



A Co-operative venture of the municipalities of:  
Cockburn, East Fremantle, Fremantle, Kwinana, Melville & Rockingham

## **Regional NRM Strategy**

A regional approach to Natural Resources Management (NRM) in the South  
West Metropolitan Region

*A landscape vision for healthy communities*



**12 August 2013**

## Contents

Section	Subject	Page
	<b>Executive Summary</b>	<b>3</b>
<b>1.</b>	<b>Purpose</b>	<b>7</b>
<b>2.</b>	<b>South West Group</b>	<b>7</b>
<b>3.</b>	<b>Strategic Planning Context</b> 3.1 Environmental Protection and Biodiversity Conservation Act 3.2 Directions 2031 and Sub-regional Structure Planning <i>Directions 2031 and Beyond</i> <i>Sub-regional Strategies and Structure Planning</i> <i>Capital City Planning Framework</i>	<b>10</b>
<b>4.</b>	<b>A Regional NRM Planning Framework</b> 4.1 Defining the NRM Business 4.2 Council NRM Framework 4.3 Regional NRM Framework	<b>15</b>
<b>5.</b>	<b>Key Landscape Elements and Values</b> 5.1 Natural Values in the South West Metropolitan Region 5.2 Importance of Native Vegetation and an Integrated Approach to Biodiversity Conservation 5.3 Comparison of the Value of Natural Areas 5.4 Biodiversity Conservation Mapping 5.5 A Collaborative Model for Integrated Landscape Management	<b>19</b>
<b>6.</b>	<b>South West Group NRM Management</b> 6.1 Internal Coordinating Arrangements 6.2 External Coordinating Arrangements	<b>26</b>
<b>7.</b>	<b>Priorities and Resources</b> 7.1 Regional NRM Framework and NRM Themes 7.2 Regional NRM Program <i>Regional Priority Projects</i> <i>Regional Priority Initiatives</i> 7.3 Prioritisation and Implementation	<b>28</b>
<b>8.</b>	<b>Governance and Funding</b>	<b>34</b>
<b>9.</b>	<b>Next Steps – Resources to Implement the Strategy and NRM Program</b>	<b>37</b>
<b>10.</b>	<b>Conclusion</b>	<b>38</b>
	<b>Appendices</b>  1) NRM Categories and Activities 2) Defining the NRM Business	<b>40</b>

# EXECUTIVE SUMMARY

## 1. PURPOSE

The South West Group Regional Natural Resource Management (NRM) Strategy sets out a vision for the landscapes and natural areas of the South West Metropolitan Region that contains diverse and valued natural areas. It establishes an 'NRM Framework' for the six Councils to work together and with the Australian and State Governments, linking into their strategic and planning initiatives that will set future land uses across the Perth Peel Region.

## 2. THE SOUTH WEST GROUP

The South West Group, formed in November 1983, is a Voluntary Regional Organisation of Councils (VROC). It comprises the Cities of Cockburn, Fremantle, Kwinana, Melville and Rockingham and the Town of East Fremantle, and is managed by a Board consisting of the Mayors and CEOs of the member Councils.

The South West Group seeks to work with the six Councils and through cooperation with industry, community and the other spheres of government to capture a wide range of opportunities to enhance economic growth as well as supporting a diversity of quality lifestyles in an enviable environmental setting.

The Regional NRM Strategy will be a key mechanism to achieve a '*landscape vision for healthy communities*'.

## 3. STRATEGIC PLANNING CONTEXT

There are two overarching planning and conservation initiatives that will establish land use and management in the Perth Peel area and their outcomes will strongly influence the South West Group's Regional NRM Strategy, namely:

- The Environmental Protection and Biodiversity Conservation Act (EPBC Act) Strategic Assessment of the Perth Peel region, being jointly carried out by the Australian and State Governments.
- Sub-regional Structure Planning being led by the Department of Planning, a key element of which is the Green Network.

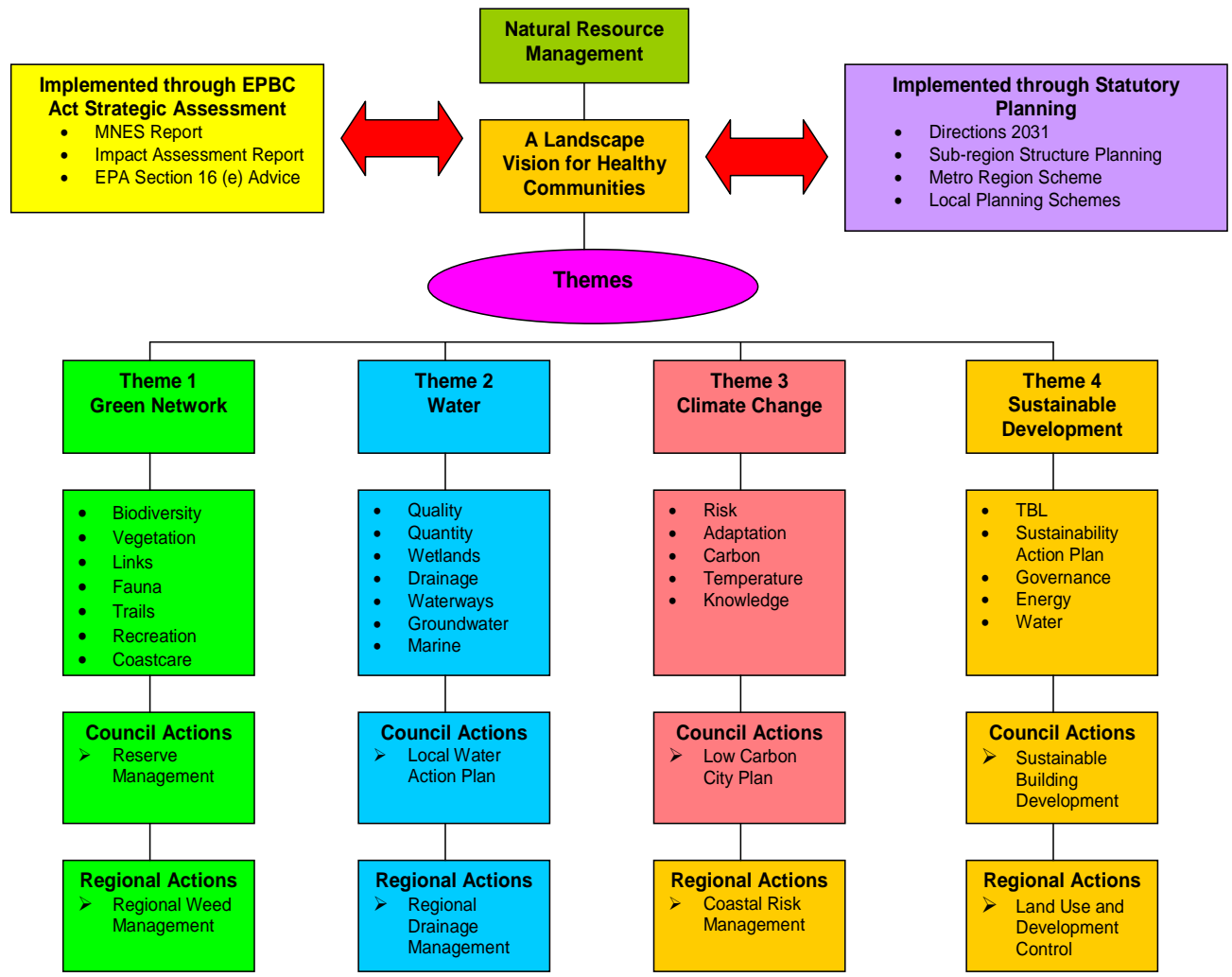
The aim of the EPBC Act Strategic Assessment is to align Federal and State environmental approvals to 'streamline' development approvals. In a parallel process, the National and State values determined from the Strategic Assessment will strongly influence the Sub-regional Structure Planning under 'Directions 2031 and beyond' and identify areas requiring conservation, able to developed or requiring greater negotiation or investigation. The Regional NRM Strategy has been developed to link into and support both of these initiatives, so the South West Group can work proactively to build a Green Network for its landscapes and communities.

## 4. A REGIONAL NRM FRAMEWORK

Using a 'definition' of NRM adapted from work done by the Australian Bureau of Statistics (see Appendix 1), the South West Group has categorised all of the NRM work undertaken by the six member Councils into four key themes:

- Theme 1 – **Green Network** (management of all of the natural areas and their ecological links)
- Theme 2 – **Water** (integrated and efficient use and management of underground and surface water)
- Theme 3 – **Climate Change** (adaptation to global warming and reduction of carbon emissions)
- Theme 4 – **Sustainable Development** (sustainable building and use of natural resources)

This resulted in a 'Regional NRM Framework' shown in Figure 8 and reproduced below. It highlights the regional NRM links to the EPBC Act Strategic Assessment and statutory planning and provides a basis to identify the Priority Regional NRM Projects (Regional Actions) as well as how these link to local projects and initiatives (Council Actions).



## 5. KEY LANDSCAPE ELEMENTS AND VALUES

The South West Metropolitan Region contains an outstanding range of natural areas ranging from internationally significant wetlands to nationally significant areas and areas with State and regional values. Many areas are conserved and managed by State and Local Government, noting that valuable native vegetation still exists on private land. Together all of these areas make up the Green Network in 'Directions 2031 and beyond' and the outcomes of the EPBC Act Strategic Assessment will emphasise the value of many areas and the need for improved protection and management.

The challenge for the future is to identify which areas and ecological links need to be conserved and together with existing reserved areas how they can be collaboratively managed by State agencies and Local Government. Another important aspect is to set targets for the native vegetation complexes that need to be retained for agreed biodiversity outcomes.

The South West Group worked in partnership with the WA Local Government Association to map all natural areas and vegetation complexes and show the impact of proposed development based on the land uses determined in the Metropolitan Region Scheme (MRS) and Local Planning Schemes (LPS).

This mapping approach was also useful in identifying options for the future conservation and management of important natural areas. Examples of the maps that are being produced are:

- Land use maps overlaid with threatened vegetation communities/complexes and Bush Forever sites.
- Local Planning Scheme map across the six member Councils.
- Local ecological linkage maps with intersecting Reserves and threatened vegetation communities/complexes.

The work completed to date has enabled the development of 'a collaborative model for integrated landscape management' and outlines how State Government agencies can work with Councils to achieve effective coordination of regional natural areas management and community engagement. The Regional NRM model enables the South West Group to work closely with member Councils to achieve regional targets for natural areas management and establish a landscape vision for healthy communities.

## **6. SOUTH WEST GROUP NRM MANAGEMENT**

As part of the Regional NRM Strategy, the South West Group has set up strong internal and external coordinating arrangements, including NRM Planning and Environment, and NRM Information and GIS Coordinating Groups. Another important initiative is an on-line NRM information database and management system, known as South West Group TargetOn.

In addition, external relationships with State Government agencies and other regional stakeholders have been established by the South West Group and will be important to facilitate collaborative and supportive working arrangements and partnerships for Priority Regional Projects through a five year Regional NRM Program.

## **7. PRIORITIES AND RESOURCES**

Using the Regional NRM Framework, Regional Priority Projects and Priority Initiatives have been identified across the six Councils through a consultative approach involving member Councils and key external stakeholders. The priority projects and initiatives will be the foundation of a Regional NRM Program and enable the identification of resource and funding requirements for implementing the Regional NRM Strategy.

**Priority Projects** include implementation of plans, research and on ground works:

- Cockburn Sound Coastal Alliance
- Climate Change Adaptation
- Integrated Coastal Management Plan and Perth Corridor Project
- Coastal Conversations Beach Monitoring Project
- Iconic Coastal/Marine Species Project
- Fire Management Project
- Dieback Mapping and Management
- Regional Control of Feral Animals
- Water Conservation and Re-use
- Integrated Wetland Conservation
- Kwinana Industry Buffer Green Belt
- Recycled Water for Heavy industry
- Green Network – Integration of Local Biodiversity Strategies and Mapping of Natural Areas and Ecological Links
- Environment and Sustainability Education
- Light Industry Audit (Cleaner Production)

**Priority Initiatives** include strategic coordination of organisations to achieve agreed objectives and targets:

- Inter-government liaison
- Effective Natural Area Management
- EPBC Strategic Assessment

The Priority Projects and Priority Initiatives have been prioritised and will become the basis for a five year Regional NRM Program, noting that further work on the scope of the projects is required through an agreed process with member Councils. The role of the South West Group and the collaborative arrangements with member Councils will need further articulation, however it is likely that variable roles will be required for the South West Group to work with other stakeholders (e.g 'coordinator', 'facilitator' or 'partner')

## **8. NRM GOVERNANCE AND FUNDING**

Funding for regional NRM work in its broadest sense could come from a range of sources and organisations at the local, state and national level. It is likely that some level of 'core' funding will be required from the member Councils to support regional NRM activities.

Grant funding is also likely to feature strongly in progressing regional NRM activities and there are existing funding programs for specific purposes such as climate change, or carbon sequestration, or saving rare and endangered species and habitat reconstruction. It is anticipated that a key regional NRM role will be aimed at identifying and securing external funding for regional NRM activities. This could be done in partnership with State Government agencies or regional bodies such as Perth Region NRM.

The South West Group TargetOn platform provides a suitable online environment to further develop regional projects and collaborate with member Councils, community groups and regional stakeholders.

## **9. NEXT STEPS – RESOURCES TO IMPLEMENT THE STRATEGY AND NRM PROGRAM**

Subject to the South West Group Board and member Councils agreement to proceed with the Regional NRM Strategy and Regional NRM Business Plan, a number of steps will be required to develop, endorse and implement the Regional NRM Strategy, including:

**April 2013** - South West Group Board provides in principle support for the Regional NRM Strategy and Business Plan and refers the proposal to member Councils for consideration of resources and funding for 2013/14 and beyond.

**May 2013** – Member Councils are fully briefed and consider funding and resources to implement Regional NRM Strategy and NRM Business Plan, based on a draft 5 year Regional NRM Program.

**June 2013** – Agreement and funding commitments achieved to proceed with implementation of the NRM Strategy based on the 5 year Regional NRM Program

**July to September 2013** – Securing of resources to implement the first stages of the Regional NRM Program

**October 2013 onwards** – Implementation of Regional NRM Program

The NRM Program is proposed as a rolling five year program that is reviewed annually, in consultation with member Councils, to ensure that desired outcomes and project objectives are achieved and future activities are fully supported.



# Draft South West Group Regional NRM Strategy

## 1. PURPOSE

The South West Group Regional Natural Resource Management (NRM) Strategy sets out a vision for the landscapes and natural assets of the South West Metropolitan Region that contains diverse and valued natural areas. The Regional NRM Strategy seeks to work with the State and Federal Governments, industry and the community to create and sustain a landscape with a wide range of natural and green areas that will underpin community well-being and conserve important biodiversity now and for future generations

The Regional NRM Strategy links strongly to the Green Network, which is one of three Structural Elements identified in 'Directions 2031 and beyond' (WAPC and Department of Planning, August 2010). Directions 2031 is the key strategic document that will drive future planning and development in the Perth and Peel Regions. The Green Network is described as a *“network of parks, reserves and conservation areas that support biodiversity, preserve natural amenity and protect valuable natural resources”*. It is important for the South West Group and its member Councils to support and engage in the planning processes that will identify and implement the Green Network.

The other important initiative that will complement the establishment of the Green Network is the Environmental Protection and Biodiversity Conservation (EPBC) Act Strategic Assessment of the Perth Peel region, which is based on the land uses identified Directions 2031. This joint initiative between the Commonwealth and State Governments will identify the natural areas with high biodiversity conservation values that should be protected and managed as part of the landscape. The EPBC Act Strategic Assessment is intended to streamline environmental approvals and will be implemented through Sub-regional Structure Plans and amendments to the Metropolitan Region Scheme and Local Planning Schemes.

These key planning and environmental initiatives will set the form of land use and management in the South West Metropolitan Region for many years to come and provide a great opportunity for the South West Group to achieve a desired landscape vision for the region. These initiatives will also strongly influence the future NRM activities in the region and be important inputs in the development and implementation of the Regional NRM Strategy. It is logical for the South West Group Regional NRM Strategy to integrate with, and build upon, the Green Network identified in Directions 2031 and the results of the EPBC Act Strategic Assessment.

