

GN R543 Regulation 31(2)(f) requires that the environmental impact assessment report contains *'a description of the need and desirability of the proposed activity'*. This section follows the DEADP Guideline on Need and Desirability (DEA&DP, 2010) in addressing the question of need and desirability for the Project.

The DEA&DP Guideline on Need and Desirability (2010) notes that the National Spatial Development Perspective (NSDP) states that to achieve the goal of stimulating sustainable economic activities and to create long-term employment opportunities, it is required that development is focused in priority area with potential for economic development, with development to serve the broader societies' needs equitably.

The DEA&DP Guideline on Need and Desirability (2010) further notes that it has become *'clear that the ad hoc nature of project-level EIA decision-making, with limited opportunities for public engagement, and the reality of time and resource constraints, do not allow for prolonged participative processes, and can therefore never substitute or replace the participative processes that should frame and inform all democratic decision-making. The strategic context for informing need and desirability is therefore best addressed and determined during the formulation of the sustainable development vision, goals and objectives of Integrated Development Plans ("IDPs") and Spatial Development Frameworks ("SDFs") during which collaborative and participative processes play an integral part, and are given effect to, in the democratic processes at local government level.'*

The DEA&DP Guideline on Need and Desirability (2010) also states that the *'need and desirability of development must therefore be measured against the ...contents of the credible IDP, SDF and EMF for the area, and the sustainable development vision, goals and objectives formulated in, and the desired spatial form and pattern of land use reflected in, the area's IDP and SDF. While project-level EIA decision-making therefore must help us stay on course by finding the alternative that will take us closer to our desired aim/goal, it is through Integrated Development Planning (and the SDF process) that the desired destination is to be decided and the map drawn of how to get there.'*

Taking the above into consideration the relevant IDP, SDF and EMF are discussed below.

5.1

CITY OF CAPE TOWN INTEGRATED DEVELOPMENT PLAN 2012 - 2017

The City of Cape Town's Integrated Development Plan (IDP) 2012-2017 provides the strategic framework that guides the municipality's planning and budgeting over the course of each political term. The current IDP for the period 2012 to 2017 sets out five strategic focus areas, namely the City of Cape Town as:

- the opportunity city;
- the safe city;
- the caring city;
- the inclusive city; and
- the well-run city.

5.1.1 *The Opportunity City*

The aim of the opportunity city as a strategic focus area is to create an economically enabling environment in which investment can grow and jobs can be created. Various initiatives and programmes are identified which will aid the City of Cape Town stimulate economic growth and create more employment opportunities. These initiatives will be pursued with a view to building the potential in key markets where the City of Cape Town can develop a competitive advantage. Markets identified include agro-processing, tourism, major events, oil and gas, shipping and ship-building, health and medical technology, services and the green economy.

The IDP states *'Only the market – as a key part of an economic-enabling environment that allows for competitive and inclusive growth – can truly provide the opportunities that lift people out of poverty and provide them with dignity. Governments have a critical role to play in facilitating the requisite economic environment for these twin imperatives. The City plays such a role through its commitment to infrastructure led growth, lending the support that governments can and must provide to enable economic growth. At the same time, the City must get out of the way of business, for only business can create the sustainable jobs that this city and our country so desperately need.'* The approach therefore of this strategic focus area is one more of allowing the free, competitive market to stimulate economic activity leading to overall economic growth and opportunity in the long-term.

Objective 1.1 of the opportunity city strategic focus is to *'Create an enabling environment to attract investment that generates economic growth and job creation.'* Under this objective, the *Programme 1.1(c): Identification and promotion of catalytic sectors, such as oil and gas* aims to stimulate the growth and development of the local economy and development in identified catalytic sectors, which include marine, oil and gas, ship repair and boat-building. Under this programme the City of Cape Town undertakes to explore mechanisms to improve business opportunities around small-boat harbours and, in partnership with Transnet, work towards the improvement of Port Cape Town, continuing to promote the upgrade of harbour operations and facilities.

