The consideration of cumulative impacts and risks needs to take into account 'all relevant past, present and reasonably foreseeable actions, programmes and policies that are likely to impact on water resources'. Consideration of local-scale cumulative impacts is undertaken by the proponent, informed by groundwater and surface modelling, Bioregional Assessments and other relevant regional plans. Advice on broader cumulative impacts may be provided by Australian government regulators.

This focus on considering and providing advice on cumulative impacts is facilitated by several factors, including:

- the broad definition of 'water resources' (defined according to the *Water Act 2007*), which supports more comprehensive and integrated scientific advice, and an holistic view of direct and indirect impacts on the physical, chemical and ecological processes that impact on species and ecosystems services,
- significant focus and investment in groundwater and surface water models over several decades,
- the more recent investment in the Bioregional Assessments[iv] to deliver independent, scientific assessments of the potential cumulative impacts of coal and unconventional gas developments on the environment, and
- the IESC's legislative functions, and its focus on developing a suite of resources to assist industry and regulators with environmental assessments, providing clarity around expectations and information needs.

The establishment of the IESC and the delivery of the Bioregional Assessments was part of a $150 million National Partnership Agreement announced by the Commonwealth government in 2012[v], with an additional $30.4. million in funding announced for the Geological and Bioregional Assessments Program in 2017. This highlights the significant amount of investment required in data aggregation, analysis and expert advice required to underpin the consideration of cumulative impacts.

With climate change, the past will no longer be a useful guide to the future. Key threats to the environment, including biosecurity incursions and altered fire regimes, will be compounded by climate change. While considering cumulative impacts is important now, this becomes increasingly so as the predicted widespread and substantial changes to the environment arising from climate change manifest.

There will always be inherent uncertainty about how future pressures will play out in terms of impacts on the environment, but it is possible to better understand how the future could play out under different scenarios to help inform decisions. There is a clear need to enhance capability to consider a dynamic environment and a changing future.

The proposed key reforms, including the setting of National Environmental Standards and the making of regional and strategic national plans enable cumulative impacts to be considered over long timeframes. This requires a substantially improved information base and a broader suite of information tools including the capacity to model the outcomes of alternative scenarios.

New information tools are needed. While proven and long used in many areas of environmental management (such as climate modelling, fisheries, the management the Great Barrier Reef and for water resources), the modelling capability to predict the impacts of threats and management actions on land-based biodiversity, while proving up are still relatively immature in Australia.

Furthermore, technologies to analyse and gain insights from diverse and very large data sets are not broadly used, but these insights are essential to develop and refine predictive models. This

contrasts to other areas of national policy such as the economy and health, where predictive modelling is a mainstream and widespread tool used to inform decision making.

6.3 The Department's information management systems are antiquated

The EPBC Act was developed in the last century, in a time where the use of paper was standard, and the internet was not yet central to the effective delivery of government services. The way the EPBC Act is administered has not kept pace with the rapid transformation in how government, businesses and people interact with technology. In essence, the department uses the systems of a policy agency which are insufficient to deliver its regulatory functions efficiently.

The online systems that support the EPBC Act are cumbersome, duplicative and slow – not meeting expectations for an easy, tailored, digital experience. The department's systems for managing assessment documentation result in the need to manually handle (and double handle) files, leading to mistakes and delays. Interactions with proponents are not easily recorded, resulting in duplication and a lack of structure.

There is no system for efficient case management, and it is not easy for the department, the proponent or the community to determine the status of a proposal in the assessment process or track a project after an approval has been granted. The systems do not link with those of the states and territories, there is no a single user portal.

The EPBC Act requires archaic methods of communication such as newspaper advertisements and publishing in the Government gazette. While not restrictive, the focus on meeting statutory requirements often comes at the expense of effort to use more modern forms of presenting and communicating information in an easily accessible way.

6.4 Key reform directions

6.4.1 A national environmental information supply chain, a comprehensive roadmap, and a national custodian

The provision of information can be viewed like a supply chain. Information is delivered through a series of processes that convert raw data into end products that can be 'used' – by decision makers to inform their decision, by proponents to help them understand and design their project proposals , and by the community to understand the impacts of decisions and the outcomes that are achieved.

As with other supply chains, effort and resourcing is required to deliver an efficient chain, so that the right products are delivered at the right time to the right customers. The 'customer' – the user – is central to the design of the supply chain.

The reforms proposed by this Review, including: requirements to make decisions that deliver ESD; the setting and implementation of National Environmental Standards; the development of regional environmental plans and the monitoring and evaluation framework of the EPBC Act (Chapter 7) are all core user needs for the supply chain of information for the implementation of the Act.

The opportunity though is broader than just the EPBC Act. A national environmental information supply chain that delivers for a national system of environmental management is needed. The national environmental information supply chain should:

- prioritise the collection of environmental and other information, making the most of modern technologies to do this efficiently,
- have a central repository (or clearly linked repositories), from where it can be curated into information and knowledge,
- incorporate the data and information that is owned and curated by others, including economic and social information. Indigenous data and knowledge should be also incorporated in a culturally appropriate way, that respects the custodians of that knowledge,
- incorporate predictive modelling capability, so cumulative pressures can be considered, future scenarios can be examined and risks comprehensively examined,
- supply the decision-making frameworks, that enable ESD to be effectively considered, and the precautionary principle applied, and
- feed into the frameworks that support monitoring and evaluation, of the National Environmental Standards, the operation of the EPBC Act, the broader national environmental management system.

A national supply chain, that can deliver the same information to a decision maker (for example the Commonwealth or a state or territory under a devolved arrangement), will make it more efficient for governments to demonstrate their systems deliver decisions that are consistent with the National Environmental Standards.

Significant upfront investment is required to deliver the substantial improvement in the information supply chain, and ongoing investment will be required to maintain the system over time. This is necessary and will improve the effectiveness in how Australia's environment is managed and deliver efficiency – for governments and for business.

Given the significant investment required, the supply chain should be delivered in a strategic and coordinated way. A comprehensive roadmap is needed. Responsibility for planning for and delivering the supply chain should be assigned to a national institution — a custodian of the national environmental information supply chain. While there are numerous potential candidates amongst key national institutions, the Review is not going to 'pick a winner'.

The national custodian would have clear responsibility for:

- facilitating the collaboration of relevant stakeholders to establish information needs for national-level reporting, and policy and program design,
- developing, publishing and maintaining a long-term data, information and systems strategy and road map that identifies priority needs,
- overseeing the central repository (or connected repositories) of information, noting that individual datasets may be managed by the collecting organisation that has the relevant expertise,

- providing advice on the national standards for data collection, management and use,
- coordinating national level capability for predictive modelling, including facilitating a community of knowledge to support the development and use of these models, and
- advising on the frameworks for delivering ESD in decision making and for applying the precautionary principle (which should be required by the EPBC Act).

6.4.2 A national environmental standard for information and data

A National Environmental Standard(s) for information and data should describe and define data requirements, and the form in which data should be provided to support data sharing and transparency. Building on existing technical data standards, it should provide a clear framework to supports the provision of the data and information that is needed, in a form that supports its integration into the supply chain.

While some standards for data and information already exist, there are rarely consequences if these standards are not used. Proponents should be required to submit data and information supporting development approval applications in a standardised way. Compliance with the standard should be a requirement for an application to be validly made.

The standard should apply to proponents and other providers of information and data including relevant departments. The 'Digital Transformation of Environmental Impact Assessment' work being delivered in partnership between the Department and the West Australian government provides a sound starting point for this standard[vi].

Legislative changes could further embed expectations for data collection and sharing in the EPBC Act. The EPBC Act could include powers that enable the Commonwealth to compel public institutions, researchers and other organisations that are funded by government grants and programs to provide the environmental information they collect in a manner consistent with the National Environmental Standard for information and data.

6.4.3 The Department's information management systems need a complete overhaul

The Department's information management systems need to be overhauled to provide a modern interface for interactions on the EPBC Act and to embed in systems the key decision-making frameworks that harnesses information and knowledge.