## 2. THE SOUTH WEST GROUP

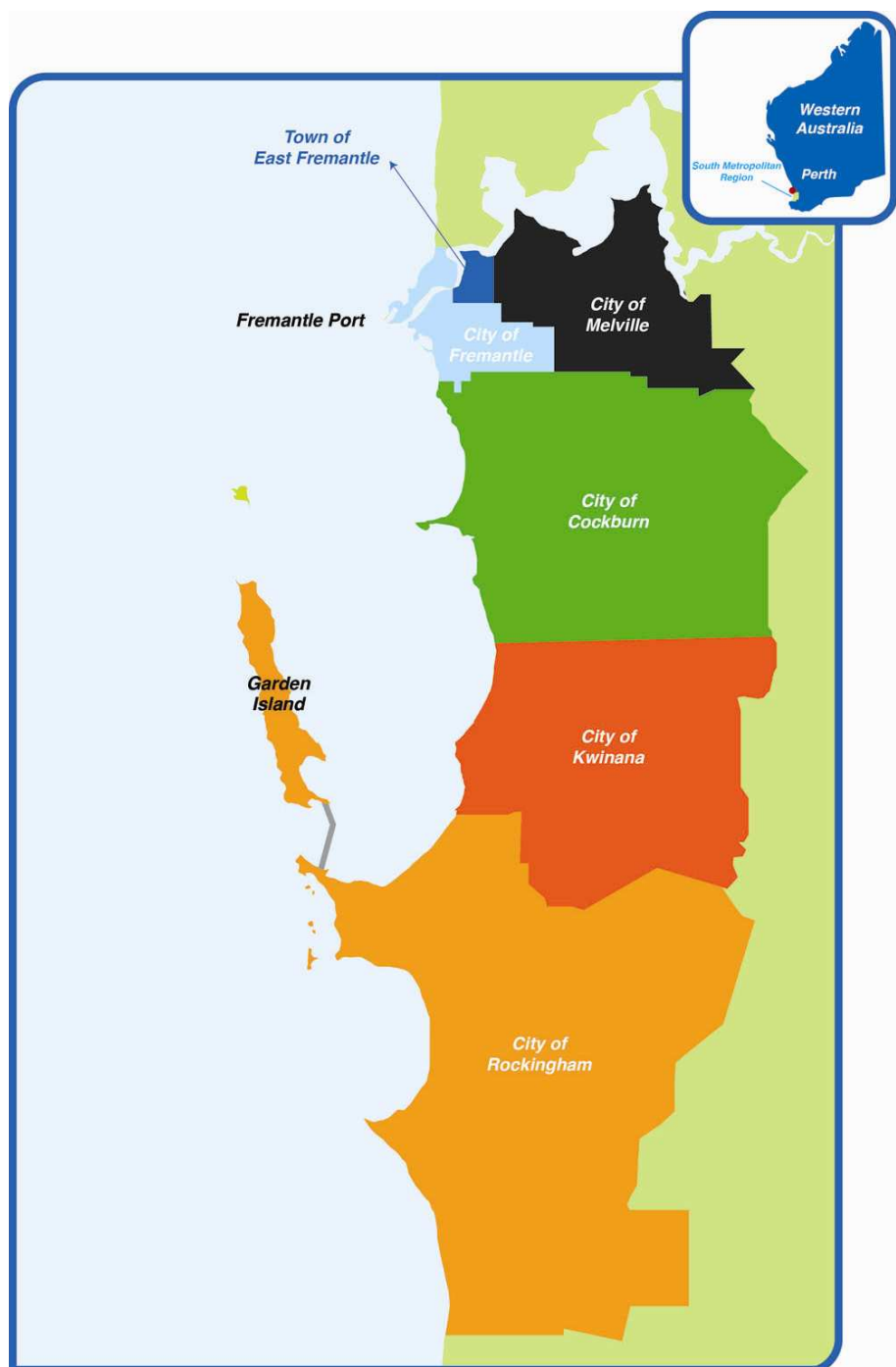
The South West Group, formed in November 1983, is a Voluntary Regional Organisation of Councils (VROC). It comprises the Cities of Cockburn, Fremantle, Kwinana, Melville and Rockingham and the Town of East Fremantle, and is managed by a Board consisting of the Mayors and CEOs of the member Councils. The South West Group seeks to work with the six Councils and through cooperation with industry, community and the other spheres of government to capture a wide range of opportunities to enhance economic growth as well as supporting a diversity of quality lifestyles in an enviable environmental setting. Figure 1 is a map of the area covered by the South West Group which is the South Metropolitan Region (the region).

South West Group Vision in the Strategic Plan is:

*Local Governments in South Metropolitan Perth, through cooperation with industry, community and the other spheres of government will capture a wide range of opportunities to enhance economic growth, promote a resilient economy as well as supporting a diversity of quality lifestyles whilst servicing and sustaining cohesive, productive communities in an enviable environmental setting.*

This Regional NRM Strategy contributes toward the *“enviable environmental setting”* and provides the opportunity to translate the vision into whole of landscape outcomes that can be implemented through

a partnership approach with member Councils, the Australian and State Governments, industry and other regional stakeholders.



**Figure 1 - South West Metropolitan Region**

The South West Group Strategic Plan identifies seven Goals: Regional Governance, Transport, Economic Development, Socio-Economic Development, Management of the Natural and Built Environment, Coordinated Municipal Services and South West Group Management. The Management of the Natural and Built Environment Goal is:

*“To provide leadership in the recognition of the values of both the natural and built environment whilst supporting sustainable management for the benefit of current and future generations”.*

This Goal, together with the associated Objectives and Strategies, has set the pathway for the preparation of the Regional NRM Strategy. The South West Group Strategic Plan, Objectives and Strategies for the Natural and Built Environment are as follows:



## Objectives

- To support the effective management of marine and coastal resources as well as sustaining estuarine and inland environments
- Further development of the region's natural attractions to support tourism and the enjoyment by the local communities whilst maintaining the integrity of these environmental assets

## Strategies

- Promote waste minimisation, energy conservation and water management through planning, design, coordination, education, awareness and project activities
- Ensure environmental values are considered and rehabilitation opportunities progressed in major development proposals
- Prepare regional strategies for recreation, environmental use and management and sustainable use of regional resources
- Monitor active policy areas such as climate change, emission trading schemes and coastal management for funding opportunities to ameliorate the impacts of climate change on the region
- Seek to improve linkages between the areas comprising the Beeliar Regional Park, the Kwinana Industrial Area Buffer and the Rockingham Lakes Regional Park and promote greenways in the development of the region

From an economic perspective, the region is very important for the State with around \$28 billion gross regional product and contributing \$30 million annually to the State's economy. The Western Trade Coast, which covers all of the industrial areas in the Cities of Cockburn, Kwinana and Rockingham, produces \$15.5 billion output annually and directly employs about 11,600 people. There are a range of new developments proposed for the region including at least one new port, a number of industrial areas, including Latitude 32 with a large inter-modal transport hub and new urban developments along the coast and the Perth Mandurah railway. As a result, there will be an estimated investment of \$1 billion annually in development over the next 20 years.

### ***The South West Metropolitan Region – Natural Resources and Conservation Values Snapshot***

Importantly, the region has many valuable natural areas that are widely recognised for their conservation value, including:

- Two RAMSAR wetland associations (Thompsons Lake and Becher Point Wetlands)
- Coastal environment and near shore reefs stretching from Fremantle to Rockingham, including Garden Island, Penguin Island, the Shoalwater Marine Park and the Becher Point Sanctuary Zone
- The Swan and Canning Rivers, including the Alfred Cove Marine Park and shoreline sanctuary
- The Beeliar and Rockingham Lakes Regional Parks and the Port Kennedy Scientific Park
- The Jandakot Regional Park and Jandakot Mound, which is an important water supply and contains valuable wetlands and damplands.
- Over 80 Bush Forever sites and other valuable reserves and areas of natural vegetation
- Kwinana Industry Buffer Strip with its large areas of native vegetation and other areas that will be important for biodiversity and public amenity.

More information on the natural assets of the region is provided in Section 5.

The challenge then, is not only to create a vision for future landscapes and communities, but to establish coordinated and collaborative planning and management to implement South West Group's Vision, Goals and Objectives. The Regional NRM Strategy sets out to achieve the South West Group Strategic Plan Vision through its own NRM objectives and strategies.

## **2.1 NRM Strategy Objectives**

- 1) Identify the regional values of natural areas and work actively with member Councils and other stakeholders to conserve and manage important natural areas as part of a whole of landscape and collaborative approach.
- 2) Establish cooperative working relationships and business processes across the member Councils and with key stakeholders to ensure an integrated and sustainable approach to regional NRM activities.
- 3) Develop Priority NRM Projects and Initiatives that will achieve the landscape vision, including better coordination and management of regionally important natural areas.

## **2.2 NRM Strategy Strategies**

- 1) Establish governance arrangements across the South West Group member Councils to provide high level coordination and collaboration.
- 2) Establish and maintain strong partnerships with key stakeholders to ensure the South West Group's NRM landscape vision, goal and objectives are understood and adopted.
- 3) Identify Priority Projects across the South West Group area and the stakeholders that need to be engaged to implement the landscape vision developed through the Green Network.
- 4) Identify Priority Initiatives that support and enhance the NRM coordination, sustainable land use planning and the implementation of the Green Network.

## **3. STRATEGIC PLANNING CONTEXT**

There are two overarching planning and conservation initiatives that will establish land use and management in the Perth Peel area and their outcomes will strongly influence the South West Group's Regional NRM Strategy, namely:

- The Environmental Protection and Biodiversity Conservation Act (EPBC Act) Strategic Assessment of the Perth Peel region, being jointly carried out by the Australian and State Governments.
- Sub-regional Structure Planning being led by the Department of Planning

The aim of the EPBC Act Strategic Assessment is to align Federal and State environmental approvals to 'streamline' development approvals. In a parallel process, the National and State values determined from the Strategic Assessment will be tested against the Sub-regional Structure Planning to identify areas requiring conservation, able to be developed or requiring greater negotiation or investigation. The implementation of these initiatives will impact on current and future zoning and land use in the Metropolitan Region Scheme and member Council Local Planning Schemes.

The following sections summarise the elements of the EPBC Act Strategic Assessment and the Sub-Regional Structure Planning that will be important for the South West Group Regional NRM Strategy.

### **3.1 Environmental Protection and Biodiversity Conservation Act Strategic Assessment**

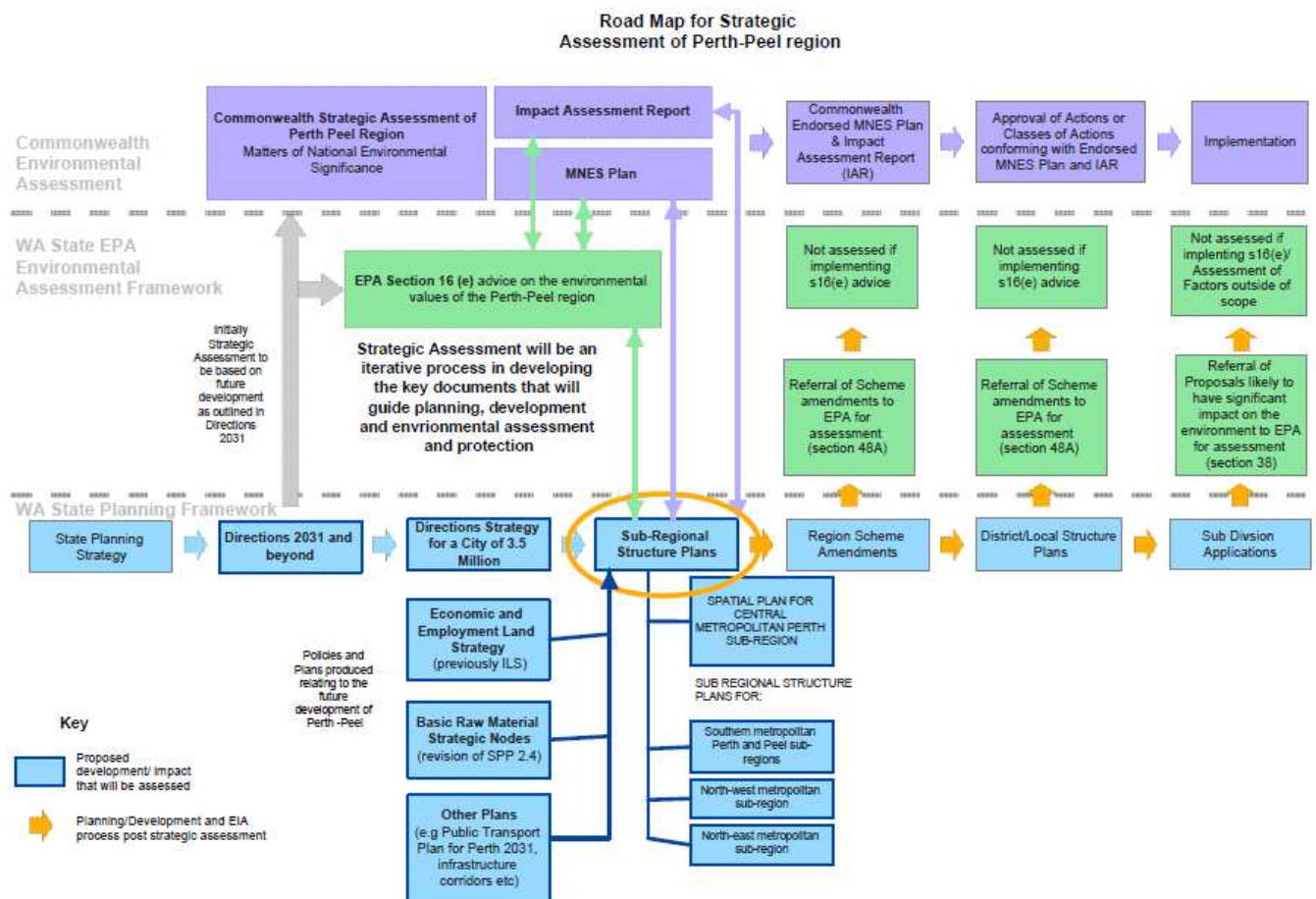
The EPBC Act Strategic Assessment and linked Sub-regional Structure Plans for the Perth Peel area of some 9,000 Km<sup>2</sup> will have a major influence on future land use and development in the Perth Peel region, including the South West Metropolitan Region. The aim is to align Federal and State environmental approval processes and clarify where future development can occur together with the areas that should be conserved and managed for their natural values and public amenity. Figure 2 is

a 'Road Map' from the Department of Premier and Cabinet website showing the process for the Strategic Assessment from identifying the environmental values through to implementation.

The three main outputs resulting from the EPBC Act Strategic Assessment will be:

- The Matters of National Environmental Significance (MNES) Plan
- An MNES Impact Assessment Report
- Section 16 (e) advice from the Environmental Protection Authority (EPA) on the issues of State significance to the State Government.

The central role of Sub-regional Structure Planning can be seen at the centre of the diagram.



**Figure 2 – Road Map of the Strategic Assessment Process (Department of Premier and Cabinet website)**

The EPBC Act Strategic Assessment commenced in early 2012 and was formalised in August 2012 following the signing of the final Agreement and Terms of Reference by the State and Australian Governments. Testing of the environmental and natural values that arise from the EPBC Act Strategic Assessment against the Sub-regional Structure Planning is being undertaken iteratively to identify land use issues, such as the supply of basic raw materials, the impact of future infrastructure corridors and the scale of environmental offsets that will be required. This work will also identify studies that need to be completed ahead of development proposals to facilitate improved and more streamlined approvals.

It is clear from even a cursory examination of the Strategic Assessment process, and its links to statutory planning at all levels, that Local Government will be intimately involved, particularly in the implementation phase. Local Government will inherit additional funding through rates as a result of accommodating population growth, but also will need to meet additional costs in managing many of

the conservation assets and offset areas that are created as a result of development and outcomes of the EPBC Act Strategic Assessment.

A Stakeholder Reference Group was established by the Department of Premier and Cabinet in November 2012 to oversee the EPBC Act Strategic Assessment and includes Local Government representation.

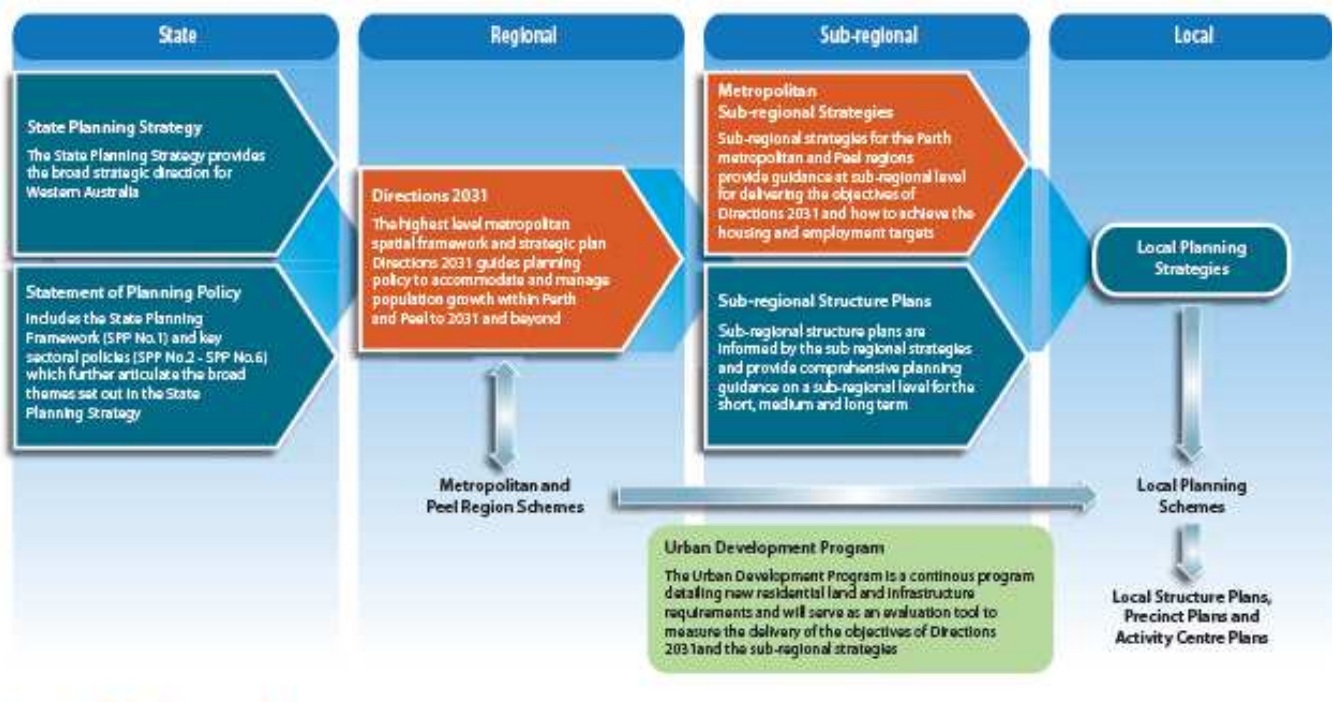
While there will be costs that arise on the outcomes of the EPBC Act Strategic Assessment, there will be new opportunities for Local Government to be involved in offset management, rehabilitation of natural areas, carbon sequestration, collaborative management of Regional Parks and adjacent reserves, and the active involvement in the establishment of ecological links.