5.2 **CITY OF CAPE TOWN TABLE BAY DISTRICT SPATIAL DEVELOPMENT PLAN 2012**

The Table Bay District Spatial Development Plan (SDP) is informed by the city-wide Cape Town Spatial Development Framework (CTSDF). The SDP sets out the following key strategies (CCT, 2012a):

- *'Aligning with and facilitating the implementation of the Provincial Spatial Development Framework (PSDF), Cape Town's Integrated Development Plan (IDP) and Cape Town Spatial Development Framework within the district;*
- *Performing part of a package of decision support tools to assist in land use and environmental decision making processes;*
- *Delineating fixes and sensitivities which will provide an informant to such statutory decision making processes;*
- *Clearly giving direction to the form and desired structure of areas for new urban development as well as areas for land use change in the district in a manner that is in line with the principles and policies of higher level planning frameworks;*
- *Providing a strategic informant to public and private investment initiatives which will assist in achieving the principles and policies of higher level planning frameworks;*
- *Informing the development of priorities for more detailed local area planning exercises and frameworks that should provide detailed guidance to land use management and public and private investment.'*

5.2.1

Key Spatial Strategies

The relevant identified key spatial strategies of the SDP are discussed below:

Strategy 1: Plan for employment and improve access to economic opportunities. This strategy focuses on encouraging economic development, both formal and informal, in accessible location so that opportunities can be accessed by a broad range of people. One of the identified actions for this strategy is to continue to attract investment into the central city while supporting investment and infrastructural upgrade in emerging economic areas, as well as in areas with latent economic potential. It can be argued that the Project represents investment in the City of Cape Town which will unlock latent economic potential of the Port of Cape Town. However, this must be balanced with any potential negative socio-economic impacts as a result of the Project. Another identified action in the SDP is the intensification of economic activity in the economic opportunity areas, which are associated with the primary accessibility routes. The Port of Cape Town falls within this designated economic opportunity areas (see *Figure 5.1*).

Figure 5.1 Economic Opportunity Areas Associated with the Accessibility Grid



Source: CCT, 2012a

Strategy 2: Manage a sustainable form of urban growth and create a balance between urban development and environmental protection. The SDP notes that urban development should be directed away from significant natural asset resource areas, and should occur as a priority within the existing development footprint (such as development of underutilised infill sites or other forms of densification). The Port of Cape Town falls within the identified urban development priority areas as informed by the SDP (see Figure 5.2). It can be argued that the Project is an example of development in an underutilised infill site and promotes densification similar economic activities.

