

**Commonwealth response to the  
Final Report of the  
Queensland Floods Commission  
of Inquiry**

**October 2012**

## Introduction

The floods that ravaged Queensland over the 2010-11 summer were in some places the worst in living memory, most significantly because of the number of people who lost their lives. The floods devastated many communities and caused billions of dollars of damage, which will take years to rebuild.

These floods are a reminder of how harsh the Australian environment can be. With populations growing significantly in disaster prone areas, particularly along the coast and urban fringes, communities will continue being affected by floods and other natural hazards. The wide geographic impacts and the significant economic costs of recent natural disasters remind us that everyone in the community must play their part in minimising exposure to disaster risk. Australia as a whole – from all levels of government to business, the third sector, community groups and individuals – needs to learn from each disaster and build their resilience to future events. Commissions of inquiry and reviews into disaster events are an important means of learning from such past events.

On 17 January 2011, the then Queensland Premier, the Hon Anna Bligh MP, established the Queensland Floods Commission of Inquiry (the Commission) to examine the events surrounding the devastating floods of the 2010-11 summer.

On 16 March 2012, the Commission released its final report. The Commonwealth has undertaken a detailed analysis of the Commission's final report and its 177 recommendations. While the majority of these recommendations are directed to the Queensland Government and local governments in Queensland, three recommendations are directed in part to the Commonwealth. They are recommendations 2.11, 10.22 and 13.5. There are a further 35 recommendations directed toward Queensland state and local governments and associated agencies, as well as some private operators, that are of relevance to the Commonwealth because they will require a level of Commonwealth involvement in implementation or because the recommendations will either not fully address the issue or if implemented may lead to unintentional detrimental effects.

Responses are grouped into those recommendations directed to the Commonwealth and those that are of relevance to the Commonwealth. This document follows the chapter headings used in the Commission's final report in so far as they relate to recommendations impacting on the Commonwealth. A Commonwealth position is provided for all recommendations that have been directed to the Commonwealth.

The Commonwealth supports all the recommendations directed to it either in full or in part, to the extent that these can be met from within the current resources of relevant agencies.

The Commonwealth will work closely with the Queensland Government, other states and territories, and the private sector to implement relevant recommendations.

## Chapter 2 Floodplain Management

The Commission's examination of the range of responses to flood risk and flood plain management includes emergency warnings, preparation, planning and response, dams, levees, and land use planning. Although these issues are largely a matter for Queensland, a number of recommendations to enhance the effectiveness of responses will require input from the Bureau of Meteorology (Bureau) and Geoscience Australia (GA). Of these recommendations, one is directed to the Commonwealth. This and other recommendations relevant to the Commonwealth are addressed below.

### *Directed to the Commonwealth*

**2.11** The Queensland Government and Commonwealth Government should ensure the existence and maintenance of a repository of data of the type used in flood studies. The database should include the types of data which the expert panel specified as needed for a comprehensive flood study. Councils, Queensland and Commonwealth Government agencies and dam operators should be able to deposit and obtain access to data.

**Commonwealth position:** The Commonwealth supports this recommendation in part.

The Commonwealth is progressing a range of projects that will address some of the intent of the recommendation. Work includes the development of a national portal and national guidelines, amendments to the Australian Rainfall and Runoff, the development of the Australian Water Resources Information System, work around flood mapping and the development of a spatial policy framework. This work is detailed below.

#### National Flood Risk Information Portal (Portal) and Guidelines

The development of an online information portal and national guidelines was announced in November 2011, as part of the Commonwealth's response to the Natural Disaster Insurance Review. The Portal will improve the quality, availability and accessibility of flood mapping information in Australia. This will, in turn, create opportunities to improve the communication of flood mapping information and better inform decision making in a wide range of areas including emergency management, land use planning and insurance.

The Portal will provide a central point through which consumers and other interested parties will be able to discover flood information from all levels of government. Funding for the four-year project has been provided to GA commencing July 2012. Scoping of the project and consultation has already commenced.