### 3.2 Directions 2031 and Sub-regional Structure Planning

The Sub-regional Structure Planning is the level where the outcomes of the EPBC Act Strategic Assessment will be translated into a planning response. The Sub-regional Structure Plans will set future land use and management for many years.

#### *Directions 2031 and Beyond*

The broad strategic planning context, as set out in 'Directions 2031 and beyond' (WAPC/Department of Planning, 2010), as shown in Figure 3 establishes the relationship between the State Planning Strategy and Statements of Planning Policy through Sub-regional Strategies and Sub-regional Structure Plans to Local Planning Strategies, Local Planning Schemes and Local Structure Plans.



**Figure 3 - Strategic Planning Context (Directions 2031 and beyond)**

Figure 3 emphasises the integral role of Local Governments through their Local Planning Strategies, Local Planning Schemes, Local Structure Plans, Precinct Plans and Activity Centre Plans.

One of three Structural Elements in Directions 2031 is a Green Network, which is described as “A network of parks, reserves and conservation areas that support biodiversity, preserve natural amenity and protect valuable natural resources” (refer to Figure 4),



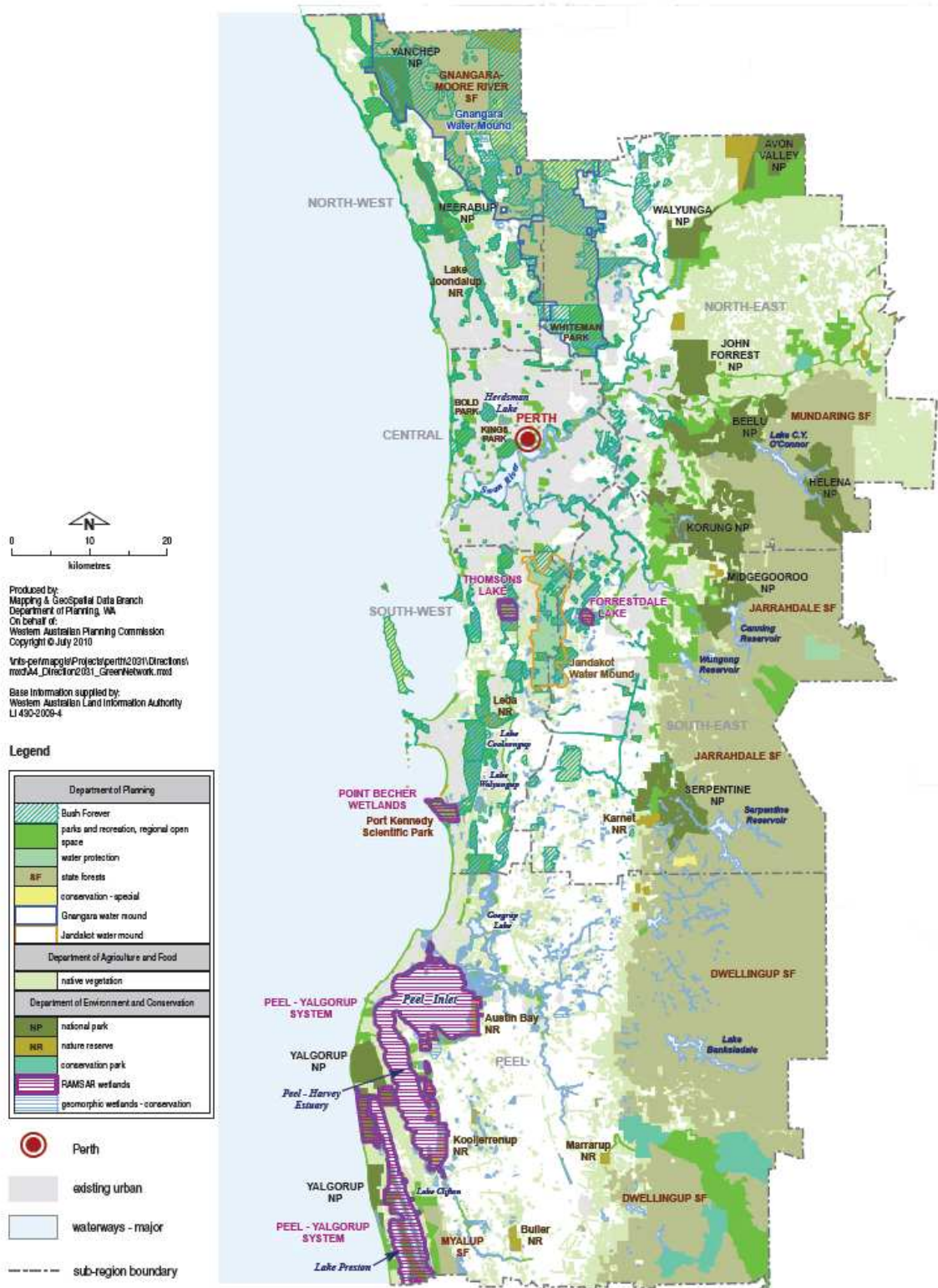


Figure 4 – Elements of the Green Network, (Figure 9 in Directions 2031 and beyond)

Under the Themes and Strategies in Directions 2031, the component that incorporates the Green Network is termed “A sustainable city”, which states:

*“We should grow within the constraints placed on us by the environment we live in.”*

It includes the following elements.

- Protect our natural and built areas
- Protect and manage significant biodiversity areas

- Protect matters of national environmental significance
- Protect water resources
- Protect our coastline
- Mitigate and adapt to climate change
- Reduce waste generation and encourage reuse and recycling
- Improve air quality
- Expand and enhance our open space network
- Integrate natural resource management into land use planning

The Green Network and its elements provide a framework to implement the Regional NRM Strategy and to positively contribute toward the South West Group's landscape and community vision.

### ***Sub-regional Strategies and Structure Planning***

The Sub-regional Strategies and Structure Plans are key mechanisms to implement Directions 2031 and provide the next level of detail to show the spatial relationships between future land use, conservation and development. The Central Sub-regional Strategy covers the northern member Council municipalities (Fremantle, East Fremantle, Melville) and the South West Sub-regional Strategy, which includes the southern member Councils (Cockburn, Kwinana, Rockingham) forms part of the Outer Metropolitan Perth and Peel Sub-regional Strategy (WAPC and Department of Planning, August 2010). The Sub-regional Strategies primarily focus on population growth and how this will be accommodated in each Sub-region, including infrastructure, dwelling densities, activity centres and economic development.

The next level down from the Sub-regional Strategies are the Sub-regional Structure Plans, which are also strategic level documents intended to provide a flexible picture of future land uses and infrastructure requirements to meet the long term needs of the community. The Sub-regional Structure Plans are intended to provide an increased degree of certainty and spatial determination of future land uses.

The South West Metropolitan Region will be split by the Central Sub-regional Structure Plan (Fremantle, East Fremantle, Melville plus others) and South Metropolitan and Peel Sub-regional Structure Plan (Cockburn, Kwinana, Rockingham plus others).

The process for completing the Sub-regional Structure Plans is a vital step to establish the form of future development, landscapes and communities. The Sub-regional Structure plans will incorporate the outcomes of the EPBC Act Strategic Assessment for the Perth Peel area and be a key plan in shaping the Metropolitan Region Scheme and Local Government Local Planning Strategies and Local Planning Schemes.

Local Planning Strategies offer a finer level of detail and establish the strategic direction and vision for land use for each Council area by:

- Providing the link between the district level strategic planning and regional policy.
- Providing the rationale for the zones and provisions of local planning schemes.
- Having a recognised status in the Western Australian Planning system.
- Providing a decision-making framework for scheme reviews, amendments, subdivision and development.

Local Planning Schemes are the statutory planning instrument to effect the Council Strategic Plan and Local Planning Strategy provisions into the planning process and provide the basis for land use decisions, including zoning, development, conservation, amenity and subdivision.

The Local Planning Strategies and Local Planning Schemes are therefore important tools for protecting landscapes and influencing the Regional NRM Strategy.



## **Capital City Planning Framework**

The Central Metropolitan Perth Sub-regional Strategy (WAPC and Department of Planning, August 2010) focuses primarily on housing, urban growth employment and infrastructure, with limited reference to the 'Sustainable Theme' in Directions 2031 and the Green Network. It is recognised that the Green Network is made up of a series of parks, lakes, wetlands and waterways all of which contribute to biodiversity, landscape amenity and public open space.

The recently released Capital City Planning Framework (WAPC and Department of Planning, February 2013) covers a smaller core area within the Central Sub-region) and addresses the environment, sustainability, climate change, water and energy conservation, and the Green Network to a much greater extent than the preceding planning documents. The framework begins with a Vision adapted from 'Directions 2031 and beyond':

*“Central Perth will be a world class liveable central city; green, vibrant, compact and accessible with a unique sense of place.”*

The 'Physical Framework' of the city covers eleven key concepts, the first of which is a 'Reconceived Setting':

*“The setting for central Perth is to be reconceived as a world class multifunctional green network, shaped by the city's sense of place, providing benefits to people and wildlife and showcasing our unique city-scapes and biodiversity.”*

The Capital City Planning Framework sets out a vision and process that shows the central place of the environment, natural resource management and public amenity in future planning and development. It is inferred that this approach should be extended to the other Sub-regions which include the growing peri-urban Local Governments with city centres.

The Capital City Planning Framework identifies the need for collaborative partnerships with Local Government and outlines the importance of a well managed natural environment for the health and well-being of the community and for wildlife. The Framework represents a whole of landscape and community approach, which would benefit by being extended to the other Sub-regions through the Sub-regional Strategies and Structure Plans.

An important aspect of the Framework from the perspective of the Regional NRM Strategy is the idea of linking green spaces and trails, biodiversity and the urban tree canopy to produce the Green Network. This is a highly urbanised approach to the Green Network and is relevant to the northern South West Group member Councils and city centres in the South West Metropolitan Region.

## **4. A REGIONAL NRM FRAMEWORK**

The member Councils have been actively involved in NRM and environmental activities over many years, however there has been limited work done collaboratively between the member Councils and therefore it is important to establish an agreed regional NRM framework. The framework needs to establish a common base, whilst recognising the existing NRM structures operating at regional and local levels.

Perth NRM Region (PRNRM) was established some years ago as one of 56 Regional NRM groups across Australia, which includes the six regional NRM groups in Western Australia. PRNRM developed the Swan Region Strategy for Natural Resource Management (December 2004) and, with the other regional NRM groups, is currently reviewing the Strategy to take account of changing Australian Government NRM and environment programs. The South West Group NRM Strategy could become part of the new PRNRM Regional NRM Strategy.

The Western Australian Local Government Association (WALGA) plays a strong role in NRM through its Environment and Waste Management policy area, which covers:

- Climate Change
- Natural Resource Management
- Biodiversity
- Water Management
- Native Vegetation Management
- Waste and Recycling
- Swan Canning Policy Forum

Important work that directly supports the South West Group Regional NRM Strategy has been the work undertaken by WALGA on the Perth Biodiversity Project (PBP) and the Perth Biodiversity Framework for Local Biodiversity Conservation. The former work supports the development of Local Biodiversity Strategies by Councils, which can be given statutory backing in Local Planning Schemes.

The Perth Biodiversity Framework builds on the vegetation condition and mapping work undertaken by PBP through the provision of a 'planning tool' to identify valuable natural assets requiring conservation and those at risk of being lost through development. This mapping and planning tool is being applied on a regional level by the South West Group member Council areas and will form a key resource in the development of the Regional NRM Strategy.

#### **4.1 Defining the NRM business**

There are a number of definitions and approaches to NRM, as well as its strong link to sustainability, the essence of which is well encapsulated in the *Western Australian State Sustainability Strategy definition*:

*... meeting the needs of current and future generations through integration of environmental protection, social advancement and economic prosperity.*

The problem with this definition and others is that they do not relate well to the type of work involved in NRM.

A key step in the development of an NRM Strategy or Plan, especially where a number of organisations need to work together, is to define the work that is planned to be undertaken in practical terms.

A report published by Perth Region NRM (Integrating NRM into Local Government Core Business, November 2008), used work undertaken by the Australian Bureau of Statistics (ABS) to define a number of NRM 'Categories' and 'Activities' as set out in Appendix 1. Appendix 2 provides more detail on how the list of categories and activities was derived.

This approach and definition allowed Perth Region NRM to analyse the NRM work of four individual Local Governments and two regional Councils to determine which categories and activities were being undertaken and the Local Government structural and organisation arrangements that supported and coordinated the NRM work.

Perth Region NRM also used the survey to clarify what 'integrated NRM' meant in a Local Government context as:

- Integration through strategic and business plans so that NRM is clearly reflected in operations and budgets.
- Integration into a Local Government's process for statutory land use planning in a way that shows the place of NRM and sustainability in all development and land use decisions.
- Integration across operational and business units within a Council.
- Integration across boundaries between adjoining Councils and catchments.

## 4.2 Council NRM Framework

The South West Group administers the South West Reference Group (SWRG), which was established to provide advice and direction on the management of natural resources and the environment across the South West Metropolitan Region. The SWRG utilised this 'integrated NRM model' to map all of the NRM business activities across the six Councils as a key input into the Regional NRM Strategy. This was done through a number of meetings and discussions with member Council officers. The exercise proved particularly useful in understanding the scope of work and plans being developed and implemented by the member Councils in the South West Metropolitan Region.

Figure 5 shows the Council NRM Framework that was used by the South West Group to map the NRM business across each member Council from the Strategic Community Plan to the 'NRM plans', including relationship with the corporate structure and into the statutory and non-statutory planning processes. Importantly this analysis showed that the work at an operational level could be aggregated into four 'NRM themes' namely:

- Theme 1 - Green Network;
- Theme 2 - Water;
- Theme 3 - Climate Change; and
- Theme 4 - Sustainable Development.

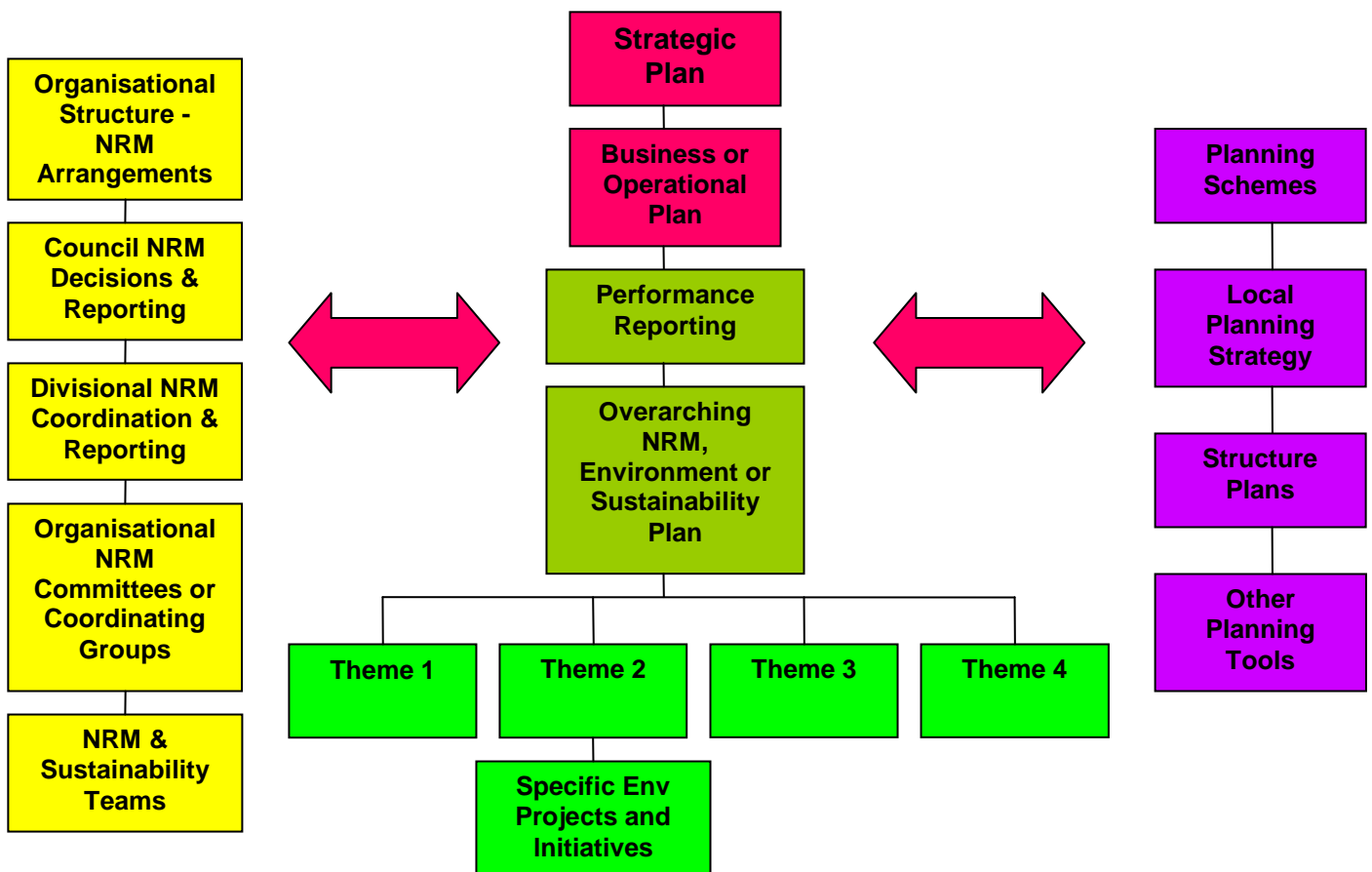


Figure 5 – South West Group Council NRM Framework to map NRM Business

Increasing the extent that the member Councils work together, should lead to greater integration, cross boundary efficiencies and the ability to attract more funding and resources for the implementation of projects and other work across landscapes and communities. Further, this integrated approach should be able to be transferred to new local government structures that may result from any proposed changes associated with the Perth Metropolitan Area Local Government

### 4.3 Regional NRM Framework

Based on the NRM mapping undertaken across the South West Group member Councils, a Regional NRM Framework was developed as shown in Figure 6. The Regional NRM Framework has incorporated the four Themes from the member Council framework to provide consistency and compatibility. For each Theme, examples of the work undertaken by Councils have been listed, which then lead to identification of specific Council Actions.

