and Torres Strait Islander people's priorities. They also commissioned Terri Janke and Company to advise on gaps, barriers, and opportunities in drought resilience and innovation in rural and remote Aboriginal and Torres Strait Islander communities (discussed in more detail below).

Any consideration of opportunities to enhance engagement and benefits needs to reflect the Australian Government's commitment to improving outcomes for Aboriginal and Torres Strait Islander people in the National Agreement on Closing the Gap (box 10). As noted in the Review of the National Drought Agreement:

This lack of recognition and silence on opportunity for First Nations people is inconsistent with the intent of a range of existing commitments and policy positions of the Australian Government and state and territory governments, already demonstrated through the National Agreement on Closing the Gap, the Voice to Parliament and treaty discussions. (Parties to the National Drought Agreement 2022, p. 14)

Box 10 – National Agreement on Closing the Gap

The National Agreement on Closing the Gap is an agreement between the Coalition of Aboriginal and Torres Strait Islander Peak Organisations and all Australian governments. It is a commitment to achieving better outcomes for Aboriginal and Torres Strait Islander people. Outcomes include:

- outcome 7: Aboriginal and Torres Strait Islander young people are engaged in employment or education
- outcome 8: Strong economic participation and development of Aboriginal and Torres Strait Islander people and communities
- outcome 14: Aboriginal and Torres Strait Islander people enjoy high levels of social and emotional wellbeing
- outcome 15: Aboriginal and Torres Strait Islander people maintain a distinctive cultural, spiritual, physical and economic relationship with their land and waters.

To achieve these outcomes, the Agreement specifies four priority reform areas to change the way governments work to accelerate improvements in these areas. They are:

- priority reform one – formal partnerships and shared decision-making
- priority reform two – building the community-controlled sector
- priority reform three – transforming government organisations
- priority reform four – shared access to data and information at a regional level.

Source: Parties to the National Agreement on Closing the Gap (2020).

This section discusses the potential for the FDF to provide opportunities to and benefits for Aboriginal and Torres Strait islander people, and how the FDF could be improved to achieve this.

Aboriginal and Torres Strait Islander people are active participants but are underrepresented in the agricultural sector

Many Aboriginal and Torres Islander people directly or indirectly participate in agriculture across locations, sectors, roles, and applying Traditional, Western, or mixed agricultural practices (Barnett et al. 2022). Their contribution is recognised in the Explanatory Statement for the *Drought Resilience Funding Plan 2020 to 2024*:

Aboriginal and Torres Strait Islander people make significant contributions to agriculture through Indigenous enterprises, as landholders and as employees.

There are approximately 930 Aboriginal and Torres Strait Islander owner-manager agricultural businesses in Australia (Shirodkar, Hunter and Foley 2018, p. 12). These businesses are in a diverse range of agriculture, forestry and aquaculture industries and are expected to grow (Barnett et al. 2022).

However, Aboriginal and Torres Strait Islander people are underrepresented in the agricultural sector. Despite making up 12.2% of the population in outer regional, remote and very remote areas (ABS 2016), only 1% (3,278) of people directly employed by the agricultural industry identified as Indigenous (Binks et al. 2018, p. 6).

There are also significant land areas that as part of the Indigenous estate are either owned (17%), managed or co-managed (22%) and/or subject to other special rights for Aboriginal and Torres Strait Islander people (44%) (Jacobsen, Howell and Read 2020).¹⁰ While this land supports a significant amount of primary production, it is mostly undertaken by non-Indigenous people (Barnett et al. 2022).

The FDF has potential to benefit Aboriginal and Torres Strait Islander people and the wider agricultural sector

The FDF is a significant opportunity to deliver better outcomes for Aboriginal and Torres Strait Islander people. These better outcomes also have the potential to benefit the wider community.

There would be significant benefits to increased Aboriginal and Torres Strait Islander people's participation in the agricultural sector ...

Agriculture is described as having strong alignment with economic development aspirations for many Aboriginal and Torres Strait Islander people (Barnett et al. 2022, p. 35). About 39% of Aboriginal and Torres Strait Islander people in Australia live in outer regional, remote, or very remote areas (ABS 2016), where agriculture is often the main local industry. Increased participation within the agriculture industry is likely to create economic development opportunities. This would support governments' commitments under the Closing the Gap Agreement, including increasing Aboriginal and Torres Strait Islander young people's employment (outcome 7) and to strong economic participation and development of Aboriginal and Torres Strait Islander people and communities (outcome 8).

Increasing participation would also benefit the sector. For example, Aboriginal and Torres Strait Islander youth participation has already been identified as an opportunity to maintain and grow the currently aging agricultural workforce (Pratley et al. 2022).

¹⁰ The figures for ownership, (co)/management, and special rights refer to the percentage of Australia's total landmass. There is substantial overlap between them.

... including in ways that support the sustenance, cultivation and sharing of Indigenous knowledges

Facilitating increased participation could also enable more Aboriginal and Torres Strait Islander people to work and live on their traditional lands. Being able to practice land management allows for cultural benefits through connection to Country and practicing Indigenous knowledges (Barnett et al. 2022, p. 35; Woodward et al. 2020, p. 7). Murawin (2022, p. 21) noted:

First Nations agriculture provides a significant opportunity for Indigenous people. Not only does it have an economic benefit, but it also ensures that custodian responsibilities concerning Caring for Country can continue. Young people are also able to remain on Country and learn traditional practices, ensuring the transmission of cultural knowledge to the next generation.

For example, being able to care for, live and work on Country, learning, using, and creating Indigenous knowledges, has been attributed as a key reason for the success of Indigenous ranger programs (DPC 2019; Social Ventures Australia 2016; The Pew Charitable Trusts 2015; Urbis 2012). Benefits of these programs flow to individuals, communities and the natural environment.

The agricultural sector also stands to benefit from sustaining and integrating Indigenous knowledges. There is growing evidence detailing how Indigenous knowledges are being used around the world in agricultural production, including specifically around drought management and adapting to climate change (for example, Akanbi and Masinde 2018; Aliabadi, Ataei and Gholamrezai 2022; Derbile 2013; Muyambo, Bahta and Jordaan 2017; Roos, Chigeza and van Niekerk 2010). Murawin (2022, p. 39) noted:

Once readily dismissed by Western scientists, Indigenous peoples' ecological knowledge has come to be viewed as an incredibly valuable resource, providing extraordinarily detailed information about environments and the processes that shape them. As the cumulative impacts of climate change are increasingly felt, the role of First Nations Knowledge Holders in enhancing resilience to these impacts is being acknowledged.

The potential value of having Aboriginal and Torres Strait Islander people as collaborators and leaders within the FDF was recognised by inquiry participants (box 11). Benefits identified include opportunities for Aboriginal and Torres Strait Islander people, knowledge sharing, and ecological and social benefits. There are also possible commercial benefits, including through the potential to diversify into new products and to gain greater access to financial and consumer markets through environmental and social benefit-related credentialing (Barnett et al. 2022, pp. 35–36).

Box 11 – Examples of inquiry participants supporting Aboriginal and Torres Strait Islander people having a greater role in the Future Drought Fund

To build on the foundations of Aboriginal Self-Determination, it is imperative that Traditional Owners and Aboriginal Victorians are influencing policy and decision-making in agriculture, as well as developing strong and enduring partnerships to enhance the role of caring for country in drought and climate resilience ... The wealth of knowledge of Traditional Owners and Aboriginal Australians in managing agricultural landscapes is currently missing from the Future Drought Fund framework. (DEECA (Vic), sub. 55, p. 4)

Increased Indigenous collaboration and leadership are in the interests of everyone involved in the Australian agriculture sector, as outlined in sector vision statements such as the NFF 2030

Box 11 – Examples of inquiry participants supporting Aboriginal and Torres Strait Islander people having a greater role in the Future Drought Fund

Roadmap. The NFF 2030 Roadmap identifies that supporting Indigenous collaboration and leadership in agricultural will work to reduce disadvantage in Indigenous communities, encourage better representation of Indigenous agriculture and attract new labour and skills. (NFF, sub. 17, p. 12)

... the use of indigenous organisation and knowledges should be more prominent. Aboriginal and Torres Strait Islander people are the first farmers and have been adapting to drought and disaster for millennia. (La Trobe University, sub. 35, p. 3)

Aboriginal and Torres Strait Islander communities have a wealth of deep knowledge and practice in adapting to the challenges posed by droughts and other environmental stresses ... Planning and solution development to improve drought resilience will be more effective in partnership with Aboriginal and Torres Strait Islander Peoples and communities. (ATSE, sub. 7, p. 3)

There is much to be gained in supporting Indigenous leaders in this area, identifying opportunities for co-design of projects and considering the impacts of drought and climate change on indigenous communities and their wellbeing e.g., access to water, local food security (provision and access to bush foods), and impacts of drought on cultural practices and cultural sites, as well as economic development opportunities. (NRM Regions Australia, sub. 51, p. 7)

Activities Aboriginal and Torres Strait Islander people are currently working with our members on to build landscape resilience to the effects of climate change include a range of traditional land practices ... In addition to these practices building landscape resilience for drought and providing sustainable income to Aboriginal and Torres Strait Islander people, a number of additional benefits are also generated, including the sequestering of carbon, improving community wellbeing and building social equity. These benefits clearly demonstrate the need for Aboriginal and Torres Strait people to play a greater role through the Fund. (LGAQ, sub. 22, p. 11)

Barriers to Aboriginal and Torres Strait Islander people's participation in agriculture also limit their participation in the FDF

Farming businesses and agricultural production

The FDF has stated aspirations for engaging with Aboriginal and Torres Strait Islander people, but its focus on participants who own farming properties and businesses does not take into account that most Aboriginal and Torres Strait Islander people do not hold rights to their ancestral lands. While more land is being returned to some form of ownership or management by Aboriginal and Torres Strait Islander people, the legal structures of ownership often come with ongoing caveats that limit how land can be used (Terri Janke and Company 2022, p. 31). This includes restrictions on using land as leverage to get loans, making it much harder to start and grow businesses (Murawin 2022, p. 27). Where some management or ownership of land has been restored, it has largely been outside the agriculturally valuable sheep-wheat zones and high rainfall areas of south-western and south-eastern Australia (Barnett et al. 2022, p. 25).

Inquiry participants have noted that a focus on farm businesses is also a barrier to the participation of Aboriginal and Torres Strait Islander people in the FDF. Definitions of ‘farms’, for example, are not always appropriate for Aboriginal and Torres Strait Islander food cultivation activities (Tasmanian Government, sub. 52, p. 7). Focusing on agricultural producers in part explains why the FDF and its potential benefits is not widely known among Aboriginal and Torres Strait Islander people (Lu Hogan and Lewis Kahn, sub. 5, p. 3). There has also been a lack of concerted effort to culturally translate terms and narratives being used to reflect Indigenous cultural narratives around drought (RECoE, sub. 38, p. 8).

Protection of Indigenous Cultural and Intellectual Property

Indigenous Cultural and Intellectual Property (ICIP) refers to all dimensions of Indigenous heritage and culture. This includes, but is not limited to, Indigenous languages, cultural objects, performance and artistic works, and traditional scientific and ecological knowledge. Current laws provide limited and fragmented protection for ICIP. For example, many ICIP rights are communally owned whereas existing non-Indigenous intellectual property laws are designed to protect individual owners (Terri Janke and Company 2022, p. 8).

There is willingness and interest from Aboriginal and Torres Strait Islander people and many other participants in the FDF to apply Indigenous knowledges to build the resilience of the agricultural sector (Murawin 2022). However, concerns that Indigenous knowledges might be used by others for private gains without benefiting knowledge holders, due to lack of protections for ICIP, pose a barrier to the agricultural sector and FDF fostering Indigenous knowledge-sharing partnerships and collaborations (Murawin 2022; Noongar Land Enterprise Group 2022, p. 11; Terri Janke and Company 2022). From its engagement on Hub priorities, Murawin (2022, p. 5) found that:

There were substantial concerns surrounding the need to ensure that Indigenous knowledge remains the Intellectual Property of First Nations people and that they were the primary beneficiaries of its application.

How have Aboriginal and Torres Strait Islander people participated in and benefited from the FDF to date?

As has been recognised in and committed to through the National Agreement on Closing the Gap, policy should be developed in partnership with Aboriginal and Torres Strait Islander people. Partnerships should be accountable and representative to support decision making that is shared between government and Aboriginal and Torres Strait Islander people. To date, the FDF has not met these ambitions. Across the Fund there has been limited participation of Aboriginal and Torres Strait Islander people in the governance and design of the Fund or as delivery partners or beneficiaries. As a result, the FDF’s potential to benefit Aboriginal and Torres Strait Islander people is not being realised.

The processes of designing the FDF and its programs did not adequately include Aboriginal and Torres Strait Islander people

Aboriginal and Torres Strait Islander people had limited input in the process of setting up the Fund. It appears Aboriginal and Torres Strait Islander people also do not hold roles in the ongoing governance of the FDF, and there are no formal mechanisms for shared decision making.

The Funding Plan does include two principles that specifically refer to Aboriginal and Torres Strait Islander people:

- 10) recognise the diversity of people, businesses and landscapes involved in agricultural production, including Indigenous landholders

11) where appropriate, use or collaborate with existing community networks, Indigenous organisations and communities, natural resource management organisations, industry and farmer groups (p.4)

These principles are reflected to some extent across other documents. Several of the grant guidelines, for example for the *Drought Resilience Adoption and Innovation Hubs* program, the grants component of the *NRM Drought Resilience Program*, the *Drought Resilience Leaders* program, and the *Networks to Build Drought Resilience* program, have included criteria that assess proposals based on the demonstrated capability to engage with, and the likely benefits for, Aboriginal and Torres Strait Islander groups (DAWE 2020a, 2020f, 2020b, 2020g). However, it appears that these principles have not been particularly effective in facilitating Aboriginal and Torres Strait Islander people's participation.