Figure 5.2 Natural Assets, Development Edges and Urban Development

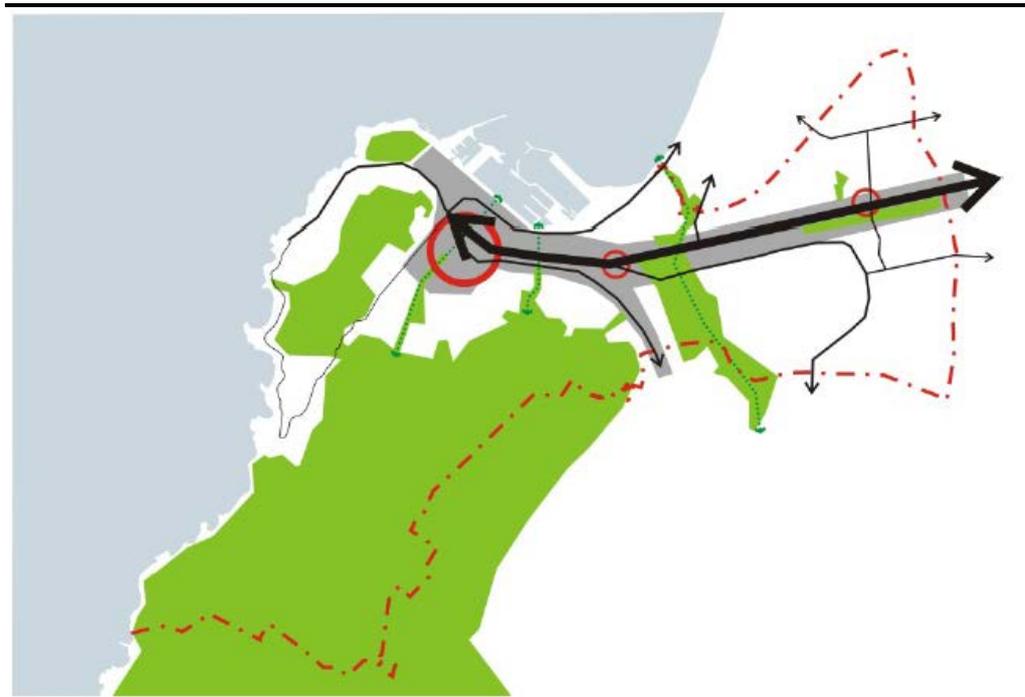


Source: CCT, 2012a

The SDP further sets out an overall spatial vision for the district. One of the key points of this vision is 'The increased intensification of the urban corridor between Cape Town CBD and Bellville' (CCT, 2012a) (see Figure 5.3). The

proposed Project, as an infrastructure development along this corridor is aligned with this point.