The full extent of NRM work being undertaken by member councils has been captured and will be available in the NRM information management system, South West Group TargetOn. Finally, the framework includes Regional Actions which relate to the type of work that could be undertaken through a collaborative approach involving the South West Group member Councils working across boundaries.

The Regional NRM Framework allows Priority Projects and Priority Initiatives to be further identified, developed and prioritised to establish a Regional NRM program. The NRM Program would identify the required resources and budgets and be a key outcome of both the Regional NRM Strategy and the Regional NRM Business Plan. The process for identifying and gaining agreement on regional NRM priorities should be undertaken in collaboration with the member Councils and key stakeholders as discussed in Section 6.

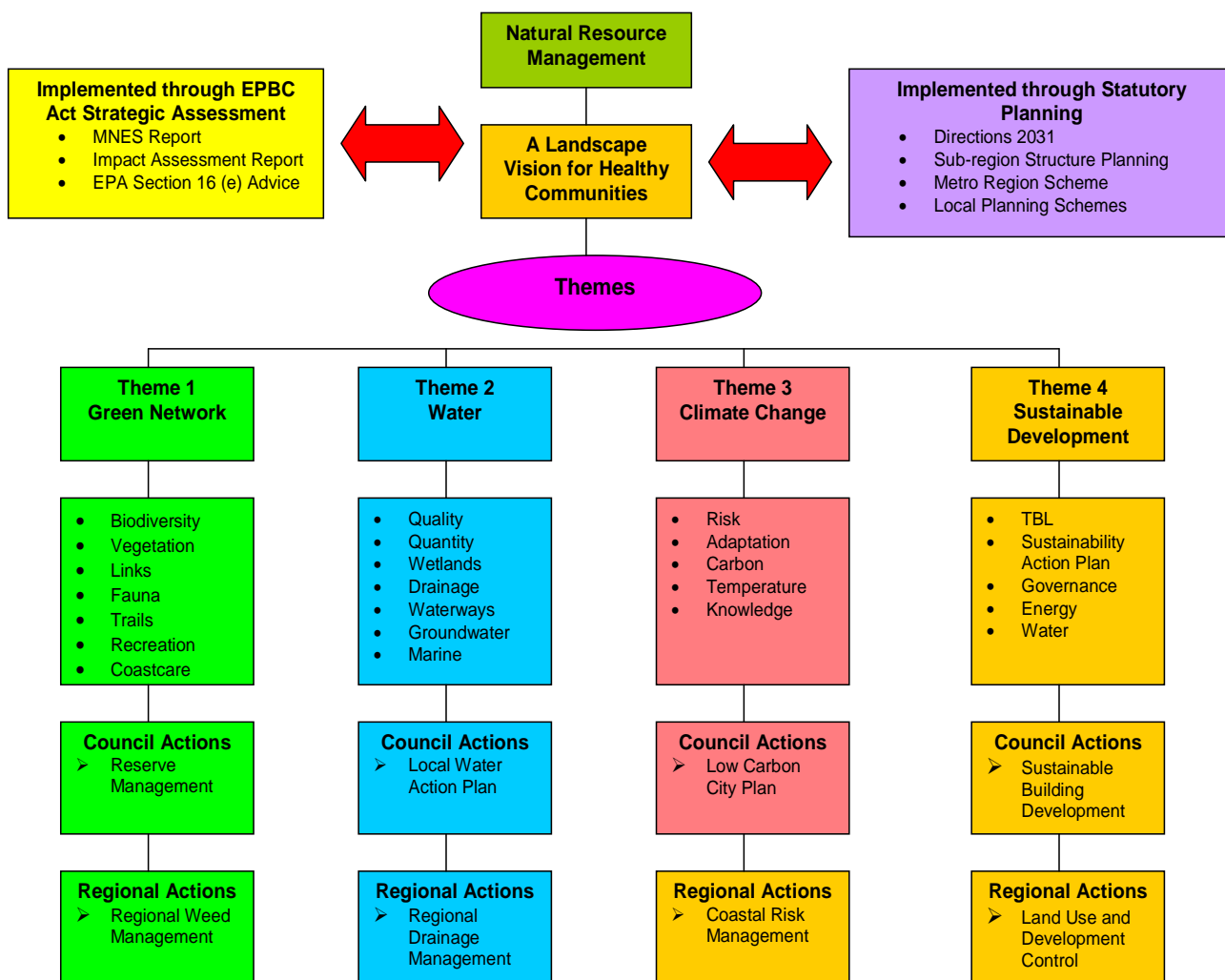


Figure 6 – South West Group Regional NRM Framework

## 5. KEY LANDSCAPE ELEMENTS AND VALUES

The purpose of this section is to briefly describe the natural values of the South West Metropolitan Region and then set out a model for how these areas can be managed in a coordinated way to implement the 'regional priority projects' and support the work of the member Councils to achieve the landscape vision for healthy communities. In particular, it shows how the South West Group of Councils can engage with the Australian and State Governments to identify a way to work together collaboratively in the management of important natural areas requiring a coordinated regional approach.

### 5.1 Natural Values in the South West Metropolitan Region

The South West Metropolitan Region contains an outstanding range of natural areas ranging from internationally significant wetlands to nationally significant areas and areas with State and regional values. Many areas are conserved and managed by State and Local Government, noting that large areas of valuable native vegetation still exists on private land. Together, these areas make up the Green Network in 'Directions 2031 and beyond' as shown in Figure 4 and the outcomes of the EPBC Act Strategic Assessment are expected to emphasise the value of natural areas from a biodiversity conservation perspective and identify measures for their protection and management.

Two of the 12 **Ramsar Wetlands** in Western Australia occur in the Region, the Becher Point wetlands and Thomsons Lake, which together with Forrestdale Lake is Ramsar Site No. 35. Figure 7 shows the Becher Pint Wetlands in relation to other nationally important wetlands and the many other wetlands in just part of the Region. Thomsons Lake is just over 5 kilometres to the north and is part of the same string of wetlands and is managed as a Nature Reserve by Conservation Commission of WA.

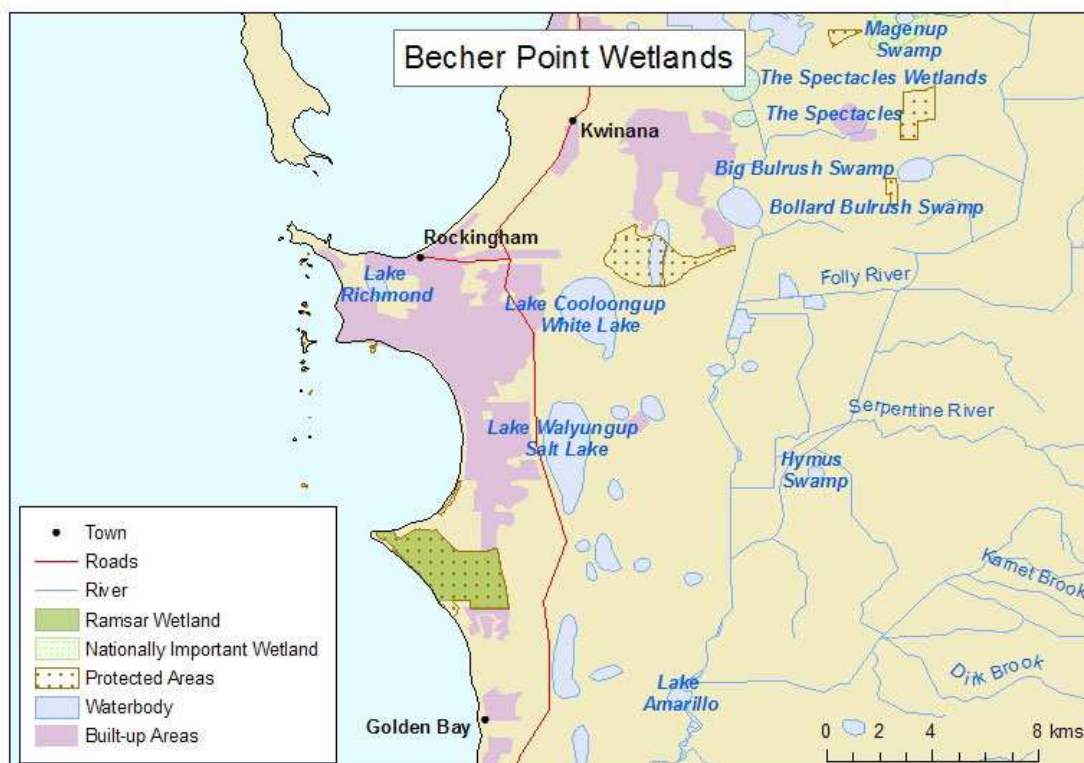


Figure 7 – Becher Point Wetlands Australian Ramsar Site No. 54

There are three Regional Parks in the region being Beelias, Jandakot and Rockingham Lakes. Regional Parks are areas of Region Open Space that are identified by planning procedures as having regionally significant conservation, landscape and recreation values. Regional Parks are a land management category which provides the opportunity for a coordinated planning strategy by different land management agencies and private land owners. Rockingham Lakes is to the north of Becher Point and epitomises the different land types and managers, as shown in Figure 8. The effective



management of these areas require collaborative arrangements involving the key agencies and landowners, and as such, lend themselves toward a regionally coordinated approach.

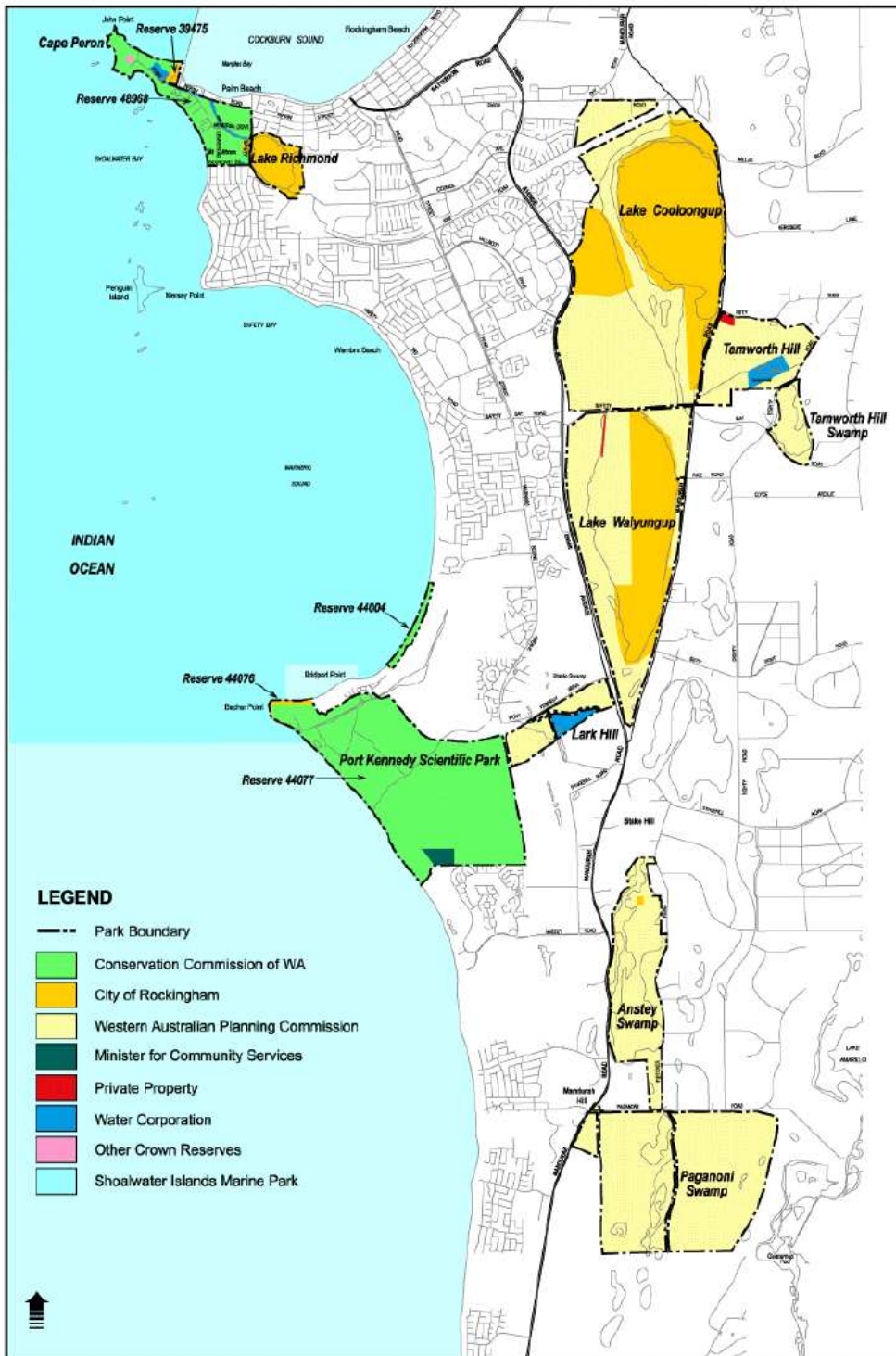
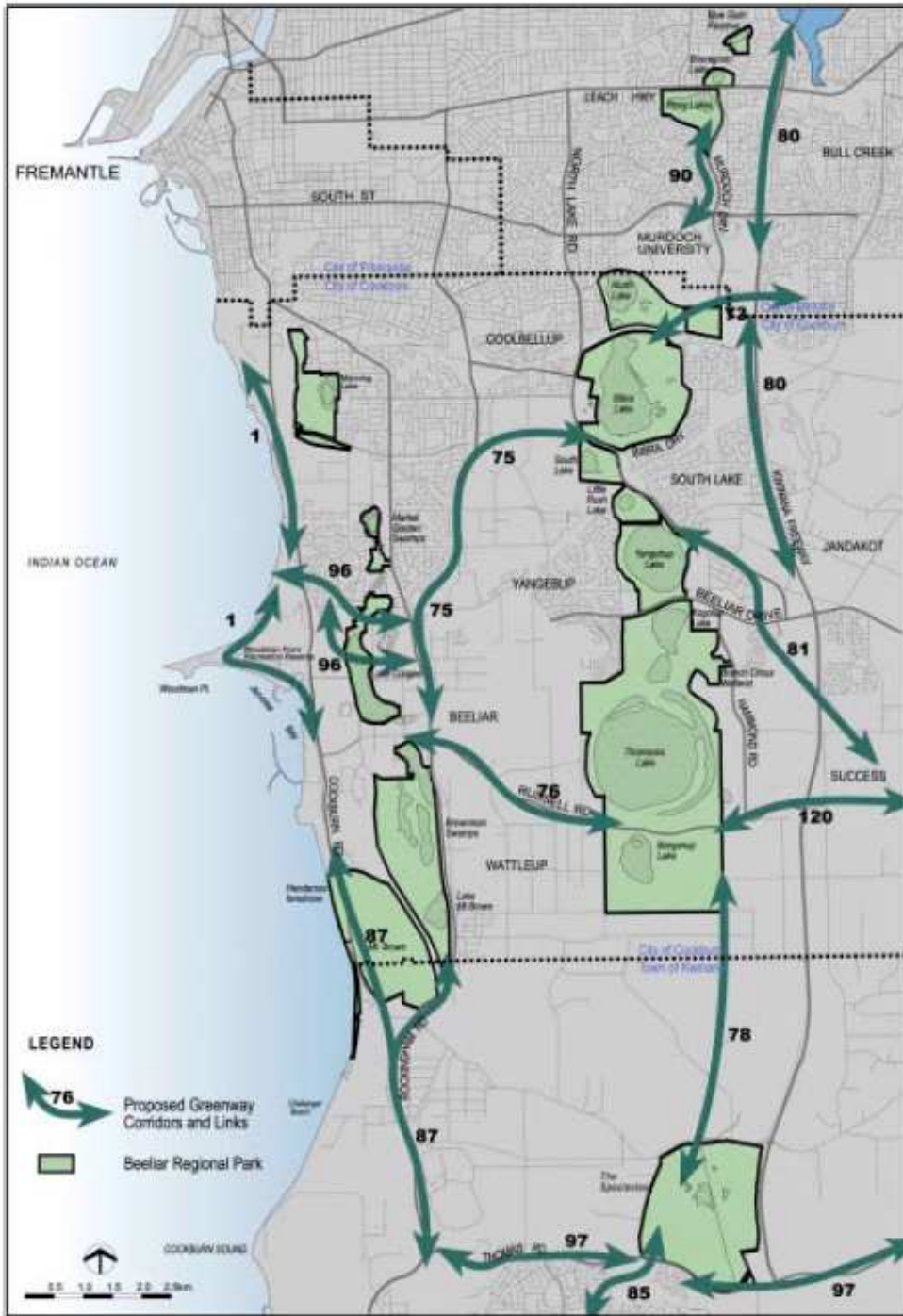


Figure 8 – Rockingham Lakes Regional Park Land Tenure (Management Plan 2010)

Jandakot Regional Park contains a similar mix of land types and tenures, but is also associated with protection of parts of the Jandakot groundwater area. Beeliar Regional Park is west of Jandakot and north of Rockingham Lakes and borders the Kwinana Industrial Area and Australian Marine Complex. Figure 9 shows the areas that form the Beeliar Regional Park and “Greenway Corridors and Links” proposed in the Draft Beeliar Regional Park Management Plan. This illustrates another aspect of the need to deal with whole landscapes where a ‘Park’ is fragmented across a large area with multiple owners and managers and therefore could benefit through a regional coordinated approach.