A modern interface includes:

- a case-management system that supports the full project lifecycle, from application through assessment, approval, to compliance and enforcement,
- the capacity to link with others— so that information can be provided once and shared many times (for example with the supply chain custodian or other regulators),
- the ability to record, share and search information related to EPBC Act decisions in a way that is accessible to both the public and proponents, and
- the ability to readily communicate decisions using modern communication channels, rather than relying on newspaper advertisements and the Government Gazette.

In the short term, the granularity of National Environmental Standards is limited by the information available to define and apply them to decision making. A quantum shift in the quality of information is required to transform standards from qualitative indicators of outcomes to quantified measures of outcomes. To apply granular standards to decision making, Government needs the capability to model the environment, including the probability of outcomes from proposals, drawing on predictive modelling capabilities and decision-making frameworks for ESD that will be delivered as part of the information supply chain.

To do this well, investment is required to improve knowledge of how ecosystems operate and develop the capability to model them, which is essential for testing scenarios and making informed, risk-based decisions. This requires a complete overhaul of the systems to enable improved information to be captured and incorporated into decision making.

The frameworks used to advise decision-makers, and how these have been applied in the development of advice for decision makers (for example in the making of a standard, regional plan or decision on a development application) should be publicly available information. The Government's systems should have the capability to efficiently support the preparation, consideration and publication of this information.

To build public trust and confidence, the proposed Information and knowledge committee should be responsible for providing the Minister with independent advice on the application of the National Environmental Standard and the ESD decision-making frameworks. This advice should be transparently provided, and, where the Minister acts in a manner contrary to the advice, a statement of reasons should be published.

6.4.4 Resourcing reforms

The Review acknowledges that a quantum shift required in information and data systems will come at significant cost.

A national information supply chain, with a custodian, should in time deliver efficiencies for all Governments. It is an upfront investment that negates the need for multiple systems to be developed by individual governments, or to fund new 'one-off' initiatives requiring grants or program funds.

CSIRO noted in their submission that systems of linked repositories and standardisation between jurisdictions could deliver both economic gains and increased transparency[vii]. In Western Australia, it is estimated that digitally transformed environmental impact assessment would deliver a benefit of more than $150 million every year through accelerated private and public project development[viii].

The need for investment in data, information and systems is in part generated by the need to regulate the impacts of development on the environment. Consistent with the principle that the impactor (or 'polluter') pays, proponents should be required to pay the efficient cost of the share of information, knowledge and systems required to underpin the regulation of their activities.

7 Monitoring, evaluation and reporting

Key points

There is no effective framework to support a comprehensive, data-based evaluation of the EPBC Act, its effectiveness in achieving intended outcomes, and the efficiency of implementation activities.

The EPBC Act includes some requirements for monitoring and reporting on activities and outcomes. However, these do not span the operation of the EPBC Act and follow-through is poor. Activities that are done lack a clear overall purpose, coordination and intent. There is a focus on 'bare minimum' administrative reporting, rather than genuine monitoring and evaluation of outcomes to learn lessons, adapt and improve.

The national State of the Environment (SoE) report is the established mechanism that seeks to 'tell the national story' on Australia's system of environmental management. While providing an important point in time overview, it is an amalgam of insights and information, and does not generate a consistent data series across reports. It lacks a clear purpose and intent. There is no feedback loop, and as a nation no requirement to stop, review, and where necessary change course.

Combined, these issues make it extremely difficult, if not impossible, to assess the relative effectiveness of the levers governments individually and collectively pull to manage Australia's environment.

The key reform directions proposed by the Review are:

- The development of a coherent framework to monitor and evaluate the effectiveness of the EPBC Act in achieving its outcomes and the efficiency of its implementation. The framework must be backed in by commitment to its implementation.
- A revamp of national SoE reporting should incorporate trend analysis and address future outlooks to provide the foundation for national leadership on the environment.
- National environmental economic accounts will be a useful tool for tracking Australia's progress to achieve ecologically sustainable development. Efforts to finalise the development of these accounts should be accelerated, so they can be a core input to SoE reporting.

Regular monitoring, evaluation and reporting are key features of modern public policy and regulation. They are essential for:

- understanding the success or failure of interventions, to enable improvements to be identified and settings to be adapted to enhance effectiveness or increase efficiency, and
- accountability to the public.

Effective monitoring, evaluation and reporting of the EPBC Act, and of the broader national environmental system is essential to achieve improved environmental outcomes. It is also central to improving and maintaining public trust in the regulatory system. If the community, and the regulated community can't 'see' the outcomes arising from regulatory intervention, then they question whether it is worthwhile.

Monitoring and evaluation is fundamentally linked to information and data management — it should inform the design of monitoring activities that provide data into the 'information supply

chain' (see Chapter 6), and the quality of insights that can be drawn from evaluations are dependent on how information is collated, shared and analysed.

The Review acknowledges that evaluating the effectiveness of environmental policy is challenging, and that attributing observed outcomes to individual interventions is extremely difficult. Many different organisations are involved at different levels, there are lengthy time lags between human actions and observed changes in the environment, and broader impacts (such as climate variability and change) that contribute to environmental outcomes can mask the impact of specific interventions.

But that does not mean we should put environmental monitoring and evaluation in the 'too hard basket'. This chapter examines the effectiveness of monitoring and evaluation of the EPBC Act. As the EPBC Act includes settings for the Australian State of the Environment Report, it also explores the leadership role the Commonwealth plays in monitoring, evaluation and reporting on the effectiveness of the nation's broader system of environmental management.

7.1 Monitoring, evaluation and reporting of the EPBC Act is inadequate

7.1.1 The EPBC Act lacks a cohesive monitoring and evaluation framework

There is nocomprehensive framework that supports effective, data-based evaluation across all the operations of the EPBC Act. The absence of a strategic monitoring and evaluation framework means that there are information gaps that hinder effective evaluation, the resources that are dedicated to monitoring are likely to be inefficient, and there is no clear pathway to learn lessons, adapt and improve.

The activities to monitor and report on the EPBC Act are patchy and inconsistent. They lack a clear overall purpose and intent, including how the operation of the EPBC Act contributes to the overall performance of the nation's environmental management system.

The broad policy areas of the EPBC Act (Chapter 3), combined with the lack of clearly defined outcomes that the Act seeks to achieve (Chapter 1) provide a challenging foundation for monitoring and evaluating the effectiveness of the Act. Furthermore, the Department lacks the systems (see Chapter 6) to collect data on its regulatory activities. This makes analysis of where resources are directed, and the efficiency of activities, difficult to assess.

To answer the fundamental question of whether the EPBC Act is operating effectively and efficiently, this Review has relied on diverse, disparate, and at times patchy sources of information and the deep knowledge of contributors. In modern public policy, this is unacceptable.

7.1.2 There are some requirements for monitoring and reporting

The EPBC Act includes some requirements for monitoring and reporting on activities and outcomes. However, these do not span the operation of the EPBC Act and follow through is poor. Resourcing constraints mean that the focus is on reporting to meet the bare minimum requirements, rather than monitoring and evaluation driving adaptive improvements over time.

For listed threatened species and ecological communities, requirements for monitoring are limited in scope. Recovery Plans for threatened species are required to include details on how

progress will be monitored, but there is no requirement to implement monitoring activities and report on whether outcomes are being achieved. This means that efforts to monitor and report are a rare exception, rather than the common practice.

Conservation Advices for listed threatened species and ecological communities have no detail on monitoring requirements, and most mandated 5-yearly reviews of Threat Abatement Plans are either well behind schedule or haven't occurred[i].

For developments approved under Part 9 of the EPBC Act, the Minister may attach conditions requiring specified environmental monitoring or testing to be carried out, and for reports to be prepared. This is an administrative decision, rather than a statutory requirement. As highlighted in Chapters 8 and 9, where offsets form a condition of approval, there is no comprehensive tracking of offsets, or assessment to determine if they are achieving the outcomes intended.

While not a requirement, strategic assessments made under Part 10 of the Act often include provisions as to how monitoring and evaluation will be achieved, and while approval holders are required to provide reports, the Department lacks the capacity to follow-up if activities are not conducted. Similarly, Bilateral Agreements 'may include' provisions for auditing, monitoring and reporting on the operation and effectiveness of all or part of the agreement, but these are not a requirement.