Genuine engagement and partnership building has been inconsistent

Partnership building, priority reform area one of the National Agreement on Closing the Gap, is a strategically important component of supporting an agricultural sector that supports knowledge sharing. As noted in the *Our Knowledge, Our Way* (Woodward et al. 2020, p. xxi) report:

Partnerships that enable the building of respect and appreciation for Indigenous knowledge are desired - particularly where they support an Indigenous voice in decision-making processes that affect us. Respect for Indigenous knowledge, culture and Country are critical for the development of trust and relationship-building, which underpin strong partnerships.

The National Agreement on Closing the Gap includes a list of principles to define strong partnerships, including that they must:

- be between parties who are accountable and representative
- have a formal agreement in place that is made public and allows Aboriginal and Torres Strait Islander parties to agree on the agenda
- facilitate shared decision making
- have adequate funding, including to engage and meet independently (Parties to the National Agreement on Closing the Gap 2020, pp. 6–7).

At a program level, there have been mixed levels of engagement, and few examples of genuine partnerships. The Hubs are intended to help build ongoing partnerships with a range of local groups, including Aboriginal and Torres Strait Islander communities. Candidates to host the Hubs were assessed, amongst other criteria, on their capacities to consult appropriately with Aboriginal and Torres Strait Islander organisations and communities, incorporate Indigenous RDEA&C needs, and foster increased cultural awareness and knowledge sharing (DAWE 2020a). While all the Hubs acknowledge the importance of this, in practice there have been varying levels of engagement with Aboriginal and Torres Strait Islander people (Murawin 2022, p. 37). And there appears to be few strong partnerships with Aboriginal and Torres Strait Islander organisations and people across the Hubs. This is due to varying capabilities across the Hubs, with some being poorly equipped to engage and collaborate with Aboriginal and Torres Strait Islander organisations and people (Lu Hogan and Lewis Kahn, sub. 5, p. 3). Strategies to facilitate engagement have included:

- the Southern Queensland and Northern New South Wales Drought Resilience Adoption and Innovation Hub and the Northern Hub have a First Nations Knowledge Broker and Director, respectively (Northern Hub, sub. 11, p. 5; SQNNNSW Hub, sub. 24, p. 7).
- the Noongar Land Enterprise Group is a consortium partner in the South-West WA Hub (GGA and the SW WA Hub, sub. 30, p. 6)

- the Tropical North Queensland Hub has a Sustainable Aboriginal and Torres Strait Islander Enterprise program (TNQ Drought Hub 2023).

The experience with the *Regional Drought Resilience Planning* (RDRP) program has also been mixed. In some cases, there appears to have been genuine collaboration with Aboriginal and Torres Strait Islander people. For example, the Torres Cape Indigenous Council Alliance was engaged to lead the development of the Regional Drought Resilience Plan in the Torres and Cape Region (RECoE, sub. 38, p. 8). In other cases, engagement appears to have been limited. For example, the Reference Groups for the Gippsland and Goulburn plans noted engagement with Traditional Owners was a gap in their RDRP processes (DAWE 2022i, p. 9).

The FDF and its programs, in developing engagement approaches, need to recognise the already heavy engagement load Aboriginal and Torres Strait Islander people are experiencing (TAS Farm Innovation Hub, sub. 39, p. 2). However, the Fund adds additional barriers by having short-term funding and relatively short time frames for the development and delivery of Hubs and other FDF programs, which limit the capacity for meaningful engagement, relationship building and shared decision making (Northern Hub, sub. 11, p. 5; NRMQR, sub. 23, p. 3; TAS Farm Innovation Hub, sub. 39, p. 2; University of Adelaide, sub. 32, p. 3; Victorian Drought Hub, sub. 28, pp. 5-6).

Little funding has gone to Aboriginal and Torres Strait Islander organisations and activities

Although public reporting of grant details and outcomes is limited, it appears that only a small proportion of funding has gone to supporting Aboriginal and Torres Strait Islander people and organisations. To date there has been six grants amounting to approximately \$665,000 awarded to Indigenous-led organisations (table 7). This amounts to about 0.4% of the total funding available for grant rounds.¹¹

Funding for non-Indigenous organisations has been limited in the extent that it has enabled partnerships with Aboriginal and Torres Strait Islander people, although there are some examples. Around \$400,000 of grants have been awarded to groups working closely with Aboriginal and Torres Strait Islander organisations and people, including for a seeding project of native grasses and shrubs, a bushfoods festival, and developing a Bush Tucker Garden and walking trail (DAFF 2022f, 2023f, 2023b). In addition, the Foundation for Rural & Regional Renewal, which ran the Networks to Build Drought Resilience program, reported that a total of 1,319 (3.5%) participants in those programs identified as Aboriginal and/or Torres Strait Islander, and that Aboriginal and Torres Strait Islander people were participants in nearly one in three activities funded (sub. 37, pp. 3, 7).

While there are emerging examples of how the FDF is partnering with Aboriginal and Torres Strait Islander organisations and people, more needs to be done.

¹¹ This is an approximation based on the total allocated program costs as of June 2022 of all programs that include grants: *Drought Resilience Innovation Grants*, *NRM Drought Resilience Program – Grants*, *Drought Resilience Soils and Landscape*, *Grants to support the Adoption of Drought Resilient Practices*, *Drought Resilience Long Term Trials*, *Drought Resilience Commercialisation Initiative*, *Drought Resilience Leaders*, *Networks to Build Drought Resilience*, and *Helping Regional Communities Prepare for Drought Initiative* (table 8).

Table 7 – Grants awarded to Aboriginal and Torres Strait Islander organisations^a

Program	Grantee	Description	Amount
Natural Resource Management Drought Resilience Program	Bigambul Native Title Aboriginal Corporation RNTBC	Recruitment and training of personnel to lead cultural burning and ecology rejuvenation demonstrations, information sessions, and workshops	\$190,740
Innovation Grants	First People of the Millewa-Mallee Aboriginal Corporation Victoria	Research into and promotion of drought resilient native crops for use as gluten-free flour and food	\$45,455
Networks to Build Drought Resilience	Mallee District Aboriginal Services Limited	Refurbishment of a meeting shed to facilitate year-round meetings, knowledge sharing and connection building	\$136,420
Networks to Build Drought Resilience	Outback Academy Australia Limited	Four regional events and an online national event to connect Aboriginal and Torres Strait Islander farming communities and allow for information sharing and adoption of industry/government provided information	\$146,966
Networks to Build Drought Resilience	Saltwater Country Ltd	A project to improve the skills, knowledge, and social and professional networks of Aboriginal and Torres Strait Islander station workers	\$145,316
Total			\$664,897

a. This does not include the two 'enabling activities' to fund the Murawin and Terri Janke and Company reports which had no on-ground impact in and of themselves.

Source: DAFF (2022f, 2023f, 2023b).



Interim finding 5

Aboriginal and Torres Strait Islander people have had limited participation in the Future Drought Fund

The Department has recognised that there was limited engagement with Aboriginal and Torres Strait Islander people in the development of the Future Drought Fund. The participation of Aboriginal and Torres Strait Islander people in the Fund and its activities has been limited.

The Future Drought Fund has the potential to benefit Aboriginal and Torres Strait Islander people and the wider agricultural sector. For the next Funding Plan, it will be important that Aboriginal and Torres Strait Islander people define their goals for participation in the Fund.

The next Funding Plan period represents an opportunity to help foster strong, reciprocal and respectful partnerships with Aboriginal and Torres Strait Islander people, in ways that strengthen their participation in decision making about the Fund.

What improvements should be considered?

It is important that Aboriginal and Torres Strait Islander people define their own goals for their participation with the FDF and outcomes that they want to achieve, rather than these being determined by the Minister, Department or Consultative Committee (TAS Farm Innovation Hub, sub. 39, p. 2). To support this, Aboriginal and Torres Strait Islander people should have meaningful input into how the Fund is governed, how Aboriginal and Torres Strait Islander people should be engaged with, how they should be considered during program design and delivery, and how Indigenous knowledge could be shared (DEECA (Vic), sub. 55, pp. 4-5). Shared decision making should be enabled across the Fund, from governance to local program delivery.

In response to the commissioned enabling activities, DAFF (2022b, p. 30) noted:

Looking forward there is opportunity to deliver on the recommendations of these projects while continuing to embed the perspectives of First Nations people into policy and program design through collaborative partnerships and community led consultation. This is an area of focus for future FDF work.

Governance

Under the National Agreement on Closing the Gap, the Australian Government committed to partnering with Aboriginal and Torres Strait Islander people to ensure shared decision making. Given there are no national agricultural-focused Indigenous organisations to partner with, it may be more appropriate to establish an Aboriginal and Torres Strait Islander working group to work with DAFF to improve the design and implementation of the Fund. The working group would advise on further changes to the governance and design of the FDF. Improvements to governance arrangements could include amending the requirements for expertise and experience on the Consultative Committee to better account for Aboriginal and Torres Strait Islander people (CSIRO, sub. 8, p. 4) and/or the requirement to develop an Aboriginal and Torres Strait Islander strategy for the FDF.

The working group, or any other body or partnership that is implemented, should reflect the strong partnership elements defined in the National Agreement on Closing the Gap, as discussed above.

Embedding Aboriginal and Torres Strait Islander outcomes in the Monitoring, Evaluation and Learning (MEL) Framework would also create more transparency and accountability in this space, an area that is specifically committed to under the Closing the Gap Agreement priority reform three (Parties to the National Agreement on Closing the Gap 2020, p. 11). It would also contribute to the important work of publicly highlighting Aboriginal and Torres Strait Islander-led agricultural and land management success stories (Massy, Hill and Wolfgang 2023, p. 69). Indicators should not only rely on quantitative metrics, which are prone to distortion due to 'black cladding', the practice of non-Indigenous businesses taking advantage of an Aboriginal or Torres Strait Islander person or business to fulfil criteria to access markets or procurement policies (Supply Nation 2020). MEL approaches should also be designed to systemically seek and understand the qualitative feedback of Aboriginal and Torres Strait Islander partners and community members.

Supporting better engagement and strong partnerships

Sustainable, meaningful and mutually beneficial participation depends on the quality of relationships at a local level. Efforts aimed at enhancing outcomes for Aboriginal and Torres Strait Islander people should consider the diversity of local contexts. There should be capacity for meaningful collaboration with Aboriginal and Torres Strait Islander people including the Traditional Owners of each area.

Support for programs to develop strong partnerships and undertake better engagement should be mindfully done. The TAS Farm Innovation Hub (sub. 39, p. 2) expressed concern that:

Any effort to enhance engagement needs to account for the existing heavy engagement load that weighs on Aboriginal and Torres Strait Islander people to consult and provide feedback on a huge range of government and non-government initiatives, allow the time and space for communities to define their own goals within the FDF, recognise the diverse voices and perspectives of Aboriginal and Torres Strait Islander communities and to undertake this engagement underpinned by a long-term commitment to working together.

These concerns and challenges are not insurmountable, but do depend on acknowledgement that ambitions for strong partnerships may only be realised after trust has been established.

While engagement must ultimately be implemented by those in local areas, DAFF has a role in providing resourcing, support and setting expectations. The enabling activity that funded Murawin to work with the Hubs on better engagement is an example of how DAFF can play a supporting role. Providing specific funding and resources to Aboriginal and Torres Strait Islander organisations, the Hubs and other relevant organisations to specifically support engagement would be a further step (NACC NRM, sub. 21, p. 5; NLN, sub. 18, p. 3; NRM Regions Australia, sub. 51, p. 7; NRM WA, sub. 13, p. 4). Longer-term timeframes would also help to facilitate improved relationship building (Northern Hub, sub. 11, p. 5; TNQ Hub, sub. 33, p. 3; University of Adelaide, sub. 32, p. 3; University of Melbourne, sub. 48, p. 2).

Coordination of engagement efforts – between different departments at all levels of government, Hubs, and other organisations – could also assist in reducing the consultation load experienced by Aboriginal and Torres Strait Islander people. Similarly, DAFF could provide more guidance about how Hubs and other stakeholders can meaningfully engage with and leverage existing networks, such as those developed by NRM groups, rather than duplicating relationships (NACC NRM, sub. 21, p. 5; NRM Regions Australia, sub. 51, p. 7; NRM WA, sub. 13, p. 4; Rangelands NRM Coordinating Group, sub. 50, p. 8).

As per the recommendation from Murawin (2022), and echoed by The Mulloon Institute (sub. 6, p. 3), Hubs could also establish Aboriginal and Torres Strait Islander advisory groups. DAFF could facilitate this through additional funding for the development and ongoing support of these groups, and/or consider including them as a requirement for future funding. A resourced advisory group would be better placed to deliver the other recommendations contained in Murawin's report (box 12) than a single First Nations Knowledge broker could on their own. Any advisory group should align with the strong partnerships principles outlined above.

Box 12 – Murawin recommendations

Based on engagement Murawin Pty Ltd was funded to do with the Hubs and Aboriginal and Torres Strait Islander people in their areas, they made the following recommendations:

- 1. All Hubs need to establish First Nations Advisory Groups drawn from Aboriginal and Torres Strait Islander stakeholder groups and communities in each Hub area. This will create and support representative and appropriate guidance for Hub activities to inform and enrich the work of each Hub in achieving their operational and program goals. This would further enable each Hub to seek and capture the views of First Nations peoples on each Hub's RDEA&C priorities.

Box 12 – Murawin recommendations

- 2. The RDEA&C priorities need to be founded on principles of Caring for Country to increase community and industry resilience to drought and climate change. The focus cannot continue to be purely on using the land to create revenue.
- 3. A mechanism that situates the RDEA&C priorities in a localised context at the Hub scale needs to be developed. Equally important is giving the Hubs a means of providing feedback on the priorities, thereby creating a two-way dialogue at the national and local scale. This will result in optimal outcomes for the stakeholders the Hubs work alongside, including First Nations peoples.
- 4. Relationships founded on transparency, reciprocity, and respect need to be built between First Nations peoples and primary producers.

Source: Murawin (2022).