The Portal will be complemented by the development of national guidelines which will improve the quality and consistency of some of the inputs and outputs of future flood risk modelling and mapping.

#### Revision of Design Rainfall Information

The Commonwealth, through the Bureau, is leading the revision of design rainfall information, crucial in the development of flood studies. This is being done as part of Engineers Australia's revision of Australian Rainfall and Runoff, which is the underpinning authoritative document used for design flood estimation, modelling and mapping work. Once completed, the revised design rainfall information will be readily accessible through the Bureau's website. Flood studies undertaken using this information will be available through the Portal.

### Australian Water Resources Information System

The Commonwealth, through the Bureau, has been developing the Australian Water Resources Information System (AWRIS), which brings together all rainfall and river level data which will, in time, be readily accessible through the Bureau's website.

AWRIS will provide some necessary input to future flood studies, while the Portal will provide a mechanism for discovering the outputs from flood studies.

### National Work Program for Flood Mapping

In April 2012, the Standing Council on Police and Emergency Management endorsed the National Work Program, which was developed by the then National Emergency Management Committee in consultation with relevant stakeholders.

The Work Program outlines four short term and four long term projects that will contribute to the generation of high quality, consistent and comparable flood risk maps to inform emergency management public policy, planning, and community safety. It will provide a clear understanding on the coverage of existing flood maps and the level of detail they contain while also providing national guidance on how future flood mapping should be undertaken. This will enable all jurisdictions to prioritise their flood mapping projects for those areas where new or updated flood maps are needed.

### Spatial Policy Framework

The Commonwealth, through the Department of Resources, Energy and Tourism, in conjunction with the Australia New Zealand Spatial Information Council (ANZLIC), is developing a spatial policy framework that will articulate the key role that Government has to ensure access to ubiquitous, relevant, standards-compliant, fundamental and authoritative data sets. All Australian jurisdictions are represented at ANZLIC, which is considered the peak Australian body responsible for the management of spatial information. This framework will enable strong collaboration between all levels of government and will provide the necessary governance to ensure that data sharing and access across jurisdictional boundaries can be achieved. The Portal will be fully aligned with this framework.

***Of relevance to the Commonwealth***

- 2.2** Brisbane City Council, Ipswich City Council and Somerset Regional Council and the Queensland Government should ensure that, as soon as practicable, a flood study of the Brisbane River catchment is completed in accordance with the process determined by them under recommendation 2.5 and 2.6.
- 2.4** A recent flood study should be available for use in floodplain management for every urban area in Queensland. Where no recent study exists, one should be initiated.
- 2.5** The Queensland Government, in consultation with councils, should determine which urban areas in Queensland do not have access to flood information from a current flood study. The Queensland Government should rank those areas in order of priority in accordance with their need for updated flood information by reference to factors including:
- population
  - sophistication of land use planning and emergency management measures already in place in those areas
  - currency of any flood risk information available to the council
  - approximate frequency of damaging floods in the area according to the historical record.
- 2.7** As far as is practicable, councils should maintain up-to-date flood information.
- 2.8** When commissioning a flood study, the body conducting the study should:
- check whether others, such as surrounding councils which are not involved in the study, dam operators, the Department of Environment and Resource Management, and the Bureau of Meteorology, are doing work that may assist the flood study or whether any significant scientific developments are expected in the near future, and decide whether to delay the study
  - discuss the scope of work with the persons to perform the flood study as well as surrounding councils which are not involved in the study, dam operators, the Department of Environment and Resource management, and the Bureau of Meteorology.
- 2.14** For non-urban areas or areas where limited development is expected to occur, councils should consider, on a risk basis, what level of information about flood risk is required for the area, and undertake the highest ranked of the following options which is appropriate to that need and within the capacities (financial and technical) of the council:
- a. a map showing 'zones of risk' (at least three) derived from information about the likelihood and behaviour of flooding
  - b. a map showing the extent of floods of a range of likelihoods (at least three)
  - c. a flood map based on historic flood levels that have been subjected to a flood frequency analysis to estimate the annual exceedance probability of the selected historical flood
  - d. a historic flood map without flood frequency analysis
  - e. the Queensland Reconstruction Authority Interim Floodplain Assessment Overlay as a way to determine those areas for which further flood studies are required, or
  - f. the Queensland Reconstruction Authority interim Floodplain Assessment Overlay (preferably refined using local flood information) as a trigger for development assessment.