Figure 5.3 *Urban Corridor Between Cape Town CBD and Bellville*



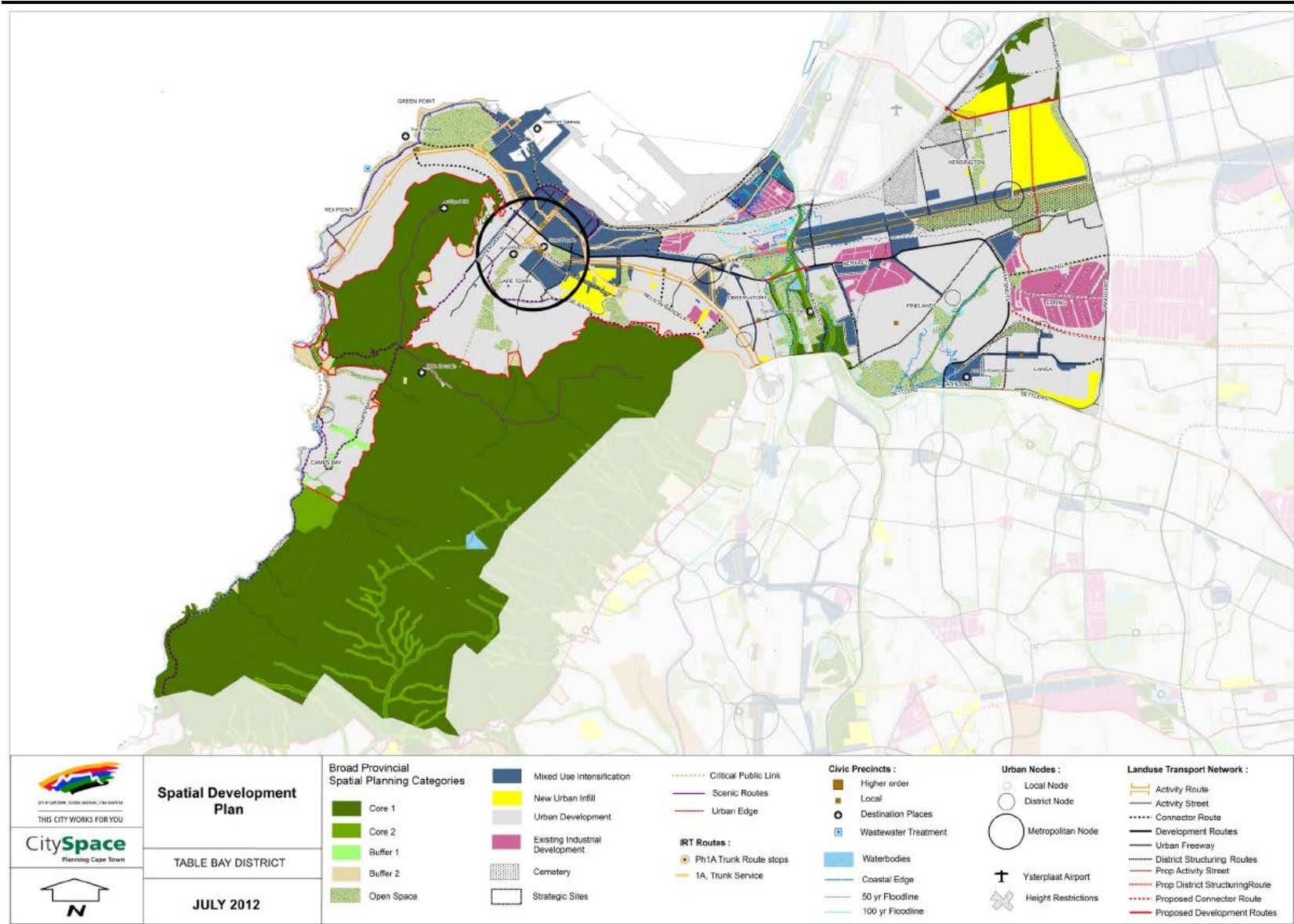
Source: CCT, 2012a

The SDP identifies various spatial planning categories for the district. The Project location, including the whole of the Port of Cape Town falls within the identified 'Urban Development' category (see Figure 5.4). Therefore the proposed development is in line with the SDP. The SDP further identifies 'Precautionary Areas'. The Port of Cape Town is identified as a potential coastal flood risk area. Two key recommendations of the SDP regarding coastal flood risk areas are ((CCT, 2012a)):

- '1. Where possible, avoid major new urban development infrastructure and bulk services investment in coastal areas that are vulnerable to coastal storm events and inundation.*
- 2. Redevelopment (intensification) and new urban development proposed in these areas should reflect consideration of potential flood risks and include mitigatory measures where necessary.'*

Considering the Project is located on the Eastern Mole terminal, the site is protected from storm events by the breakwater, which provides protection from storm surges to the whole Port of Cape Town. The Port of Cape Town is potentially at risk from sea level rise as a result of climate change. However, this would be a relatively slow and incremental rise, and mitigation measures could be developed as required.

Figure 5.4 Table Bay District Spatial Development Plan



Source: CCT, 2012a

The EMF describes the Environmental Impact Management Zones (EIMZ), which are to be considered in planning, development and environmental and land management decisions. The EMF also gives guidelines for the management of each EIMZ. The EMF identifies the following EIMZs (CCT, 2012a):

- Hydrological Zone;
- Coastal and Dune Zone;
- Conservation and Biodiversity Priority Zone;
- Cultural and Recreational Resources Zone;
- Natural Economic Resources Zone; and
- Urban Uses and Utilities Zone.

The relevant EIMZs to the Project are discussed below.

Hydrological Zone: While the Project location does fall with the identified Hydrological Zone, there is little specific relevance other than a risk of coastal flooding, which is catered for under the Coastal and Dune Zone.

Coastal and Dune Zone: The Project location falls within the identified Coastal Risk Areas. These are areas that have been previously developed, but are identified as being vulnerable to flooding. The EMF does not give specific guidelines on these areas, but rather states that the City of Cape Town will be developing a policy for management of the coastal areas, and that in all cases a precautionary approach must be adopted and emergency planning for flood and storm events be undertaken.

Conservation and Biodiversity Priority Zone: The Project location falls outside the identified conservation and biodiversity priority areas.

Cultural and Recreational Resources Zone: The Project location fall inside the identified Special Areas. Under activities that would be undesirable in this location, the EMF states that any '*alterations, additions or new structures unsympathetic to protected buildings or the general character of the area*' would be undesirable, and any '*Industrial activities*'. For activities that are desirable in this location the EMF states any '*Appropriate residential and commercial activities that are in keeping with the character of the area*'. In considering the proposed Project, the Project is located on the Eastern Mole in the port of Cape Town which is already an industrial area. Furthermore considering there are already bulk storage facilities in the Port of Cape Town and on the Eastern Mole, the proposed Project is in keeping with the character of the area.