Making grant rounds more accessible

To address the underrepresentation of Indigenous-led organisations in grant outcomes, DAFF should also consider ways of making grants processes more accessible. Like other small organisations, barriers such as short time frames also affect Aboriginal and Torres Strait Islander organisations (section 2). Providing flexibility for Aboriginal and Torres Strait Islander applicants around some grant criteria, such as requiring co-investment, would also make the process more accessible (SA Government, sub. 53, p. 5).

The Department could also establish specific funding streams for Aboriginal and Torres Strait Islander people and organisations (GGA and SW WA Hub, sub. 30, p. 6). This could ensure that grant funding reaches Aboriginal and Torres Strait Islander people and give them more power in forming partnerships. For example, governments' Indigenous Procurement Policies have facilitated growth of Indigenous business sectors (Evans and Polidano 2022; Terri Janke and Company 2022, p. 25). However, as with Indigenous Procurement Policies, eligibility criteria come with their own challenges (Terri Janke and Company 2022, p. 25), including locking out organisations that do not wish to publicly identify as Aboriginal and/or Torres Strait Islander.

Looking beyond the scope of the FDF

Terri Janke and Company's (2022) report on the gaps, barriers, and opportunities, for drought resilience and innovation in rural and remote Aboriginal and Torres Strait Islander communities included a range of recommendations. These include:

- funding education and training programs to learn in communities on Country, and building cultural competency of agencies and organisations engaging with them
- developing ICIP protocols, including around Indigenous data sovereignty and governance
- making funding sources more accessible by reducing red tape around grant funding and land use
- providing support to grow Aboriginal and Torres Strait Islander businesses, including assistance for grant applications, project planning, corporate governance training, and supply chain management, and in particular supporting an Aboriginal and Torres Strait Islander-led bushfood and bush medicine industry
- transforming interactions with rural and remote Aboriginal and Torres Strait Islander communities, including recognising the importance of relationships, culture and Country, building trusted relationships with key people, and working towards holistic objectives
- investing in community wellbeing and healing programs and community inclusion systems.

Some of these can be implemented within the FDF. For example, even if they are not legally binding, ICIP protocols could be developed, promoted and built into programs. Many of them, however, extend beyond the direct remit of the Fund. They should be considered by DAFF and the Australian Government as broader policy considerations.



Information request 8

The Commission is seeking views about its suggested options to improve engagement with, and benefits for, Aboriginal and Torres Strait Islander people. We are interested in whether these options should be implemented, and if so, what would be needed to ensure their success in practice. Other suggested options are also welcome. The options, which are not mutually exclusive, include:

- establishing a Future Drought Fund Aboriginal and Torres Strait Islander working group to work with the Department of Agriculture, Fisheries and Forestry to improve the design and implementation of the Fund
- requiring the Consultative Committee to include Aboriginal and/or Torres Strait Islander representation
- developing a Future Drought Fund Aboriginal and Torres Strait Islander strategy
- providing specific funding and resources to Aboriginal and Torres Strait Islander organisations, the Hubs and other relevant organisations to advise on and undertake engagement
- improving guidance about how Hubs and other organisations can meaningfully engage with existing networks to foster strong partnerships with Aboriginal and Torres Strait Islander people
- embedding Aboriginal and Torres Strait Islander outcomes in the Monitoring, Evaluation and Learning Framework
- establishing a specific funding stream for Aboriginal and Torres Strait Islander people and organisations
- providing flexibility around some grant criteria, such as the requirement of co-investment.

7 Evaluation of individual FDF programs

This section provides a high-level assessment and findings for the FDF key programs grouped under their four FDF broad themes. It does not include the five most recent programs, as they are yet to become fully operational.

The funding allocation of the Future Drought Fund across 19 programs across four themes is in table 8.

Table 8 – Australian Government funding of the Future Drought Fund, as of 30 June 2022

	Total Allocated ^a (\$m)	Total Expensed ^b (\$m)
Better Climate Information	38.858	17.596
Climate Services for Agriculture	28.988	12.296
Drought Resilience Self-Assessment Tool	9.870	5.300
Better Planning	116.818	26.081
Farm Business Resilience Program	75.965	15.965
Regional Drought Resilience Planning	40.853	10.116
Better Practices	203.472	77.107

	Total Allocated ^a (\$m)	Total Expensed ^b (\$m)
Drought Resilience Adoption and Innovation Hubs	66.000	34.000
Hub Projects	4.097	4.097
Adoption Officers	9.000	3.000
National Enabling Activities	8.011	1.195
Drought Resilience Innovation Grants	33.961	18.821
Natural Resource Management Drought Resilience Program – Grants	7.806	7.806
Natural Resource Management Drought Resilience Program – Landscapes	5.622	5.622
Drought Resilience Soils and Landscapes	23.110	2.566
Grants to support the Adoption of Drought Resilient Practices	14.265	0
Drought Resilience Long Term Trials ^c	20.000	0
Drought Resilience Commercialisation Initiative	10.000	0
Drought Resilience Scholarships	1.600	0
Better Prepared Communities	40.844	16.200
Drought Resilience Leaders	7.446	7.446
Networks to Build Drought Resilience	3.750	3.750
Helping Regional Communities Prepare for Drought Initiative	29.648	5.004
Total	400.000	136.985

a. Total Australian Government funding allocated in the funding cycle of 2020–24. These figures do not include any state and territory government funding, or cash or in-kind contributions provided by delivery partners. b. Actual expenditure to 30 June 2022. c. Long-term Trials is funded to 2027–28 (\$40m over six years). \$20m has been allocated for 2024–25 to 2027–28.

Source: DAWE (2022b, p. 49).

In summary, the Better Practices theme is expected to account for just over half of all Australian Government FDF funding to 30 June 2024 (51% or \$203 million), with the Better Planning theme accounting for 29% and the remaining two themes each accounting for 10%. In terms of expenditure to date, less has been spent on the Better Planning theme than earmarked (19% compared to its allocated share of 29%) with proportionately more being spent on the other three themes.

Better Climate Information

The *Better Climate Information* theme intends to establish new authoritative national capabilities that make climate information accessible and useful for understanding climate risk and developing pathways to build resilience in the agriculture sector. The theme consists of two FDF programs: *Climate Services for Agriculture* (CSA) and *Drought Resilience Self-Assessment Tool* (DR.SAT) (box 13).

The programs are delivered by external partners. CSIRO and the BOM deliver CSA and Deloitte Touche Tohmatsu delivers DR.SAT. Almost \$39 million has been allocated over the four years of the current Funding Plan for these two programs; \$17.6 million had been spent by 30 June 2022 (table 6).

The underlying logic for investing in climate services tools for building drought and climate change resilience is that, if farmers, businesses, and communities better understand their climate risks, resilience, and adaptation pathways, they are more likely to take effective actions to manage risks (DAFF 2022b, p. 7).

Box 13 – Better Climate Information programs

What are climate services?

The European Commission defines climate services as the transformation of climate-related data – together with other relevant information – into customized products such as projections, forecasts, information, trends, economic analysis, assessments, counselling on best practices, development and evaluation of solutions and any other service in relation to climate that may be of use for the society at large. As such, these services include data, information and knowledge that support adaptation, mitigation and disaster risk management (EC 2015).

Climate Services for Agriculture

Climate Services for Agriculture is a free interactive tool that gives farmers and communities access to climate information for their local area. It provides users with historical data (1961–current), seasonal forecasts (1–3 months), future climate projections (2030, 2050, 2070), and additional climate insights for business planning, including:

- specific insights for 20 of Australia's top commodities
- customisable rainfall and temperature thresholds
- a temperature humidity index for beef, dairy and sheep
- general climate trends.

The tool enables users to anticipate future climate conditions, draw comparisons with recent weather and consider possible consequences for the commodities they produce.

Drought Resilience Self-Assessment Tool

DR.SAT is a free resilience self-assessment tool designed to offer farm-scale information and analysis. The tool enables farmers to assess their resilience against climate change, drought and other climate risks. Resilience assessments include financial, personal and social, and environmental indicators. Using information supplied by the user, the tool provides tailored options and resources for a farmer. The tool also contains:

- regularly updated satellite imagery
- remote sensed data
- climate projections provided by CSA.

Source: DAFF (2023).

The rationale for the Better Climate Information theme is sound

There is a sound justification for the Australian Government through the FDF to provide climate information for farmers for two key reasons.

First, providing better climate information for farmers has strong public good characteristics (section 2). Accessible and reliable climate information can reduce information barriers and support farmers to better understand the risks of drought and climate change (OECD 2020; PC 2009).

Second, there was a gap in the market for climate services. The Drought Response, Resilience and Preparedness Plan (Department of Agriculture 2019, p. 9) indicated that, while there is significant information available, 'more is needed, particularly improved forecasts and local information'. A recent survey on

mapping climate services in Australia confirmed the need for government support for a climate service platform (Cunningham 2020).

Inquiry participants also pointed to the importance of accurate local information and tools that farmers can use to prepare for the next drought (for example, NFF, sub. 17, p. 11; Riverine Plains, sub. 29, att. 1, p. 6).

However, in some jurisdictions the CSA and DR.SAT overlap with other public (state government) and private tools. For instance, the Department of Agriculture and Fisheries (Qld) stated:

At a broad level, some of the information [of CSA] replicates existing long standing online information (e.g., Queensland's Long Paddock website which has been operational since 1995). Queensland delivers historical climate data (e.g., SILO) which is widely used for modelling, research and applications; and bespoke property scale information services such as the FORAGE service. (sub. 54, p. 3)

Overlap between CSA and DR.SAT

Despite a sound rationale for the government providing climate information, there does not appear to be a compelling reason why the FDF funded two, at times overlapping, tools.

While CSA and DR.SAT were designed for different purposes, in some circumstances they provide similar services. For example, both tools provide historical climate data and projections at a farm scale. They both also provide future impact assessments for certain commodities.

CSA is the source for much of the information used in DR.SAT. The Commission is considering whether a separate tool is needed or whether elements of DR.SAT (such as the resilience assessment component) can be built into CSA.

Uptake of CSA and DR.SAT has been modest

CSA and DR.SAT have been operating for a relatively short time and, to date, uptake has been modest.

DR.SAT's final version was released in November 2022. The goal is to reach 2,000 users by July 2023, but this seems unlikely with 866 accounts as at January 2023. CSA's development is still to be completed (due mid-2024), but, as of January 2023, 6300 users have accessed the platform (DAFF, Canberra, pers. comm., 8 March 2023).

The Commission has heard that many factors may be contributing to low uptake, including:

- lack of awareness – there has not been a nationwide communication campaign to boost awareness of the tools
- overlaps with existing tools – there are some regions and some sectors that already have tools in use
- poor user design – design deficiencies impede the user experience. For example, the Commission has heard that the requirement to create an account for DR.SAT is a barrier to use
- poor targeting of end users – though farmers are the intended end-users for DR.SAT, the Commission has heard that better outcomes could be achieved if the tool was designed for the consultants and advisers to the farmers.

Regardless of the level of uptake, it is impossible to know the extent to which the tool has spurred changes to farm practices and/or informed decisions for building drought (or climate) resilience. In relation to DR.SAT the National Farmers' Federation noted:

... DRSAT has no quantifiable performance indicators as to practice change. Although it is positive that 1,200 self-assessments have been completed, this does not give clear indication of

long-term practice change, program relevancy, accuracy, complementary nature to existing agronomic information and other relevant factors. (sub. 17, p. 11)¹²

The effectiveness of co-design process has varied

Participants in the inquiry stressed the importance of sufficient time for co-design (for example, Farming Systems Group Alliance, sub. 15, p. 3). Like other FDF programs, rushed delivery and frequent changes in scope requirements compromised the design and delivery of CSA and DR.SAT.

Co-design is essential to ensure accessibility and usefulness of climate services tools (Buontempo et al. 2018; Cavelier et al. 2017; Christel et al. 2018; Swart et al. 2017). In particular, the process of building trust and dynamic relationships between producers and users is as important as the information itself (NSTC 2023).

However, both CSA and DR.SAT have suffered from shortcomings in their co-design processes. The CSA prototype was developed using existing climate information, without market testing to identify the actual preferences of likely users (DAWE 2021). The change in target users for the platform – from primary producers and advisers to a more diverse group including natural resource management (NRM) groups, banking and finance professionals, and agricultural suppliers – added a complexity in the user engagement for co-design. More recently, the tool has been re-designed through improved user engagement (DAFF 2022b).¹³

For DR.SAT, co-design was integrated into the development of the product from the beginning, including user needs assessment for small and medium sized farm businesses. However, despite these efforts, some inquiry participants have questioned the relevance of some of the information provided to farmers:

[The DR.SAT tool] ... is high level and generic so as to be nationally relevant, but does not provide useful guidance or insight at the local/regional level. (Lu Hogan and Lewis Kahn, sub. 5, p. 2)

Funding uncertainty is impeding further development

Funding for CSA and DR.SAT is provided to 30 June 2024, with no certainty of funding continuing under the next Funding Plan. The Commission has heard that funding certainty is needed to ensure ongoing maintenance, further improvements and regular updating. Without a decision to extend funding, both projects will wind up over the next twelve months.

It is prudent that the Government regularly assesses the funding of these tools. However, timely decisions should be made to avoid unnecessary costs and uncertainty.

How can the Better Climate Information programs be improved?

Given the strong case for governments to support climate services for farmers and the community, the Commission considers there are two options for the future of CSA and DR.SAT:

- continuing to fund both tools, while improving them and reducing duplication
- funding only CSA, possibly incorporating elements of DR.SAT.

¹² 1200 self-assessments had been completed by 574 accounts generated in DR.SAT by June 2022 (DAFF 2022b).

¹³ The CSA team sub-contracted FarmLink for user engagement and re-designed the platform, improving its accessibility (DAFF 2022a).

The Commission is inclined to support the second option with a clarification of the scope. CSA is the essential interface for the Drought Early Warning System¹⁴ and provides data to DR.SAT. Whichever approach is taken, inquiry participants strongly argued for the need to review and address duplication of climate services within the Better Climate Information theme and with other climate services.