Other parts of the EPBC Act require management plans to be developed, and in some cases, reports against these plans to be prepared. While many requirements and approaches fall short of best practice, there is ongoing effort to improve the quality and consistency of planning and reporting.

For World Heritage places and National Heritage areas entirely on Commonwealth land, a management plan is required to be prepared and reviewed every five years, while for those not entirely on Commonwealth land 'best endeavours' must be made to ensure a plan is in place. Similar requirements are in place for Ramsar wetlands.

Solid processes are in place for the monitoring and reporting of World Heritage places, which is guided by the international World Heritage Council and highly scrutinised. Planning and review of National Heritage places is patchier. While some form of plan is in place or in preparation for most areas, a recent 5-yearly review by the Minister for the Environment did not assess their effectiveness[ii]. Work is currently underway to develop a standardised monitoring methodology for heritage places, consistent with the existing requirements for World Heritage properties.

The Director of National Parks (DNP) and the joint Boards of management are required to prepare management plans for jointly-managed Commonwealth reserves, which must be updated every 10 years. While all reserves have plans in place, a recent ANAO report identified shortcomings in their effectiveness and implementation[iii], which the DNP is working to address.

All Commonwealth entities are required to report on ESD activities and outcomes in their annual reports (s516A). While the intent is to provide a mechanism to ensure the Commonwealth Government is considering ESD in its operations, this has been lost over time. The reality is that most Commonwealth entities report on their use of recycled paper or the energy efficiency of buildings. It is an administrative burden with no real benefit.

The Department is required to report annually on the operation of the EPBC Act. This is currently delivered as part of the Department's annual report. Despite some recent improvements, in practice, this reporting is output and activity-focused, rather than focused on the outcomes arising from the operation of the EPBC Act. The measures used to report publicly on the operation of the EPBC Act consolidate performance information across several programs and they change from year to year. This greatly reduces the usefulness of the reporting effort that is made.

7.2 Monitoring and evaluation of Australia's environmental management system is fragmented

7.2.1 Monitoring and evaluation of Australia's environment management system is challenging

The management of Australia's environment is a shared responsibility between the Commonwealth and the states and territories, with jurisdictions working in partnership with the community and the private sector (Chapter 1). To meet its international obligations, the Commonwealth has an overarching responsibility to monitor and report on the national environment.

The approach to monitoring and evaluation within the system happens at a range of scales (project site, environmental asset, region), for a range of reasons (project, program, regulatory framework) and varies considerably. Some of the monitoring and evaluation frameworks are strong and have benefited from decades of investment and effort, others are emerging and some, like many under the EPBC Act, are immature (see Box 1 Examples of environmental monitoring, evaluation and reporting).

Box 1 Examples of environmental monitoring, evaluation and reporting

The Reef 2050 Long-term Sustainability Plan provides the overarching strategy for the Great Barrier Reef, developed by the Australian and Queensland governments and partners. It is underpinned by a coordinated and integrated monitoring, modelling and reporting program to support an adaptive management approach[iv]. It guides the coordination and alignment of existing long-term monitoring programs, to capitalise on existing investment and avoid duplication, and informs annual report cards and the Great Barrier Reef Marine Park Authority's five yearly outlook reports.

The Commonwealth's Regional Land Partnerships program has a long-term monitoring framework for projects, which builds on improved practices for collecting and storing information on on-ground activities funded by the Commonwealth under previous programs. The current work has a greater emphasis on processes to support monitoring and evaluation of ecological outcomes at the project and program level, with an aim to promote more robust, long-term ecological modelling and evaluation more broadly[v].

There is no cohesive mechanism that brings the various efforts together to present a picture of the performance of our national system of environmental management. This is a key shortcoming that should be addressed.

7.2.2 The purpose of state of the environment reporting is not clear

The national State of the Environment (SoE) report is the established mechanism that seeks to 'tell the national story' on Australia's system of environmental management. While significant

improvements have been made in the way the SoE is presented, in its current form the SoE report as the centrepiece of monitoring and environmental reporting on Australia's national environmental system is dated.

The EPBC Act requires the preparation of the SoE report every five years (s516B). Five SoE reports have been delivered, the first in 1996 and the most recent in 2016. The practice has been for the SoE to be prepared by a team of independent authors with the approach to each report determined by the authors. This has influenced capacity to use the SoE as the driver for establishing longitudinal datasets.

While the national SoE reports provide an important overview of the state and trend of Australia's environment, it is an amalgam of insights drawn from disparate sources, does not generate a consistent data series across reports and is an attempt to report on everything for everyone. There is no feedback loop, and as a nation there is no requirement to stop, review, and where necessary change course.

The EPBC Act provides no guidance as to the purpose or objective of the SoE, and while provision is made for this to be clarified in regulations, this has never been done. It relies on collating available data and information and authors have repeatedly highlighted the inadequacy of data and long-term monitoring as a key challenge to effective environmental management. The SoE report's purpose is not clear, and it lacks a coherent framework that supports consistency over time.

National SoE reports provide little insight into the effectiveness of different activities to manage the environment, and there is no requirement for a government response. The links between SoE and other initiatives, such as the development of national Environmental Economic Accounts (see Box 2 Environmental Economic Accounting) is not clear.

Box 2 Environmental Economic Accounting (EEA)

In April 2018 the Australian Government and all state and territory governments agreed on a strategy to implement a common system of environment-economic accounts across Australia[vi].

EEA is a framework for organising statistical information to help decision-makers better understand how the economy and the environment interact. The importance of the environment and its contribution to our economic and social wellbeing is often overlooked because it is not fully reflected in traditional financial accounting methods, which have developed and improved over decades.

The ultimate outcomes of a national system of environment-economic accounts include that:

- policy and decisions by government, business and community take into account the benefits of a healthy environment
- decisions makers balance social, economic and environmental outcomes
- return on investment into the environment can be demonstrated; and
- information on the condition and value of environmental assets is fully integrated into measures of social and economic activity – such as reports prepared by Treasury and the Department of Finance.

In practice, EEA brings together information on the environment and how it is changing over time in a consistent way that can be easily integrated with social and economic data. The common national approach to EEA agreed as part of the 2018 National Strategy will adopt the internationally agreed System of Environmental Economic Accounting framework. It starts by classifying and measuring the extent of

environmental assets, then considers the condition or health of the asset and the range of goods and services that the asset provides. The values of those services are estimated based on market transactions, or techniques to assess non-market value.

For example, the value of a national park may be demonstrated through the income from park entry fees, and the value of tourism to the local economy. The park also provides health benefits for physically active park visitors, with a value estimated from avoided health care costs. Other benefits include pollination for local agriculture, water supply and filtration, climate change mitigation, biological diversity and flood protection.

The 2018 National Strategy sets out a roadmap with intermediate outcomes delivered over 5 years, including improving the consistency of reporting on Australia's environment and the coordination of, and access to, the data that underpins it. Several pilot accounts are underway, but they have yet to be picked up and implemented in Commonwealth or jurisdictional level reporting.

7.3 Key reform directions

7.3.1 A specific monitoring and evaluation framework for the EPBC Act

A comprehensive and coherent framework to monitor and evaluate the effectiveness of the EPBC Act in achieving its outcomes and the efficiency of its implementation is required.

The fundamental purpose of this framework is to enable two key questions to be answered:

- Is the EPBC Act achieving its intended outcomes?
- Is the EPBC Act operating efficiently?

A comprehensive framework backed in by the systems required to support its implementation will mean the next review of the EPBC Act will start with a comprehensive evidence base on which judgements can be made. The framework should specify:

- the key outcomes to be measured, noting that the outcomes and objectives of the National Environmental Standard provides a key basis for this,
- the spatial and temporal scale at which outcomes should be measured, and
- the monitoring and data required, including how requirements for specific areas of the EPBC Act (e.g. standards, regional plans) come together.

The reforms proposed by this Review, particularly the establishment of National Environmental Standards and regional plans provide a solid foundation for the development of a monitoring and evaluation framework for the EPBC Act as a whole. The implementation of the framework should be underpinned by the data and information supply chain (Chapter 6).

