

APPENDIX J - IMPACT TABLES

Geographical and Physical Impacts

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Construction activities can affect the underlying geological layers on site to some extent.
Nature of impact:	Disturbance to subsurface geological layers.
Extent and duration of impact:	Extent 1 (footprint) & Duration 2 (two to five years)
Consequence of impact or risk:	Construction and excavation activities can affect the underlying geological layers on site to some extent.
Magnitude:	2 (Minor)
Probability of occurrence:	2 (Improbable: some possibility, but low likelihood)
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Disturbance to surrounding subsurface geological layers.
Cumulative impact prior to mitigation:	It is not anticipated that the impact will be high as the affected substrata is deep and the integrity of the underlying ground structures will not be sacrificed.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	10 - Low
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	Demarcation and work within demarcated areas only.
Residual impacts:	It is not anticipated that the impact will be high as the affected substrata is deep and the integrity of the underlying ground structures will not be sacrificed.
Cumulative impact post mitigation:	It is not anticipated that the impact will be high as the affected substrata is deep and the integrity of the underlying ground structures will not be sacrificed.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Not applicable
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Soil erosion and dust
Nature of impact:	<p>Construction activities will cause a disturbance to the soil and the vegetation cover on the site. This disturbance, unless carefully managed, could spread as a result.</p> <p>Soil erosion can occur due to wind (wind erosion cause dust pollution); and due to overland storm water flow should rains fall during construction. Due to the sloping nature of the terrain, it is unlikely that a shallow perched water table will develop on site. Residual soils are also expected to have a very low permeability and due to low infiltration rates and the sloping terrain, water will tend to runoff from surface in a downslope direction.</p> <p>Soil erosion can occur due to wind (wind erosion causes dust pollution).</p>
Extent and duration of impact:	Extent 3 & Duration 5
Consequence of impact or risk:	Construction and excavation activities can result in erosion and dust.
Magnitude:	6
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Disturbance to surface area can result in erosion and dust generation.
Cumulative impact prior to mitigation:	Exposing soil may lead to erosion and dust generation if not mitigated.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	56 - Medium

APPENDIX J - IMPACT TABLES

Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	Control access to roads and other areas to avoid disturbance of areas outside the development footprint. Undertake dust suppression as needed. Personnel should be restricted to the camp site and immediate construction areas only. Undertake storm water management measures as required, with special attention to storm water management that may be required upslope. Rehabilitate or stabilise eroded areas immediately to prevent increase in erosion.
Residual impacts:	None
Cumulative impact post mitigation:	It is not anticipated that the impact will be high if the mitigation measures are adhered to.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Potential erosion of the site and surrounds due to stormwater flow or flooding
Nature of impact:	Soil erosion or flooding of the site and surrounds due to excessive stormwater flow or obstructions in stormwater infrastructure
Extent and duration of impact:	Extent 3 Duration 5
Consequence of impact or risk:	Soil erosion which can occur due to overland storm water flow and flooding should heavy rains fall.
Magnitude:	6
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	Partial loss of resource, but can be rehabilitated
Degree to which the impact can be reversed:	100% Reversible
Indirect impacts:	Exposing soil may lead to erosion of site and surrounds if not mitigated.
Cumulative impact prior to mitigation:	Exposing soil may lead to erosion of site and surrounds if not mitigated.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	56-Medium
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	Disturbed and open space areas must be rehabilitated and planted with indigenous vegetation to promote rehabilitation. If erosion is detected implement erosion rectification and preventions measures as guided by an ECO Frequent (three monthly and/or after heavy rains) litter and debris removal from the stormwater channels must be conducted to prevent potential flooding, erosion and improve water quality.
Residual impacts:	None
Cumulative impact post mitigation:	Good stormwater management and prevention of erosion and flooding
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Impact of construction activities on surface and underground water pollution.
Nature of impact:	Diesel and oil spills affecting ground and surface water.
Extent and duration of impact:	Extent 3 (Within a 20 km radius of the centre of the site) & Duration 2 (2 - 5 years)
Consequence of impact or risk:	Possible pollution of surface and ground water.
Magnitude:	4 - Low
Probability of occurrence:	4 - most likely
Degree to which the impact may cause irreplaceable loss	PR

APPENDIX J - IMPACT TABLES

of resources:	
Degree to which the impact can be reversed:	PR
Indirect impacts:	Pollution of water resources.
Cumulative impact prior to mitigation:	Diesel and oil spills affecting ground and surface water quality.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	36 - Medium
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	Mitigation measures included in EMP, attached as Appendix H, shall be adhered to.
Residual impacts:	It is not anticipated that the impact will be high if the mitigation measures are adhered to.
Cumulative impact post mitigation:	Diesel and oil spills affecting ground and surface water quality.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Not applicable.
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Impact of noise on surrounding environment.
Nature of impact:	<p>Environmental noise pollution. Nuisance impacts could relate to the increase noise and disturbance associated with the proposed development, e.g. noise, traffic etc.</p> <p>Construction activities and construction personnel on the sites, and construction vehicles moving to and from the sites would cause an increase in noise in the area, which may impact negatively upon the adjoining landowners.</p>
Extent and duration of impact:	3 Local & 1 Short term
Consequence of impact or risk:	Noise pollution
Magnitude:	3 – Probable
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	R
Indirect impacts:	Impacts on fauna and local residents
Cumulative impact prior to mitigation:	Low
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	28 – Low
Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Medium
Proposed mitigation:	<p>Working hours will be restricted to normal working hours.</p> <p>All noise and sounds generated by plant or machinery must adhere to SABS 0103 specifications for the maximum permissible noise levels.</p> <p>All plant and machinery are to be fitted with adequate silencers.</p> <p>No sound amplification equipment such as sirens, loud hailers or hooters may be used on site, after normal working hours, except in emergencies.</p> <p>If work is to be undertaken outside of normal work hours, permission must be obtained from the Local Authority.</p>
Residual impacts:	None
Cumulative impact post mitigation:	Noise of construction activities may affect surrounding environment.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Impact of noise on surrounding environment.
Nature of impact:	Environmental noise pollution. Nuisance impacts could relate to the increase noise and disturbance associated with the proposed development, e.g.