The consolidation of programs with duplicate functionality: an example might be, consolidating of multiple satellite programs (Dr.Sat, DEA, CSIRO's CSA and BOM projects, NSW CDI and QLD CDI (combined drought indicators (1), especially those other overlapping programs between national, state and territory programs. (AgForce Queensland, sub. 45, p. 5)

Clearly, there are opportunities for aligning with and supporting such existing jurisdictional services to complement, rather than duplicate them. (Department of Agriculture and Fisheries (Qld), sub. 54, p. 3)

... highlights the importance of active management to minimise duplication [of climate information tools]. (Lu Hogan and Lewis Kahn, sub. 5, p. 2)

The Commission recognises the efforts to ensure alignment of tools across jurisdictions. For example, the CSA team has engaged with state and territory governments and has found that there is a need for clarity around cross-jurisdictional governance arrangements for data integration and management, climate science communication, water, and agriculture (CSIRO and BOM 2022a). To move forward with the tools, the Department will need to address the duplication issues, by strengthening collaboration between the Australian Government and jurisdictions.

It is essential that the uptake of tools be lifted to achieve intermediate outcomes of programs. Ensuring better coordination between FDF programs such as the Better Climate Information programs and other FDF programs such as the Hubs, FBR, and RDRP, may increase uptake. Some jurisdictions are intending to integrate DR.SAT into the FBR program (Tasmanian Government 2022a; Victorian Government 2022a; WA Government 2022a).

The Commission is seeking feedback on the future of both *Better Climate Information* programs under the next Funding Plan.



Interim finding 6

Investing in climate information services is appropriate, but funding two overlapping tools may be unnecessary

Providing information about climate risks is important to inform decision making. However:

- the uptake of the climate information tools has, so far, been modest
- there is an overlap between the target audience and information provided by Climate Services for Agriculture and Drought Resilience Self-Assessment Tool
- the effectiveness of the tools could be enhanced with improved user engagement
- the uptake of the tools could be increased through better coordination with the Drought Resilience Adoption and Innovation Hubs, Farm Business Resilience and Regional Drought Resilience Planning programs.

¹⁴ Drought Early Warning System is an initiative established by the Department of Agriculture, Fisheries and Forestry and will develop a set of national indicators for measuring and forecasting the extent and severity of drought impacts in the Australian agricultural sector. These indicators will be forward looking, thus are different from the results reported by existing drought monitoring systems (ABARES 2022).



Information request 9

The Commission is seeking views on the future of both Better Climate Information programs.

- Should the Future Drought Fund continue funding both Climate Services for Agriculture (CSA) and the Drought Resilience Self-Assessment Tool (DR.SAT)? If so, what information should they provide to whom?
- Should DR.SAT be integrated with CSA? If so, what elements of DR.SAT should be incorporated into the consolidated tool?

Better Planning

The *Better Planning* theme consists of two programs that fund planning for drought resilience:

- Farm Business Resilience (FBR)
- Regional Drought Resilience Planning (RDRP).

Almost \$117 million has been allocated to these programs over the four years of the current Funding Plan (\$76 million for the FBR program and \$41 million for the RDRP program). The two programs account for almost 30 per cent of FDF funds. The initial roll-out of both programs was delayed and only \$26 million had been spent by 30 June 2022 (table 6).

Farm Business Resilience

The FBR program is one of the FDF's foundation programs and the receives the largest share of funding. The program supports farmers to manage risk by providing subsidised training in strategic business skills, risk management (including drought risk), natural resource management, and personal and social resilience. The program also funds tailored business plans for individual farms.

The FBR program is delivered in partnership with state and territory governments, who provide co-funding. The state and territory governments have flexibility to tailor delivery to specific regional or industry priorities and build on their existing expertise and delivery mechanisms.

Government investment in business planning can be justified

There is evidence that improving farm business planning can help enhance resilience to many risks, including drought (OECD 2020; PC 2009). Business planning can lead to decisions which lift farm productivity and profitability (economic resilience) and change farming practices to better manage natural capital (environmental resilience).

Improving economic resilience will typically produce private benefits for farmers, while enhancing environmental resilience may deliver longer-term private economic benefits and spill-over public benefits, such as more sustainable landscapes. To the extent that support for business planning builds drought resilience, it aligns with the objectives of the FDF.

That said, there is a weak public benefit argument for funding businesses to undertake what could be considered a standard type of business activity. In 2009, the Productivity Commission stated in a report on government drought assistance that:

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. (PC 2009, p. 377)

Ideally, the mix of public and private funding should reflect the distribution of public and private benefits. In the case of the FBR program, all but one jurisdiction requires a co-contribution from participating farmers. However, the contribution is modest (about 5% of costs) and likely does not reflect the private returns for participating farmers.

A popular program which is promising change

The FBR program has had a strong uptake overall. Although Tasmania and Western Australia have had relatively modest uptake given they commenced their pilots later and Northern Territory has not yet commenced the program. As at 30 June 2022, 6,546 farmers had taken part in the program across seven jurisdictions, with 538 farm business plans completed and 903 plans reviewed (DAFF 2022b, p. 13).

The FBR program has been generally well received, with positive participant feedback across all states and territories other than the Northern Territory, where implementation has not yet commenced. The National Farmers' Federation said that:

The Farm Business Resilience Program is an example of a FDF program with an effective, simple, and industry-aligned objective that has been well-executed to date. The NFF strongly supports creating a step-change in the use of farm business management skills to proactively manage drought risks. (sub. 17, p. 11)

The Department of Agriculture and Fisheries (Qld) stated that:

Feedback received so far from attendees of the FBRP is that it has been well received and the information provided has been valuable. (sub. 54, p. 4)

The number of participants is one measure of the impact of the program. A more important measure is the extent that participation in the program leads to actions which would otherwise not occur, especially actions which lead to public benefits.

Evidence from the outcome and evaluation reports for the first year of the program suggests that most participants intend to make changes, particularly changes to improve their economic situation. For example:

- In New South Wales, 67% of participants reported an increased likelihood of changing behaviour; 41% of these participants reported specific behaviour changes. 100% of participants in business coaching reported specific intentions to implement priority changes (NSW Government 2022a, p. 1).
- In Victoria, participants reported a significant improvement in their knowledge and skills in business planning, farm finances and risk management. In post-program surveys of grains, mixed, beef and sheep farmers, 94% of farmers indicated that they intend to and/or have made changes and/or improvements to their farm business because of the program (Victorian Government 2022a, p. 6).
- In Queensland, across all industries, there were 73 fully completed business plans with up to another 246 being completed. Many participants had not completed budgets nor developed a business plan before their participation (Queensland Government 2022a, p. 5).

At this early stage, there is little evidence about what changes to farm management have occurred because of the program. It will be important that ongoing monitoring of changes to farming practices occurs to support a robust assessment of the effectiveness of the program.

The program should be refined to generate greater public benefits

Although there is reasonable justification for public support of education, training and planning activities, the intended public benefits of the FBR program are not clear. Most of the 18 short- and medium-term outcomes specified in the MEL Plan (DAFF 2022c) relate to building economic resilience objectives, which are likely to produce private benefits. Three medium-term outcomes, which focus on incorporating NRM approaches, are focused on environmental benefits.

Improved natural resource management has the potential to lift farm productivity and profitability – as well as produce positive spillover benefits such as more resilient landscapes (Brodt et al. 2011; Fleming et al. 2022b). A greater focus on natural resource management in FBR training and planning has the potential to deliver mutually reinforcing economic and environmental actions:

Improved NRM management is fundamental to FBRP participants becoming more drought resilient. Improved pasture management, water conservation, better cropping choices and decisions are all relevant to positive NRM outcomes. The FBRP program has proactively reached out to the NRM bodies and the Drought Innovation Hubs to maximise the input and impact around NRM outcomes. NRM bodies are sub-contracted parties within the Grazing industry project. (Queensland Government 2022a, p. 5)

Participants undertook workshops in natural resource management on topics including soil management, water management, identifying and managing climate risks, and on-farm carbon and emissions. (Victorian Government 2022, p. 8)

However, the Commission has heard that not all jurisdictions included NRM modules in their FBR programs so far. In South Australia, for example, natural resource management was not planned as part of the foundation year of the program (SA Government 2022, p. 10).

Integrating natural resource management more fully into the FBR program and strengthening its uptake where it already exists has the potential to both build economic resilience for farmers and deliver greater public benefits by enhancing environmental resilience, particularly if done at a landscape scale.

The Commission is interested in views on how natural resource management can be better embedded as a core feature of the coaching, planning and education modules offered by the FBR program. The program MEL Plan should be revised to capture if and how the program is supporting on-farm actions to improve natural resource management and to assess the economic and environmental outcomes achieved.



Interim finding 7

The Farm Business Resilience program has untapped potential for delivering public benefits

Feedback on the Farm Business Resilience program has been positive. But the public benefits from the program are likely marginal compared to private benefits. Natural resource management is already a component of the program; however greater public benefits are likely if the program provides more support for on-farm environmental initiatives.



Information request 10

Healthy landscapes support productive farms and contribute to greater drought resilience. The Commission is considering options to enhance the Farm Business Resilience (FBR) program to better support farmers' natural resource management. We are seeking further information on:

- the extent to which the FBR program already supports natural resource management on individual farms, and how the program can be amended to also support landscape-scale environmental initiatives
- how the FBR program can be better used to improve environmental resilience, in tandem with economic resilience
- whether and how the FBR program can be better coordinated with other Future Drought Fund programs.

Regional Drought Resilience Planning

The RDRP program is intended to help regional communities prepare for and manage future drought risks. It aims to:

- empower communities to identify the impacts of drought and develop regional drought resilience and management plans
- support communities to identify and assess the incremental, transitional and transformational opportunities needed to strengthen drought resilience
- facilitate increased community understanding of drought resilience including by encouraging communities to share their learnings with each other
- encourage improved natural resource management capability through planning (DAFF 2022d, p. 2).

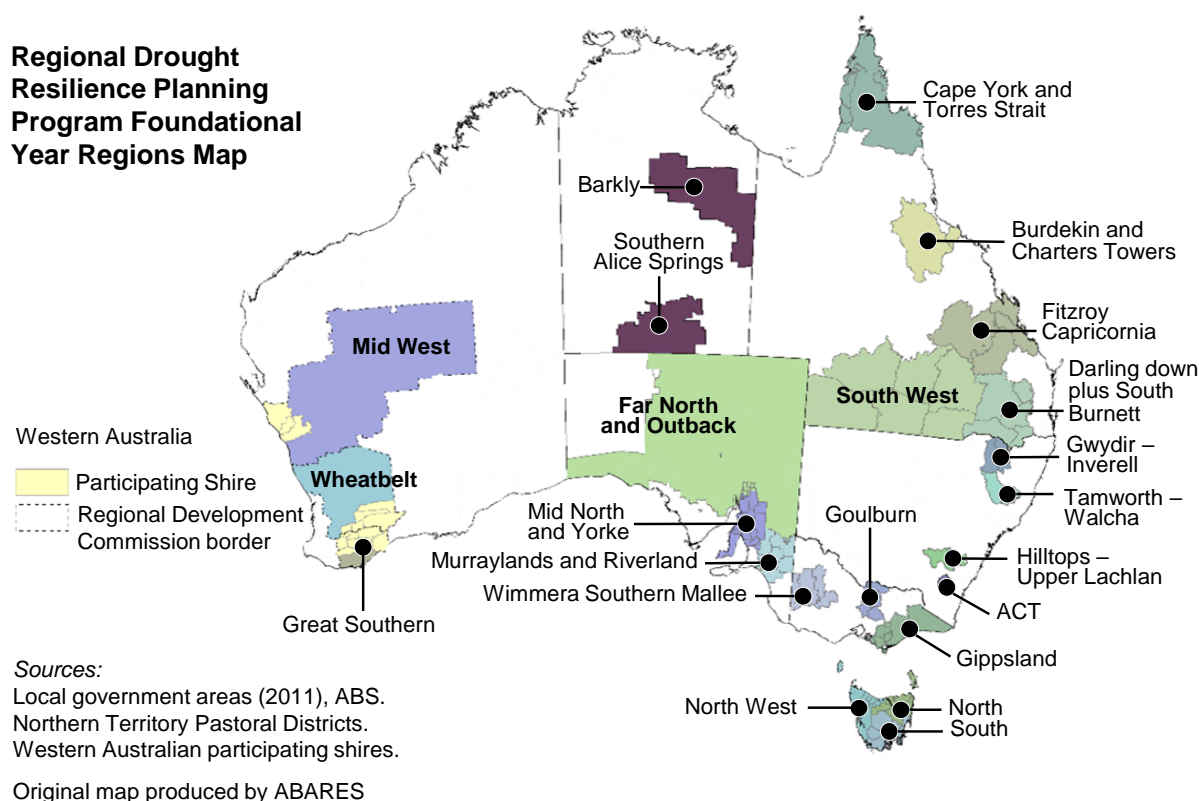
Each regional drought resilience plan is expected to:

- identify actions to prepare for future droughts, concentrating on the agricultural sector and allied industries
- bring people together to share their local knowledge and perspectives
- use best practice approaches to resilience, adaptation and transformation
- build on existing planning
- draw out regional needs and priorities to inform future investments (DAFF 2023g).

Before publication, regional plans are required to be reviewed by the CSIRO and then approved by both the relevant state/territory minister and the Australian Government Minister for Drought.

The pilot phase of the program commenced in 2020-21 and involved the preparation of 19 regional drought resilience plans (figure 6). The FDF provides up to \$600,000 for each of these plans. Australian Government funding for pilot-year programs can only be used for planning and not for undertaking any activities identified in the plans (DAFF 2022d, p. 3). The program also involves some state and territory governments funding, with these arrangements varying by jurisdiction. While most plans have reached the draft stage, no plan has been finalised yet. The rationale for conducting a pilot phase was to identify any learnings that would improve the process before rolling out the remaining plans:

In the foundational year, state and territory governments may take a staged or 'pilot' approach to implementing the full suite of core program elements ... The foundational year will also enable governments to trial and evaluate a range of delivery approaches, to ensure the learnings inform future program design and delivery. (DAFF 2022d, p. 2)

Figure 6 – Regional Drought Resilience Planning program map^a**Foundation year regions**

a. Plans have commenced for 19 of the 23 regions identified (DAFF 2022b, p. 6).