The Commonwealth will continue to assist states, territories and local governments to undertake flood studies and will continue to assist, where appropriate, in the implementation of the above recommendations. This assistance includes providing data and technical support mainly delivered through GA and the Bureau. Relevant work includes:

- GA conducted post-disaster surveys in Queensland following the 2010/2011 floods. These surveys gathered data on flood hazard (eg water depth) and the damage caused by the flood. This data was delivered to the Queensland Government in March 2012. This data can be used to validate flood models as well as to develop flood vulnerability models for specific building classes.
- GA maintains the national archive of satellite data, which can provide historical mapping and help inform frequency and extents of floods across Australia thereby supporting emergency response efforts for flood events.
- Engineers Australia, with support from the Commonwealth, is updating the Australian Rainfall and Runoff Handbook. The Handbook is a national guideline document for estimating design flood characteristics in Australia.
  - The Bureau is working to update its rainfall ‘intensity-frequency-duration’ information across the country under the Australian Rainfall and Runoff revision project. This will provide significant input into helping address these recommendations by providing design rainfall information necessary to carry out flood hazard modelling.
  - The Commonwealth is working with the Australian Rainfall and Runoff team to develop national guidance on incorporating potential climate change impacts into flood risk assessment processes.
- The Bureau plays a lead role in assisting councils to collect rainfall and river level data necessary for flood monitoring. The Bureau is also developing the comprehensive Australian Water Resources Information System (AWRIS) described against the Commonwealth response to Recommendation 2.11.
- The Bureau in partnership with GA, the Australian National University Fenner School of Environment and Society, and CSIRO Water for a Healthy Country Flagship, has developed the Australian Hydrological Geospatial Fabric, or “Geofabric”. The Geofabric is a system which shows the relationships between rivers, dams, lakes and other hydrological features, and can be used to show how water is stored as well as how it moves through the landscape. In conjunction with elevation and topographic datasets, the information in the Geofabric can be used to model overland water flow and its potential impact on the built environment. This has national coverage and therefore will include the Brisbane River catchment.
- The Great Barrier Reef Marine Park Authority undertakes flood monitoring work in the Great Barrier Reef catchment and can provide data on flooding where the work may be of interest to, or affect, the Great Barrier Reef World Heritage Area.

The Commonwealth notes that any future flood study should also consider future climate impacts<sup>1</sup>. Climate change projections and modelling should be taken into account in any major flood study, when practicable, to minimise risk of poorly located development, liability, and to improve resilience in the medium to longer term. Information on the proposed future built environment and its impact on flood levels should also be modelled and considered in planning controls to improve resilience.

## Chapter 5 Local Planning Instruments

The Commission's examination of the range of responses to flood risk includes consideration of local planning instruments and implementing local planning controls. These issues are largely a matter for the Queensland Government. The Commonwealth is supportive of the recommendations being proposed in this chapter to local government planning instruments to address the impacts of development on the flood plain and its downstream impacts, as this is very important to addressing potential impacts on the Great Barrier Reef World Heritage Area of poorly planned development. The Commonwealth notes the importance of incorporating future climate impacts, particularly in high risk areas, into local government planning schemes. The recommendations of particular interest to the Commonwealth are addressed below.

### *Of relevance to the Commonwealth*

- 5.2** The Queensland Government should include in the model flood planning controls a requirement that councils have a flood overlay map in their planning schemes. The map should identify the areas of the council region:
- that are known not to be affected by flood
  - that are affected by flood and on which councils impose planning controls (there may be subsets in each area to which different planning controls attach)
  - for which there is no flood information available to council.
- 5.3** If the Queensland Government does not include a requirement for such an overlay map in the model flood planning controls, councils should include a flood overlay map in their planning schemes. The map should identify the areas of a council region:
- that are known not to be affected by flood
  - that are affected by flood and on which councils impose planning controls (there may be subsets in each area to which different planning controls attach)
  - for which there is no flood information available to council.

