



LIMPOPO

PROVINCIAL GOVERNMENT
REPUBLIC OF SOUTH AFRICA

LIMPOPO SPATIAL DEVELOPMENT FRAMEWORK Phase 2: Spatial Analysis Report

Part E: Synthesis

31 March 2023

First Draft

The Office of the Premier

Lets grow South Africa together

The heartland of southern Africa - development is about people

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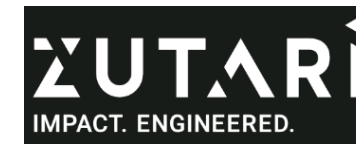
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LIMPOPO SPATIAL DEVELOPMENT FRAMEWORK: SPATIAL ANALYSIS

5 Spatial synthesis

In this document, a high level overview of the key spatial issues is presented in graphic form. The findings of the spatial analysis are synthesised in relation to the five Provincial Spatial Outcomes that were formulated in Phase 1 of the review of the LSDF 2016. The Provincial Spatial Outcomes were derived from the National Spatial Outcomes presented in the NSDF 2022 and informed by the Spatial Development Objectives from the LSDF 2016, which were retained and refined in Phase 1 of the LSDF Review.

<p>Provincial Spatial Outcome One A network of consolidated, transformed and well-connected urban nodes, regional development anchors and rural service centres that enable Limpopo to derive maximum transformative benefit from urbanisation and concentrated rural settlements, enabling climate change adaptation, inclusive economic development and equal, effective and efficient access to social services in support of equitable and inclusive provincial human capital development</p>		<p>Capitalise on the Province's strategic location within the SADC region to facilitate trade links and regional cooperation on resource sharing;</p>
<p>Provincial Spatial Outcome Two Provincial-scale corridors and productive rural regions enable sustainable livelihoods supported by economic diversification through green industrialisation and participation in the Fourth Industrial Revolution, mutually beneficial urban-rural linkages, and wise management, nurturing and conservation of ecological assets and ecosystem services.</p>		<p>Capitalise on, and improve regional and local connectivity to establish a connected network of nodes and settlements;</p>
<p>Provincial Spatial Outcome Three Provincial connectivity and movement infrastructure systems are strategically located, extended and maintained, to support a diverse, ecologically sustainable, adaptive, regenerative and inclusive economy, and a set of key provincial, national and regional gateway cities and towns.</p>		<p>Provide a strategic and coherent rationale for public sector investment, including engineering, community and economic infrastructure, to optimise service delivery;</p>
<p>Provincial Spatial Outcome Four Productive rural regions are supported by sustainable resource economies and strong and resilient regional development anchors provide effective, efficient and equitable access to people living in rural areas to the provincial, national and global economy</p>		<p>Encourage urban and rural spatial restructuring to address spatial injustice and facilitate climate change mitigation and adaptation;</p>
<p>Provincial Spatial Outcome Five The provincial ecological infrastructure and natural resource foundation are well-protected and managed, to enable climate change mitigation and sustainable and equitable access to water, high-potential agricultural land, minerals and other natural resources, both for current and future generations.</p>		<p>Aggressively protect and enhance the Province's natural resources, including scarce fresh water sources and high biodiversity landscapes;</p>
		<p>Guard valuable agricultural land as a scarce resource and national asset;</p>
		<p>Consolidate and enhance the Province's ecotourism product</p>
		<p>Encourage and institutionalise the sustainable development of its massive mineral potential and encourage diversification and industrialisation through green economy initiatives</p>
		<p>Create an enabling environment for both large- and small-scale business development (retail, office, commercial, industrial)</p>

5.1 Relating spatial issues to spatial outcomes








Provincial Spatial Outcome One

A network of consolidated, transformed and well-connected urban nodes, regional development anchors and rural service centres that enable Limpopo to derive maximum transformative benefit from urbanisation and concentrated rural settlements, enabling climate change adaptation, inclusive economic development and equal, effective and efficient access to social services in support of equitable and inclusive provincial human capital development.



1- More nuanced roles need to be defined for the nodal network to support spatial transformation

The hierarchy of Limpopo Growth Points largely coincides with the NSDF functional nodal typology. Polokwane, Tzaneen, Burgersfort and Musina emerged as strong in an assessment of current national, provincial and district planning, household growth patterns, connectivity of settlements in terms of national and provincial corridors, priorities and proposals, and national and provincial spatial targeting. To optimise on the potential for spatial transformation the role of each Growth Point needs to be defined in terms in spatial transformation, economic development prospects and access to social services. This includes special consideration of the changing roles of Burgersfort and Lephalale.









NSDF Functional Town Hierarchy 2021:

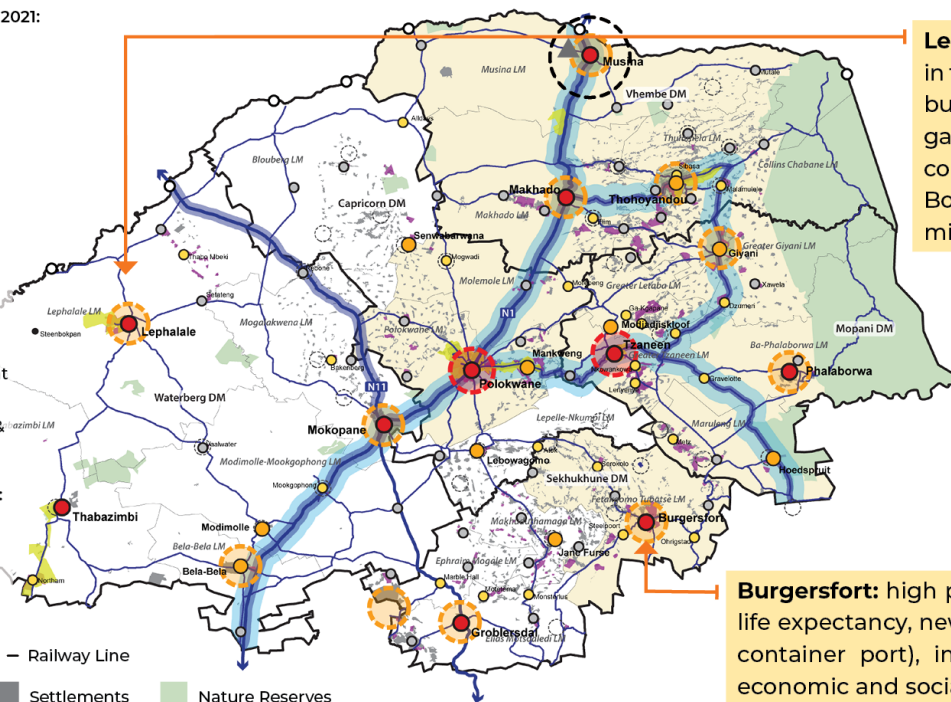
-  National Urban Node
-  Regional Development Node
-  Rural Service Centre
-  NSDF Eastern Escarpment Transformation Corridor
-  NSDF National Development Corridor
-  NSDF Key National Roads
-  NSDF Key Regional Roads

Housing Programmes:

-  Priority Housing Development Areas
-  Priority Human Settlements & Housing Development Areas

Limpopo SDF Growth Points 2016:

-  Provincial Growth Point
-  District Growth Points
-  Municipal Growth Point
-  Rural Node/Service Point
-  Import/Export Node
-  Railway Line
-  Special Economic Node
-  Settlements
-  Nature Reserves

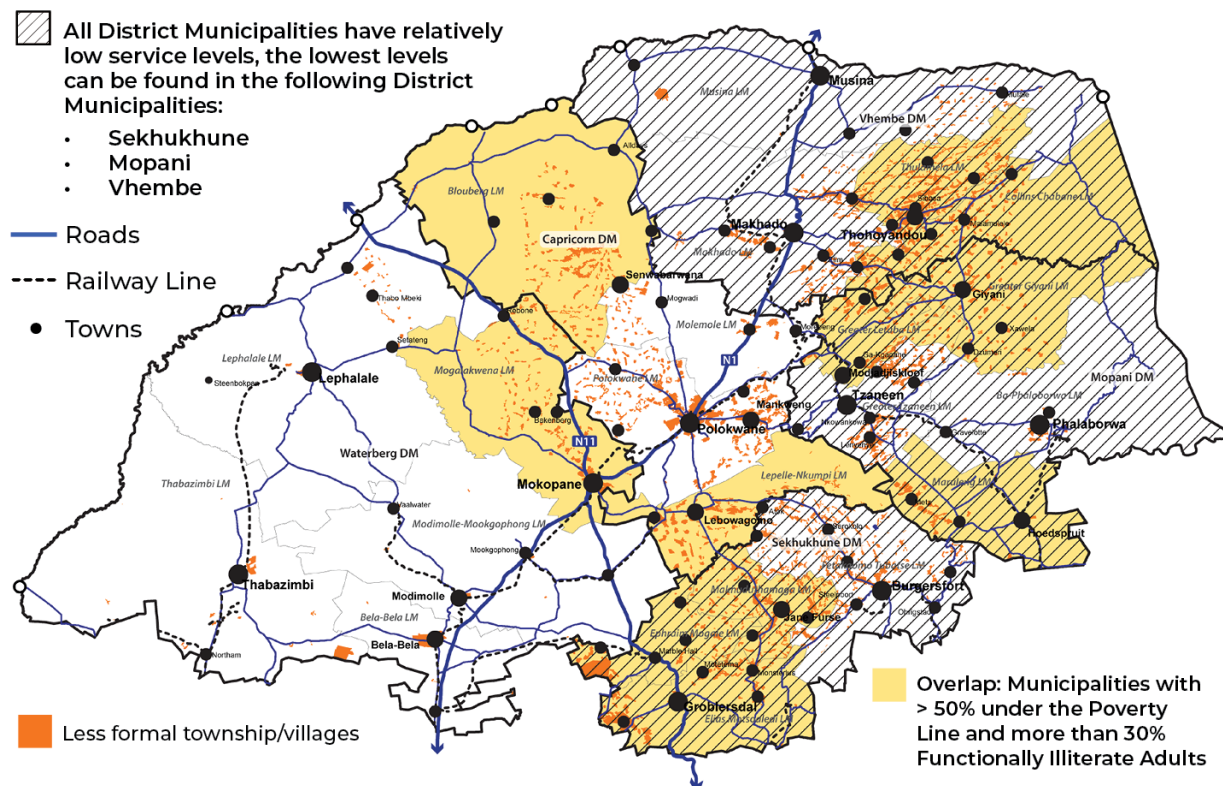


Lephalale: future economic prospects in terms of contribution to energy sector but also diversification to tourism, game farming, more limited role of construction sector, functional links to Botswana, limited life expectancy of mining sector.

Burgersfort: high population growth, mining with long life expectancy, new planned development (SEZ, inland container port), infrastructure and water challenges, economic and social links to Mashishing.

2- Current peri-urban and rural settlement trends are reinforcing spatial injustice and vulnerability

Current population growth and settlement trends in rural and peri-urban areas are reinforcing spatial disparities. Sprawling residential structure growth in peri-urban and rural settlements, not only reinforces the pattern of the most vulnerable communities living in areas that are inaccessible to social service and economic opportunity. It also places undue pressure on land availability with settlement expansion taking over agricultural land and encroaching on mining land at an alarming and unsustainable rate.



ADDITIONAL LAND NEEDED BY 2031:

68,074 ha (close to 70% of the area currently occupied by settlements in the Mopani District).