Source: DAFF (2023g).

Regional drought resilience plans have produced some benefits

While in their infancy, some pilot regional drought resilience plans have already produced drought resilience benefits. Western Australia, for example, created a replicable model that enables communities to examine their sensitivity and vulnerability to drought using the latest data and software, which can be used in subsequent regional drought resilience plans (WA Government 2022b, p. 7). The Tasmanian and Western Australian governments pointed out that the process created networks and connections between jurisdictions for 'getting to know drought related initiatives' (Tasmanian Government 2022b, p. 4; WA Government 2022b, p. 8). The NSW Government (2022, p. 6) highlighted the benefits of community engagement stemming from participation in the program:

Connections made through the engagement process have already allowed the Gwydir and Inverell region to progress one of their identified RDRP initiatives. They are partnering with Bindaree Beef (a large meat processor in the region) to develop and conduct engagement and training with their farmer supplier network of 4,000 farms to deliver a drought plan. This work clearly demonstrates the community's engagement and support of the identified actions. (NSW Government 2022b, p. 6).

However, the value of the regional plans is contested

Regional Drought Resilience Plans are intended to build environmental and social resilience to drought at the regional level, in keeping with the objectives of the Future Drought Fund.

While the Commission has heard in-principle support for regional planning and positive views about individual plans, some stakeholders have expressed doubts about the implementation and value of the RDRP program.

The program was announced after little, if any, consultation with the state and territory governments, which were expected to partly fund the plans (Department of Agriculture and Fisheries (Qld), sub. 54, p. 5). Submissions from states and territory governments have mentioned instances where program delivery has been affected by a lack of timely agreement on program design and administration (DEECA (Vic), sub. 55, p. 5). These issues highlight the importance of effective coordination and co-operation between governments on joint programs.

A strength of the program is that a broad coalition of local stakeholders are supported to work together to develop a genuinely local plan. However, this may have contributed to confusion about the long-term ownership of regional plans and their resourcing. The Regional Economies Centre of Excellence stated:

A recurring issue identified in designing the engagement process for RDRPs (or drought plans) was who “owns” the region’s drought plans. Drought is more pervasive an issue than the responsibility of local government, a Natural Resource Management Group or a regionally-based charity. These organisations all deal with drought to the extent that it impacts their scope of responsibilities but there is no overarching body or institution for whom drought is a primary responsibility at the local and/or regional level. (sub. 38, p. 9)

Regional drought resilience plans are intended to be ‘locally owned’ by the regional groups of local governments and other organisations that develop them (DAFF 2022d, p. 5). However, the Commission heard from some participants that local ownership may be diminished by:

- the involvement of the CSIRO in providing expert advice on draft regional drought resilience plans
- the requirement for plans to be signed off by the relevant state and territory Minister and the Australian Government Minister.

The Queensland Government (2022, p. 10) suggested there may be a lack of ownership of regional plans in Queensland because councils were ‘told to stay within the parameters of the Local Gov [Government] Act’.

Local governments across Australia vary significantly in size, capacity and ability to take responsibility for the plans and the priority areas contained in them. This has given rise to different views as to who should own regional plans, as highlighted below:

- **Gippsland** saw the benefit of the Reference Group members all having input into the RDR [Regional Drought Resilience] Plans and ownership over the RDR Plans. This was seen as a positive change from the past and a way of building trust about regarding a government initiative.
- In the **Goulburn** region, it was noted that for the RDR Plans to be implemented, someone must take ownership of its implementation and questioned whether community had the capacity to do this.
- **Wimmera Southern Mallee** said that the Reference Group did not sign up for ownership of the RDR Plan and they needed to find an organisation to commit to delivering the RDR Plan. They did not agree with finding another organisation to do this, and thought ownership should be with the Reference Group. (Deloitte 2022, p. 21)

These different views point to the limitations of a ‘one size fits all’ approach to ownership of both the plans and priority areas identified in them. Some priority areas are usually the responsibility of local governments (such as providing local infrastructure), while other are the domain of state governments (such as the provision of mental health services or more substantial water infrastructure) or the Australian Government (such as nationally significant infrastructure). The inherent challenge is the need to foster distributed, but

coordinated, ownership across all parties of each plan and the actions contained therein, recognising that some parties will seek to influence actions rather than take responsibility for them.

Regardless of how the plans are developed, clear ownership and responsibility is essential for their success, transparency and accountability. This applies to both the plans themselves and the priority areas for building local drought resilience initiatives in them.

The most appropriate levels of government to provide funding will vary according to the nature of each action. Given this, it seems inevitable that most funding for activities identified in the plans will need to come from sources outside the FDF.

An early priority for the Department should be consultations with state, territory and local governments about likely avenues for funding and any implications for the scope and content of regional plans yet to commence.

Regional plans should be accessible

The original intention was for the Australian Government to publish approved regional drought resilience plans on the Department's website:

... to enable communities to learn from each other and enable those with less expertise or capacity to benefit from access to examples and case studies. (DAFF 2022d, p. 5)

Despite 15 plans reaching the draft stage (DAFF 2022b, p. 18), only Western Australia and South Australia have published their draft RDRPs online (containing five plans). As yet, no plans have been finalised.

It is not clear why other jurisdictions have not followed suit. However, the failure to publish the remaining draft regional drought resilience plans limits their usefulness and is contrary to the long-term outcome of the 'greater sharing of learnings related to drought resilience between communities' for the RDRP program. To overcome this, the National Landcare Network called for:

Drought Resilience Plans should all be placed on one repository/website so they are easier to find and a public register of plans, and outcomes somewhere. (sub. 18, p. 2)

Drought resilience plans should take account of other regional plans

Regional drought resilience plans are just one of many regional plans, particularly at the state and territory government level (such as regional development plans, flood management plans and emergency management plans).

The Commission has heard of circumstances where RDRPs overlap with other plans and have confused stakeholders. The existence of other related plans does not mean that there is not a need for an RDRP. But, it highlights the importance of coordination and integration.

Lessons, views and feedback from related plans should be incorporated into the RDRP process where relevant. This approach has been taken by some governments. In its submission, the Department of Agriculture and Fisheries (Qld) pointed out that:

In Queensland, the RDRP is being implemented in parallel to the *Resilient Queensland 2018–2021* strategy completed by the Queensland Reconstruction Authority. Under the strategy, 14 regional plans were developed, aimed at improving community disaster resilience. The RDRP in Queensland reflects the learnings from the implementation of the strategy and is being developed for another 14 regions. (sub. 54, p. 4)

While the ACT Government (2022, p. 3) noted:

The Plan is also simultaneously developed with the ACT's broader agriculture Strategy, sharing stakeholder consultations methods and events. The Plan will also include insights gathered

through Various NRM programs such as Farm Diversification Study and ACT Native Woodland Conservation Strategy. Finally, the RDRP aligns with a recently completed (unpublished & confidential) work on ACT Whole of Government Climate Change Risk Assessment.

The role of regional drought resilience plans within the FDF

The Commission has heard of confusion about the place of RDRPs within the FDF and how it integrates with other programs:

There was confusion around where the plans fit within the FDF overall program and there is a need to provide a clear document / diagram / explanation of these to the new regions. This includes the Drought and Innovation Hubs, the Drought Resilience Leaders Program; the Farm Business Resilience Program (FBRP), Climate Services for Agriculture (CSA) and DR.SAT. For example, there was a comment about the lack of regionally specific climate data, which is the very thing that CSA is intended to provide. (Queensland Government 2022b, p. 30)

This points to the scope for RDRPs to play a more prominent role within the FDF by exploiting the potential linkages with other FDF programs. One area for greater linkage is with the Drought Resilience Adoption and Innovation Hubs program (discussed below). Hubs currently develop their own list of regional priorities in parallel to the regional planning process. This causes a duplication of effort, where the same stakeholders are often being consulted. It also risks spreading available resources thinly and reducing the efficacy of effort. It makes sense to better integrate the Hubs into RDRPs to ensure a consistent set of community drought resilience objectives within each region.

As highlighted by the Victorian Government:

... in the Goulburn region, Riverine Plains participated in the Goulburn Reference Group but was consistently looking to Agriculture Victoria to describe the connection to the Hub and the RDRP program. (Victorian Government 2022b, p. 3)

Given the focus of Hubs on community needs, scope exists to better link the grants components of the Better Prepared Communities program (discussed below) with the priorities identified in RDRPs. Such an approach would enable scope for funding some of the social initiatives identified in RDRPs.

Indeed, the Department is beginning to do this. The new Helping Regional Communities Prepare for Drought initiative (discussed below) seeks to reduce the duplication of effort by linking funding to the community theme identified as priorities in the regional plans.

Changes are needed if the potential of RDRPs are to be realised

Well-developed regional drought resilience plans have the potential to identify regional needs and investment priorities and guide FDF activities within their region. However, given the issues mentioned above, some regional plans may 'quickly become another set of forgotten reports' (Rural Economies Centre of Excellence, sub. 38, p. 9).

An important factor in determining the effectiveness of these plans is the extent of buy-in from state and territory government agencies, which can give impetus, funding and ownership to these plans.

Clarity around the next steps after a plan is finalised, including funding sources, is needed to realise RDRP objectives. Without a way to fund initiatives, the Commission sees little value in continuing with the plans. Some funds could be funded through reallocations within the FDF, but, as already noted, other sources will be needed.



Interim finding 8

Regional Drought Resilience Plans could be improved

The Regional Drought Resilience Plans can help communities prepare for drought. However, plans are often affected by poor integration and sequencing with other Future Drought Fund programs, lack of ownership over who is responsible for their delivery and minimal funding to implement the identified initiatives. There is a risk that plans will not lead to tangible outcomes and could result in confusion and consultation fatigue.



Information request 11

The Commission is seeking views on how the Regional Drought Resilience Planning program can be improved, including through better integration with other Future Drought Fund (FDF) programs, stronger governance and public reporting.

The Commission is also seeking views on whether the Australian Government should reassess the value of the program and consider options for reallocating funds to other FDF activities.

Better Practices

The *Better Practices* theme is the largest of the four FDF themes. It has undergone substantial change since the start of the Funding Plan.¹⁵ The theme now has 12 programs with just over \$203 million allocated over the four years of the current Funding Plan (over half of all FDF funding). Almost \$77 million had been spent by 30 June 2022 (56.3% of FDF expenditure to date) (table 6).

The *Drought Resilience Adaptation and Innovation Hub* program grew significantly in scope, ambition and funding following advice from the FDF Consultative Committee in late 2020, after their consultation with stakeholders on the draft Funding Plan. The *Natural Resource Management Drought Resilience* program was split in two when it was rolled out – Grants and Landscapes – to cater for different target audiences.¹⁶

In 2022, three programs were added to the theme (*Adoption Officers, Hub Projects and Drought Resilience Soils and Landscapes*) and a further four programs have recently been announced and are in the early stages of roll out (*Grants to support the Adoption of Drought Resilient Practices, Drought Resilience Long Term Trials, Drought Resilience Commercialisation Initiative and Drought Resilience Scholarships*). This section does not cover the four recently announced programs that are still being rolled out.

¹⁵ The foundation year programs contained two programs (Drought Resilience Research and Adoption and Natural Resource Management Drought Resilience (Littleproud 2020) that are still delivered under the Better Practices theme. The Drought Resilience Research and Adoption program consisted of four sub-programs: Drought Resilience Adaptation and Innovation Hubs; Drought Resilience Innovation Grants; Drought Resilience Research and Adoption Investment Plan; Science to Practice Forum (DAFF 2023b). The first two of these sub-programs subsequently became programs, and the last two were rolled in with two other activities to form the National Enabling Activities program.

¹⁶ These two programs were grouped under the Better Land Management theme (DAWE 2021, p. 34) before being rolled into the Better Practices theme (DAFF 2022b, p. 49).

Drought Resilience Adoption and Innovation Hubs

The eight Drought Resilience Adoption and Innovation Hubs (Hubs) are a core part of the FDF, both in terms of funding (\$66 million over four years) (table 6) and their potential links to other programs. The purpose of the Hubs is to drive regional efforts to develop, extend, adopt and commercialise drought resilient practices and technologies.

With one exception, the Hubs are hosted by regional universities, with a presence in other centres of the region ('nodes'). The consortium operating each Hub was chosen in 2021 by a competitive tender process.

Hubs are intended to be a conduit for building drought preparedness and resilience in their regions by:

- supporting local networks of farmers, businesses and other groups (including industry, environmental and community groups)
- linking these local stakeholders with researchers, government agencies and others groups (including industry, environmental and community groups)
- providing information on, and assisting with applications for, other FDF grants and programs
- enabling information and knowledge to flow in both directions (between local farmers, businesses and other groups to the Hubs, regional universities and the Australian Government, and vice versa).

Hubs are expected to achieve these goals in various ways such as providing the latest knowledge to farmers (extension), encouraging the uptake of improved practices and technologies (adoption) and bringing new products and services to market (commercialisation).

Uncertainty surrounded the initial role of the Hubs

Uncertainty surrounded the roles of the Hubs when they were first established, for various reasons, including:

- their intended role, outputs and outcomes not being clearly articulated when they were established
- inconsistent messaging from the Department, including to Hub organisations, about the extent to which Hubs would engage in research and development
- insufficient detail on how Hubs would interact with existing organisations, such as NRM groups, Landcare groups and Rural Research and Development Corporations (RDCs).

These initial issues have been partly addressed. The Department has stated that Hubs are to focus on applying existing knowledge to solve issues of local concern (extension, adoption and commercialisation) rather than generating new knowledge (research and development).