The Commonwealth, through the Great Barrier Reef Marine Park Authority, sees the outcome of these actions as very important with regard to addressing potential downstream impacts of development on the floodplain and on the Great Barrier Reef World Heritage Area. It will be important that responsibility for implementation of these recommendations is clearly allocated.

<sup>1</sup> Engineers Australia, supported by the Commonwealth is updating the Australian Rainfall and Runoff. In the interim, the Department of Climate Change and Energy Efficiency is working with the Australian Rainfall and Runoff team to develop national 'rule-of-thumb' guidance on incorporating potential climate change impacts into flood risk assessment processes. This work will take into account regional variations and build on efforts already underway in New South Wales and Queensland.

## Chapter 7 Development and flood considerations

The Commission's examination of the range of responses to flood risk includes consideration of the types of development including: residential uses, community infrastructure, commercial and industrial development, river architecture, placement of fill in floodplains, levees, and evacuation. Although these issues are largely matters for the Queensland Government, a number of recommendations will require input from the Bureau. The recommendations relevant to the Commonwealth are addressed below.

### *Of relevance to the Commonwealth*

**7.14** The Queensland Government should review the code for development applications for prescribed tidal work in the *Coastal Protection and Management Regulation 2003* to consider whether the design and construction standards should be made more stringent than the existing standards.

The Commonwealth is supportive of this recommendation as several developments on or adjacent to the coast have experienced problems with their facilities being able to cope with the level of recent rainfall events in, for example, their waste treatment ponds. Recent changes in our climate, such as the warming of oceans, are producing conditions more favourable for the generation of extreme events such as those experienced in Queensland in 2011.

**7.16** The Queensland Government should consider drafting assessment criteria to be included in the model flood planning controls which require that works in a floodplain:

- do not reduce on-site flood storage capacity
- counteract any changes the works will cause to flood behaviour of all floods up to and including the applicable defined flood event by measures taken within the subject site (for example, use of compensatory works, detention basins or other engineering mechanisms)
- do not change the flood characteristics outside the subject site in ways that result in:
  - loss of flood storage
  - loss of/changes to flow paths
  - acceleration or retardation of flows, or
  - any reduction in flood warning times elsewhere on the floodplain

**7.17** If the Queensland Government does not include such assessment criteria in the model flood planning controls, councils should consider including assessment criteria in their planning schemes which require that works in a floodplain:

- do not reduce on-site flood storage capacity
- counteract any changes the works will cause to flood behaviour of all floods up to and including the acceptable defined flood event by measures taken within the subject site (for example, use of compensatory works, detention basins or other engineering mechanisms), and
- do not change the flood characteristics outside the subject site in ways that result in:
  - loss of flood storage
  - loss of/changes to flow paths
  - acceleration or retardation of flows, or
  - any reduction in flood warning times elsewhere on the floodplain

**7.18** The Queensland Government should consider amending the *Sustainable Planning Regulation 2009* so that operational work or plumbing or drainage work (including maintenance and repair work) carried out by or on behalf of a public sector entity authorised under a state law to carry out the work is not exempt development under the *Sustainable Planning Act 2009* if the development has the potential to reduce floodplain storage.

The Commonwealth, through the Bureau, should be kept informed of any changes to flood behaviour so that the warning system reflects current flood behaviour. The Bureau will investigate any changes to flood warning times when such changes are proposed.

The Commonwealth sees the outcome of this action as very important with regard to addressing potential downstream impacts of development on the floodplain on the Great Barrier Reef World Heritage Area. It will be important that responsibility for implementation of these recommendations is clearly allocated.