Source: Tingay and Associates (1998).

**Figure 9 – Beelihar Regional Park Proposed Greenway Corridors and Links (Draft Management Plan 2001 – 2011)**

Marine Parks and reserves are another important part of the landscape and the South West Metropolitan Region has a number of valuable areas. Part of the Swan Estuary Marine Park and adjacent Nature Reserve is found at Alfred Cove in the City of Melville. The City of Rockingham has the Shoalwater Marine Park with Sanctuary and Special Purpose Zones, while further north the Cockburn Sound Management Council works with Local Government, industry, the community and the Department of Defence (Australian Navy) to collaboratively manage Cockburn Sound.

While the Ramsar Wetlands and Regional Parks contain valuable wetlands and vegetation, there are many other natural areas and local reserves that are managed by Local Government. These areas form an important part of the built environment and natural landscape, with many designated as reserves in Council Local Planning Schemes. Figure 10 shows a number of reserves and conservation areas, including wetlands, managed by the City of Cockburn. The management of these

local areas, some of which have regional conservation values, are guided by Wetland and Bushland Conservation Policies adopted by Council. There may be opportunities for a regional approach to work across local government boundaries on connecting natural areas that would benefit through coordinated and collaborative arrangements with increased likelihood of attracting external funding support for on-ground works.

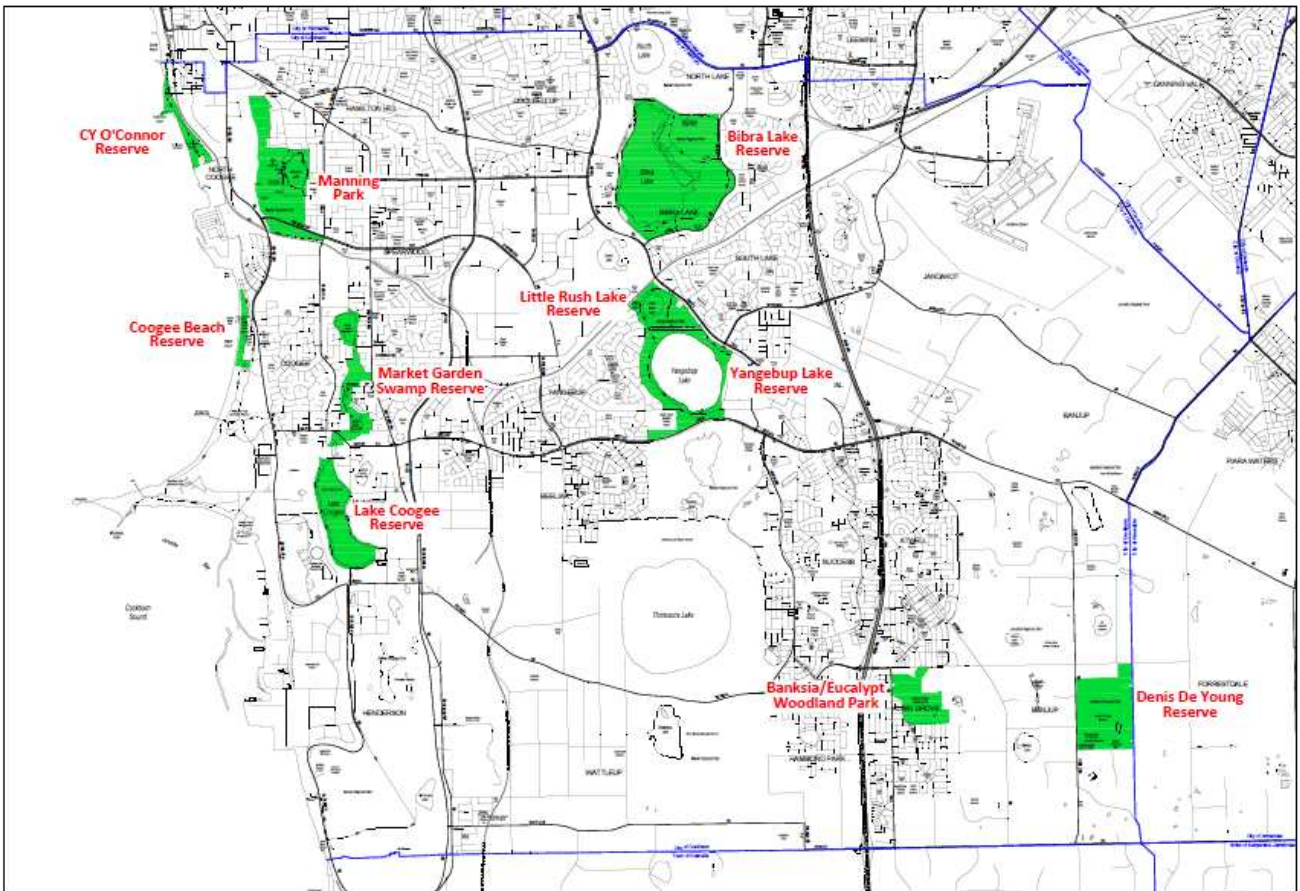


Figure 10 – City of Cockburn Reserves taken from the City of Cockburn Parks, Wetlands and Beach Guide.

## 5.2 Importance of Native Vegetation and an Integrated Approach to Biodiversity Conservation

Section 5.1 showed the importance of a range of reservations in conserving important natural areas. Fundamental to the conservation of biodiversity in all natural areas, even in marine areas, is the diversity and form of native vegetation and flora. The definition of biodiversity adopted by World Conservation Union states:

*Biodiversity generally means the variety of life in all of its forms and combinations, including ecosystem diversity, species diversity and genetic diversity.*

This is given practical expression in the Perth Metropolitan Area by trying to conserve a minimum of 10% of pre-existing vegetation complexes through existing and proposed reservation in the 'Bush Forever Program' (Ministry for Planning, December 2000). To quote from the report:

*"Bush Forever is a ten year strategic plan to protect some 51,200 hectares of regionally significant bushland in 287 Bush Forever sites, representing, where achievable, a target of at least 10% of each of the original 26 vegetation complexes of the Swan Coastal Plain portion of the Perth Metropolitan region. Of the regionally significant vegetation some 33,400 hectares already have some protection through existing reservations and/or tenure arrangements. Of the unprotected sites, an estimated 9% is privately owned within land zoned Rural (approx 4,270 hectares), Urban, Urban Deferred or Industrial (approx 330 hectares) under the*

*Metropolitan Region Scheme. The remaining 13,200 hectares is owned by governments at the State, Commonwealth or local level and most of this is zoned for public purposes in the MRS.”*

While these figures have changed since 2000, the principle of taking a holistic approach to conserving high value vegetation complexes and associated species is still relevant. In addition, it is likely that local natural areas identified by Local Government over the last decade, and outside that identified in Bush Forever, may have an elevated conservation status and may be under threat due to clearing and loss of vegetation complexes since 2000.

The EPBC Act Strategic Assessment will be critical in reviewing and setting a new base for the conservation value of all natural areas, including native vegetation that is important for the protection of endangered animal species.

Carnaby’s Black Cockatoo is an example of a threatened species that has significantly influenced development in WA due to the requirement to obtain Federal and State Government environmental approvals for clearing vegetation that has the potential to impact on Carnaby’s habitat.

The EPBC Act Strategic Assessment aims to streamline the environmental approvals process and provide greater certainty regarding the protection and management of Carnaby’s Cockatoo and other species listed on the Matters of National Environmental Significance (MNES) list. The native vegetation located in the South West Metropolitan Region will play an important role in the conservation of MNES species and State listed fauna species protected under the *Wildlife Conservation Act*.

### 5.3 Comparison of the Value of Natural Areas in the South West Metropolitan Region

It has already been stated that there are a large range and type of valuable natural areas in the South West Metropolitan Region (SWMR). This section compares the number, type and area of the most valuable areas (Natural Assets) for conservation and protection of biodiversity in the SWMR to the larger Metropolitan area as set out in Table 1.

Natural Asset	Metropolitan Area Extent	South West Metropolitan Region (SWMR) Extent	Percentage in the SWMR	Notes
Bush Forever	<ul style="list-style-type: none"> <li>• 287sites</li> <li>• 51,200 Ha</li> </ul>	<ul style="list-style-type: none"> <li>• 59 sites</li> <li>• 12,232 Ha</li> </ul>	<ul style="list-style-type: none"> <li>• 20% of sites</li> <li>• 24% of area</li> </ul>	
Ramsar Wetlands	3	2	66%	There are 12 Ramsar Wetlands in WA
Conservation Category Wetlands	TBC	108	TBC	
Resource Enhancement Wetlands	TBC	64	TBC	
<b>Vegetation Complexes</b> – these are important as they contain Threatened Flora and Fauna, and Threatened Ecological Communities (TECs). There are significant areas left in the SWMR, especially in the Cities of Cockburn, Kwinana and Rockingham.				
<b>Vegetation complexes endemic to Perth and Peel with less than 30% pre- European extent remaining</b>				
Cottesloe Central and South	TBC	<ul style="list-style-type: none"> <li>• less than 30%: Cockburn and Kwinana</li> <li>• greater than 30%: Rockingham</li> </ul>	TBC	
Herdsmen		Greater than 30% Cockburn, Kwinana and Rockingham		

Natural Asset	Metropolitan Area Extent	South West Metropolitan Region (SWMR) Extent	Percentage in the SWMR	Notes
<b>Vegetation complexes with greater than 60% of pre-European extent in Perth and Peel</b>				
Bassendean complex Central and South	TBC	<ul style="list-style-type: none"> <li>Less than 30%: Cockburn and Rockingham</li> <li>Greater than 30%: Kwinana</li> </ul>	Approx 40% in SWMR	
Serpentine River	TBC	<ul style="list-style-type: none"> <li>Less than 10 %: Rockingham</li> </ul>	Approx 40% in SWMR	
Karrakatta Central and South	TBC	<ul style="list-style-type: none"> <li>Less than 10%: Cockburn, Fremantle and Melville</li> <li>Less than 30%: Kwinana and Rockingham</li> </ul>	Approx 20% in SWMR	
Quindalup	TBC	<ul style="list-style-type: none"> <li>Less than 30%: Kwinana</li> <li>Greater than 30%: Cockburn and Rockingham</li> </ul>	Approx 30% in SWMR	
Southern River	TBC	Greater than 30%: Cockburn	?	
Guildford	TBC	Less than 10%: Kwinana and Rockingham	?	
Yoongarilup	55% remaining in Perth Peel	69% in Rockingham	? – is it 69% of Perth Peel remaining	

**Table1 – Valuable Natural Assets in the South West Metropolitan Region**

The information for the South West Metropolitan Region has been broken into the ‘valuable natural assets’ for each South West Group member Council as well as for the region. Threatened Ecological Communities, Flora and Fauna are dependent on vegetation complexes and can be linked to the complexes listed in Table 1. Thus, protecting and managing vegetation complexes in specific areas and in ecological corridors are important.

To identify which areas should be retained the South West Group has worked with the WA Local Government Association to map all valuable natural areas and ecological corridors to set targets for retention and this is discussed in Section 5.4.

#### **5.4 Biodiversity Conservation Mapping in the South West Metropolitan Region**

The South West Group member Councils have been active in mapping local natural areas as part of their Biodiversity Strategies and natural area management plans to gain an understanding of the extent and ownership of native vegetation complexes in their municipality. This information complements the native vegetation areas identified and mapped in Regional Parks, Conservation Reserves and Bush Forever sites.

For the first time, the datasets for local natural areas and vegetation complexes have been brought together by the South West Group into a regional format to gain an appreciation of the conservation value of native vegetation across a regional scale landscape. This information is critical to understand conservation values from a regional perspective as they relate to the Perth Metropolitan Area and the role of the region in protecting and managing native vegetation and important fauna habitat areas into the future.

The South West Group established a partnership with the WALGA to use the detailed information from the Perth Biodiversity Project (Regional Framework for Local Biodiversity Conservation

Priorities) to map local natural areas and the extent of the vegetation complexes in the Region and in each Council area. To do this, existing mapping layers from each Council, including Local Planning Schemes and Structure Plans were combined to produce maps. The maps aim to show local natural areas (i.e. the extent of native vegetation complexes) and their associated conservation values as a key information source to determine vegetation:

- At risk of being cleared as a result of future development (urban, industrial, commercial, infrastructure, services);
- Requiring protection through reservation and other mechanisms to retain these areas as part of the landscape; and
- Requiring active management to reflect its conservation status.

Examples of the maps that were produced are listed below:

- Land use Maps overlaid with threatened vegetation communities/complexes and Bush Forever sites
- Local Planning Scheme map across the six member Councils
- Local ecological linkage maps with intersecting Reserves and threatened vegetation communities/complexes

These maps are an initial step in gaining the required understanding to make more informed decisions regarding the assessment, protection and management of native vegetation in the region. The maps contain 64 land uses and a relatively large number of 'layers' that can be combined to provide different views of the landscape, such as opportunities and constraints for conservation and opportunities to retain vegetation complexes.

Further work will be required over time to examine areas in more detail and to assist in translating regional information into local decision making on development, impact assessment and management. To assist in this process, the South West Group has developed a collaborative model for integrated landscape management.

### **5.5 A Collaborative Model for Integrated Landscape Management**

Drawing on the mapping of natural areas and ecological links identified to date, the collaborative model for integrated landscape management seeks to put into context the conservation status of natural areas in the region and the collaborative arrangements for their management. This is based on the management arrangements that currently operate.

The outcomes of the EPBC Act Strategic Assessment have the potential to change the current conservation status of natural areas in the region, thereby elevating their conservation status to a higher value that incorporates MNES factors and State level conservation requirements. This elevated status will require an adjustment to current roles and responsibilities and the collaborative arrangements required to address threatening processes affecting species protected by legislation.

The model set out in Table 2 below is a first step in outlining collaborative arrangements and also introduces the concept of biodiversity offsets, which are expected to feature in mitigation measures for high conservation value vegetation likely to be cleared due to development.

The table assists in identifying areas and roles for collaborative management based on the conservation status of a natural area or groups of natural areas, such as a Regional Park. It also takes account of situations where the value of an area potentially changes based on the outcomes of the EPBC Act Strategic Assessment.

Under some circumstances, the Australian and/or State Government may have to settle landowner compensation claims resulting from loss of development rights related to increased biodiversity conservation and protection requirements.