The National Environmental Standard for monitoring and evaluation is envisaged to ensure that those that interact with the EPBC Act (such as proponents or accredited regulators) are required to contribute their information as appropriate to populate the framework.

In line with this framework, the annual reporting on the operation of the EPBC Act should be enhanced. It should report against the achievement of the National Environmental Standards, where standards have not been achieved, and the core activities undertaken to support the operation of the EPBC Act.

7.3.2 Revamp State of the Environment reporting

A revamp of SoE reporting is required to provide the foundation for Commonwealth leadership on the environment. It should be the vehicle through which Australia, as nation, tells its story on the environment, both to itself and to the world.

The national SoE report should continue to be independently prepared, so that judgements are made at arm's length and without fear or favour. But the report should be rooted in a nationally agreed evaluation framework, to which the data and information collected by many can support. This framework will provide focus and consistency to the reports, while being sufficiently flexible so as not to limit the ability of the report to consider information in new ways or talk to emerging issues.

The national SoE report should examine the state and trends of Australia's environment, and the underlying drivers of these trends, including interventions that have been made, and current and emerging pressures. It should provide an outlook for Australia's environment, based on future scenarios.

Government should be required to formally respond to the national SoE report. It could, for example, respond in the form of a national plan for the environment, that identifies priority areas for action, and the levers that will be used to act.

This revamp of the national SoE report requires an ongoing commitment to resourcing and maintaining capacity for national scale monitoring. Ideally, national SoE reports should be published on a cycle that enables comprehensive input into strategic planning and the statutory reviews of the operation of the EPBC Act.

The EPBC Act should be amended to set the formal objectives for the national SoE report, require the Government to respond, and to better align the timing of the report with the statutory review.

7.3.3 Accelerate efforts on national environmental economic accounts

Environmental-economic accounting provides a mechanism to underpin consistent ESD reporting across governments (see Box 2 Environmental Economic Accounting (EEA)). The collaborative development of a nationally consistent system will support greater coordination and the capacity to better tell a national-level story.

While a National Strategy and Action Plan for a common national approach to environmental economic accounting was agreed in 2018, progress has been slow. A series of pilot and experimental accounts have been developed, but it has yet to be incorporated into State of the Environment reporting at the state and territory or Commonwealth level.

Efforts to finalise the development of these accounts should be accelerated, so that in time they can be a core input to SoE reporting, and are used to promote explicit consideration of environmental, heritage and cultural assets as part of Australia's broader national accounts.

8 Restoration

Key points

To deliver Ecologically Sustainable Development, the EPBC Act must encourage restoration. Given the state of decline of Australia's environment, restoration is required to enable future development to be sustainable. Available habitat needs to grow to be able to support both development and a healthy environment. The current settings of the EPBC Act do not support effective or efficient restoration.

Environmental offsets are poorly designed and implemented, delivering an overall net loss for the environment.

- The stated intent of the offsets policy, to only be used once proponents have exhausted all reasonable options to avoid or mitigate impacts on MNES, is not occurring. In practice, offsets have become the default negotiating position, and a normal condition of approval, rather than the exception.
- Offsets do not currently offset the impact of development. Proponents are allowed to clear or otherwise impact habitat by purchasing and improving other land with the same habitat and protecting it from future development. It's generally not clearly established that the area set aside for the offset is at risk from future development, and overall there is a net loss of habitat.

Offsets need to include a focus on restoration and should be enshrined in the law, rather than departmental policy. The Act should:

- Require offsets to be considered only when options to avoid and then mitigate impacts have been actively considered, and demonstrably exhausted.
- Require offsets, where they are applied, to deliver protection and restoration that genuinely offsets the impacts of the development, avoiding a net loss of habitat.
- Incentivise investment in restoration, by requiring decision makers to accept robust restoration offsets, and create the market mechanisms to underpin the supply of restoration offsets.

There are opportunities for Government to explore policy mechanisms to accelerate environmental restoration including those to:

- Leverage the carbon market, which already delivers restoration, to deliver improved biodiversity in suitable habitat types.
- Co-invest with the philanthropic and private sectors, including funding innovation to bring down the cost of environmental restoration, growing the habitat available to support healthy systems.

The reforms proposed by this Review recommend the EPBC Act focus on protecting, conserving and restoring the environment, so that development can proceed in a sustainable way (Chapter 1). To deliver the net gain for the environment that is needed, the national focus on restoration must be enhanced (see Box x).

Box X What does restoration mean

Restoration in this chapter refers to improvement in the condition of the environment to a state that is required to be sustainable in the long term, or a state that is desirable. It should not be inferred as a blanket ambition for a return to a particular historic environmental condition (though this may be a reasonable goal for some areas), as this may not be possible, particularly considering ongoing impacts such as climate change.

Central to the proposed reform agenda is a commitment to monitoring and evaluating progress made, and reviewing and amending settings to ensure that interventions made are on track to deliver intended environmental outcomes. The proposed National Environmental Standards and regional plans (Chapter 1) are key mechanisms that specify the outcomes sought from development decisions and the priorities for restoration. Reviewing and, where needed, amending these instruments, is critical to delivering ecological sustainable development in the long term. A recurring cycle of review provides the opportunity to adjust the rules when circumstances change or where outcomes are not being achieved.

In addition to this commitment to adaptive management, specific action is required to support restoration. Fundamental change to the way developments are permitted to 'offset' the impacts of their development are needed.

The Review has identified opportunities for national leadership outside the Act that should be considered. Existing markets, including the carbon market can be leveraged to deliver restoration in appropriate areas, and greater effort can be made to coordinate the investments in restoration made by governments and the private sector. Biodiversity markets investment vehicles at scale also provide an opportunity to and to improve techniques used for restoration, so that it can be delivered at least cost. These opportunities are explored below, although no firm reform directions are proposed at this stage. The Review will continue to consider the merits of these concepts.

8.1 Environmental offsets do not offset the impacts of developments

8.1.1 The offsets policy permits continued environmental decline

The EPBC Act offsets policy was implemented in 2012[i]. The policy enables developers to compensate for unavoidable environmental impacts, mostly by protecting areas of habitat similar to the area that has been destroyed or damaged by the project.

The policy embeds a hierarchy of considerations when assessing the impacts of a proposal. In the first instance, impacts on MNES should be avoided. Once all reasonable efforts are made to *avoid*, remaining impacts should be *'mitigated'*, with efforts made to reduce the impact(s) on MNES. The 'residual impacts' — those remaining after all reasonable efforts to avoid and mitigate have been exhausted — can then be *offset*, in accordance with the rules of the offsets policy.

The offsets policy is based on the notion that as suitable habitat becomes more scarce overtime, offsets become harder to find and secure, and therefore more expensive. While this has played out, it has not resulted in projects avoiding increasingly scarce habitat. Rather, it has led to concern from business that the scarcity of some offsets creates an 'unworkable' cost of doing business.[ii]

While the *avoid, mitigate, offset* hierarchy is its stated intent, this is not how the policy has been applied in practice. Proponents see offsets as something to be negotiated from the outset, rather than a commitment to fulsome exploration (and exhaustion) of options to avoid or mitigate impacts.

This is in part because the proponent's decision to develop a particular site (or on a specific footprint within a site) has generally already been made before a referral is made under the EPBC Act. This limits real consideration of broadscale avoidance. Project cost and difficulty drives final decisions about siting of projects, rather than environmental considerations.

For example, the Review has noted proposals where proponents have placed linear infrastructure through habitat, rather than considering all opportunities to secure agreement(s) to site it through adjacent already disturbed or cleared lands. In other cases, proponents have identified multiple prospective areas for extraction activities and have chosen sites for solely commercial reasons (such as lower costs due to proximity to transport hubs), despite generating potentially high environmental impacts.

Once a proposal is referred, assessment officers have limited scope and time to work with proponents to avoid and mitigate impacts. Once a proposal is referred, assessment officers have limited scope and time to work with proponents to avoid and mitigate impacts. This becomes a 'nice to do', rather than a core focus of their efforts. An offset has become an expected condition of approval, rather than an exception.