**7.19** Levees should be regulated

**7.20** The Queensland Government should consult with councils to determine an effective method for the regulation of the construction of levees in Queensland. In particular, the Queensland Government should consider:

- requiring a development permit for the construction of a levee by designating levees as assessable development in the *Sustainable Planning Regulation 2009*, or
- requiring, by way of a state planning policy or mandatory provision in the Queensland Planning Provisions, that councils nominate the construction of a levee as assessable development in their planning schemes.

**7.21** The Queensland Government should consult with councils to formulate a definition of 'levee' to identify what should be regulated.

**7.22** There should be a consistent process for the determination of applications to build levees. That process should include:

- consulting landholders who may be affected by the proposed levee
- obtaining or commissioning appropriate hydrological and hydraulic studies to assess the impacts of the proposed levee.

**7.23** There should be a common set of considerations in the decision whether to approve an application to build a levee, including:

- the impacts of the proposed levee on the catchment as a whole
- the benefits of the proposed levee to the individual or entity applying to build the levee and to any nearby community as a whole
- any adverse impacts on other landholders, including the risk of levee failure
- the implications of the proposed levee for land planning and emergency management procedures
- whether any structural, land planning or emergency management measures can be taken to mitigate the adverse impacts of the proposed levee.

The Commonwealth is supportive of this group of actions and notes that levee construction has been identified as one of the key actions affecting the natural flooding of the flood plain and therefore affecting potential downstream impacts such as on the Great Barrier Reef World Heritage Area.

The Commonwealth also notes that, along with the common set of considerations outlined in Recommendation 7.23, any decision whether to approve an application to build a levee should also include consideration of its impact on adjacent wetlands.

## **Chapter 8 Development assessment in practice**

The Commission examined aspects of the development approval process and made two recommendations that are of relevance to the Commonwealth. These are detailed below.

### ***Of relevance to the Commonwealth***

**8.3** The Queensland Government should draft a model planning scheme policy to be included in the model flood planning controls that sets out the information to be provided in development applications in relation to stormwater and flooding. The policy should specify:

- the type of models and maps to be provided
- the substantive information required to be shown in the development application
- how the assumptions and methodologies used in preparing the models and maps should be presented
- the form in which the information on stormwater and flooding is to be presented in the application.

**8.4** If the Queensland Government does not include such a policy in the model flood planning controls, councils should include a planning scheme policy in their planning schemes that sets out the information to be provided in development applications in relation to stormwater and flooding. The policy should specify:

- the type of models and maps to be provided
- the substantive information required to be shown in the development application
- how the assumptions and methodologies used in preparing the models and maps should be presented
- the form in which the information on stormwater and flooding is to be presented in the application.

The Commonwealth sees the outcome of these actions as very important with regard to understanding and assessing the potential downstream impacts of development on the floodplain and thus on the Great Barrier Reef World Heritage Area. It will be important that responsibility for implementation of these recommendations is clearly allocated.

## Chapter 10 Disaster frameworks, preparation and planning

The Commission's examination of the damage caused by the 2010/2011 floods includes damage to sewerage, stormwater, electricity, telecommunications, and roads and rail infrastructure of Queensland. The Commission considered changes to planning and design practices as a means by which such damage can be minimised in future flood events. These issues are largely a matter for Queensland. One recommendation is partly directed to the Commonwealth, and specifically to the Australian Communications and Media Authority. This recommendation is addressed below.

### *Directed to the Commonwealth*

**10.22** Carriers, councils and the Australian Communications and Media Authority should take into account the risk of flooding when considering the placement of telecommunications facilities.

**Commonwealth position:** The Commonwealth supports this recommendation in part.

The Commonwealth agrees that the risk of flooding should be taken into account when considering the placement of telecommunications facilities. However, this recommendation misinterprets the role of the Australian Communications and Media Authority (ACMA). The placement of telecommunications facilities is primarily a matter for carriers, which have an inherent interest in mitigating the impact of floods and other disasters so as to maximise continuity of service. At the same time, carriers need to meet customer demand, which may mean that facilities need to be installed in flood prone areas. Carriers generally operate in the context of planning policies established by state, territory and local governments. In many instances, however, carriers install facilities under powers and immunities granted by the Commonwealth or under approval exempt planning arrangements established by state and territory governments.