Further additional land needed by 2051: **238,265 ha.**

The land area covered by settlements will increase with around **49%**.

Provincial Spatial Outcome Two

Provincial-scale corridors and productive rural regions enable sustainable livelihoods supported by economic diversification through green industrialisation and participation in the Fourth Industrial Revolution, mutually beneficial urban-rural linkages, and wise management, nurturing and conservation of ecological assets and ecosystem services.

1- Current economic performance, advantage and diversification not addressing spatial disparities

Polokwane is currently the hub of economic activity in Limpopo, with the most diversified and also largest economy if measured by output. Vhembe and the northern parts of Mopani showed the highest growth rates, albeit off a lower base than Polokwane. Economic decline was the most significant in Waterberg and Sekhukhune, driven in part by large declines in the construction industry. Waterberg and Sekhukhune also have the least diversified economies with a heavy reliance on a single sector (mining and quarrying).

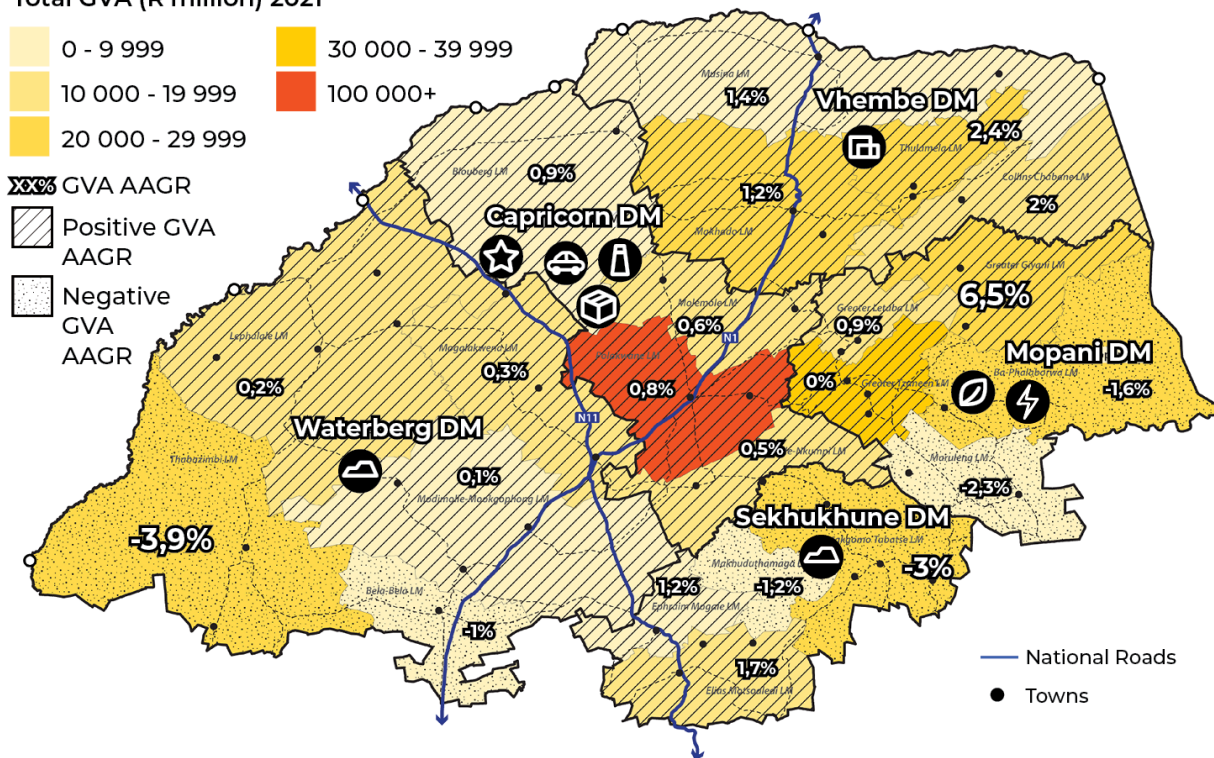
Total GVA (R'million) 2021



xxx% GVA AAGR

Positive GVA AAGR

Negative GVA AAGR



SECTORS WITH HIGH LOCATION QUOTIENTS:

Capricorn DM:

- Manufacturing;
- Wholesale and retail trade, catering and accommodation;
- Transport, storage and communication; Government and community services

Mopani DM:

- Agriculture;
- Electricity, gas and water

Sekhukhune DM:

- Mining and quarrying

Vhembe DM:

- Construction

Waterberg DM:

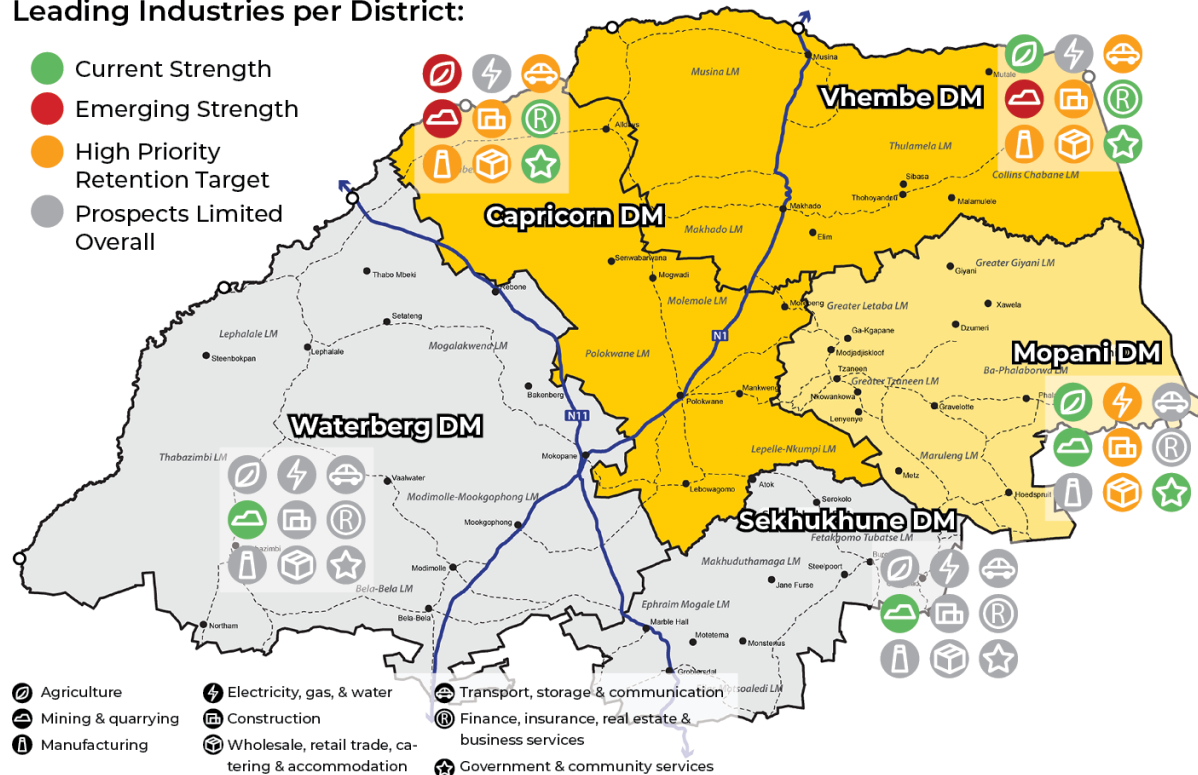
- Mining and quarrying

2- Economic prospects: towards diversification and inclusion

The agricultural and mining and quarrying industries show a current strength in the overall provincial economy, either through driving or accelerating the provincial economy. Sekhukhune and Waterberg have the most limiting prospects in terms of economic growth and development, with most industries characterised by limiting or declining industry trends. In both districts, only the sub-industry of the mining of coal and lignite shows current strengths. The current reliance on limited sectors emphasises the importance of exploring new potential (e.g. green energy), linking into international markets and promoting sectors that could contribute to high value addition and diversification such as manufacturing and services.

Leading Industries per District:

- Current Strength
- Emerging Strength
- High Priority Retention Target
- Prospects Limited Overall



LEADING INDUSTRIES PER DISTRICT:

Capricorn DM: Agriculture (emerging strength), mining and quarrying (emerging strength), manufacturing (high retention target)

Mopani DM: Agriculture (current strength), mining and quarrying (current strength with gold and uranium as priority retention target)

Sekhukhune DM: Mining and quarrying (current strength)

Vhembe DM: Agriculture (current strength with fishing as emerging strength); mining and quarrying (emerging strength), manufacturing (high priority retention target)

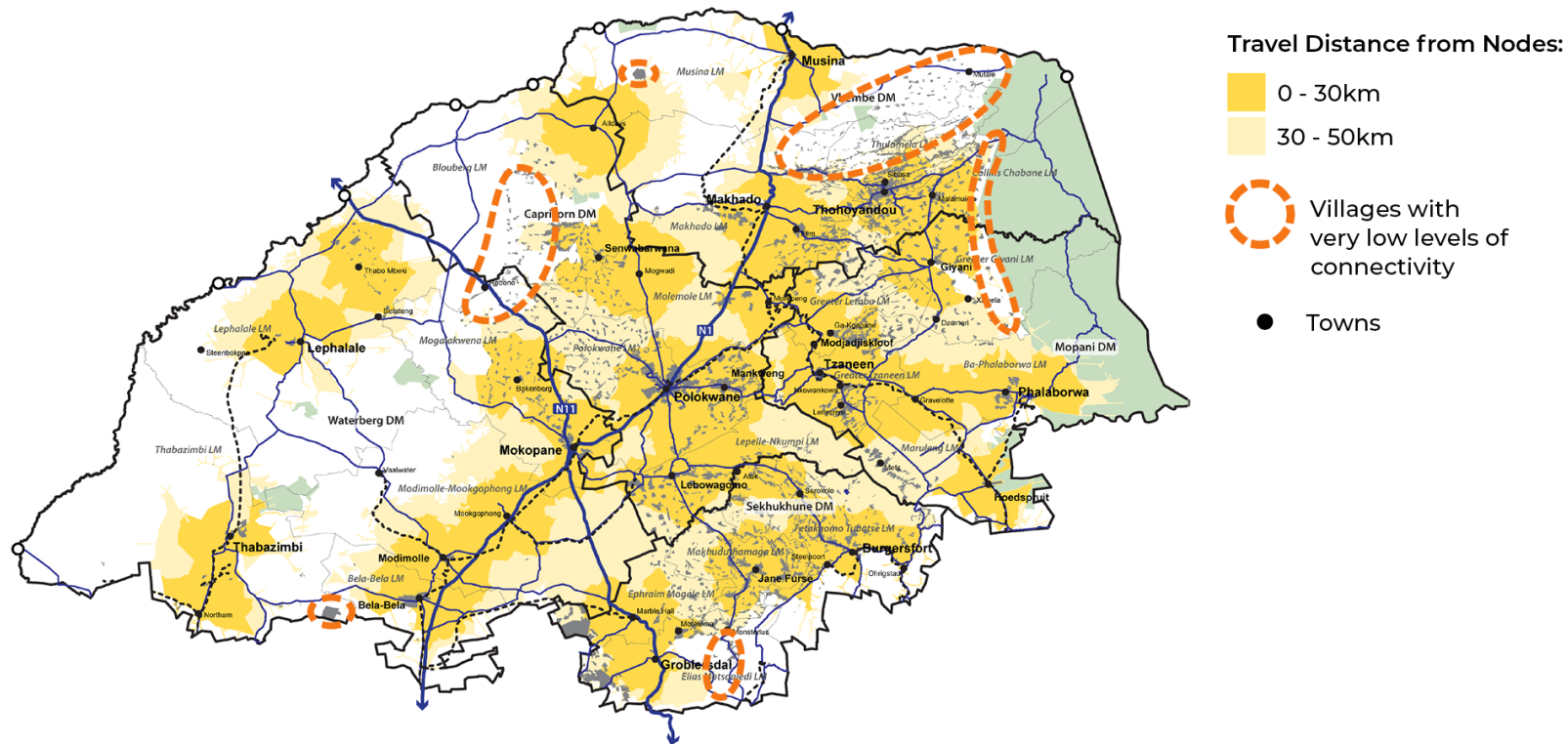
Waterberg DM: Mining and quarrying (current strength)