Further to problems with application, there are significant shortcomings with the design of the offsets policy. The current policy is based on the concept of 'averted loss'. This means that proponents usually seek to meet the offset requirement by purchasing and improving land with the same habitat, and protecting it from future development. However, there is no formal requirement for the proponent to demonstrate that the area set aside for the offset was sufficiently likely and able to be cleared for future development. The environmental outcome achieved by the purchase of the offset may therefore not be genuinely 'additional' to the outcome that would have been achieved anyway.

While the policy allows proponents to meet their offset condition by improving degraded land (an approach the Review terms a restoration offset) or by using an offset that has been delivered in advance of the impact occurring (an 'advanced offset'), most offset conditions are met by protecting areas of like habitat (an averted loss offset) (see Box x).

Box X – Averted loss, advanced and restoration offsets

Averted loss offsets

These offsets are met by purchasing and improving an area of land with the *same* habitat as that which is destroyed or damaged by the development. This offset is then protected from future development. A development with an averted loss offset results in a net reduction of habitat.

Restoration offsets

These offsets are met by creating new or recovering old habitat from highly degraded land. These offsets are met by creating new (or recovering old) habitat from highly degraded land. A development with a restoration offset can result in a net gain of habitat.

Advanced offsets

Advanced environmental offsets are those that are 'supplied' in advance of an impact occurring. The offset area is set aside for potential future use by the owner, or to sell to another developer. The current offset policy allows advanced offsets for:

- protecting and improving existing habitat (averted loss)

- creating new habitat from highly degraded land (restoration)

Advanced offsets are difficult to deliver under the current settings. There is no guarantee that the Minister will accept an advanced offset, nor is it possible to accurately determine the area of offset required prior to an approval being granted. This makes investing in an advanced offset a risky proposition, and so proponents focus on protecting what is left, rather than promoting restoration. This means that over time, the policy permits continued loss and ongoing decline, rather than realising a gain (or at least no net loss) to offset expected realising a gain (or at least no net less) to offset expected environmental impacts, let alone improve them.

Offset requirements are a condition of approval. As with other conditions (see Chapter 9), offset conditions are not adequately monitored, and efforts to enforce compliance are weak. There is no transparency of the location, quality or quantity of offsets. There is no 'register of offsets', and in the absence of such a tool it may well be possible that the same area of land has been 'protected' more than once.

As most offsets are averted loss offsets, in its current form, the offset policy delivers little other than weak protection of remnant habitats of MNES, that may have never been at risk of development. It requires fundamental review.

8.1.2 Key reform directions

The offset policy should be replaced with clear laws. The EPBC Act should require offsets only be considered when options to avoid and then mitigate impacts have been demonstrably exhausted.

The EPBC Act should require that offsets deliver genuine restoration to offset the impacts of the development. Requirements for restoration should be proportional to the risk to MNES, with more stringent requirements for more highly endangered species or ecological communities.

To provide the certainty needed to invest in restoration ahead of impacts occurring, the EPBC Act should require a decision maker to accept *robust* advanced offsets that are created prior to an approval being granted. Restoration offsets should be encouraged to enable a net gain for the environment to be delivered.

If offsets, including advanced offsets, were to be supported with greater certainty under the EPBC Act, then this could be the catalyst for a market response. Proponents are generally not in the business of managing habitats as their core business. There are however expert land managers and specialist project managers who deliver these services, as has been demonstrated through the operation of the carbon market[iii]. The right policy settings would provide certainty for these players to invest in landscapes, confident that developers will be in the market to purchase the restored and protected habitat or management services down the track.

The concept of a biodiversity restoration market should frame the approach to offset reforms. Settings should promote regulatory certainty, transparency and competition, and the supply of robust offsets including:

- Market depth. The ability for a wide range of participants to purchase restoration for a range of reasons. Voluntary buyers (e.g. companies purchasing credits for green

credentials), philanthropic investors and government funds should be able to purchase credits

- Market integrity. The integrity of the environmental market unit is central to a successful and trusted market. This requires market transparency, clear standards, reporting and registries all backed by firm compliance and enforcement.
- Market efficiency. Buyers and sellers should be able to easily find each other, and the overhead costs to participate kept as low as possible.

Laws that accept advanced restoration offsets, and provide a robust market to underpin them, will mean that third parties will pre-empt the needs of developers, invest in restoration activities now, and then on sell the robust offset to proponents when they need them. This will in turn provide business with a far simpler mechanism to meet their residual obligations to offset their impacts.

There are barriers between biodiversity markets that are currently delivered at an individual state level. Consideration should be given to how systems could be better aligned (for example by enabling recognition of cross border offsets). This would reduce costs for business while delivering the same environmental benefits.

8.2 The carbon market could be leveraged to deliver environmental restoration

There is an opportunity to better leverage other schemes that promote environmental restoration. Australia's carbon market, underpinned by the *Carbon Credits (Carbon Farming Initiative) Act 2011* has successfully promoted environmental restoration since its inception.

To participate in the carbon market, farmers and other land managers can change the way they use their land to absorb and store carbon dioxide. Land is managed in accordance with prescribed rules (called 'methods') to earn carbon credits. These credits are then on sold either to the Government or another purchaser (for example a philanthropic investor or a company voluntarily purchasing to enhance its 'green' credentials).

Carbon credits can be earned in in many ways, including by allowing or actively promoting, the restoration of native forests. Since 2013, when the rules for these types of activities were put in place, more than 2.3 million hectares of land have been restored[iv], expanding the area of natural habitat.

To date, most restoration activity under the carbon market (by area and credits generated) has occurred in drier regions of Australia[v], where both biodiversity and the numbers of threatened species are lower. In these areas, the returns from using land for carbon are often greater than returns from other land uses.

The Commonwealth Government has recently agreed to carbon market reforms that are intended to increase the competitiveness of carbon-farming when compared to other land uses. These reforms include the ability to use different carbon methods on the same parcel of land (for example for one area to be credited for the carbon sequestered in vegetation and soil). This is known as 'stacking' carbon credits. These reforms will result in a shift in restoration arising from the carbon markets into areas of higher biodiversity, and higher numbers of threatened species.

This is because the returns from 'farming carbon' will be greater than alternatives, resulting in land use change to deliver environmental outcomes.

The value derived from using land to deliver environmental outcomes can be further increased if credits from a biodiversity market can be 'stacked' on top of carbon credits, with one area of land delivering both carbon and biodiversity outcomes.

While not covering the entirety of the biodiversity habitat types likely to be required enhancing the links between the carbon market and biodiversity markets can shift restoration efforts into many areas of higher biodiversity, delivering multiple benefits for the community including:

- An increase in the overall sequestration of carbon over time, as the regions where carbon and biodiversity farming is a commercially viable land use would increase.
- The recovery of threatened species, as the area of habitat necessary to their survival would be increased.

It would also lower the overall cost of achieving carbon and threatened species outcomes, as both benefits can be realised from the one activity.

8.3 Investments in restoration could be better coordinated to maximise outcomes

Commonwealth Government programs for investment in environmental restoration have been a constant feature of national environmental policy over the past 20 years. These include the National Heritage Trust, Caring for Country, the Environmental Stewardship Program, the National Landcare Program, Green Army, Threatened Species Recovery Fund and the Reef Trust.

The current streams of Commonwealth funding allocated towards environmental protection conservation and restoration, while aligned with matters of national environmental significance, are not comprehensively coordinated to prioritise investment in a way that achieves the greatest possible biodiversity benefits.

The reforms proposed by this Review, with a focus on National Environmental Standards and national and regional planning, will provide a foundation for more effective prioritisation and coordination of investments by governments.

There is an opportunity to provide the policy settings to better leverage private interest in investing in the environment as well as drive down the cost of restoration. A global shift towards companies focusing on their corporate social responsibilities, has resulted in growing interest from the private sector to invest in a way that improves environmental outcomes. The pool of available capital has grown over the past decade. In 2018 the responsible investment market in Australia reached $980 billion with sustainability-themed investments accounting for $70 billion.[vi] It is also likely the resources available to invest in environmental outcomes will continue to grow.