ACMA is a statutory authority within the federal government portfolio of Broadband, Communications and the Digital Economy. The ACMA is responsible for the regulation of telecommunications in accordance with the *Telecommunications Act 1997*. That Act does not provide for the ACMA to have a role in determining the placement of telecommunications facilities. To help give effect to this recommendation, the ACMA will refer it to Communications Alliance. Communications Alliance is the telecommunications industry peak body and is responsible for the development of codes relating to practice for the telecommunications industry.

### *Of relevance to the Commonwealth*

**10.3** Authorities responsible for the management of sewerage infrastructure should conduct a review of their existing infrastructure to identify electrical infrastructure that may be vulnerable to inundation and perform risk and cost/benefit assessments to determine if it should be relocated to a higher level.

As outlined in the response to recommendations in Chapter 2, the Commonwealth through the Bureau in partnership with GA, the Australian National University Fenner School of Environment and Society, and CSIRO Water for a Healthy Country Flagship has developed the Australian Hydrological Geospatial Fabric, aka "Geofabric". The Geofabric is a system which shows the relationships between rivers, dams, lakes and other hydrological features, and can be used to show how water is stored and moves through the landscape. In conjunction with elevation and

topographic datasets, the information in the Geofabric can be used to model overland water flow and its potential impact on the built environment. The Geofabric is available to download for free from the bureau's website: <http://www.bom.gov.au/water/geofabric/>

## Chapter 11 Buy-backs and land swaps

The Commission's examination of larger-scale flood-risk mitigation measures includes the use of land buy-backs and land swaps. The Commission's examination focuses on the example of Grantham and the rebuilding initiative that commenced there following the 2010/2011 floods. Land planning and buy-back schemes in vulnerable areas are largely a matter for state and local governments. However, the Commission's recommendation suggests involvement by the Commonwealth through the Natural Disaster Resilience Program, which is jointly funded by the Commonwealth. This recommendation is addressed below.

### *Of relevance to the Commonwealth*

**11.1** Councils should consider implementing a property buy-back program in areas that are particularly vulnerable to regular flooding, as part of a broader floodplain management strategy, where possible obtaining funding from the Natural Disaster Resilience Program for this purpose.

The Commonwealth notes that there is limited funding available through the Natural Disaster Resilience Program (NDRP), and that this funding is administered by the states and territories through the jointly funded National Partnership Agreement on Natural Disaster Resilience (NPA). The NPA seeks to address priority risks of states and territories as identified in their risk assessments and in line with the objectives and aim of the NPA.

To access NDRP funding, local governments would need to approach their state or territory government which would determine if a 'property buy-back program' was a priority. State and territory governments set funding priorities under the NDRP and are responsible for any decisions on the viability of a land buy-back program and assessing its value for money in terms of addressing the identified risks, including value for money in relation to other proposals for funding. In this context and as a general principle, the Commonwealth supports the suggestion made by the Commission that any property buy-back program supported by a state or territory should have a clear purpose for the land buy-back so that the purchased land can be put to best use and will not pose a risk to the health and safety of future prospective users, for example through the establishment of nature conservation areas such as constructed wetlands and basins to increase floodplain storage.

State, territory and local governments may also wish to consider alternate funding sources. A possible funding source for local governments is the Commonwealth funded Financial Assistance Grants. The purpose of the grant is to improve local governments' capacity to provide their communities with an equitable level of service. The grants are able to be used at the local government bodies' discretion and could be used for land buy-back programs if this has been identified as a priority for the region.

## Chapter 12 Performance of private insurers

The Commission's examination of the performance of private insurers includes a focus on private insurers' communication with policy holders, the timeliness in claims processing and dispute resolution in relation to the 2010/2011 floods.