<b>Natural Area Conservation Status</b>		
<b>State Conservation Status</b>	<b>Regional Conservation Status</b>	<b>Local Conservation Status</b>
<ul style="list-style-type: none"> <li>Regional Parks</li> <li>Conservation Reserves</li> <li>Ramsar Wetlands (National)</li> <li>High Conservation Category Wetlands</li> <li>Rare and Endangered Species</li> </ul>	<ul style="list-style-type: none"> <li>Bush Forever</li> <li>Conservation Category Wetlands</li> <li>Threatened Ecological Communities</li> <li>Threatened Species</li> <li>Regional Open Space</li> </ul>	<ul style="list-style-type: none"> <li>Local Natural Areas not reserved</li> <li>Local Reserves</li> <li>Private Land</li> <li>Local Open Space</li> </ul>
<b>Collaborative Management Arrangements</b>		
State Government as the lead with Local Government in well defined circumstances	State Government/Local Government Partnership with clearly defined roles and responsibilities	Local Government with State Government support in defined circumstances, eg private land
<b>Outcome of EPBC Strategic Assessment and EPA Section 16(e) advice</b>		
Elevates conservation and management of some natural areas. May require compensation for development forgone	Elevation of Matters of National Environmental Significance <ul style="list-style-type: none"> <li>Higher level of management</li> <li>Opportunity for Federal/State funding</li> <li>Key areas for offsets (established bushland and rehabilitation of degraded land)</li> </ul>	<ul style="list-style-type: none"> <li>Local areas recognised as nationally/regionally significant</li> <li>Local Government able to seek Federal/State funding for management</li> <li>Compensation for landowners</li> <li>Key areas for offsets (established bushland reserves/areas and rehabilitation of degraded land)</li> </ul>

**Table 2 – Natural Area Conservation Status (preliminary model)**

It is relevant to note that the EPBC Act Strategic Assessment also opens up natural resource management opportunities for Local Government and may lead to enhanced and better coordinated management of biodiversity conservation, in parallel with streamlined planning and development approvals processes.

## **6. SOUTH WEST GROUP NRM MANAGEMENT**

It will be important for the South West Group to have the required internal processes to coordinate the NRM work so it is sustainable and works effectively for both the region and the member Councils. It will also be important to have strong relationships with external stakeholders to achieve the South West Group landscape vision and objectives. This section summarises the internal and external arrangements and relationships established through the preparation of the Regional NRM Strategy.

### **6.1 Internal coordinating arrangements – Working together across the South West Group**

- Successful formation of NRM Planning and Environment, and GIS and Information Management Coordinating Groups and meetings to begin coordination across the South West Group Councils.
- Establishment of an on-line NRM management information system, South West Group TargetOn - <http://southwestgroup.targeton.com/>, including training of officers from each Council This will allow loading of all relevant NRM information at national, state, regional and local levels into a single document management system, including maps, strategic plans, policies and spatial data.
- Establishment of Lead Councils for NRM information management (City of Melville) and GIS coordination (City of Cockburn).
- Agreement with WALGA to use the Perth Biodiversity Framework Planning Tool to map scenarios and options for future land use in the South West Metropolitan Region. This WALGA tool is being used by the Department of Planning (DoP) in its current 'planning footprint' for the



EPBC Act Strategic Assessment, pending development of a similar planning tool by DEC and the EPA. Preparation of the maps will allow the South West Group to engage with State Government agencies to actively participate in decision making about future land use and management.

- Strengthened working relationships established between member Council Environmental, Planning, GIS and Information Management staff.

## 6.2 External coordinating arrangements- Partnerships and relationships with key stakeholders

- Continued work with Department of Planning to reach agreement to work together and share information on the results of Sub-regional Structure Planning. and the links to the EPBC Act Strategic Assessment.
- Preliminary agreement with the Department of Environment and Conservation (DEC) and the Environmental Protection Authority (EPA) to share spatial data and ‘test’ land use scenarios. Both DEC and the EPA recognise the important role of Local Government in implementing the results of the EPBC Act Strategic Assessment.
- Agreement with Landgate through the WA Land Information Service that WALIS will support the South West Group with technical and collaborative support to ensure all mapping and spatial data is compatible with the Shared Land Information Platform (SLIP).
- Agreement with the Department of Water to share spatial data and information on water resources management.
- Agreement with Landcorp, Western Trade Coast, Kwinana Industries Council and Cockburn Sound Management Council to work together on planning and land use options, and share spatial data.

Table 3 lists the key stakeholders that are essential to the South West Group achieving its landscape and community vision and the purpose of each relationship.

Relationship	Purpose
<b>WAPC and Department of Planning</b>	To support strategic and statutory planning in the SW Corridor and participate in implementation of the Green Network to achieve the South West Group's NRM landscape and community vision.
<b>Environmental Protection Authority</b>	To work with EPA to gain support to develop the Regional NRM Strategy and Green Network, including mapping and implementation of the EPBC Strategic Assessment.
<b>Department of Conservation and Environment (DEC)</b>	To work with DEC to gain support and link their biodiversity mapping and policies to the Green Network, including collaborative arrangements for future management of natural areas.
<b>Department of Water (DoW)</b>	To work with and support DoW so the State and Local Government water information can be integrated to inform future land use planning and implementation of the Green Network.
<b>WALGA</b>	Develop a partnership to work with WALGA to develop the Green Network and use the Regional Framework for Local Biodiversity Conservation Priorities in the South West Metropolitan Region
<b>Australian Government</b>	Identify sources of funding and strategic links for NRM work including implementation of the Green Network, Priority Projects and Priority Initiatives.
<b>Premier and Cabinet</b>	Seek support for ‘integrated land use planning’ and implementation of the EPBC Act Strategic Assessment and Green Network.
<b>Perth Region NRM (PRNRM)</b>	To support Perth Region NRM's Regional NRM Strategy, link the South West Group NRM Strategy and work collaboratively to seek funding to implement the Green Network and Priority Projects.
<b>KIC</b>	Retain the support of KIC for the work of the SWRG and maintain strong links to implement the Green Network and the Kwinana Industry Buffer Zone.
<b>Western Trade Coast</b>	Maintain contact with the Western Trade Coast Committee to collaboratively implement the Regional NRM Strategy and Green Network in their area.

Relationship	Purpose
<b>Landcorp</b>	Landcorp is a major landowner and developer in the SW Corridor and its support is needed to implement the Regional NRM Strategy and Green Network.
<b>Cockburn Sound Management Council (CSMC)</b>	Work with the CSMC to integrate marine, coastal and land planning and studies to implement the Regional NRM Strategy and Green Network.
<b>Landgate and WA Land Information System (WALIS)</b>	Seek technical support for mapping and coordination of GIS to develop and implement the Regional NRM Strategy and Green Network.
<b>Department of Indigenous Affairs and South West Aboriginal Land and Sea Council</b>	Seek support for the inclusion of Noongar culture and links to the lands and waters they identify as 'their country' in implementation of the Regional NRM Strategy.
<b>Planning Institute of Australia WA Branch (PIA)</b>	Seek support for Integrated Land Use Planning and the Regional NRM Strategy, including a possible forum run by the PIA in partnership with the WAPC and Department of Planning. <sup>451</sup>
<b>Urban Development Institute of Australia WA Branch</b>	Seek support for preparation of the Green Network, including a collaborative approach to determining future land use and management.

**Table 3 – South West Group Regional NRM Strategy Key Stakeholders and Partners**

While these relationships have been established, it will be important in the future to strengthen them, as developing and implementing the Priority Projects and Priority Initiatives in Section 7 will depend on the formation of collaborative partnerships.

It is the development of these relationships across Council functions and strong external relationships that will provide the environment to achieve the South West Group's landscape and community vision and to successfully implement regional NRM activities.

## 7. PRIORITIES AND RESOURCES

The gathering of information and mapping of the detailed NRM work that member Councils are undertaking has been consolidated into agreed NRM categories and activities. This information gathering activity also involved seeking feedback from member Council officers on regional Priority Projects and Priority Initiatives.

- **Priority Projects** - refer to a defined activity of a specified period of time (e.g. large scale revegetation project, habitat protection/reconstruction project).
- **Priority Initiatives** - could include programs, policies or procedures that have a longer term timeframe aimed at improving regional NRM outcomes (e.g. catchment plan, regional NRM impact assessment procedures and across organisation coordinating groups).

The Priority Projects and Priority Initiatives will need to be consolidated into a Regional NRM Program that identifies resources and budget requirements. This should be done through a consultative process involving member Councils and other regional stakeholders.

A number of Priority Projects and Priority Initiatives have been put forward by the member Councils for consideration in the Regional NRM Strategy as outlined below. The South West Group is also in the process of identifying projects and initiatives based on information gathered during the development of the Regional NRM Strategy.

The regional priorities and initiatives selected for the Regional NRM Program can be loaded on the South West Group TargetOn database with existing information to provide an up-to-date NRM resource for member Councils, community and regional stakeholders.

The TargetOn platform will increase the awareness of regional NRM activities and improve the ability for member Councils to access funding and work with each other, the community and other stakeholders on priority projects and activities.

## **7.1 Regional Framework and NRM Themes**

The establishment of the Regional NRM Framework was derived from mapping the NRM business across the South West Group member Councils and identified the four NRM Themes (Green Network, Water, Climate Change and Sustainable Development) under which NRM activities can be classified.

While there were some differences between the ways each Council undertakes their NRM business activities, there were more similarities and potential synergies that could be established for cross boundary collaboration in the future. It also gives confidence that the regional NRM model can be extended to other local governments and be used in the process of Local Government structural reform.

## **7.2 Regional NRM Program**

The summary of Priority Projects and Priority Initiatives set out below are presented for initial consideration based on feedback from member Councils and information gathered during the development of the Regional NRM Strategy. It is likely that more regional priorities will be developed during the consultation phase recommended for the development of the Regional NRM Program.

The process for developing the Regional NRM Program has been initiated and includes a collaborative approach (refer also to Section 7.3 below on the prioritisation process).

Each member council will be briefed on the draft Regional NRM Strategy, NRM Business Plan and NRM Program as part of consideration for implementation as a regional initiative. The Regional Priority Projects and Initiatives that came from consultation with the member Councils will be prioritised as a first step in developing the South West Group NRM Program

### ***Regional Priority Projects***

The regional priority projects listed below are preliminary suggestions from member Councils and key regional stakeholders, with the aim of gaining an understanding on the type and scale of projects that could be undertaken on a regional basis.

Regional projects would need to demonstrate wider benefits and applicability of outcomes that would not otherwise be achieved at a local scale.

#### Cockburn Sound Coastal Alliance (CoK, CoC, CoR)

This group is coordinating investigations to better understand the implications of sea level rise on infrastructure and land uses adjacent to Cockburn Sound and Garden Island. Stakeholders include Local, State and Australian Government agencies. The City of Rockingham has a similar collaborative project, the Peron Naturaliste Partnership with the Cities of Mandurah and Bunbury and the Shires of Busselton, Capel, Dardanup, Harvey, Murray and Waroona.

#### Climate Change Adaptation (all Councils)

All of the South West Group Councils have Climate Change Adaptation plans at some stage of development and implementation and they generally cover the impacts of four main themes; sea level rise, increasing temperature, decreased rainfall and increasing storm intensity. All Councils have community support programs and are implementing emission and carbon reduction plans and strategies. While the Cockburn Sound Coastal Alliance covers the impacts of sea level rise there is a need to adopt a regional approach to the other aspects of Climate Change Adaptation, to better secure funding and improve the effectiveness and efficiency of similar programs and approaches. This Project has coordination elements as well

as operational elements and can be considered as both a Priority Project and a Priority Initiative.

#### Integrated Coastal Management Plan and Perth Corridor Project (PRNRM, CoK)

The implementation of projects in the region that form part of major coastal management plans to produce an Integrated Coastal Management Plan that brings the community and key stakeholders together to identify, prioritise, fund and collaboratively implement coastal projects that will ensure the Metropolitan coast is accessible and well managed.

#### Coastal Conversations Beach Monitoring Project (CoR)

This Project aims to engage the community in active conversations about the dynamic nature of coastal areas and to develop a collaborative monitoring program. It aims to introduce new approaches to measuring coastal change, which will support the information and tools which are currently available. It will also document local historic coastal change through the use of art, photographs and local narrative, and will engage the community in coastal vulnerability discussions, using planning tool/methodology developed by Curtin University. It links to the Integrated Coastal Management Plan and work on adaptation to sea level rise through the Cockburn Sound Coastal Alliance.

#### Iconic Coastal/Marine Species Project

The project involves the coordination and management of iconic marine and coastal wildlife, particularly dolphins and penguins. This project would bring together researchers, local governments, management agencies, industry and the community to improve the understanding and health of these species as indicators of ecosystem health.

#### Fire Management Project (CoK and CoC)

This project is intended to consolidate best practice fire management for conservation and property protection for areas with or close to natural bushland, including pre and post fire preventative management practices. It also includes identification of bushfire prone areas, which can be built into Structure Plans for better management.

#### Dieback Mapping and Management (CoK, CoC, CoM)

Regional dieback assessment and management project involving the identification of high risk areas and the development of management measures, including hygiene measures, to control, contain and/or minimise the spread of dieback. Where appropriate rehabilitation activities would be undertaken. This project will have a strong local component.

#### Regional Control of Feral Animals (CoM)

Control of feral animals is a major issue across the Perth Peel Region, especially in peri-urban areas and to be efficient it requires a cross boundary and coordinated regional approach. Efficiencies and cost savings should result from the South West Group Councils combining relevant part of their feral animal control plans and strategies and seeking partnership funding from the State and Australian Governments.

#### Water Conservation and Re-use

This project involves investigations into re-use of wastewater for Local Government purposes (irrigation of POS, recharge of groundwater for wetlands etc) to reduce demands on scheme and groundwater.

#### Integrated Wetland Conservation (CoM)

The South West Metropolitan Region contains many high value wetlands in Regional Parks, RAMSAR Wetlands and Council reserves and managed areas. They add to the natural diversity and public amenity of the region. Wetland management requires a range of skills and approaches including scientific understanding, water and vegetation quality monitoring and careful management of water levels. Some wetlands require rehabilitation and repair to deal with adverse impacts. There has been a lot of work done on all these aspects, including rehabilitation of severely degraded wetlands, but little of this information is readily available. Significant increases in effectiveness and cost savings would be achieved by the South West

Group Councils working together and with the relevant State Government agencies. This is both a Priority Project and a Priority Initiative, strongly linked to the Inter-government Liaison Priority Initiative.

#### Kwinana Industry Buffer Green Belt

This project seeks to consolidate information on conservation values and develop a natural area management approach with key stakeholders aimed at identifying and linking natural areas as an ecological/wildlife corridor.

#### Recycled Water for Heavy industry

Examine options to determine the cost effectiveness of heavy industry accessing appropriately treated recycled water via managed aquifer recharge (MAR), including benefits from recycling – preventing sea water intrusion, recovering throughflow wetlands and providing irrigation water for local government.

#### Green Network – Integration of Local Biodiversity Strategies and Mapping of Natural Areas and Ecological Links (CoC, CoR, CoK, CoM)

All of the South West Group Councils have either, Local Biodiversity Strategies, Green Plans or Natural Area Management Plans, with a number being reviewed and extended. In conjunction, the WA Local Government Association is working with the South West Group, supported by the City of Cockburn, to produce 'Local Biodiversity Conservation Mapping' for the South West Metropolitan Region. This will provide maps showing all natural areas and vegetation on public and private land with their conservation status, values, ecological links and how they could be affected by development. It will include urban green networks that integrate the urban tree canopy, vegetation on private property and streetscapes. The resulting maps and 'conservation targets' will then be able to be linked to the results of the EPBC Act Strategic Assessment and the South Metro Peel Sub-region Structure Plan to identify and progressively implement the Green Network in highly developed and partly developed Councils.

#### Environment and Sustainability Education

All of the South West Group Councils conduct extensive programs of environmental and sustainability education, including support for community groups, incentives and subsidies. Combining this work across the region will lead to greater efficiencies by sharing methodologies and approaches. It will also appear to be less confusing for community groups and more integrated to potential funding providers.

#### Light Industry Audit (Cleaner Production)

This project includes an inventory and categorisation of all small to medium enterprises (SMEs) that potentially could, or do pollute the environment so they can be audited and supported to eliminate any pollution and move to cleaner and more sustainable production. This builds on and extends a program developed by Perth Region NRM to cover businesses in the catchments of Cockburn sound to protect the quality of ground water and the marine waters of the Sound.

### ***Regional Priority Initiatives***

The regional priority initiatives have been put forward for consideration for the Regional NRM Strategy by member Councils and other regional stakeholders. Similar to regional priority projects, these initiatives would require further investigation into the scope of work required and the preparation of a brief and plan to guide their development and implementation.

#### Inter-government liaison

Much of the remaining natural estate (e.g. Regional Parks, Conservation Reserves) is managed by State departments who are ill equipped, not experienced, under funded, not capable or do not see these areas as requiring management. The development of relationships with these departments to provide avenues for experienced land managers (or groups of) to collaboratively manage areas they for the benefit of the community, the

environment and the managing agencies. This initiative seeks the South West Group to take a lead coordination role in the liaison with State Government agencies regarding conservation and management of Council managed lands within, or connected to, the State conservation estate.

#### Effective Natural Area Management

This initiative seeks to share knowledge, expertise and resources on best practice management of natural areas covering issues such as weed control, fire management, dieback control and other activities of common interest. It will fill the large gap of readily available information on all aspects of managing and rehabilitating natural areas and artificial lakes in urban areas. It will ensure a more balanced approach across the South West Group Councils to raise the profile of Council managed natural areas so they are given adequate resources and priority when compared with public open space (POS). Additionally this approach would be used to ensure POS is 'designed' to include habitat for native species and where appropriate contribute to ecological links through Structure Planning and sub-division.

#### EPBC Strategic Assessment

Regional coordination and management of the conservation and management outcomes associated with the EPBC Act Strategic Assessment, including the implications for decision making and engagement of member Councils.

### **7.3 Prioritisation and Implementation of Priority Projects and Initiatives.**

Some Priority Projects and Initiatives will be led by a Council or group of Councils, while others could be led by industry or a government agency. Most projects or initiatives will require collaborative groups working together across relevant organisations.