Provincial Spatial Outcome Three

Provincial connectivity and movement infrastructure systems are strategically located, extended and maintained, to support a diverse, ecologically sustainable, adaptive, regenerative and inclusive economy, and a set of key provincial, national and regional gateway cities and towns.

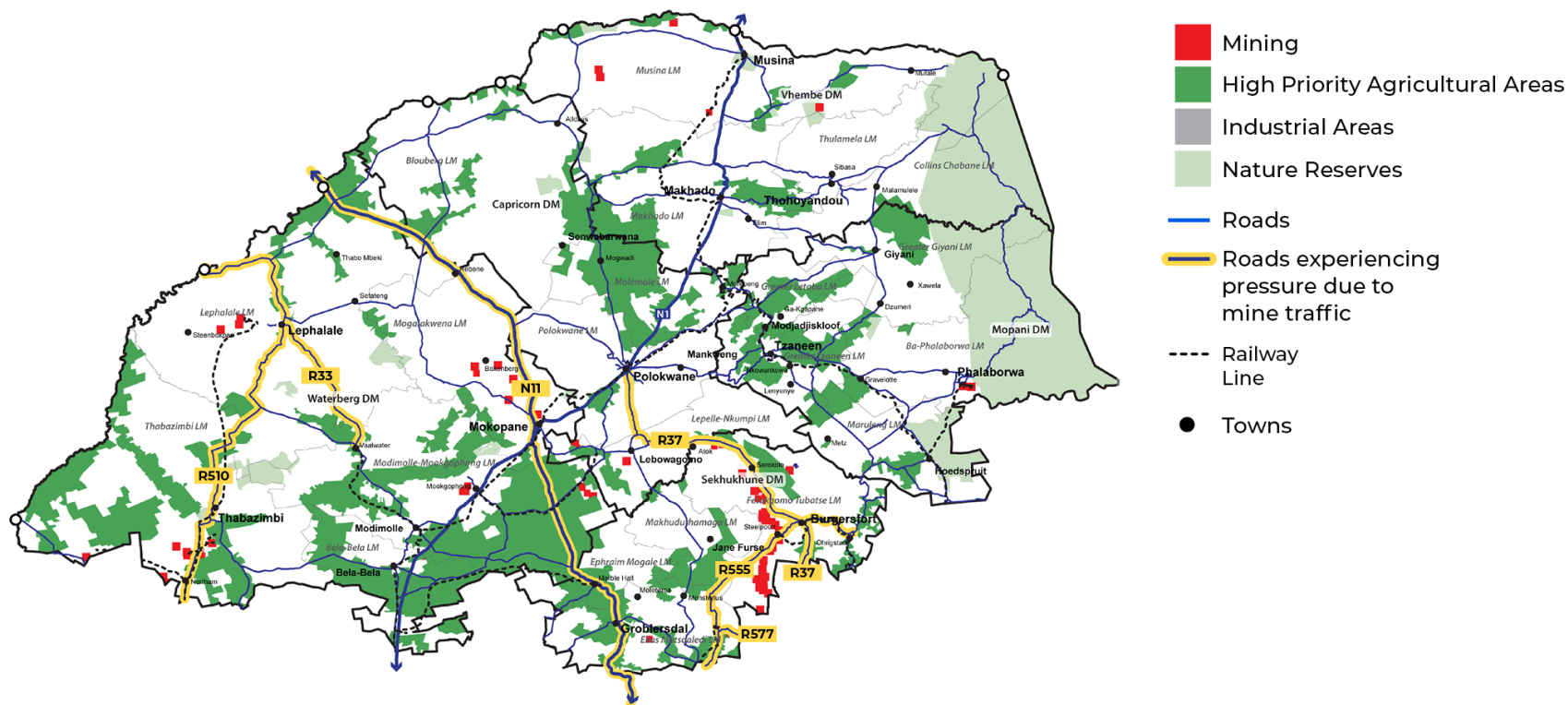
3- Connectivity in support of the nodal network is limited in some rural areas and for some nodes

Most of the urban and rural communities in Limpopo are connected to the nodal network within 50km access via the road system. The exceptions are marginalised rural areas namely the Blouberg area in the northern part of Capricorn District, areas north of Thohoyandou up to Motale and areas to the east and southeast of Giyani. The quality of the road network is a concern mainly in the rural areas but also for access road to nodes such as Phalaborwa, Makhado, Thohoyandou and Burgersfort.



4- Connectivity in support of productive regions is road based and not functioning optimally

The role of rail in the province must be reconsidered and prioritise for heavy duty freight haulage. The lack of rail infrastructure to transport export-grade coal and chrome to the Richards Bay harbour is a major constraint. Mine traffic put roads under pressure with transport from mines to smelters in Rustenburg, Mashishing and Middelburg and to export destinations via the N4 and N3. This includes the N11, R33, R510, R555, D212, R577 and R37. In terms of rail, Transnet anticipates significant growth in commodities on the two core systems in Limpopo between 2015 and 2046, i.e. Lephalale to Ogies (coal system), Groenbult to Kaapmuiden and Musina to Pyramid (north-eastern system).