It would still be beneficial to both the Hubs and the wider public for the Department to clarify its expectations for the program and the types of activities that Hubs can undertake.

The roles and responsibilities of the Hubs have expanded

New functions and funding assigned by the Australian Government include the employment of adoption officers, regional soil coordinators and innovation officers, as well as funding for projects involving more than one Hub. Hubs are now expected to undertake broader innovation activities to improve productivity and commercialisation opportunities, particularly across the agriculture, aquaculture and forestry sectors (\$21.7 million). Some of the additional funding has come from the FDF (the \$4 million Cross Hub Projects program and the \$9 million Adoption Officers program; table 6). The remainder has come from non-FDF sources and, as such, is out of scope for this review (employing regional soil coordinators and their role as innovation hubs). These new functions have exacerbated existing confusion in the wider community about the roles and responsibilities of Hubs.

Hubs focused first on building economic resilience and networks

While Hubs are only newly established, their operational plans and first MEL reports indicate that their activities are broadly consistent with the objectives of the FDF.

Most of the Hub activities to date have focused on building networks and drought resilience extension and adoption, which has been primarily aimed at building economic resilience.

The TNQ [Tropical North Queensland] Hub has been actively engaging with key stakeholders to build networks, collaboration and partnerships. Cape York Node NRM has joined the TNQ Hub as a Node Member. Inviting Cape York NRM to become a node was a strategic decision made through the Steering Committee as there are many opportunities that can be pursued in Cape York and having the NRM on board will help facilitate change in that region. (TNQ Hub 2022, p. 44)

During the reporting period, the TNQ Hub has met with the below Research Development Corporation (RDC) to identify common RDEA&C [research, development, extension, adoption and commercialisation] needs and priorities. ... The TNQ Hub has ongoing meetings and collaboration with the remaining RDCs, with most of the activity revolving around grant applications and Hub Program support. (TNQ Hub 2022, p. 49)

Fostering partnerships and relationships has been an essential component of establishing the Hub. It is worth noting that many of the Hub's partnerships are either new or may previously have been largely transactional rather than collaborative. (TAS Farm Innovation Hub 2022, p. 3)

At the Partner Council meeting in March, one of the key benefits noted by several partners in their presentation was the opportunity that the Hub was providing to form new connections. ... The Hub has facilitated connections between local regenerative agriculture networks and organisations that had previously not been in contact. (TAS Farm Innovation Hub 2022, p. 36)

The Commission has heard that some Hubs are starting to broaden their focus to include environmental resilience priorities. This should be encouraged as it enables them to better meet their triple bottom line objectives. Hubs will also need to undertake activities to meet their stipulated social objectives.

The Hubs program needs a MEL plan

Unlike most FDF programs, there is no monitoring, evaluation and learning (MEL plan) for the Hubs program. Instead, each Hub has its own MEL plan setting out their expected outputs, outcomes and metrics.

There would be value in the Department establishing an overarching MEL plan for the program to define what the intended outputs and outcomes are for the Hubs program, and how the program links with the FDF's MEL Framework.

Hub governance needs improvement

Numerous submissions to this inquiry raised issues surrounding the governance and operations of some Hubs. These concerns were also evident in many stakeholder consultations. For example, Natural Resource Management WA, the peak body for NRM groups in Western Australia, stated:

The experience of regional NRM groups in WA with the Drought Hubs has been unsatisfactory. The intent of the Hubs is supported however the implementation has not met expectations. This includes issues with real and perceived duplication of services and reliance, and insufficient acknowledgement on NRM Regional Organisation networks, capacity, reach, contacts and events. Some Regional NRM Organisations report providing significant self-funded support to the Hub in the establishment phase, that has continued into program delivery. Conversely, despite repeated offers of access to background information and details of projects undertaken by

regional NRM groups to inform the priority project areas for WA, this was not used to inform planning adversely affecting the impact and efficacy of the program. (sub. 13, p. 3)

This view was repeated in other submissions from NRM groups in Western Australia (NACC NRM, sub. 21, p. 3; Rangelands NRM Coordinating Group, sub. 50, p. 5) and from NRM Regions Australia (sub. 51, p. 8).

The number of these concerns suggest issues with the operation, management and governance of Hubs. However, the context surrounding each concern is not clear, making it hard to identify whether the concerns relate to an individual Hub or all Hubs.

The annual survey of Hub members, conducted by the Hubs themselves, generally contradicts the view heard that there are widespread governance issues with Hubs.¹⁷ The results pointed to general satisfaction with how Hubs are run. However, some survey responses do highlight areas of dissatisfaction with the governance of specific Hubs. The bulk of these issues seem to arise from the *operation* of the governance arrangements, rather than the absence or inappropriateness of these arrangements.

Key issues flagged in the survey include:

- tensions arising from differences in expertise, experience, priorities, resources and culture of the organisations that make up the consortium that runs each Hub (particularly between regional universities and other groups, and between farming and NRM/Landcare groups)
- Hubs failing to recognise, value and include all consortium members in the decision-making process
- differences of opinion concerning the direction that the Hub should take and projects that it should fund, particularly after the remit of the Hubs was expanded (such as whether to initially pursue innovation or build drought resilience objectives)
- a lack of certainty concerning the role of the Hub steering committee (or equivalent), Hub staff and the boundaries between the two
- a lack of certainty concerning whether the steering committee is an advisory body or one that makes binding decisions (like the board of a listed company)
- whether membership of the steering committee should be based on the skills that the Hub needs or should represent the interests of the organisations that comprise the consortium.

Though the survey was not comprehensive, the breadth of these issues highlighted do raise questions about the effectiveness of these oversight arrangements and suggest that improvements may be warranted.¹⁸

The issues raised may reflect differences of opinion on the way particular matters should be handled, while others may have resolved themselves (such as by the Department clarifying its expectations concerning the role and intended outputs of Hubs). However, the number of concerns raised warrants further investigation.

The role for Hubs going forward

As a first step to addressing these governance and operational issues, the Department should develop and publish a statement of expectations that sets out its expectations concerning the Hubs program. The statement should clarify the roles and responsibilities of the Hubs and set out the outputs and outcomes that they are expected to deliver.

Once a statement of expectations has been provided to all Hubs, supported by a MEL plan for the program, it will be important for the Department to begin assessing the operation and performance of each Hub.

¹⁷ Hubs are required to undertake an annual survey of their members (output 13) and publish it in their annual MEL Report (2021–22, unpublished).

¹⁸ Only five of the eight Hubs undertook the required survey of their members in 2021–22. The three that elected not to survey their members were the South Australia, Tasmania and Tropical North Queensland Hubs.

During the life of the next Funding Plan, the Department should review each Hub to determine if funding should continue beyond 2028.

Hubs should also be asked to provide accessible public information on their priorities and their forward work program. This information will be important for subsequent performance assessments as well as addressing concerns raised by stakeholders about the visibility of Hub activities.



Interim finding 9

There is scope to improve the Drought Resilience Adoption and Innovation Hubs

The Drought Resilience Adoption and Innovation Hubs are in their early stages. It is likely that many Hubs are contributing to drought resilience, but it is too early to assess their effectiveness.

There is scope to make improvements to better manage and assess Hub performance and overcome initial implementation issues around stakeholder engagement, integration with other Future Drought Fund programs and better targeting investment.



Interim recommendation 5

Improving the Drought Resilience Adoption and Innovation Hubs

Funding for the Drought Resilience Adoption and Innovation Hubs should be extended in the next Funding Plan. However, the Australian Government should:

- state what its expectations are for the Drought Resilience Adoption and Innovation Hubs program and individual Hubs
- commission a performance review of the Hubs during the next Funding Plan, with future funding contingent on demonstration of adequate performance and governance
- implement a monitoring, evaluation and learning (MEL) plan for the Hubs program as a whole and ensure individual Hub MEL plans align accordingly.

National Enabling Activities

The National Enabling Activities program supports activities to 'help farmers and regional communities build drought resilience through investment in collaboration and impact assessment'. Four National Enabling Activities have been funded, comprising of:

- an annual Science to Practice Forum
- an investment plan to identify drought resilience research and adoption investment priorities
- work on how to effectively engage with First Nations communities on drought resilience
- work on how to develop an effective knowledge management system for the FDF (DAFF 2022b, pp. 30–31).

These activities were rolled out at the beginning of the FDF, and were intended to underpin other FDF activities.

Over \$8 million has been earmarked for National Enabling Activities over the four years of the current FDF Funding Plan. The bulk of this funding (\$6.8 million) remains unallocated (85% of allocated funding) (table 6).

Most of the activities within the *National Enabling Activities* program have concluded. The one exception is the Science to Practice Forum, which the Commission considers to be a low-cost avenue for sharing information and worth continuing.

The other activities have yielded very mixed results. A draft Drought Resilience Research and Adoption Investment Plan was developed, at a cost of \$214,000, but was overtaken by changes in the Fund and not released (the need for such a plan is discussed in section 2). Two consultancies were undertaken to assist with engagement of Aboriginal and Torres Strait Islander people (the recommendations from these consultancies are discussed in section 6). A consultancy project, costing more than \$700,000, was commissioned to inform the development of a knowledge management platform for the Hubs and others, but this platform has not been progressed.

Drought Resilience Innovation Grants

The *Drought Resilience Innovation Grants* program funds innovative projects to equip farmers, agricultural communities and businesses to adapt, reorganise, transition and/or transform in preparation for drought conditions. The program funds projects at different stages of development, including early-stage proposals, feasibility testing for new products, processes and services and large-scale innovation projects.

There was substantial interest in the grants, with over 800 applications and 46 grants worth \$28.9 million awarded. The grants consisted of 15 Innovation Grants, 8 Proof-of-Concept Grants and 23 Ideas Grants. Two projects have since ceased (DAFF 2022b, p. 32; Community Grants Hub nd, p. 1).

The funded projects are diverse and encompass activities such as: harvesting atmospheric moisture; using irrigation management technology and livestock ranking strategies; trialling diversified vegetation cover; demonstrating different crop rotation cycles; developing digital tools to support decision making ahead of droughts; and using behavioural science approaches to building drought resilience.

The FDF's role in innovation is unclear

The presence of public good benefits associated with research and development are an important rationale for government involvement (IC 1995; PC 2011). Innovation provides spillover benefits from the resulting knowledge beyond the innovator, who therefore tends to underinvest.

The projects under the Innovation Grants program offer the potential to deliver improved ways of building drought resilience and are consistent with the Funding Plans' objectives. However, as outlined in section 2, it is not clear what gaps the Innovation Grants program are filling and whether the FDF is best placed to fund innovation.

There is possibly duplication with other programs and questions on the FDF's role for innovation

The funding of innovative projects that seek to build drought resilience raises the potential for tensions and inconsistencies in the approach to innovation across the fund. Many stakeholders expect the Hubs - including their regional university partners, who otherwise undertake research - to apply existing knowledge rather than generate new knowledge through innovation. In contrast, the Innovation Grants streams deliberately funds applied research and innovation. There is also a lack of consistency across the Fund about whether it should finance research and commercialisation activities.

Furthermore, the innovation grants program can create overlap with numerous other FDF programs. For instance, CSA and DR.SAT involve developing tools to assist farmers. Likewise, many Hub and Drought Resilience NRM grant activities (including Drought Resilient Soils and Landscapes) target broadly similar endeavours.

Future innovation grants should seek to avoid duplication with existing programs.

A MEL plan for the program is needed

Recipients of the Innovation Grants stream are required to complete a MEL plan and to report against it, while the other grant recipients are required to complete a report at the end of the project. However, there is not a MEL Plan for the program as a whole. The absence of a MEL plan and MEL Reports, means the benefits and learnings that have come from the two finished grant streams and what outcomes the third stream will deliver will not be shared and understood.

The Activity Work Plan sets out, among other things, the intended objectives, deliverables and milestones for each grant made under the Innovation Grant stream. These Plans contain, in effect, a condensed MEL plan for each project that outlines the intended approach for assessing the effects of the program (including the baseline against which the effects will be measured). These projects are mid-way through their three-year periods and, as such, it is too early to ascertain what the actual outputs and outcomes will be and their contribution to the objectives of the FDF.

However, projects funded under the other two streams were scheduled for completion by now. But, there is a lack of published information on what outputs and the outcomes were delivered by the projects funded from the Ideas and Proof-of-Concept Grant streams. This prevents an assessment of the appropriateness, effectiveness and efficiency of the streams, their value for money and what knowledge and learnings have been gained for informing future grant decisions and operation of the program. This is also at odds with the reason for funding innovation and trials in the first place, which is to develop new and improved knowledge, products, services and processes for building drought resilience and for farmers to adopt them at scale (section 2).

The ability to share learnings at a national level is important for success. While there may be climatic or production differences between jurisdictions, activities funded under the Innovation Grants may have outcomes applicable to producers across the nation. Tasmania supports the creation of mechanisms to share these success stories using formats familiar and accessible to farmers as a priority. (Tasmanian Government, sub. 52, p. 7)

Any future grants would benefit from clearer expectations

Only 61 of the more than 800 applications were funded, which may signal a lack of clarity and understanding about the types of projects that the program was seeking to fund.

The Commission is seeking feedback on whether there is merit in re-orienting the innovation grants program to focus on solutions to *specific* drought resilience problems. One way of identifying these drought resilience problems would be to tap into the co-design processes that already form part of many FDF programs (such as the Hubs and NRM programs). Consultation would identify a small number of challenges – possibly a single challenge for each region serviced by a hub – with FDF funds available to leverage funds from other sources for innovation projects to address these challenges.

While seeking solutions to local problems, the program should continue to focus on potential solutions that can be scaled up and applied more widely across Australia. The Fund would need to develop a way of prioritising the problems, so that the grants deliver clear drought resilience benefits.

One option that may be worth considering is the funding of a series of competitions aimed at solving specific drought resilience issues. An example is the annual Open Innovation Challenger run by the City of Melbourne to solve a city issue. Such a challenge could consist of two stages. The first stage could seek proposals for practical and cost-effective solutions to the specific challenge identified. The second stage could fund the best and most cost-effective proposals. An independent assessment panel could include people who may be affected by the drought resilience problem being targeted.