The selection and prioritisation of regional priority projects and initiatives has been initiated and involves a collaborative approach based on the following activities:

- Identification of all projects and initiatives that would contribute to regional NRM outcomes – these could be categorised under the four main themes
- Development of selection criteria and weighting of criteria for prioritising projects and initiatives through a consultative process with stakeholders (e.g. workshop)
- Determination of partnership, resource and funding requirements for priority projects and initiatives
- Identification of priority projects and initiatives dependant upon external funding support to proceed
- Ranking for priority projects and initiatives
- Scheduling of projects and initiatives into a 5 year program
- Negotiating an agreed funding model with member Councils and other key stakeholders

The role of the South West Group in developing and implementing the regional priority projects and initiatives will vary depending upon funding sources, available resources and stakeholder responsibilities. The roles fall into three main categories being:

- Coordinator – responsible for leading the project, or initiative, managing funding and all engagement activities with key stakeholders
- Facilitator – responsible for bringing together key stakeholders, negotiating regional outcomes and reporting back to selected stakeholders (e.g. member Councils)
- Partner – contributor toward project led by another organisation with regional implications/benefits

Table 4 shows a model that could be used to develop the Regional NRM Program and identify the South West Group's role for regional priority projects and initiatives, including required resources and funding.



Those regional priority projects and initiatives requiring coordination or facilitation by the South West Group are likely to have the greatest resource and budget demands, compared to the partnering roles.

Ranked Projects and Initiatives	South West Group Role <ul style="list-style-type: none"> <li>• Coordinate</li> <li>• Facilitate</li> <li>• Partner</li> <li>- hours</li> </ul>	Resources and Funding		
		Member Councils	Grants and Other Sources	Officers hours
<b>Ranked Priority Projects and Initiatives</b> – The projects and initiatives were scored against six criteria by all member Councils, the south West Group office and the Cockburn Sound Management Council resulting in the listed rankings from 1 to 17. This provides a reasonable first ranking to build the projects and initiatives into the five year Regional NRM Program				
1. Green Network - Integration of Local Biodiversity Strategies and Mapping of Natural Areas and Ecological Links	Facilitator - 245			
2. EPBC Strategic Assessment (SWG)	Coordinator - 140			
3. Regional Fire Management	Facilitator - 190			
4. Cockburn Sound Coastal Alliance	Partner - 90			
5. Climate Change Adaptation	Partner - 110			
6. Regional Control of Feral Animals	Facilitator - 145			
7. Water Conservation and Reuse	Facilitator - 205			
8. Integrated Wetland Conservation	Facilitator - 250			
9. Integrated Coastal Management Plan and Perth Corridor Project	Partner - 70			
10. Inter-government Liaison	Facilitator - 195			
11. Effective Natural Area Management	Facilitator - 170			
12. Kwinana Industry Green Belt	Partner - 160			
13. Dieback Mapping and Management	Facilitator - 155			
14. Environment and Sustainability Management	Partner - 40			
15. Iconic Coastal and Marine Species	Partner - 85			
16. Coastal Conversations Beach Monitoring	Partner - 65			
17. Recycled Water for Heavy Industry	Partner - 150			
<b>Total South West Group five year NRM Program core hours</b>	<b>2465 hours</b>			
Light Industry Audit (Cleaner Production) – new project not ranked				

Table 4 – Resource and Funding Model for Regional NRM Program

Those regional priority projects and initiatives requiring coordination or facilitation by the South West Group are likely to have the greatest resource and budget demands, compared to the partnering roles.

The following sections outline how the governance and funding could be undertaken, noting that details for these arrangements will be included in the Regional NRM Business Plan that will be considered separately by the South West Group Board and the member Councils.

## **8. NRM GOVERNANCE AND FUNDING**

Funding for NRM work in its broadest sense comes from a range of sources and organisations at the national and state level and is available to a range of organisations, depending on the purpose of the funding. So, for example some funding is directed at the 56 NRM Regions around Australia, while other funding is specifically for community groups and yet other funding is available for a range of organisations including local government. Then there is funding for specific purposes like climate change, or carbon sequestration, or saving rare and endangered species.

The challenge is for Councils and their community groups to sift through the funding opportunities and apply for those that best fit the purpose of the project or initiative. This requires an understanding of the purpose and culture of the organisations that provide the funding – the ‘governance’ component.

Access would be much improved if there was a central source that contained all of the funding information. This section covers the concept of a central funding source and summarises the main funding sources that are currently available.

### **8.1 A Central Information Source for NRM Funding**

The South West Group has established an on-line NRM information management system, South West Group TargetOn where access will be provided on NRM information at the national, state, regional and local level, including NRM activities being undertaken by member Councils. Access will be provided to documents or maps or through links to information in other places. The aim is to be clear on who updates the information on a regular basis so information is relevant, current and accurate.

The South West Group Councils will be able to update their information and a lead Council will need to update some of the other NRM information (state and national). Other NRM information will be updated by the relevant organisation through existing arrangements or by agreement with the South West Group.

In the case of funding information, it would be desirable to have one State or regional organisation that has all of the NRM funding information and which updates it as funding priorities and programs change. This could be either Perth Region NRM for the whole Perth region or the State NRM Office for Western Australia. The South West Group can liaise with these organisations to determine the best arrangement and a link to the information provided on South West Group TargetOn. Background information on each of the ‘NRM’ organisations will be provided on TargetOn as they are likely to change less frequently than the NRM funding programs.

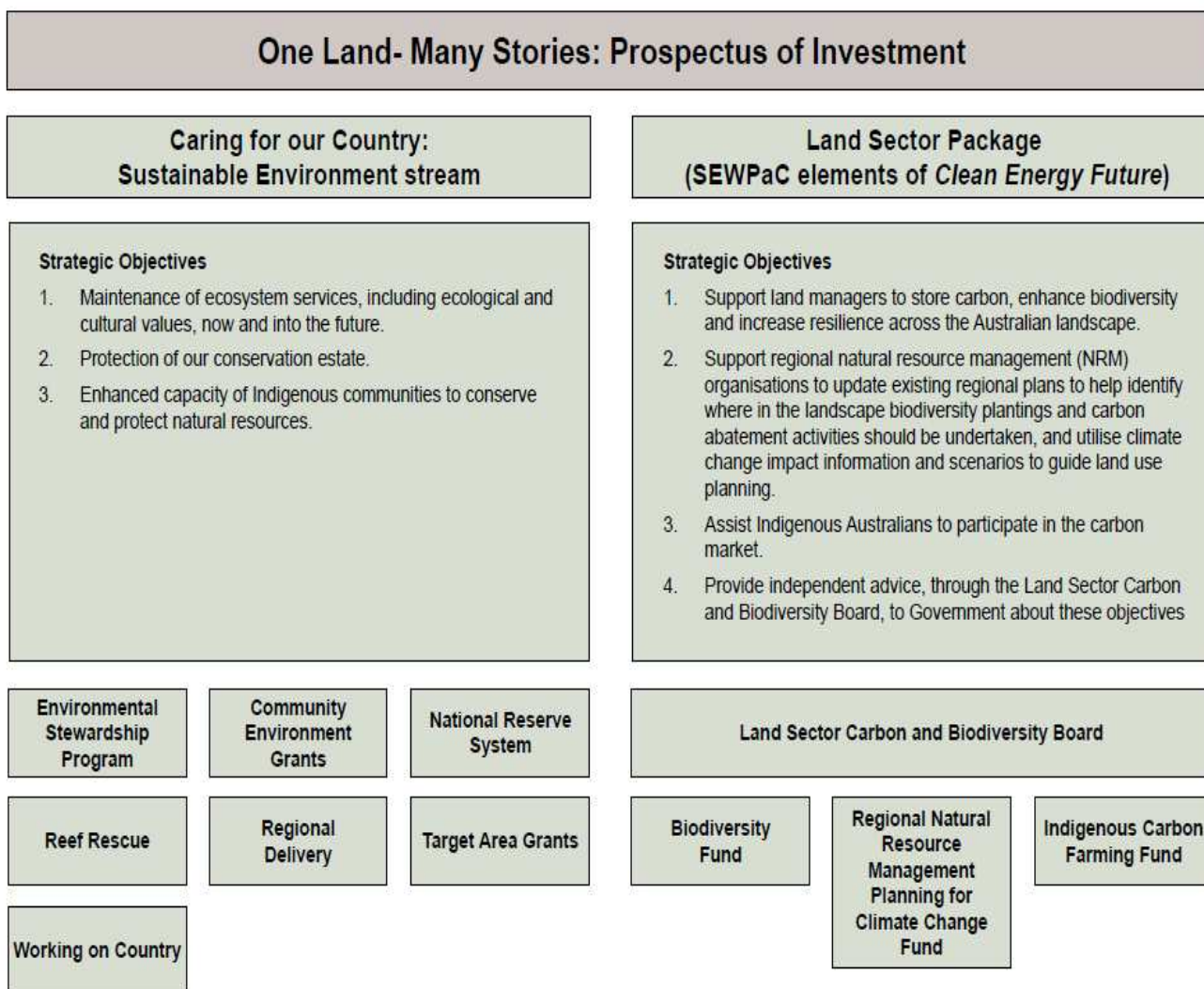
### **8.2 NRM Funding**

Natural Resource Management funding is complex because it is mainly controlled by Australian and State Government programs that change relatively often and which can run across a range of different organisations. Set out below is a summary of National and State Government funding opportunities and community group opportunities at both levels. More information can be obtained from the relevant websites, but a ‘central clearing house’ as discussed in 8.1 would make the identification of suitable funding programs for local government and their associated community groups much easier.

#### ***National NRM Funding***

The main Australian Government departments are Agriculture, Fisheries and Forestry (DAFF); Sustainability, Environment, Water, Population and Communities (SEWPaC) and Climate Change and Energy Efficiency (DCCEE). Sometimes other Australian Government organisations will be important sources of funding for particular projects, such as the National Water Commission or the Australian Water Recycling Centre of Excellence. Although Caring for Our Country has been the main NRM funding program for a number of years, there are others that come under the NRM or

sustainability umbrella. Figures 11 and 12 summarise the main funding program relationships and funding opportunities in 2013.



**Figure 11 – Prospectus of Investment ‘Map’ from DAFF and SEWPaC February 2013**

Figure 11 shows the main funding streams through Caring for our Country and the Land Sector Package through SEWPaC. It illustrates the wide range of grants that cover urban and country areas, Indigenous programs, biodiversity and funds directed at Regional NRM groups.

It is important for local government to maintain a range of relationships across the NRM sector to have the best chance of attracting significant funding. This is an important part of the ‘external relationships’ part of this Regional NRM Strategy.

Figure 12 extends the programs in figure 11 to cover the Clean Energy Future Plan and the colour coding shows which department administers the fund, including here the Department of Climate Change and Energy Efficiency.

There are other relevant national funding programs and it will be important for the South West Group to match the funding sources with its Priority Projects and Priority Initiatives. Another important aspect, at least at the national level, will be to demonstrate that the South West Group NRM Programs and Projects are based on a strategic, integrated and prioritised approach. This is expected by the Australian Government through initiatives such as the EPBC Act Strategic Assessment and requirements for Strategic Planning for infrastructure projects funded by Infrastructure Australia.

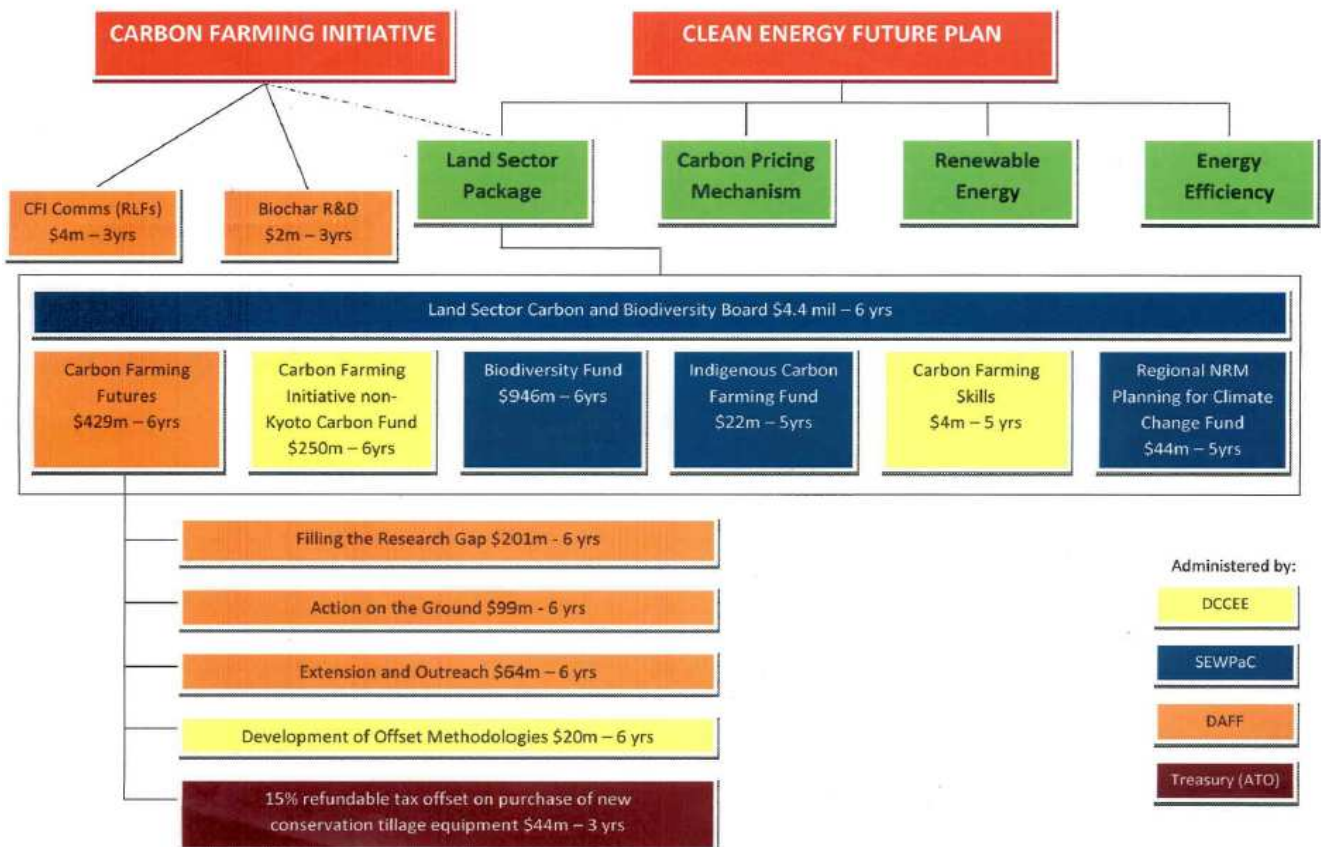


Figure 12 – Carbon Farming Initiative and Clean Energy Future Plan Funding Opportunities

### State NRM Funding

The State NRM Program and funding is administered through the State NRM Office based in the Department of Agriculture and Food. The Office also administers funding through the Caring for our Country Program. Two funds are administered totalling about \$10 million per year although some projects are funded for more than one year.

**NRM Community Grants** provide funding for community-based projects that target on-ground NRM action at a local level. Catchment and community groups, industry groups, not for profit organisations, local governments and education institutions are eligible for these grants.

**NRM Strategic Priority Project Grants** are for larger scale, strategic projects that address specified Western Australian Government priorities. This funding is made available to a broad range of government and non-government organisations.

The website states that significant amounts are also spent on NRM activities by WA Government departments, Regional NRM groups and other associations through their approved programs, emphasising the need for the South West Group to maintain strong relationships with such organisations.

### Other Community Grants

There are a wide range of community NRM and environment grants that are not always coordinated requiring community groups to scan the opportunities for funding their projects. South West Group member Councils have a range of grants and subsidies and support their community groups to access other funding opportunities that could be applied to NRM activities.

The community grants come from a number of private sector organisations as well as government agencies, so it is important to canvas the whole range to determine which grants or groups of grants

are best for particular projects. Table 5 summarises some of the available grants, including the objectives, timelines, frequency of calls and grant limits. More details on the full range of community grants are available from Perth Region NRM and the State NRM Office.

<b>Western Australian NRM Grants</b>		
<b>Timeline</b>	<b>Frequency</b>	<b>Grant Limits</b>
<b>State NRM Office: Objective - to support community engagement at the local level for approved projects</b>		
Announced April with closure in June	Annual call –funds available until 2014	\$10,000 to \$50,000
<b>DEC: Objective – Provision of support to conserve natural resources</b>		
Announced February closure April	Annual with 3 to 4 year programs	Up to \$40,000
<b>Coastwest (DoP): Objective – Support for community groups to implement coastal plans, address degraded areas, sustainable recreation and tourism, and build capacity</b>		
Open April and close June	Annual	Up to \$250,000
<b>Lotterywest: Objective – To achieve beneficial outcomes for community groups through a flexible grants program</b>		
Rolling application process	Ongoing, except for cultural heritage	\$1,000 up
<b>Swan River Trust: Objective – Provision of funds for on-ground revegetation and rehabilitation works in the Swan and Canning Rivers catchments</b>		
Open in April with announcement in October	Annual	Up to \$20,000 with larger grants broken into sub-projects
<b>Royalties for Regions: Objective – Regional capacity building, retaining benefits in rural communities and attaining sustainability (this funding source has limited application within the Perth Metropolitan area)</b>		
Rolling applications	Various depending on sector	Various depending on sector
<b>Caring for our Country Open Call: Objective – Fund projects to implement Business Plan and Australian Government priorities</b>		
1 to 3 years depending on project scope	Annual	\$20,000 to \$500,000
<b>Caring for our Country Action Grants: Objective – To help community groups to conserve and protect their natural environment</b>		
Short term projects up to 12 to 18 months	Annual	\$5,000 to \$20,000

**Table 5 – Examples of the Main Community NRM Funding Grants**

The wide range of community grants together with the complexity of Australian and State Government programs and grants emphasises the need for the South West Group to work collaboratively across the member Councils, with the community groups and with key stakeholders such as government agencies and industry to develop the best bids for funding Regional Priority Projects. These projects can then become the umbrella or framework for a wider range of local projects done by community groups and other organisations to create the ‘landscape vision for healthy communities’.