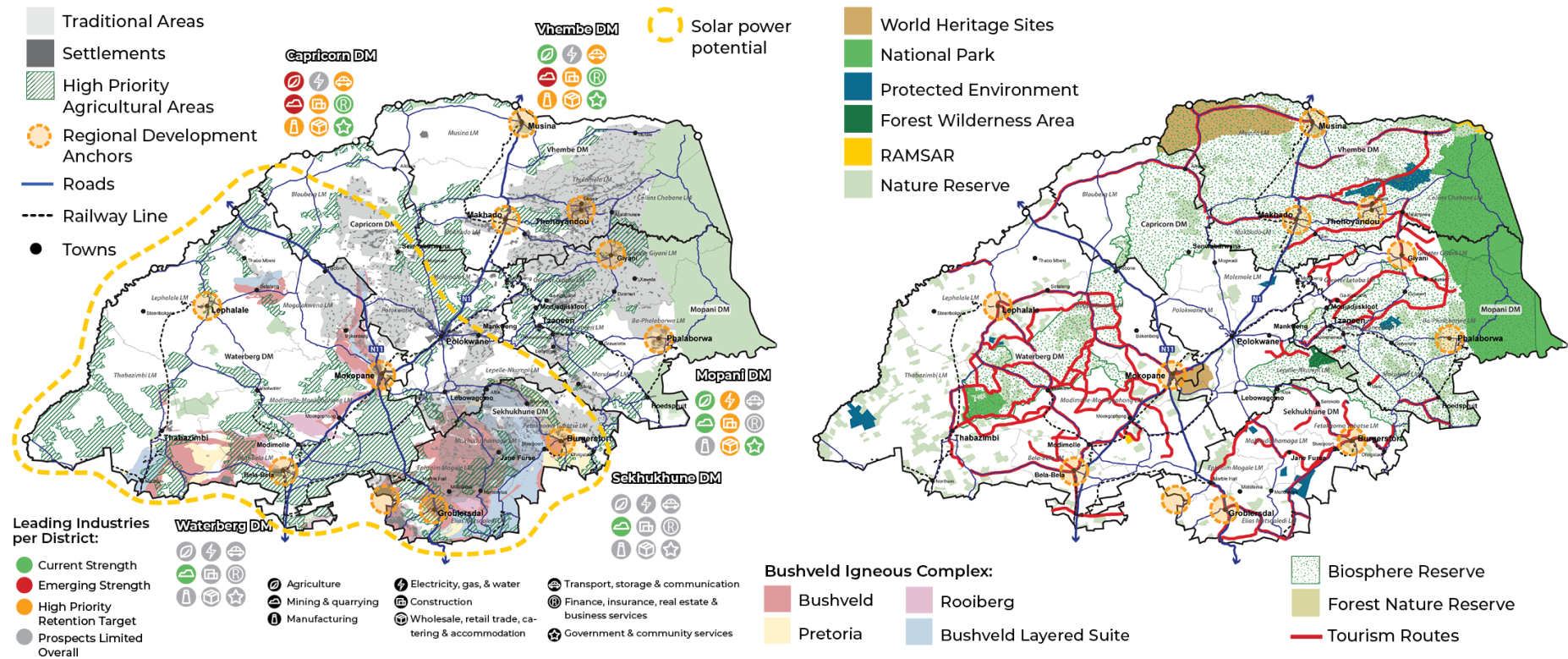


Provincial Spatial Outcome Four

Productive rural regions are supported by sustainable resource economies and strong and resilient regional development anchors provide effective, efficient and equitable access to people living in rural areas to the provincial, national and global economy

1- Lack of an optimally functioning regional-rural network

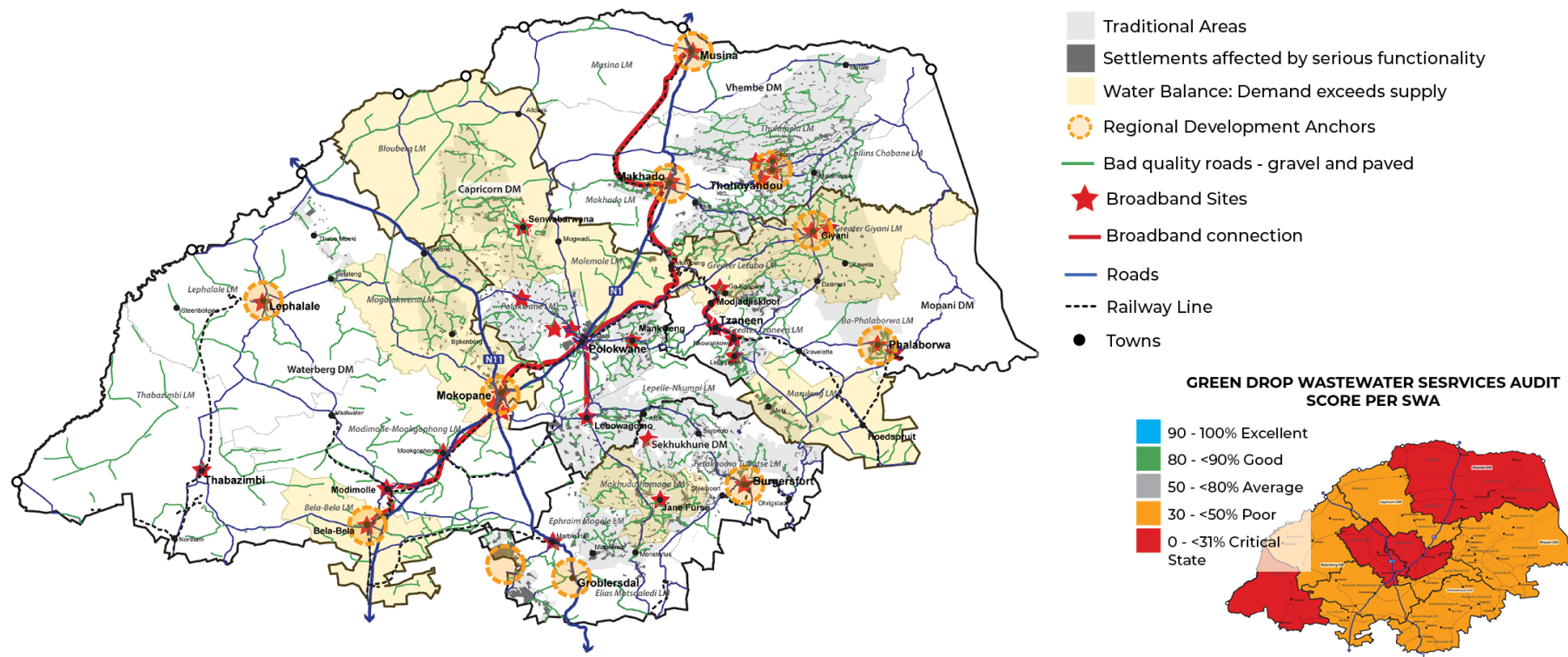
Regional development anchors should act as economic growth and value addition points, access points to wider markets and hubs for social service provision and human capital development. While Limpopo has established nodes that could act as regional development anchors, the role of each anchor in terms of economic growth and social service provision need to be more clearly defined. The same goes for the elements of the rural regions linking to each anchor.