The biodiversity offset markets proposed above are one destination for this capital. Philanthropic and other investors could also be voluntary participants in the market purchasing restoration.

Contributions to the Review have suggested that a national biodiversity trust be established that links government and philanthropic investments, as well as enabling developers to meet their offset obligations. These proposals are similar to those implemented in some states and territories, such as the NSW Biodiversity Conservation Trust and Queensland Land Restoration Fund. These models are government-run, sometimes independent legal entities and investment vehicles designed to oversee the collection and allocation of money to improve the environment. They have legal, governance and financial structures; capitalisation and resourcing strategies. Environmental trust funds come from both public funding, philanthropic donations, and from developers who pay the trust to discharge their development approval offset obligations.

Contributions to the review have highlighted the key role the philanthropic sector plays in 'testing new solutions to tough problems'[vii]. A proposal posed to the Review is for co-investment to advance innovation and bring down the costs of environmental restoration[viii]. This is akin to the role that the Australian Renewable Energy Agency (ARENA) plays in supporting activities in the renewable energy sector that are not yet commercially viable. ARENA co-invests with the private sector in projects to research, develop and demonstrate new approaches, providing a pathway to prove the viability of technologies to support commercialisation and uptake. The uptake of proven restoration 'technologies' or new approaches could be accelerated by government— for example by recognising their suitability in the biodiversity market, or by underwriting access to the finance need for upfront investment.

The merits of the application of these types of models for biodiversity will be further explored prior to the finalisation of the Review.

9 Compliance, enforcement and assurance

Key points

Compliance, enforcement and assurance under the EPBC Act is ineffective. There has been limited activity to enforce the EPBC Act over the period of 20 years it has been in effect, and the transparency of what has been done is limited.

The culture of compliance, enforcement and assurance is not forceful. Weak monitoring, compliance and enforcement erodes public trust in the ability of the law to deliver environmental outcomes.

There is broad consensus from the regulated community and the experts that advise them, that it is not easy to comply with the EPBC Act. Likewise for the Department, the complexity of the EPBC Act impedes compliance and enforcement.

The compliance and enforcement powers in the EPBC Act are outdated. Powers are restrictive and can only be applied in a piecemeal way across different parts of the EPBC Act due to the way it is constructed.

Monitoring, compliance and enforcement activities are significantly under-resourced.

The key reform directions proposed by the Review are:

- Establish a modern, independent regulator responsible for compliance, enforcement and assurance to be a strong cop on the beat.
- Increase the transparency of compliance and enforcement activities.
- Effectively draw on Standards, simplified law, and better systems to increase compliance and easier enforcement.
- Shift in focus toward assurance of devolved decision making and monitoring, compliance and enforcement of national strategic plans, regional plans, offsets and regeneration.
- Provide the regulator with a full suite of modern regulatory compliance and enforcement tools and adequate funding.

Compliance, enforcement and assurance is core to delivering the intent of the EPBC Act. There is little point in putting rules in place if they will not be monitored and if failure to meet them does not result in appropriate compliance and enforcement action.

Strong compliance, enforcement and assurance is essential to protecting the environment and build trust that breaches of the EPBC Act will be fairly, proactively and transparently addressed. It is also necessary to protect the integrity of most of the regulated community, who spend time and money to comply with the law, with those that do not play by the rules facing theconsequences.

9.1 Compliance, enforcement and assurance approach is not forceful

9.1.1 The Department has a collaborative approach to compliance and enforcement, which is too weak

The Department has improved its regulatory compliance and enforcement functions in recent years but it does not have a strong compliance culture. Progress has included the establishment of a dedicated Office of Compliance, the development of a regulatory framework and new compliance policies that identify priority areas for focus.

While these were small steps forward, the foundations of the Department's regulatory posture focus heavily on supporting a voluntary approach to compliance. The Department has positioned itself as a collaborative regulator, working to reach agreement with the regulated community.

The Department's compliance policy describes its approach as 'fair, reasonable, respectful, reliable'. This stance comes from good intentions of recognising the majority who work to be compliant. It is however a passive approach that has resulted in a culture that has limited regard for the benefits of using the full force of the law where it is warranted.

There is limited evidence of proactive compliance effort, and the compliance posture of the Department is reactionary. Enforcement efforts often rely on a tip off from the public, rather than active surveillance driving enforcement activities. There is little active monitoring to provide assurance that conditions of approval are being met. As highlighted in Chapter 8, assurance to confirm that environmental offsets have been secured and are delivering intended outcomes is limited. There are insufficient resources dedicated to proactive compliance.

9.1.2 Compliance and enforcement options are limited, and under utilised

Enforcement provisions are rarely applied, particularly to Part 3 activities (requirements for environmental approvals), and the penalties do not appear commensurate with the harm of damaging a public good of national interest.

There have only been 29 breaches of the EPBC Act related to impacting threatened species and communities that have been subject to compliance outcomes[i]. Serious enforcement actions are rarely used.

The largest penalty issued under the EPBC Act was via an enforceable undertaking with a company to regenerate 31.5 ha of Central Hunter Valley Eucalypt Forest Woodland for a cost of $2.1 million. While a suspended jail sentence has been handed down for failure to refer an activity for consideration under the EPBC Act, from the evidence available to the Review to date, a jail sentence has not been applied for a breach of a condition of approval.

Since 2010, a total of 22 infringements have been issued by the regulator for breaches of conditions of approval granted under Part 9, with total fines less than $230,000. Local governments issue more than this amount in paid parking fines annually. By way of contrast, local governments often issue more than this amount in paid parking fines annually, for example, Dubbo and Orange Councils in NSW respectively issued more than $220,000 and $1.15 million in parking fines in the 2018/19 financial year [ii].

While provisions are not fully utilised, the regulator is also impeded by some limitations in the powers at their disposal. The EPBC Act provides an incomplete and inconsistent set of regulatory tools that are spread across different parts of the Act. Some enforcement mechanisms, for example. apply only to specific contraventions of the EPBC Act. The EPBC Act lacks contemporary powers needed to address breaches of the law. This includes powers for information sharing and tracking.

This can also lead to inefficient and mismatched pathways being taken. For example, the ability to issue an infringement notice under the EPBC Act is limited to instances where a breach of approval conditions has occurred. If a person cleared a protected habitat and wasn't an approval holder the regulator is limited to pursuing court or other actions even where a fine might be the most direct and appropriate way to respond.

9.1.3 There is inadequate transparency of monitoring, compliance and enforcement functions

The transparency of monitoring, compliance and enforcement under the EPBC Act, including proactive communication with the regulated community, is limited.

Compliance and enforcement reporting is limited to departmental annual reports. Some compliance and enforcement activities online, but the lack of a mandatory requirement to do so under the EPBC Act results in incomplete reporting and the use of different approaches over time.

Submissions received by the Review indicate that the lack of transparency of current compliance arrangements is contributing to low public trust that appropriate action is taken. In the absence of that line-of-sight, submitters to the Review highlighted their view that compliance actions may be subject to political interference.

Most modern regulators have clear logs that include investigation of potential breaches and comprehensively list even minor notices that have been issued. The lack of thorough reporting for the EPBC Act makes it hard to find information, failing to provide any disincentive to others not to breach the EPBC Act or clear assurance to the community that matters are followed-up.

9.2 Complexity impedes compliance and enforcement

As discussed in Chapter 3, the EPBC Act is long and complex. The complexity of the legislation, impenetrable terminology and the infrequency with which many interact with the law, makes voluntary compliance and the pursuit of enforcement action difficult.

The EPBC Act primarily relies on a self-assessment by proponents to determine whether they are likely to have a significant impact on a nationally protected matter. The Department provides some guidance material to assist with that process but submitters to the review have highlighted that interpreting the EPBC Act remains a challenge due to its size and complexity.

Understanding is further strained where related state-based rules change, generating confusion about how local rules relate to national-level rules. For example, changes to Queensland and New South Wales land-clearing rules in recent years resulted in confusion about whether activities that could be legally conducted under new state arrangements also needed to be considered under the EPBC Act, even though the EPBC Act requirements had not changed. For

the person on the ground, it didn't matter whose rules had changed, this just led to a new layer of confusion.