Natural Economic Resources Zone: The Project location does not into an identified priority natural mineral resource area.

Urban Uses and Utility Zone: The Project location does not fall within an identified zone within this EIMZ. However, closest to the Project location are two identified industrial zones. The Project location is however located in an existing industrial and commercial area in the Port of Cape Town. The guidance pertaining to undesirable activities in the identified industrial and commercial areas includes '*Any upgrades or additional industrial activities which exceed air emission standards or will contribute to ambient pollution exceedences*' and '*Heavy (scheduled) industrial activity*'. The Project given the appropriate mitigation measures will result in neither of these. Activities in an industrial zone that are desirable include light industrial, commercial and infill development.

The above IDP, SDP and EMF although not directly applicable to the Project, inform the below discussed Port of Cape Town Port development Plan which directly influences the Project.

5.4 *PORT OF CAPE TOWN PORT DEVELOPMENT PLAN*

As mentioned in Chapter 2 the Port Development Plan (PDP) for the Port of Cape Town was developed by Transnet, as were other PDPs for other ports in South Africa. The PDP notes in terms of expansion activities, "*The port is currently expanding the container terminal to handle larger vessels and increase throughput capacity. Short term plans include a dedicated two-berth passenger terminal, the expansion of the landside area for ship repair and the development of 160ha of the Culemborg site for back-of-port commercial logistics. Medium term plans include expanding the container stacking seaward and in the long-term building an outer basin for an additional four-berth container terminal, and five extra liquid bulk berths*" (Transnet, 2013). The PDP also contains short, medium and long term port layout plans. Regarding the liquid bulk areas, the short term layout earmarks the entire Eastern Mole for this purpose. Therefore the proposed Project is in alignment with the Port of Cape Town Port Development Plan (see Figure 2.1).

5.5 *FINANCIAL VIABILITY*

A Fuel Sector Specialist Assessment (see Annex I) has been undertaken as part of this EIA process. One of the aspects assessed by this specialist study was the question of financial viability of the Project. The key requirements for the viability of a project of this nature are an anchor tenant, efficiency, capability to handle clean fuels and a connection into the Chevron white oil pipeline receiving facility to the Chevron Refinery. Storage of strategic stocks for companies without facilities in Cape Town would be an added benefit. The above mentioned requirements have been met by the Project as follows:

- An anchor tenant agreement has been signed with a major oil company and additional agreements including strategic stock storage will be advanced.

- The facility has been designed for efficiency which is primarily driven by size, as similar staffing levels would be required for a smaller facility and smaller tanks would be more expensive on a cost/volume basis.
- Capability to handle cleaner fuels is an essential component to minimise the cross contamination of product and would further enhance the viability given the increasing demand for these fuels as the demand will not be able to be met by the Chevron Refinery.
- Connectivity into the Chevron pipeline enables product from the refinery to be received into the facility and road hauled into the supply area.
- Storage of 14 days strategic stocks for those companies without storage in the Cape Town supply area would require ~40 Ml of storage.

Considering the drivers above, the Fuel Sector Specialist Assessment concludes that there is a high probability that the proposed Project will be financially viable. In addition, the facility would offer a platform to members of the industry, who are dependent on Chevron for offloading and pipeline facilities, to negotiate competitive supply agreements with the Chevron Refinery. Furthermore it would improve the security of supply to the area and access to petrol⁵⁰ and diesel⁵⁰ to those oil companies which choose to market the products required for customers whose passenger vehicle engines meet European emission standards.

5.6

ANALYSIS OF THE 'NEED' OF THE PROJECT

The Project, as discussed above, is in line with the relevant IDP, SDF, EMF and PDP. There is no reason why this development should not be considered at this particular point in time considering the growing demand of fuel in the Western Cape. The required services are available on site to cater for the development, and there is already bulk storage fuel facilities located in the area.