2- Supportive infrastructure challenges hampering optimal development of productive rural regions

A functioning regional-rural network requires supportive infrastructure for both human capital development and economic activities. The key challenges in Limpopo revolve around:

- Road quality and lack of use of rail infrastructure
- Serious water shortages
- Functionality limitations in service provision to settlements, in terms of both water and sanitation
- Energy availability challenges
- Limited broadband availability especially in rural areas

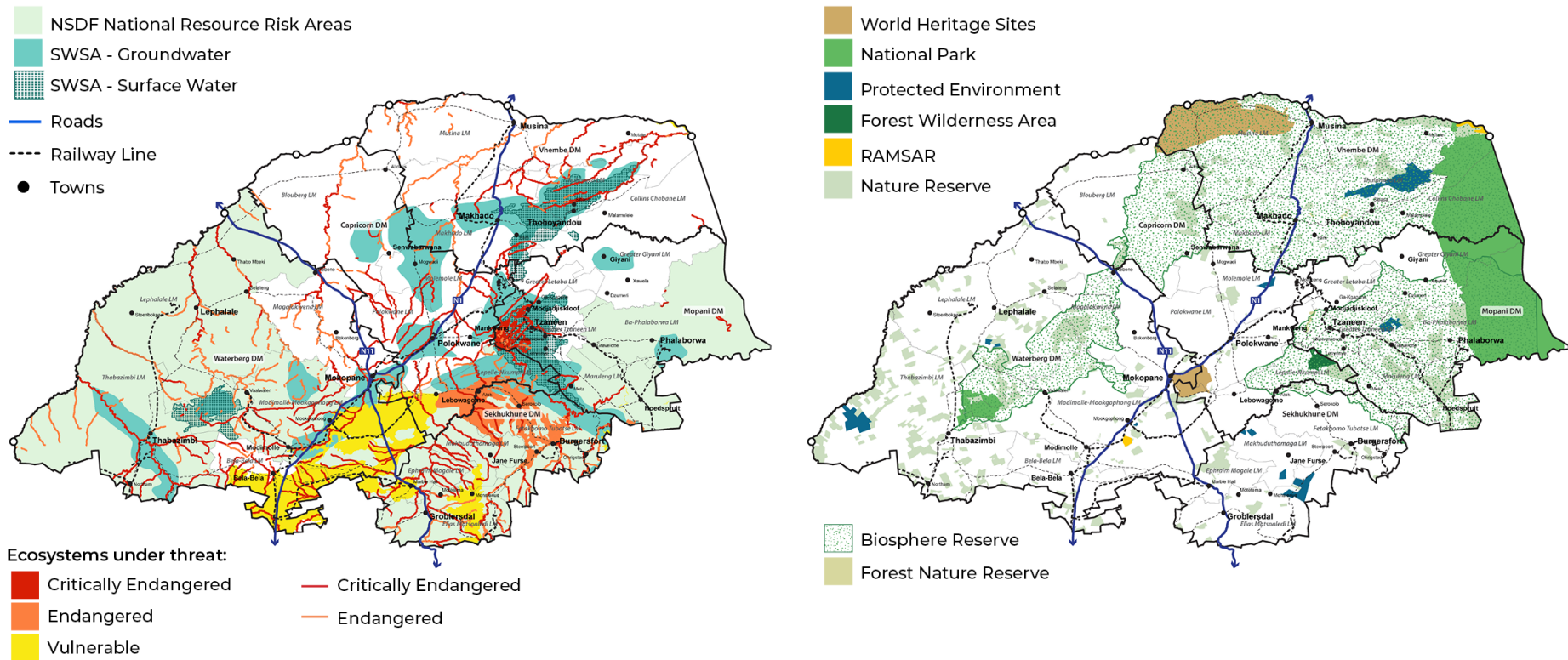


Provincial Spatial Outcome Five

The provincial **ecological infrastructure and natural resource foundation are well-protected and managed**, to enable climate change mitigation and sustainable and equitable access to water, high-potential agricultural land, minerals and other natural resources, both for current and future generations.