For many Australians, they will never need to interact with the EPBC Act. For some, interaction may be limited to a single circumstance. This contrasts with other broad and complex laws, where frequent interactions mean that the regulated community builds knowledge of their obligations over time. For example, most of the adult population engages with the Income Tax Assessment Act 1997 on an annual basis, and both employees and employers frequently engage with their obligations under employment laws.

The infrequency of interactions with the EPBC Act is further complicated as the circumstances in which the rules apply change each time the lists of the threatened species and ecological communities is added to or amended. While companies of reasonable scale have the capacity to deal with these adjustments, compliance in this context is particularly difficult for individuals and small landholders. This was highlighted in the Craik review as a challenge for the agricultural sector[iii].

9.3 Monitoring, compliance and enforcement activities are significantly under-resourced

The available resources for monitoring, compliance and enforcement constrain the ability of the Department to deliver credible functions.

The monitoring, compliance and enforcement functions of the EPBC Act are not supported by cost recovery arrangements. Compliance and enforcement staff also undertake compliance and enforcement of other Commonwealth environment laws, constraining the pool of resources dedicated to delivering EPBC Act compliance and enforcement. The resources available for monitoring, compliance and enforcement are insufficient and the monitoring, compliance and enforcement caseload continues to increase, as more projects are approved.

A move toward risk-based regulation is far from complete and the full investment needed to deliver efficiency by the use of modern risk-based systems and analytics has not yet been made.

9.4 Key reform directions

An effective EPBC Act monitoring, compliance, enforcement and assurance function will require legislative amendments to improve the regulatory toolkit and structural change to increase independence and build trust. These amendments to the EPBC Act will be best supported by commensurate resourcing and evolution of a stronger culture.

Key reforms proposed by the Review, including simplifying the EPBC Act and setting clear standards, as outlined in Chapters 1 and 3, will assist with greater clarity of obligations to support voluntary compliance and the ability to better enforce provisions. These reforms should be supported by specific guidance for sectors in line with recommendations by the Craik Review. Combined, these efforts will improve the ability of the Department to convey regulatory obligations, and for the regulated community to understand them.

9.4.1 Independent monitoring, compliance and enforcement, with improved transparency

An independent compliance and enforcement regulator that is not subject to actual or implied direction from the Minister should be established. This is important to address significant community concern about perceived conflict of interest, which is undermining their trust in the EPBC Act.

An independent, strong 'cop' on the beat will provide confidence that once conditions are set, they will be enforced to deliver the intended outcomes.

The compliance and enforcement regulator should have improved transparency, publishing all actions taken in a timely manner. It should publish on its website the directions, prohibition notices and improvement notices it makes and provision of follow up on when they have been met. The regulator should also maintain the practice of publishing a clear set of compliance priorities and should report against an annual compliance plan.

The compliance regulator must also set out a clear and strong regulatory stance. While it remains important to be proportional, and to work with people where inadvertent non-compliance has occurred, the regulator needs to establish a culture that does not shy from firm action where needed. This is essential to providing community confidence and giving business a clear and level playing field.

9.4.2 Consolidate, strengthen and modernise monitoring, compliance and enforcement provisions within the EPBC Act

The monitoring, compliance and enforcement powers in the EPBC Act should be overhauled. The Regulatory Powers (Standard Provisions) Act 2014 provides a standardised approach to setting out such powers, and these should be bolstered with specific arrangements to ensure that monitoring, compliance and enforcement powers in the EPBC Act are fit for purpose. The regulator should have a full 'tool-kit' available to it, so that fair, consistent and proportionate action can be taken across different scenarios.

Changes to the monitoring compliance and enforcement provisions of the EPBC Act should include, but not be limited to:

- Standardised powers to delegate authorised officers to undertake EPBC compliance, including to states and territories.
- Incorporation of modern information sharing provisions – supporting collaboration with other regulators.
- Improvements to coercive powers under the EPBC Act to facilitate greater intelligence capability, including using surveillance warrants.

Penalties must be sufficient to be an active deterrent, rather than a cost of doing business. A review of the adequacy of penalties and provisions should consider, but not be limited to:

- Ensuring penalties across the EPBC Act align with the potential harm or benefit and provide a reasonable deterrance.

- Due to the potential significant financial benefit from some areas of non-compliance, monetary penalties are unlikely to provide adequate disincentive, suggesting remediation orders that deliver restoration are fundamental.
- In serious cases of egregious and irreparable damage, criminal prosecutions may be appropriate.

9.4.3 Shift focus of monitoring, compliance, enforcement towards assurance of standards

The Review proposes reforms that will support greater devolution in decision-making (see Chapter 4). Clear, legally enforceable National Environmental Standards combined with strong assurance are essential to community confidence in these arrangements.

The proposed reform promotes the greater use of regional-level plans, with other regulators and proponents working under agreed rules in a regional context. Together with the National Environmental Standards, a simplified Act, better guidance material, and the potential of intelligent systems, will increase confidence in the self-assessment of actions and provide assurance for those actions that demonstrate they can meet the rules.

This shift will not remove the need for monitoring, compliance and enforcement on individual projects, but it will require a refocus and shift over time to provide the assurance needed that standards, plans and other strategic tools are delivering the intended environmental outcomes.

Transparent, independent oversight of these devolved and strategic arrangements will be critical to building community trust that the EPBC Act is effectively protecting the environment and our iconic places in the national interest.

The Commonwealth independent regulator must have power and authority to deal with all breaches of the EPBC Act, even by accredited decision makers, such as a state or territory. The devolved decision maker should remain primarily responsible for monitoring, compliance and enforcement of conditions set to meet National Environmental Standards. Reporting on accredited arrangements should include reporting on all potential breaches, and the response taken. The Commonwealth should retain the ability to intervene in project level compliance and enforcement, where egregious breaches are not being effectively dealt with by the state regulator.

While transition will occur, it is important that the legacy of projects already approved under the EPBC Act will have appropriate monitoring and oversight. Approved activities often take years to complete and will continue to require careful management and oversight to ensure environmental protection is achieved over the long-term.

9.4.4 Sustainable resourcing

Monitoring, compliance, enforcement and assurance functions must be adequately resourced, and resources sustained over the long term.

In the short-term there is a need to invest in appropriate systems and tools to enable the independent compliance regulator to effectively deliver monitoring and risk-based compliance, to help people comply with the EPBC Act and to assure the community that risks to the

environment from non-compliance are identified and managed. Resourcing must support adequate monitoring and more than basic follow-up action to respond to issues as they arise. Proactive monitoring, surveillance and investigation are needed to restore public trust in the system and to review and ensure actions that have occurred to date are in fact meeting requirements and delivering for the environment.

10 Proposed reform pathway

Key points

The EPBC Act is ineffective, and reform is long overdue. Past attempts to do so have been largely unsuccessful. Commitment to a clear pathway for reform is required.

Immediate steps to start reform should be taken, focussing on:

- Reducing points of clear duplication, inconsistencies, gaps and conflicts in the EPBC Act.
- Improving the settings for devolved decision making, including issuing interim National Environmental Standards to provide confidence that outcomes will be delivered.
- Building the foundations to provide a solid base for longer-term reform.

Similarly, in the short term, the conversation to deliver complex reforms and the mechanisms to underpin continuous improvement should commence so that policy development and implementation plans can be finalised, and resourcing commitments made.

Once these steps are taken, reform should focus on comprehensively fixing the problems with the EPBC Act, with this phase of reform focused on:

- Developing a full suite of National Environmental Standards, refined from the lessons learned from implementing the interim standards, and armed with improved data and information
- Redrafting the Act to simplify, clarify and strengthen it.
- Embedding changes to governance arrangements.

The environment, heritage and Indigenous policy areas covered by the EPBC Act are complex. The benefit of reforms commenced now will reap benefits over the next decade and beyond.

The reform agenda proposed is not one to 'set and forget'. Settings should be monitored and evaluated, and the path forward adjusted as lessons are learnt and new information and ways of doing things emerge.