The Project will bring increased fuel storage infrastructure, and allow for fuel importation thereby increasing the security of supply to the Western Cape. This speaks to the need of the Project for the local community in the context of a growing fuel demand. However, this must be balanced by any potential negative impacts on the supply from the Chevron Refinery which currently supplies the Western Cape with fuel (see *Chapter 8*).

The oil and gas sector plays an important role in the development of Cape Town's economy and the contribution it makes to the city's economy is expected to grow. Analysts forecast that the industry will contribute R7, 2

billion to Cape Town's economy and employ roughly 11 400 people by 2014 ⁽¹⁾.

The oil and gas sector has been identified as a priority sector by the City of Cape Town and investment into this sector is being promoted ⁽²⁾. Additionally, the location of Cape Town is ideally positioned to service the demands of Africa's oil and gas sector ⁽³⁾.

The Department of Energy (DoE) (previously known as the Department of Minerals and Energy), identified a number of capacity constraints and challenges faced by the petroleum sector in meeting energy demand in the 'Energy Security Master Plan - Liquid fuels'.

They have identified that the logistical infrastructure associated with the petroleum industry have been under pressure especially within ports and the depots of oil companies.

More specifically, the lack of fuel offloading infrastructure at ports, minimal on-loading and offloading infrastructure as well as minimal storage capacity have all been highlighted by the DoE as decreasing the petroleum industry's ability to adequately deal with supply irregularities as well as adversely impacting on both petroleum pipelines and rail operations ⁽⁴⁾.

One of the short-term solutions identified by the DoE to increase fuel security in South Africa is to update and increase liquid fuel handling facilities at ports.

Ports are considered an integral part of the petroleum industry's logistical value chain. However, an increased demand for imports may put additional strain on the Cape Town harbour. This will be amplified from 2017 onwards when Clean Fuels must be available to the South African market and it is widely assumed that infrastructure to handle additional imports will be critical.

Investment into infrastructure such as fuel storage depots has been identified as a solution to relieve some of the pressure currently faced by ports and other sections of the petroleum supply chain. A study conducted by the Fuel Supply Strategic Task Team (FSSTT), has shown that most of the current depots are unable to receive large pipeline shipments ⁽⁵⁾.

An economic specialist study has been undertaken as part of this EIA and is included as *Annex I*.

(1) City of Cape Town IDP 2011 review

(2) City of Cape Town IDP 2011 review

(3) 'Investors prefer Cape Town' (article)

(4) Department of Minerals and Energy- Energy Security Master Plan- Liquid Fuels

(5) Department of Minerals and Energy- Energy Security Master Plan- Liquid Fuels

The proposed development is one of the better practicable environmental options for this particular site, given the industrial zoning of the area, the vacant land with very low biodiversity present, the fact that the adjacent site is already used as a bulk fuel storage facility and the strategic location within the Port of Cape Town. The approval of the Project would not compromise the integrity of the existing approved and credible IDP, SDF and EMF as described above.

The location does favour the proposed land use, as the Port of Cape Town is a strategic location for the import, export and storage of bulk fuel. Again, there are existing bulk fuel storage facilities in the area at the Port of Cape Town.

The findings of the impact assessment (see *Chapter 8*) show that the potential impacts on the natural and the cultural heritage in the area is negligible. Considering the industrial zone of the area and the already existing bulk storage facilities in the Port of Cape Town, there is no anticipated negative impact on the sense of place of the area as a result of the development. In terms of health and safety, given the mitigation measures stipulated in this EIR are adhered to, the health and safety risks of the facility can be mitigated.

From an economic perspective, it is not anticipated that the approval of the Project will result in unacceptable opportunity costs for the site. The site has been marked by Transnet National Ports Authority specifically for the proposed land use. The site is currently vacant with no other potential uses being considered. The Project aims to have the site utilized by an ongoing, sustainable, profitable business. The proposed Project is also not anticipated to result in unacceptable cumulative impacts (see *Chapter 8*).