The Commonwealth recognises the important role insurance and insurers play in building community resilience. The Commission's final report identified three bodies of work relating to the insurance industry undertaken at the Commonwealth level, namely the Natural Disaster Insurance Review, the House of Representatives Standing Committee on Social Policy and Legal Affairs report *"In the Wake of Disasters: Volume One: The operation of the insurance industry during disaster events"* and the Commonwealth Treasury's April 2011 discussion paper focusing on a standard definition of flood and the development of a key fact sheet.

The Commission's final report contains a number of recommendations that relate to improvements in claims handling. The Commonwealth provides a comment against these recommendations below.

### *Of relevance to the Commonwealth*

- 12.1** When a policy-holder makes a claim, the insurer should ascertain the policy-holder's preferred method of contact and ensure that it is used (with other modes of communication if necessary) to keep the policy-holder informed about the progress of the claim. However, important decisions regarding the claim – for example, determinations about the outcome of the claim and settlement sums – should always be confirmed in writing.
- 12.2** Insurers should review their existing systems and processes and implement any improvements necessary to ensure that accurate and complete records of conversations with policy-holders are made.
- 12.3** Letters notifying policy-holders that their claims have been denied should, at a minimum, state the information upon which the insurer has relied in making the decision. These letters should also advise policy-holders that copies of the information will be made available upon request (in accordance with clause 3.4.3 of the General Insurance Code of Practice) and indicate how policy-holders can make a request.
- 12.4** The Insurance Council of Australia should consider an amendment to Part 3 of the code which requires insurers to notify policy-holders of the information on which they relied in assessing claims.
- 12.5** The Insurance Council of Australia should amend clause 3.4.3 of the General Insurance Code of Practice so that it requires insurers to inform policy-holders of their right to request a review of an insurer's decision to refuse to provide access to information on which it relied in assessing claims.

The Commonwealth is working closely with the insurance industry to address the issues raised by the Commission and in the three reports undertaken at the Commonwealth level identified by the Commission. For example, following extensive consultation, the Commonwealth has recently passed legislation to give effect to a standard definition of flood and key facts sheets for home building and home contents insurance. The Commonwealth also notes recent changes made to the General Insurance Code of Practice (the Code) by the Insurance Council of Australia following discussions between the Government and the insurance industry.

Further, the Commonwealth notes that the Insurance Council of Australia has indicated that the insurance related outcomes of government inquiries, including the findings of the *Queensland Floods Commission of Inquiry*, will be considered in the upcoming independent review of the Code. The Commonwealth welcomes the independent review of the Code and looks forward to being consulted as part of the review process.

## Chapter 13 Mining

The Commission's final report focuses on better management of the discharges from flooded mining infrastructure, which is welcomed. However, similar issues arise with settlement ponds associated with other activities such as storage of ore, mineral processing and other industries such as aquaculture. Additionally, larger mines also often involve the creation of rail infrastructure which can inadvertently channel or facilitate the movement of flood waters into unwanted areas. A commitment to improving the standards for planning and management of these types of facilities, such as placing rail infrastructure in areas less prone to flood or undertaking flood modelling in the affected areas, is also very important.

These issues are largely a matter for the Queensland Government and mine operators. However, recommendations relating to the performance of relevant risk assessments and coordinated monitoring of potential contaminants may require input from the Commonwealth in circumstances in which it has a statutory interest, or where there are agreed Queensland and Commonwealth arrangements. In these cases, the required input will be provided by the appropriate Commonwealth agency.

There are a number of recommendations in this chapter that, as they currently stand, may not fully address the issue or if implemented in isolation may lead to unintentional detrimental effects on the environment. The Commonwealth has provided a comment on these recommendations below.

### ***Directed to the Commonwealth***

**13.5** The Queensland Government should work collaboratively with the Commonwealth Government and mine operators to ensure co-ordinated and effective monitoring of salts, metals and other contaminants in marine environments that may be affected by mine discharges.

**Commonwealth position:** The Commonwealth supports this recommendation.

The Commonwealth will work with the Queensland Government to address this recommendation, noting that the Queensland Government, in its capacity as being responsible for current and abandoned mine related management, will lead this work.