The EPBC Act is long overdue for improvement. Despite multiple past efforts, the Act has remained largely unreformed over its two decades of operation. It is not fit-for-purpose as it is not able to deliver long-term sustainable growth.

Effective administration of a regulatory system is not cost free. The reforms proposed seek to improve the overall efficiency of the system. It is important to consider how to best fund the implementation of a reformed system, including the fair costs that should be recovered from proponents. In principle, government should pay for elements that are substantially public benefits (e.g. the development of standards), while business should pay for those elements of the regulatory system required because of their impact on the environment to derive private benefits (e.g. approvals and monitoring, compliance and enforcement). There are elements of the regulatory system that have mixed benefits where costs should be shared (e.g. data and information).

While the reform pathway is ultimately a decision for Government, the Review considers a phased approach is necessary to deliver immediate improvements to the effectiveness and efficiency of the EPBC Act, while taking the time to do the detailed work required to deliver more complex reforms. Three key phases should be considered.

- **Phase 1** should deliver urgent, long-overdue changes to the EPBC Act and take the steps needed to build the core foundations for more complex reform. There is no reason to wait to commence this phase.
- **Phase 2** should commence early, to start the conversation on complex policy reforms and to deliver those elements of reform required to support continuous improvement in the way the EPBC Act operates.
- **Phase 3** should build on Phases 1 and 2, with a focus on delivering the more complex legislative reform that will take time to develop and implement.

10.1 Phase 1 — fix long known issues, and set the foundations

The initial phase of reform should fix long-known standing issues with the EPBC Act within its current construct and set the base for key reform foundations that can be built on and improved over time. The five areas of focus for phase 1 reforms are:

- Reduce points of clear duplication, inconsistencies, gaps, and conflicts in the EPBC Act.
- Issue interim National Environmental Standards to set clear national environmental outcomes against which decisions are made.
- Improve the durability of devolved decision-making, to deliver efficiencies in development assessments and approvals, where other regulators can demonstrate they can meet interim National Environmental Standards.
- Early steps and key foundations to improve trust and transparency in the EPBC Act, including publishing all decision materials related to approval decisions.
- To legislate a complete set of compliance and enforcement tools across the EPBC Act.

10.2 Phase 2 — initiate complex reforms and establish the mechanisms for continuous improvement.

The proposed reform agenda involves key elements that need to be initiated and established, and require ongoing development, review and adjustment. These reform proposals require sustained investment, as they underpin the effective and efficient operation of the EPBC Act.

This phase of reform should commence as soon possible, so that the policy development, implementation plans can be finalised, and resourcing commitments made.

The six areas of ongoing focus for phase 2 are:

- Establishing the framework for monitoring, reporting on, and evaluating the performance of the EPBC Act, with a key focus on the arrangements for National Environmental Standards and national and regional plans. Commitment to implementing the framework is essential, to enable the settings to be improved over time.
- Starting the conversation with the States and Territories about state-led regional planning priorities, and priorities for strategic national plans.
- Starting the conversation on the revamp of the national State of the Environment report to support a step forward in the delivery of the upcoming 2021 report, and establish the

formal objectives, timing and approach to the Government response for the subsequent reports.

- Committing to sustained engagement with Indigenous Australians, to co-design reforms that are important to them — the culturally respectful use of their knowledge, effective national protections for their culture and heritage, and working with them to meet their aspirations to manage their land in partnership with the Commonwealth.
- Appointing a national custodian, responsible for delivering the information supply chain and overhauling the systems that the Department needs to capture value from the supply chain.
- Establishing the mechanisms to better leverage investment, to deliver the scale of restoration required for future development in Australia to be sustainable in the long term.

10.3 Phase 3 —New law and implementation of the reformed system

Once the policy direction is settled, and key initiatives are underway, the final phase of reform should involve complete legislative overhaul to a focus on establishing remaining elements of reform and implementing the reformed system.

In this phase a full suite of National Environmental Standards should be made that cover all areas for standards that have been identified by this Review. This should draw on the experience of implementing the Interim National Environmental Standards, and with improved data and information. Other regulators seeking to be devolved decision makers, including states and territories, must demonstrate how their regulatory approach meets the National Environmental Standards. All arrangements in place for devolved decision making should be formally reviewed at this time. Where necessary, the settings in the EPBC Act for making standards, accrediting other regulators and quality assurance of the devolved model and compliance should be amended based on lessons learned.

Phase 3 should deliver a comprehensive redrafting of the EPBC Act to simplify, clarify and strengthen the law. The re-drafted law should incorporate key reform proposals including:

- Settings to hardwire the concept of ecologically sustainable development (ESD) into the Act and require that it forms the basis of all decisions, as it is the overall outcome that the EPBC Act seeks to achieve,
- Settings for making and reviewing national and regional plans,
- Measures to improve trust in decision making, including:
  - Requirements for greater transparency
  - An independent compliance, enforcement and assurance regulator, not subject to actual or implied direction from the Minister that has a clear mandate to enforce compliance with law.
  - Changes to the structures of statutory advisory committees, to provide confidence that decision makers receive sound information and advice for making decisions
  - Revised legal review mechanisms to provide regulatory certainty and build trust in decision making.

- Hierarchy of protecting (avoiding impact), conserving (minimising impact) and restoring the environment, including incorporating restoration focused environmental offsets into the law.
- The mechanisms to support the use of markets and trusts to deliver environmental restoration.

In embarking on re-drafting the law, the merits of separating the EPBC Act along key functional lines should be considered.

The proposed reforms seek to build community trust that national environmental laws deliver effective protections and regulate businesses efficiently. It is impossible for the Review to satisfy the aspirations of every person with an interest in the environment or in business development. Rather, the Review has attempted to provide a way forward, to ensure effective environment protection and biodiversity conservation and efficient regulation of business. The EPBC Act in its current form achieves neither.

While the proposed reforms are substantial, the changes are necessary to set Australia on a path of ecologically sustainable development. This path will deliver long-term economic growth, environmental improvement and the effective protection of Australia's iconic places and heritage for the benefit of current and future generations.

From: Bruce Edwards
Sent: Tuesday, 30 June 2020 6:38 PM
To: s22
Cc: James Tregurtha; Dean Knudson
Subject: Brief submitting EPBC Act Review Interim Report [SEC=OFFICIAL]
Attachments: MS20-000508.pdf; Interim report_For Publication_June 2020.pdf

Hi s22, please see attached the Interim Report for the EPBC Act Review and a cover brief.

This is the final publication ready version and includes the appendix that Professor Samuel has been finalising.

Professor Samuel asked the Secretariat to ensure this was provided this evening.

I have also submitted via PDMS.

Bruce

Bruce Edwards
Assistant Secretary - Environment Protection Reform

DEPARTMENT OF AGRICULTURE, WATER AND THE ENVIRONMENT

MS20-000508

To: Minister for the Environment (For Information)

INDEPENDENT REVIEW OF THE *ENVIRONMENT PROTECTION AND BIODIVERSITY CONSERVATION ACT 1999* (EPBC ACT) – INTERIM REPORT

Recommendation:

1. That you note the attached interim report (**Attachment A**)

Noted / Please discuss

Minister: Date:

Comments:

Clearing Officer: Sent:. 30/6/2020	James Tregurtha	First Assistant Secretary, Environment Protection Reform	Ph: Mob:
Contact Officer:	Bruce Edwards	Assistant Secretary, Environment Protection Reform	Ph: Mob:

Key Points:

1. This brief provides a final copy of the EPBC Act Review Interim Report.
2. Professor Samuel previously provided an information copy of the report (MS20-000440), and executive summary, and talking points (MS20-000410).
3. The attached final copy of the interim report now includes an appendix to the report that has been finalised by Professor Samuel.
4. Once released the Interim Report will be open for public comment through an online survey platform for a period of 4 weeks. Professor Samuel will also undertake further targeted engagement with key stakeholders. These activities will help Professor Samuel test his interim views ahead of finalising the review in October, when he will provide you with his Final Report and recommendations.

Attachments

A: Interim Report for the Independent Review of the EPBC Act