## **9. NEXT STEPS – RESOURCES TO CONTINUE THE NRM WORK AND IMPLEMENT THE NRM STRATEGY**

Subject to the South West Group Board and member Councils agreement to proceed with the Regional NRM Strategy and Regional NRM Business Plan, a number of steps will be required to develop, endorse and implement the Regional NRM Program, including:

**April 2013** - South West Group Board provides in principle support for the Regional NRM Strategy and Business Plan and refers the proposal to member Councils for consideration of resources and funding for 2013/14 and beyond.

**May 2013** – Member Councils consider funding and resources to implement the Regional NRM Strategy and NRM Business Plan, based on a draft five year Regional NRM program.

**June/July 2013** – Agreement and funding commitments achieved to proceed with implementation of the five year Regional NRM Program

**July to September 2013** – Securing resources to implement Regional NRM Program

**October 2013 onwards** – Implementation of Regional NRM Program

The NRM Program is proposed as a rolling five year program that is reviewed annually in consultation with member Councils to ensure that desired outcomes and project objectives are achieved and future activities are fully supported.

## 10. CONCLUSION

The South West Group Regional NRM Strategy is an evolving document that will improve over time, but this version sets a firm foundation for the six member Councils to work together to create a **'landscape vision for healthy communities'** that has a balanced range of natural areas and open space for biodiversity conservation and public amenity.

Research and surveys from around the world show that it is vital for community welfare and health that people can have interactions with a range of 'green' areas close to where they live, so the Regional NRM Strategy is important for residents as well as wildlife and vegetation complexes.

Additionally the NRM Strategy sets out a mechanism to implement the landscape vision through statutory planning provisions, building on the Environmental Protection and Biodiversity Conservation Act Strategic Assessment and the Central and South Metropolitan Peel Sub-region Structure Plans.

The key features of the Regional NRM Strategy can be summarised as follows:

- Consistent with the South West Group Strategic Plan vision, goals, objectives and strategies and member Council Strategic Community Plans.
- Builds on and provides a practical mechanism to implement the Green Network in 'Directions 2031 and beyond'.
- Enables NRM and sustainable development to be integrated with land use planning.
- Advocates and promotes the role of Local Government as a leader in NRM.
- Consolidates member Council, National and State NRM information into a common platform (South West Group TargetOn) which provides a useful resource for data storage and knowledge sharing into the future.
- Provides a regional 'snapshot' of NRM assets and values to assist with future planning, management and decision making.
- Has a Regional NRM Framework for implementation that builds on the information gathered from member Councils (Council Actions, Regional Actions).

- Identifies and maps key regional landscape values using the Perth Biodiversity Project Planning Tool to show how the Green Network sits in the landscape, including ecological linkages between Regional Parks and Reserves.
- Establishes collaborative management measures for all natural areas that clarify the roles and responsibilities of State and Local Governments as the main land managers.
- Establishes internal working arrangements with, and lead roles for member Councils (e.g. Planning/Environment and NRM Information/GIS Coordinating Groups and GIS lead and TargetOn lead Councils).
- Establishes external working relationships with key government agencies and regional stakeholders.
- Outlines Regional Priority Projects and Priority Initiatives and a prioritisation process so they can be costed for implementation.
- Resourcing and budgets to be developed through a five year Regional NRM Program based on priorities and a schedule of activities/tasks.
- National, State and industry funding sources to be mapped and the best mix for priority projects identified.
- In principle support from the South West Group Board required to progress development of the Regional NRM Program, following advice from the Technical Directors and CEOs Forum.

\*\*\*\*\*END\*\*\*\*\*

## Appendix 1

### NRM Categories and Activities

Categories in NRM definition	Responsible division or department	Plan, Strategy or Policy that guides decision making and implementation
<p><b>1. Integration, Effectiveness and Outcomes</b></p> <ul style="list-style-type: none"> <li>a) <i>Institutional arrangements – roles and responsibilities.</i></li> <li>b) <i>NRM Targets and links to reporting systems.</i></li> <li>c) <i>Integration and coordination mechanisms.</i></li> <li>d) <i>Legislation, policies and strategies</i></li> </ul>		
<p><b>2. Monitoring, Reporting and Evaluation</b></p> <ul style="list-style-type: none"> <li>a) <i>Establishment of targets and indicators.</i></li> <li>b) <i>Coordination and linking of environmental and natural resource management reporting systems.</i></li> <li>c) <i>Establishment and maintenance of monitoring systems.</i></li> <li>d) <i>Establishment of reporting systems, including links and relationships.</i></li> </ul>		
<p><b>3. Water Supply and Management – Groundwater and Surface Water</b></p> <ul style="list-style-type: none"> <li>a) <i>Source identification and feasibility of development, including environmental impact.</i></li> <li>b) <i>Source development, including water quality protection and environmental management.</i></li> <li>c) <i>Maintenance of quality and purification of water supplies.</i></li> <li>d) <i>Water conservation plans and strategies, including water restrictions</i></li> <li>e) <i>Water reuse and recycling.</i></li> </ul>		
<p><b>4. Waste and Storm Water Management</b></p> <ul style="list-style-type: none"> <li>a) <i>Sewerage operations, including the treatment of waste water for reuse.</i></li> <li>b) <i>Treatment of Industry waste water to reduce or eliminate social and environmental impacts.</i></li> <li>c) <i>Management of stormwater to reduce social and environmental impacts, including reuse.</i></li> <li>d) <i>Management of drainage for economic, social and environmental outcomes.</i></li> </ul>		
<p><b>5. Solid Waste Management</b></p> <ul style="list-style-type: none"> <li>a) <i>Landfill and solid waste operations.</i></li> <li>b) <i>Recycling and reuse of solid waste.</i></li> <li>c) <i>Reduction of the production of solid waste at source</i></li> </ul>		
<p><b>6. Protection and Management of Waterways and Wetlands</b></p> <ul style="list-style-type: none"> <li>a) <i>River and wetland classification systems.</i></li> <li>b) <i>River and wetland protection plans.</i></li> <li>c) <i>Institutional arrangements for Protection and management.</i></li> <li>d) <i>Water quality management</i></li> <li>e) <i>Foreshore and landscape management.</i></li> </ul>		



<p><b>7. Protection and Management of Land (Soil), Surface and Ground Water</b></p> <ul style="list-style-type: none"> <li>a) Soil classification system.</li> <li>b) Surface water management.</li> <li>c) Land capability and best management practices.</li> <li>d) Management of water logging and salinity.</li> <li>e) Remediation of contaminated soils.</li> <li>f) Protection of soils, surface and ground water from contamination.</li> <li>g) Soil and water protection BMP's, such as revegetation and engineering initiatives</li> </ul>		
<p><b>8. Conservation of Biodiversity and Habitat</b></p> <ul style="list-style-type: none"> <li>a) Conservation strategies and policies, including World Heritage Areas, RAMSAR areas etc.</li> <li>b) Preservation of species and habitat.</li> <li>c) Threatened species protection and management.</li> <li>d) Conservation through reserves.</li> <li>e) Conservation on private land.</li> <li>f) Reestablishment of native species.</li> </ul>		
<p><b>9. Land Planning and Development</b></p> <ul style="list-style-type: none"> <li>a) State legislation and policies.</li> <li>b) State planning framework.</li> <li>c) Regional planning schemes.</li> <li>d) Local planning schemes and planning strategies.</li> <li>e) Land development and management, including environmental impacts.</li> </ul>		
<p><b>10. Protection of Ambient Air</b></p> <ul style="list-style-type: none"> <li>a) Air pollution control and management, including ambient air standards.</li> <li>b) Emissions control, including industry emission standards.</li> <li>c) Air quality policies, strategies and BMPs.</li> </ul>		
<p><b>11. Climate Change</b></p> <ul style="list-style-type: none"> <li>a) Understanding the causes of Climate Change – 'natural', cyclical and human induced.</li> <li>b) Understanding the impacts of climate change.</li> <li>c) Managing the impacts of climate change.</li> </ul>		
<p><b>12. Protection and Management of Cultural, Recreational and Heritage Values</b></p> <ul style="list-style-type: none"> <li>a) Identification of cultural, recreational and heritage values and assets.</li> <li>b) Management plans and strategies for cultural, recreational and heritage assets.</li> <li>c) Government and community engagement in protection and management.</li> <li>d) Restoration and ongoing management.</li> <li>e) Education and communication.</li> </ul>		
<p><b>13. Noise and Vibration Control</b></p> <ul style="list-style-type: none"> <li>a) Set standards for the sources of noise and vibration</li> <li>b) Monitor social and environmental impacts of noise and vibration.</li> </ul>		

<p><b>14. Radiation</b></p> <ul style="list-style-type: none"> <li>a) Monitor and control production of radioactive materials</li> <li>b) Monitor and control transportation of radioactive materials</li> <li>c) Monitor and control use of radioactive materials</li> <li>d) Monitor and control disposal of radioactive materials.</li> </ul>		
<p><b>15. Mining and Extractive Industries</b></p> <ul style="list-style-type: none"> <li>a) Assessment of environmental impact of exploration activities</li> <li>b) Assessment of environmental impact of mining activities</li> <li>c) Approval of exploration and mining activities</li> <li>d) Enforcement of post mining environmental repair and restoration</li> </ul>		
<p><b>16. Energy Consumption and Efficiency</b></p> <ul style="list-style-type: none"> <li>a) Promotion of greater domestic and industrial energy efficiency</li> <li>b) Development of renewable energy sources eg solar, wind and biomass</li> <li>c) Promotion of the use of renewable energy by domestic and industrial consumers</li> <li>d) Phasing out the use of carbon based fuels</li> <li>e) Development of market mechanisms to discourage use of carbon based fuels eg carbon tax</li> <li>f) Education programs to promote knowledge of renewable energy at school, TAFE and University</li> </ul>		
<p><b>17. Information Systems</b></p> <ul style="list-style-type: none"> <li>a) State land information system.</li> <li>b) Remote sensing and monitoring.</li> <li>c) GIS and data management systems.</li> <li>d) Decision support systems.</li> </ul>		
<p><b>18. Research and Development</b></p> <ul style="list-style-type: none"> <li>a) Identification and prioritisation of R&amp;D needs.</li> <li>b) Identification of BMPs.</li> <li>c) Social and behavioural change.</li> </ul>		
<p><b>19. Education, Capacity Building and Communication</b></p> <ul style="list-style-type: none"> <li>a) Capacity building strategies and programs for key sectors.</li> <li>b) Skills training delivery and coordination.</li> <li>c) Schools programs.</li> </ul>		
<p><b>20. Industry Engagement and Support</b></p> <ul style="list-style-type: none"> <li>a) BMPs and support for rural and primary industries.</li> <li>b) BMPs and support for service and secondary industries.</li> <li>c) Case studies and trials.</li> </ul>		
<p><b>21. Community Engagement and Support</b></p> <ul style="list-style-type: none"> <li>a) Skills support for community groups.</li> <li>b) Administrative support for community groups.</li> <li>c) Information for community groups.</li> <li>d) Links and coordination.</li> </ul>		

## Appendix 2

### Defining the NRM business

There are a number of definitions of and approaches to NRM and its strong link to sustainability, the essence of which is well encapsulated in the *Western Australian State Sustainability Strategy definition*:

*Meeting the needs of current and future generations through integration of environmental protection, social advancement and economic prosperity.*

The definition covers 'major classes of assets' that make up natural resources as, biodiversity, water, coasts and marine, land and atmosphere.

A more specific definition of NRM comes from the WA Government Framework for NRM:

*The ecologically sustainable management of the land, water, air and biodiversity resources of the State for the benefit of existing and future generations, and for the maintenance of the life support capability of the biosphere.*

The WA Local Government Association (WALGA) has adopted a Policy Position on NRM similar to the State definition, which defines Natural Resource Management as:

*The ecologically sustainable management of land, water and biodiversity resources for the benefit of existing and future generations and the maintenance of the life support capability of the biosphere.*

The City of Cockburn has added governance to produce a more rounded definition:

*Pursuing governance excellence to meet the needs of current and future generations through integration of environmental protection, social advancement and economic prosperity.*

Each of the member Councils has actively pursued NRM through their own environmental plans, strategies and programs. To assist in capturing the range of Local Government related NRM activities, it is useful to adopt a common approach to the categories and activities that contribute to NRM.

The Australian Bureau of Statistics (ABS) uses internationally accepted definitions of Environmental Protection and Natural Resource Management to collect statistical information on expenditure by local governments across Australia (Environment Expenditure Local Government, Australia 2002-03, ABS 4611.0). Here the definitions are important, because they include specific 'categories' and 'activities', which define the business, as set out below.

**“Environment Protection** activities are those that prevent, reduce or eliminate pressures on the environment arising from social and economic activities. They also cover activities aimed at repairing or restoring damage to the environment after it has occurred.”

Environment protection activities are classified into a number of categories based on the UN Classification, including:

- Waste water management and water protection.
- Solid waste management
- Protection of soil and groundwater.
- Conservation of biodiversity and habitat.
- Protection of ambient air and climate.
- Protection of cultural heritage.
- Other environmental protection activities

Three distinct types of economic activity are measured:

- the purchase or use of environmental protection products and services,
- the supply of the environment protection products and services, and
- the financing of environment protection products and services.

***“Natural Resource Management activities include the management, allocation and efficient use of natural resources (trees, land, water, and quarrying materials). Also included are activities associated with the recreational use of the environment, such as management of parks, beaches and reserves.”***

*Three main categories of natural resource management are used:*

- Water supply and management.
- Land management and development.
- Other resource management.

The ABS approach was adapted by Perth Region NRM to map the NRM work being undertaken by a number of individual councils and regional local governments with the aim of supporting all Local Governments in the Perth Metropolitan region to introduce “integrated NRM” through the integration of NRM into Local Government core business (Perth Region NRM November 2008). In this case, the two sets of ABS categories and activities were combined into a consolidated list (refer to Appendix 1 above for further details).

In this context ‘Integrated NRM’ included:

- Integration through strategic and business plans so that NRM is clearly reflected in operations and budgets.
- Integration into a Local Government’s process for statutory land use planning in a way that shows the place of NRM and sustainability in all development and land use decisions.
- Integration across operational and business units within a Council.
- Integration across boundaries between adjoining Councils and catchments.

The South West Reference Group utilised this integrated NRM model to map all of the NRM business activities across the six Councils as a key input into the Regional NRM Strategy. This exercise proved particularly useful in understanding the scope of work and plans being developed and implemented by the member Councils in the South West Metropolitan Region.

By increasing the level that the member Councils work together, it is likely that that this will lead to greater integration, cross boundary efficiencies and the ability to attract more funding and resources for implementation of projects and other work across landscapes and communities. Further, this integrated approach should be able to be transferred to new local government structures that may result from the proposed structural reforms for the Perth Metropolitan Area (Metropolitan Local Government Review, Final Report of the Independent Review Panel, July 2012)

### ***NRM – Core business for Councils – Principles and Practices***

Considerable work has been done by the Queensland Local Government Association to support the integration of NRM into Local Government business. A seminal ‘guide’, “Integrating Natural Resource Management into Local Government Corporate, Strategic and Operational Plans” (QLGA 2006) contains key statements and principles which relate to the South West Group:

*“Natural assets are the land, soils, atmosphere, energy, water, landscapes, flora, fauna and the natural processes which link them together. Managing these assets means ensuring that the current levels of use and impacts on these resources are sustainable into the longer term.”*

Local governments are seen to be the key managers at the local level for the asset base underpinning community well-being. That asset base comprises the full suite of natural (environmental or ecological), socio-cultural as well as economic assets. This combination of three sets of assets which Councils manage directly and indirectly provides the triple bottom line for Councils' corporate performance."

In this context, Councils are the champions for healthy communities and healthy landscapes in their local areas.

There are a range of principles that have been developed to underpin NRM and sustainability (for example, EPA Position Statement No.8, October 2005, Environmental Protection in Natural Resource Management), however the Queensland LGA ones have produced a set that are short and simple. They are:

- 1) Protect natural processes and flora and fauna.
- 2) Significantly increase resource efficiency.
- 3) Minimise environmental impacts.
- 4) Strive for equity.

Together, the more comprehensive definition of NRM and the ways it can be built into Local Government core business provide a strong foundation for Councils in urban or country areas to demonstrate that they have a very strong role in conserving and managing the natural environment, which underpins our well-being, ecosystem health and economic prosperity.