The Commonwealth will provide its assistance through the relevant Commonwealth agency, for example the Great Barrier Reef Marine Park Authority (GBRMPA), noting that the GBRMPA has a program for monitoring water quality issues in the Great Barrier Reef World Heritage Area, and the Bureau of Meteorology. On mining policy and abandoned mine framework matters, the Department of Resources, Energy and Tourism will be consulted.

***Of relevance to the Commonwealth***

- 13.1** Mine operators should obtain all public seasonal forecasts issued by the Bureau of Meteorology relevant to the regions in which their operations are located.
- 13.3** The Department of Environment and Resource Management should prepare a list of relevant considerations to be taken into account in performing a risk assessment to decide which sites to inspect. Bureau of Meteorology forecasts should be one consideration.

The Commonwealth, through the Bureau, also provides forecasts and warnings covering areas which would include mine sites and will continue making this information widely available through its briefings to emergency management and other Queensland authorities and through its comprehensive public website.

- 13.11** The Queensland Government should consider amending the *Environmental Protection Act 1994* so that it allows for the relaxation of environmental authority conditions, by transitional environment program or otherwise, as to discharge of water:
- pre-emptively, in advance of rainfall or flooding events, or
  - for all mines in a catchment that is flooding.
- 13.12** The Queensland Government should prepare a procedural guide for officers deciding whether to grant a relaxation of environmental authority conditions, by transitional environmental program or otherwise, with guidance as to:
- the meaning of each criterion
  - examples of the types of things that may be relevant to each criterion
  - the priority, if any, to be afforded to different criteria.

The Commonwealth notes that these recommendations could potentially lead to unintended outcomes such as waste water releases or contamination of receiving waters or ecological systems (such as sites listed under the *Environment Protection and Biodiversity Conservation Act 1999*, including wetlands of international importance) from discharged water from mine sites. For these reasons, the Commonwealth recommends that the criteria for any such releases should only apply in situations where there are significant risks to life and property.

- 13.16** The Queensland Government should amend the *Environmental Protection Act 1994* so as to permit an emergency direction to be given orally where it is not practicable to provide the direction in writing, with provision for its subsequent confirmation in writing.

The Commonwealth agrees that verbal direction is useful in emergency situations, but notes that legislative amendments should be accompanied by strict controls (eg requirement that all verbal directions be recorded or witnessed) to reduce the associated risks, such as ambiguous directions leading to adverse outcomes.

- 13.17** The Queensland Government should determine which of its agencies should take responsibility for the management of all existing and new abandoned mine sites in Queensland.
- 13.18** The Department of Employment, Economic Development and Innovation should assemble all information currently available to the abandoned mine land program into a single database. The Queensland Government should ensure, using whatever information is available, that the list of abandoned mines is as complete as possible. This should at least include a review of all information held by the Department of Environment and Resource Management and the Department of Employment, Economic Development and Innovation.
- 13.19** The Queensland Government should seek information about the size, features and condition of abandoned mines, including whether the mine or its surrounding environment were adversely affected by flood, from private landholders who have abandoned mines on their properties.

The Commonwealth supports this group of actions as it has the potential to address a long standing risk from past mining operations to downstream environments including the Great Barrier Reef World Heritage Area.

## **Chapter 16 Operation of Wivenhoe and Somerset Dams**

This part of the Commission's report focused on the operational strategies used at the Wivenhoe Dam during the 2010-11 floods. While the recommendations in the chapter are directed to the Queensland Government or its bodies, as well as Seqwater, one recommendation will require involvement from the Commonwealth. This recommendation is addressed below.

### ***Of relevance to the Commonwealth***

- 16.5** The Queensland Government should resolve the discrepancy in recorded peak river height for the January 2011 flood of the Brisbane River between the Brisbane City and Port Office gauges.

The Commonwealth, through the Bureau, will assist the Queensland Government to address this recommendation by providing all its historical data for the gauges between the Brisbane City and Port Office, which are operated by two Queensland authorities. The Bureau will also assist the Queensland Government in the interpretation of the information from these gauges and others for the purpose of resolving their discrepancy.