Interim finding 10

The role of Drought Resilience Innovation Grants

The Drought Resilience Innovation Grants support the development of new or improved products, services or processes which build drought resilience. However, many institutions participate in agriculture innovation (including universities, industry-led Research and Development Corporations and Cooperative Research Centres). It is unclear how and where the Future Drought Fund can best add value.

There may be opportunities to adjust the program to better target grants toward a small number of pre-identified major resilience challenges.



Information request 12

The Commission is seeking views on whether the Future Drought Fund should be supporting agriculture innovation and if so, what types of innovation it should fund.

If Innovation Grants continue, the Commission is considering whether the Innovation Grants program could be improved by adopting a 'challenge-oriented' approach whereby the Australian Government outlines specific resilience challenge and invites applicants accordingly. The Commission is requesting feedback on:

- whether this approach is worthwhile
- whether similar approaches have been effective in other jurisdictions
- what the process should be to identify and define challenges
- how to scope and stage a 'challenge-oriented' approach appropriately, given funding limits.

Natural Resource Management Drought Resilience Program

During the first Funding Plan, three grant programs have been rolled out to improve natural resource management (NRM).

The first two programs, Natural Resource Management Drought Resilience Program – Grants (\$7.8 million) and Natural Resource Management Drought Resilience Program – Landscapes (\$5.6 million) were 12-month programs. The third program, Drought Resilience Soils and Landscapes (\$23.1 million) is a three-year program running from 2021-22 to 2023-24 (table 6).

Enhancing natural resource management offers private and public benefits

It is appropriate that the FDF supports better natural resource management – the management of natural resources such as land, water, soil, plants and animals, with a focus on sustainable practices – to the extent effective natural resource management can improve economic and environmental resilience.

NRM projects may produce private benefits in the form of increased profitability and productivity (economic resilience) and public benefits arising from improvements to the natural environment (environmental resilience). Examples of public benefits that may arise from improved NRM practices include:

- producing direct benefits for the environment (such as improving water or vegetation quality)
- undertaking trials and demonstrations of improved NRM practices that increase the awareness and understanding of farmers about these techniques, which is essential if they are to adopt them

- facilitating coordination and collaboration across multiple parties needed to affect meaningful landscape-scale change.

Government has a crucial role in supporting NRM projects with broad public benefits. Activities that involve trialling and demonstrating practices to improve the management of natural capital at a landscape scale are more likely to generate net public benefits, and thus warrant government support. Conversely, smaller scale, farm-specific activities are likely to have greater private benefits, and as such, a weaker justification for government intervention.

Natural Resource Management – Grants and Landscapes

The NRM Grants and Landscapes programs target the building of environmental resilience to drought by supporting on ground projects that enhances the resilience of natural capital in agricultural landscapes. Natural capital underpins ecosystem services provided by vegetation, soils, water and biodiversity, which in turn helps to build a functional and resilient landscape. Ecosystem services include services provided by native vegetation, soil, as well as water and the diversity of plants, animals and micro-organisms that are important to the resilience and productivity of agricultural landscapes. The intention is that the programs will lead to enhanced socio-economic resilience to the impacts of drought and climate change for farmers and agriculture-dependent communities.

The NRM Grants program funded a greater number of smaller projects compared to the NRM Landscapes program. The NRM Landscapes program was restricted to NRM organisations, whereas the NRM Grants process was open to everyone (subject to standard eligibility criteria).

The NRM Grants program received 314 eligible applications, of which 66 were funded totalling \$7.8 million. Payments occurred in 2021, and all projects had to be completed by 30 June 2022 (DAFF 2022b, p. 33; Community Grants Hub nd, p. 1).

The NRM Landscapes program received 42 eligible applications, of which 14 were funded totalling \$5.6 million. Payments occurred in 2021, and all projects had to be completed by 30 June 2022 (DAFF 2022b, p. 33; DAWE 2020e, p. 1).

By 30 June 2022, 35 projects across the two programs were completed. The remaining 45 projects were extended beyond 30 June 2022 due to the impacts of COVID-19, floods and other adverse weather conditions. The combination of these factors has delayed the ability of some grantees to complete activities and to measure, monitor and evaluate their projects (DAFF 2022b, p. 25).

Short-term timing impacted outcomes

Both the grants and landscape programs operated for 12 months and rolled out quickly, with applications opening in late 2020. The short-term nature of the programs appears to have had a detrimental impact on eliciting applications for long-term lasting change.

The Selection Advisory Panel for both NRM Landscapes and NRM Grants observed that most applications lacked strong transformative propositions (DAWE 2020d, DAWE 2020e). The NRM Grants Panel, observed that this was primarily due to the short duration (12-18 months) and that transformational change is simply not feasible within this timeframe (DAWE 2020d).

This is inconsistent with the MEL plan for both programs which indicates that both programs are expected to contribute to the long-term FDF objectives (4+ years) of:

- more primary producers preserve natural capital while also improving productivity and profitability (Environmental outcome EN1)

- more primary producers adopt whole-of-system approaches to NRM to improve the natural resource base, for long-term productivity and landscape health (Environmental outcome EN2)
- more primary producers adopt risk management practices to improve their sustainability and resilience (Economic outcome EC2) (DAFF 2022e, p. 11).

The short-term nature of these projects means that it is also unlikely to deliver on its 'central aim of promoting transformational on-ground practices, networks and partnerships that contribute to the drought resilience of agricultural and broader landscapes' as delivering transformational change takes time. This sentiment is recognised by the Department of Agriculture, Fisheries and Forestry (Cth) (sub. 42, p. 8):

The foundational NRM Drought Resilience program received 12 months of funding for activities throughout 2021-22. By 30 June 2022, more than half of the projects required extensions due to the impacts of COVID-19, and floods. A combination of these factors delayed the ability of grantees to complete face-to-face activities and, to measure, monitor and evaluate their projects. Further, it was difficult to align project activities with relevant seasonal windows, particularly if a seasonal planting window was missed due to adverse weather conditions. Short timeframes also created significant challenges to achieving drought resilience outcomes. For example, project outcomes may have been masked by the impacts of significantly higher than normal rainfall events and floods. It is essential that our grantees be given the time and space if they are to observe and report on drought resilience improvements. Drought resilience technologies and practices must be applicable to 'real world' farming conditions before farmers can trust and adopt those practices and technologies. Experimenting with transformative approaches to build natural capital to increase drought resilience often takes multiple years under varied seasonal production cycles and climatic conditions.

There is not a separate MEL plan for each program

There is one MEL plan (DAFF 2022e) that covers both programs rather than each program having its own MEL plan.

The MEL plan states there is supposed to be:

An end of Program evaluation following activity completion and receipt of final reports, focusing on how efficiently the Program was administered and factors affecting the achievement of outcomes. This will be part of a process-focussed FDF-level mid-term evaluation around September 2022. (DAFF 2022e, p. 6)

However, the extension to the final completion date has meant that there has been limited project-specific reporting to date. Consequently, there has been no end of project MEL reporting for the combined programs.

Environmental outcomes are generally difficult to measure (section 5). This, coupled with the heterogeneous nature of the projects funded, will make it difficult to assess the effectiveness of the combined programs.

Notwithstanding this, differences between the two programs – the parties involved, the types of projects funded, grant size and the quantum of funding involved – point to the need for separate MEL plans and MEL Reports to enable the effectiveness of each program to be determined individually.

Some projects produce private benefits

Some of the projects funded appear to produce private benefits. For example, one NRM Grant funded the demonstration of objective tools (including soil moisture sensors) to determine when to irrigate and when determining how much water to apply. While the use of such tools clearly has the potential to increase on-farm productivity by reducing and optimising water use, the resulting cost savings is a private benefit. While these projects may have the potential to produce public benefits, this will likely depend on the degree

with which information on the outcomes of the project is shared and readily available. At this stage, it is not clear that this has occurred.

While grants involved co-investment to cover the private benefits (as per funding principle 13), it is unclear what the expected public benefits are and why funding is needed to achieve these benefits (as required under funding principle 15).

Drought Resilient Soils and Landscapes

The objective of the program is to trial and demonstrate how scaling of particular practices (or combinations of practices) to improve management of natural capital can build drought resilience. It aims to create and communicate an evidence base and case studies that contribute to scaling out the successful practices.

The Drought Resilience Soils and Landscapes Program appear to have incorporated learnings from the initial two NRM programs. This program provides for longer time frame for projects and delivers them at a greater scale. It also involves more funding than the previous two programs (just over \$23 million compared to just over \$13 million) (table 6). These factors increase the potential for the program to deliver public benefits in the form of stronger environmental resilience compared to the earlier NRM programs.

The 26 projects being funded were selected from 144 applicants to an open competitive grant round held between 1 December 2021 and 11 January 2022 at a total expected cost of just over \$23 million (Community Grants Hub nd, p. 1). Applications were assessed against the criteria set out in the Grant Opportunity Guidelines. Successful applications were chosen by the Drought Minister based on the recommendations of the program's independent Selection Advisory Panel and advice from the Regional Investment Corporation Board.

The primary focus of successful projects was to trial and demonstrate practices that targeted improved drought resilience. They were required to support:

- continued agricultural productivity and profitability during times of drought
- faster recovery of agricultural productivity and profitability following times of drought
- the provision of common and public good ecosystem services during and following times of drought (as these services underpin or are co-benefits to agricultural productivity and profitability) (Community Grants Hub 2021, p. 6).

The program will run from 2021-22 to 2023-24. Activities must be completed by 30 June 2024.

The projects have been running for roughly one year, and it is too early to assess their effectiveness. A draft MEL plan has been prepared for the program but has not yet been finalised. Given the possibility of strong spillover benefits from NRM activities, the Commission is considering recommending this program be continued in the next Funding Plan.

Better Prepared Communities

Programs under the *Better Prepared Communities* theme are focused on building local social capital to help communities withstand the impact of drought. The programs support local leaders, networks, mentors and organisations working on drought resilience in their community. The guiding principle is that social capital is built on strong social networks and community leaders who help communities adapt and transform in response to the shocks produced by drought and other forms of climate variability.

Phase one of this theme involved two foundational programs.

- *Drought Resilience Leaders* (Leaders) program – provided leadership training courses, extension grants for leadership training participants to fund initiatives in their communities, and a national mentoring program (\$7.5 million). The program was delivered by the Australian Rural Leadership Foundation (ARLF)
- *Networks to Build Drought Resilience* (Networks) program – provided grants for community projects such as events, training and small-scale community infrastructure (\$3.75 million). The program was delivered by the Foundation for Rural & Regional Renewal (FRRR).

Phase two of the theme involves a single program – the *Helping Regional Communities Prepare for Drought* (Helping Regional Communities) program (\$30 million) – which commenced in 2022, continuing and integrating both phase one programs. The program is being jointly delivered by the ARLF and the FRRR.

The Helping Regional Communities program effectively consists of five separate, but related, streams.

- Community Impact Program, which consists of:
 - Community Impact Grants for community organisations to strengthen community networks, capabilities and facilities that support drought preparedness
 - Community Leadership Activities to support community members to develop their leadership skills to contribute to drought resilience in their community
- Small Network Program provides one-off events or initiatives to strengthen community networks and capabilities
- National Mentoring Program brings together experienced mentors with mentees who want to contribute to their community's drought resilience
- National Learning Network connects individuals and organisations to facilitate knowledge sharing
- National Expertise Pool provides specialist support to help community organisations implement FDF funded drought resilience initiatives (FRRR nd).

The three programs have been allocated \$40.8 million over the four years of the current Funding Plan; \$16.2 million had been spent by 30 June 2022 (table 6).

The FDF's role in supporting community resilience activities is unclear

Government support for social resilience initiatives in regional communities can be justified on the basis that social capital can be underinvested in, despite its potential to provide a public benefit to the community. Underinvestment may be partly due to the lack of private gain but also due to the reduced resources and capacity in rural and remote communities to invest. However, as outlined in section 3, the role the FDF should play in doing this is debatable.

The Commission has heard positive feedback about these programs. The FRRR reported that their Networks program initiatives have been a success, with 87 projects being completed within the reporting timeframe, supported by grants totalling roughly \$4.2 million. Grantees provided positive feedback on the opportunities to participate in workshops, network events, training, and small infrastructure investments. Social capital and wellbeing were reportedly improved due to several measures showing grantees reporting growth in their networks (FRRR 2023). Riverine Plains Inc reported that a community networking project funded through the networks program successfully brought a broad range of community members together and provided them an understanding of community needs that informed their subsequent project applications (sub. 29, p. 12).

The Commission is unable to comment in detail on reporting or outcomes from the Leaders program as it has not received the final report. Riverine Plains Inc has suggested the mentoring program was a success for one of their staff members who participated and reported positive results (sub. 29, p. 12):

The program enhanced our employee's confidence, understanding of their strengths and weaknesses and provided strategies to advance their careers and increase their effectiveness.

However, this is more indicative of private benefit and does not provide evidence of public benefit to communities. More detailed and broader community feedback is needed to determine if activities under these programs are meeting the most important community and regional needs.

Overlap with other programs needs addressing

There has likely been duplication of effort among FDF programs targeting social resilience because programs directly targeting social networks will often involve information sharing around drought resilient practices in agriculture. This can overlap considerably with other areas of the Fund that do this through extension and adoption activities that also provide opportunities for both professional and social networking.

For instance, the Networks program included the development of professional social capital through workshops and networking events aimed at sharing knowledge, skills and tools for drought resilient practices (FRRR 2023). At the same time, the Hubs have knowledge brokers and regional nodes with the explicit aim to engage in knowledge sharing, collaboration and co-design with governments, primary producers, community groups, research and training providers (DAWE 2020a). Similarly, many projects through the NRM Drought Resilience Program included large regional extension or industry-focused events on trial and adoption for on-ground drought practices (DAFF 2022b, p. 33).