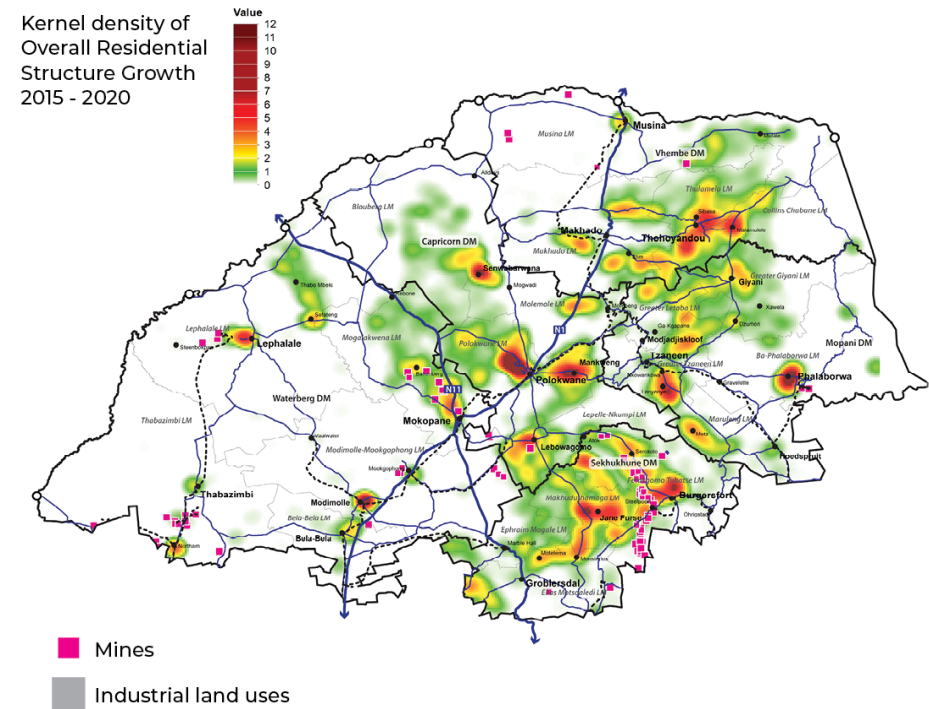
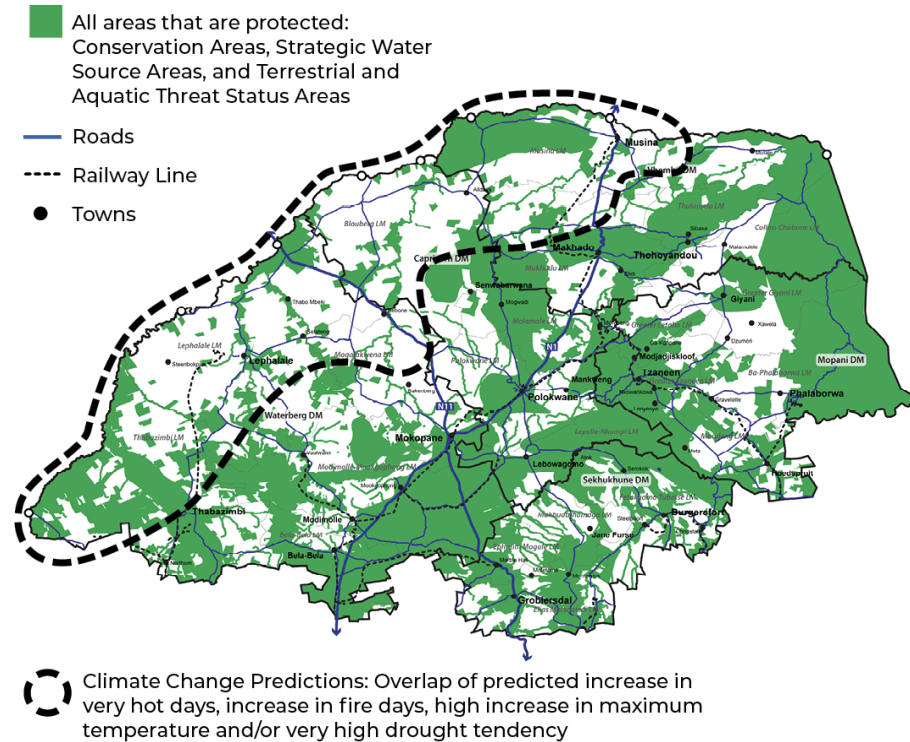
1- Conservation and management of sensitive ecosystems and resource areas requires action

Limpopo's natural resource base makes a nationally significant contribution to the economy and conservation. In addition to Critical Biodiversity Areas including wetlands affecting much of the provincial space, strategic water source areas and vulnerable ecosystems that are not well protected and thus under threat of damage and destruction should be prioritised for conservation and management.



3- Resource pressure and competition are threatening sustainability and limiting economic growth and diversification

One of the biggest challenges facing Limpopo in promoting spatial justice and ensuring inclusive, diversified growth is managing resource pressures and competition. With its abundance of natural resources, the provincial economy is largely a resource economy. The sustainable use of these resources, as well as value addition through beneficiation, manufacturing and establishing a supportive service industry, present a challenge as activities compete for the same resources and often spatially overlap and impact on sensitive ecosystems and high potential natural resource areas. Added to this already challenging scenario is the impact of climate change. High drought tendencies and an increase in the number of very hot days will place increasing pressure on all industry sectors reliant on water and will also affect viability of certain agricultural crops and livestock.



5.2 Way forward

Phase 3 of the LSDF 2016 review process entails the formulation of spatial proposals in the form of an **indicative plan** and **spatial focus areas**.

This will be done taking cognisance of the outcomes of the spatial analysis completed in Phase 2, as well as the analysis of legislation and policy guidance completed in Phase 1.