Other FDF programs are also targeting the development of social resilience to drought at the local or regional level. For example, the Regional Drought Resilience Planning and Hub programs are separately identifying and prioritising local and regional needs to develop social resilience to drought and climate variability.

Furthermore, state and territory governments also provide similar services (section 3).

The number of similar FDF and non-FDF programs raises the very real risk of overlap in seeking to build social resilience to drought and climate variability. There is scope to reduce the overlap between the Helping Regional Communities program and other FDF and non-FDF programs.

The programs would benefit from improved integration and sequencing

The significant overlap identified above points to scope for improved integration across the *Better Prepared Communities* theme and other FDF programs. FDF programs were often rolled out in parallel, missing opportunities to deliver better social outcomes through increased coordination, cohesion and sequencing (section 2).

Several inquiry participants have raised concerns about coordination between programs.

Whilst there have been various statements and wording in individual program documents that have suggested integration and coordination between the programs, there has been no platform or mechanism provided by FDF to facilitate this. ... The missed opportunity of holding Drought Leadership sessions in conjunction with the RDRP process is but one example. (RECoE, sub. 38, p. 5)

Most notably, the RDRP program, the Drought Hubs and the Helping Communities Prepare for Drought program are all concurrently undertaking similar priority setting processes. (DEECA (Vic), sub. 55, p. 6)

The FRRR also noted coordination challenges due to resourcing constraints on communication and engagement activities with state and local stakeholders and the complexity of activities in the Fund, which made it difficult to understand the broader program context and avoid overlap (FRRR 2023, pp. 16–18).

These concerns are also known to DAFF and have informed phase two in the design of the Helping Regional Communities program. Along with integrating the networks and leadership activities, the program also aims to align with RDRPs and the Hubs. This has involved:

- targeting regions that align with the RDRP's regions
- preferencing organisations involved in RDRP's for project funding
- RDRP organisations being invited to participate in co-design of projects
- notification of activities for RDRP coordinators and state and territory contacts (DAFF, Canberra, pers. comm., 7 February 2023).

While these efforts may address the concerns above, it is too early to assess their effectiveness. However, it is also possible that these measures will not go far enough. Part of the challenge appears to be the large number of programs and delivery partners operating in a similar space. Attempting to promote better communication between actors who do not already have established relationships may be a band-aid solution. Indeed, FRRR have argued that, despite reporting some improved information sharing between FDF programs, there continues to be a need to develop a state-by-state information sharing mechanism (FRRR, sub. 37, p. 11).

How should the Fund monitor and evaluate the Better Prepared Communities programs?

While there is uncertainty about what role the FDF should play in improving social resilience (chapter 3), it is important that intended outcomes can be evaluated to determine the program's effectiveness and test underlying program assumptions. However, the MEL plan for the *Better Prepared Communities* theme does not meaningfully link outputs to outcomes.

Currently, overall success and short-term outcomes are measured by indicators such as the total number of activities funded, number of participants and surveys of participant satisfaction, changed attitudes and learnings. Indicators of long-term outcomes were not included (DAFF 2023e). For the Networks program, success is being measured through attendance numbers and improvement in the quantum of connections made, despite these being largely guaranteed through participation. This may be somewhat reasonable when targeting professional networks. However, it is less so for social and community networks given that the research suggests social networks decline during drought due to increased workloads, inability to leave the property because of feeding and water regimes, declining economic resources, out-migration and the financial and emotional cost of going into town (Lester, Flatau and Kyron 2022, p. 23). Measuring an increase in the size of networks is unlikely to capture their resilience against these factors, and longer-term monitoring of whether these connections will be lasting and meaningful for social resilience poses a greater challenge.

Monitoring of program reach has occurred through tracking of participants age, gender, disability, culture, First Nations status, spouse relationship and whether they are new residents. There has also been some anecdotal reports from grantees that they have made efforts to target the broader community (FRRR 2023). While this provides some understanding of the inclusiveness of activities, it does not establish the extent to which the reach of community organisations has been successfully extended to previously non-participating members. Without improved reporting, activities may still be largely catering to community members who are already actively involved, with little additional benefit.

The Commission is unable to comment in detail on reporting from the Leaders program as it has not received the final report.

Way forward

Given the range of issues faced by the programs that make up the *Better Prepared Communities* theme, several options exist to address the objective of building enduring social resilience. These options include:

- continuing programs in the Better Prepared Communities theme but improving integration with other activities of the FDF
- focusing the FDF on economic and environmental programs with social capital developed within these programs
- allocating the funds from the Better Prepared Communities theme into priorities identified through the RDRP program, which could reduce consultation fatigue and ensure community projects align with a considered regional approach to community needs.

At this stage, the Commission is inclined to recommend the third option. While there are significant challenges in providing meaningful support for social resilience, strengthening the bottom-up approach through the regional planning process should ensure community ownership and involvement. DAFF has already sought to link the Helping Regional Communities program with Regional Drought Resilience Plans, but it is the Commission's current view that the Department could go further.



Interim finding 11

There are issues with relevance, overlap and measurement of the Better Prepared Communities programs

While social resilience is important, the Future Drought Fund (FDF) may not be best placed to support all community resilience activities.

While program delivery partners have given positive feedback, the Better Prepared Communities theme has several challenges.

- The programs focusing on professional networking and information sharing may overlap with work being done (or that could be done) by Drought Resilience Adoption and Innovation Hubs or through implementation of regional development plans.
- While there has been some evidence of better integration and communication between the Helping Regional Communities Prepare for Drought program and other areas of the FDF, this may be insufficient to ensure activities targeting social resilience and community needs are efficiently implemented.
- There is no focus on longer-term outcomes for social resilience. The current emphasis on delivering activities and improving the quantum of social networks creates challenges in understanding the effectiveness of these programs.



Information request 13

The Commission is seeking views on the appropriateness of programs delivered under the Better Prepared Communities programs (Networks to Build Drought Resilience, Drought Resilience Leaders and Helping Regional Communities Prepare for Drought).

The Commission is considering ways to better target the role of the Future Drought Fund (FDF). The Commission is seeking views on the following three options:

- maintain current arrangements and improve integration with other areas of the Fund
- explicitly tie community grants to regional drought development plans
- focus the FDF on economic and environmental programs with social capital developed within these programs.

A Public engagement

The Commission has actively encouraged public participation in this Inquiry. This appendix outlines the engagement process undertaken and lists the organisations and individuals that have participated in this Inquiry.

- Following the receipt of the terms of reference on 10 January 2023, an advertisement was placed in *The Australian* and *The Land*, also a circular was sent to identified interested parties.
- Call for submissions was released on 19 January 2023, to assist those wishing to make a written submission to the Inquiry. The Commission received 56 submissions (table A.1). The Commission also received a total of 5 brief comments.
- Consultations were held with state and territory government agencies, private organisations and their peak bodies, industry groups, community groups, academics and researchers (tables A.2).

The Commission welcomes further submissions on the content of the interim report, including responses to the information requests, interim findings and interim recommendations.

The Commission would like to thank everyone that has participated in this Inquiry.

Table A.1 – Submissions

Participants	Submission no.
Adrian and Gayle	41
Ag Excellence Alliance	19
AgForce Queensland	45
AgRee Commodities	2
Australian Academy of Technological Sciences and Engineering (ATSE)	7
Australian Land Conservation Alliance (ALCA)	16
Australian Pork Limited (APL)	31
Commonwealth Scientific and Industrial Research Organisation (CSIRO)	8
David Blackett	44
Department of Agriculture and Fisheries (DAF) (Qld)	54
Department of Agriculture, Fisheries and Forestry (DAFF) (Cth)	42
Department of Energy, Environment and Climate Action (DEECA) (Vic)	55
Department of Primary Industries and Regional Development (DPIRD) (WA)	46
Department of Primary Industries and Regions (PIRSA) (SA)	53
Donald Yates	1
Farming Systems Group Alliance (FSGA)	15
Foundation for Rural & Regional Renewal (FRRR)	37
Future Drought Fund Consultative Committee (FDF Consultative Committee)	3
GrainGrowers	12
Grower Group Alliance (GGA) and the South-West WA Drought Resilience Adoption and Innovation Hub (SW WA Hub)	30
Hydro Tasmania	40
Institute for Water Futures	25
La Trobe University	35
Livestock SA	26
Local Government Association of Queensland (LGAQ)	22
Lu Hogan and Lewis Kahn	5
Mallee Sustainable Farming (MSF)	9
Meat and Livestock Australia (MLA)	36
NACC NRM	21
Name Withheld	34
National Farmers' Federation (NFF)	17
National Landcare Network (NLN)	18
National Rural Health Alliance (NRHA)	27

Participants	Submission no.
Natural Resource Management WA (NRMWA)	13
Northern Hub	11
NRM Regions Australia	51
NRM Regions Queensland (NRMQR)	23
Rangelands NRM Coordinating Group	50
Regional Development Australia Central West (RDA Central West)	14
Regional Investment Corporation (RIC)	47
Riverine Plains	29
Rural Economies Centre of Excellence (RECoE)	38
Shire of Dumbleyung	4
Southern Farming Systems (SFS)	43
Southern NSW Drought Resilience Adoption and Innovation Hub (Southern NSW Innovation Hub)	56
Southern Queensland and Northern New South Wales Drought Innovation and Adoption Hub (SQNNNSW Hub)	24
Stanthorpe and Granite Belt Chamber of Commerce	10
TAS Farm Innovation Hub	39
Tasmanian Government	52
The Mulloon Institute (TMI)	6
Tropical North Queensland Drought Resilience Adoption and Innovation Hub (TNQ Hub)	33
University of Adelaide	32
University of Melbourne	48
Vic Catchments	20
Victoria Drought Resilience Adoption and Innovation Hub (Vic Drought & Innovation Hub)	28
Wendy Schelbach	49

An asterisk (*) indicates that the submission contains confidential material not available to the public.

Table A.2 – Consultations**Participants**

ACT Government
AgForce
Agriculture Victoria
Agrifutures
Alan Dale
Australian Bureau of Agricultural and Resource Economics and Sciences (ABARES)
Australian Dairy Farmers
Australian Farm Institute
Australian Local Government Association
Australian Rural Leadership Foundation (ARLF)
Brian Keating
Bureau of Meteorology (BOM)
Cape York NRM
Commonwealth Scientific and Industrial Research Organisation (CSIRO)
Deloitte
Department of Agriculture and Fisheries (DAF) (Qld)
Department of Agriculture, Fisheries and Forestry (DAFF) (Cth)
Department of Climate Change, Energy, the Environment and Water (DCCEEW) (Cth)
Department of Industry, Tourism and Trade (NT)
Department of Natural Resources and Environment (DNRE) (Tas)
Department of Premier and Cabinet Tasmania (DPC) (Tas)
Department of Primary Industries and Regional Development (DPIRD) (WA)
Department of Primary Industries and Regions (PIRSA) (SA)
Department of Primary Industries New South Wales (DPI) (NSW)
Emma Boon
Environment, Planning and Sustainable Development Directorate (ACT)
Facey Group
Far North Queensland Regional Organisation of Councils (FNQROC)
Farmers for Climate Action
Foundation for Rural & Regional Renewal (FRRR)
Future Drought Fund Consultative Committee
Grosvenor
Growcom
Grower Group Alliance

Participants

Gulf Savannah NRM

Hub Knowledge Brokers

Hurriyet Babacan

Joshua Gilbert

Landcare Australia

Lewis Kahn and Lu Hogan

Merredin and Districts Farm Improvement Group

Merredin Drylands Research Institute

Mount Isa to Townsville Economic Development Zone (MITEZ)

Murawin

National Emergency Management Agency

National Farmers' Federation

National Landcare Network

Natural Resource Management Northern Tasmania

NRM Regions Australia

Noongar Land Enterprise Group

Northern WA and NT Drought Resilience Adoption and Innovation Hub

Nous Group

NQ Dry Tropics

Queensland Farmers' Federation

Rangelands NRM

Regional Development Australia Pilbara

Regional Development Australia Townsville and North West Queensland

Regional Investment Corporation

Regional NSW

Rural Business Tasmania

Shire of Dumbleyung

Shire of Kojonup

South Australian Drought Resilience Adoption and Innovation Hub

Southern Dirt

Southern NSW Drought Resilience Adoption and Innovation Hub

Southern Queensland and Northern NSW Drought Resilience Adoption and Innovation Hub (SQNNSW Hub)

South West Catchments Council

South-West WA Drought Resilience Adoption and Innovation Hub (SW WA Hub)

Stuart Lockie

Participants

Tablelands Regional Council

TAS Farm Innovation Hub

Tasmanian Farmers and Graziers Association

Tasmanian Institute of Agriculture

Tasmanian Irrigation

Tasmanian Leaders

Terrain NRM

The Mulloon Institute

Torres Cape Indigenous Council Alliance

Tropical North Queensland Drought Resilience Adoption and Innovation Hub (TNQ Hub)

Victorian Drought Resilience Adoption and Innovation Hub

Wheatbelt Development Commission

Wheatbelt NRM

Yvette Everingham

Abbreviations

ABARES	Australian Bureau of Agricultural and Resource Economics and Sciences
ARLF	Australian Rural Leadership Foundation
BOM	Bureau of Meteorology
COAG	Council of Australian Governments
COVID-19	Coronavirus disease 2019
CSA	Climate Services for Agriculture
CSIRO	Commonwealth Scientific and Industrial Research Organisation
DAFF	Department of Agriculture, Fisheries and Forestry
DR.SAT	Drought Resilience Self-Assessment Tool
FBR	Farm Business Resilience
FDF	Future Drought Fund
FRRR	Foundation for Rural & Regional Renewal
ICIP	Indigenous Cultural and Intellectual Property
MEL	monitoring, evaluation and learning
NDA	National Drought Agreement
NRM	natural resource management
OECD	Organisation for Economic Co-operation and Development
PC	Productivity Commission
RDEA&C	research, development, extension, adoption and commercialisation
RDRP	Regional Drought Resilience Planning
RIC	Regional Investment Corporation
RNTBC	Registered Native Title bodies corporate

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