APPENDIX J - IMPACT TABLES

	noise, traffic etc.
Extent and duration of impact:	3 Local & 5 Permanent
Consequence of impact or risk:	Noise pollution
Magnitude:	6
Probability of occurrence:	5 - Definite
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	R
Indirect impacts:	Impacts on local residents and current ambience of the adjacent community.
Cumulative impact prior to mitigation:	The current ambience of the local community will be altered as a result of the additional residence to the suburb of Louville.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	70- High
Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Medium
Proposed mitigation:	It is not envisioned that the impact n noise will result in a dramatic change in the environmental noise and nuisance as currently experienced in surrounding residential areas. Although there may be a marked increase in general noise it is not likely that it will impact severely on adjacent residents.
Residual impacts:	None
Cumulative impact post mitigation:	Impacts on local residents and current ambience of the adjacent community.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Medium
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

BIOLOGICAL IMPACTS:

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Loss of and impacts on low sensitivity terrestrial indigenous vegetation
Nature of impact:	The proposed development will result in the loss of indigenous vegetation.
Extent and duration of impact:	Extent 2 & Duration 5
Consequence of impact or risk:	<p>The habitat loss is deemed to be permanent (>15 years).</p> <p>The original vegetation type occurring within the area is Saldanha Granite Strandveld listed as Endangered. However the site has no remaining natural vegetation in good condition (i.e. no viable populations of threatened or localised plant species). All ecological processes on the site have been significantly impacted by soil disturbance (excavations, site clearance, urban development etc.), inappropriate fire regimes, loss of pollinators and seed dispersers, alien-, weed- and garden plant invasion, habitat fragmentation due to urban development and the creation of the concrete storm water drainage line along the southern border. The heavily disturbed and isolated site also present a very difficult conservation and/or rehabilitation challenge, and formal conservation or rehabilitation of the site is therefore highly unlikely and not feasible.</p> <p>No loss of high sensitivity habitat or plant species of conservation concern will take place as a result of this proposed development; however habitat will be lost and therefore a medium impact on processes is expected to occur.</p>
Magnitude:	4
Probability of occurrence:	5
Degree to which the impact may cause irreplaceable loss of resources:	Partial loss of resource will occur (restricted to proposed development area)
Degree to which the impact can be reversed:	100% Reversible with rehabilitation
Indirect impacts:	Habitat fragmentation and loss of ecological connectivity
Cumulative impact prior to mitigation:	Habitat fragmentation and loss of ecological connectivity
Significance rating of impact prior to mitigation	55 - Medium

APPENDIX J - IMPACT TABLES

(e.g. Low, Medium, Medium-High, High, or Very-High)	
Degree to which the impact can be avoided:	Low
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	Low
Proposed mitigation:	<p>The southern concrete stormwater channel and its associated 1:100 year floodline area are to be demarcated as a “no-go” area for the duration of the construction phase of the development unless activities relate to installation of service and road infrastructure or rehabilitation of disturbed area.</p> <p>No construction related disturbance should be allowed outside of the proposed development areas. This includes no dumping of fill, no roads, and all forms of temporary disturbance.</p> <p>Implement site specific erosion and storm water runoff management measures to prevent (or if prevention is not possible limit) any erosion from occurring on the development footprint area and surrounds.</p>
Residual impacts:	None.
Cumulative impact post mitigation:	Ongoing protection of hydrological functioning of stormwater channel and areas around the channel is to be excluded from the developable area and is to be zoned as public open space.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Medium
OPERATIONAL PHASE	
Potential impact and risk:	With ongoing protection and maintenance of the southern stormwater channel to ensure hydrological functioning it is not expected that the operational phase will have any significant impact on indigenous vegetation.
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase, but with a high positive impact of site rehabilitation after decommissioning.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Impact on terrestrial fauna and avifauna occurring on the site and surrounds
Nature of impact:	The proposed development will result in the loss of indigenous vegetation potentially forming part of fauna and avifauna habitats.
Extent and duration of impact:	Extent 2 & Duration 5
Consequence of impact or risk:	No loss of high sensitivity habitat or fauna or avifauna Species of Conservation Concern will take place as a result of this proposed development.
Magnitude:	4
Probability of occurrence:	5
Degree to which the impact may cause irreplaceable loss of resources:	Partial loss of resource will occur (restricted to proposed development area)
Degree to which the impact can be reversed:	100% Reversible with rehabilitation
Indirect impacts:	Habitat fragmentation and loss of ecological connectivity
Cumulative impact prior to mitigation:	<p>Habitat fragmentation and loss of ecological connectivity.</p> <p>Loss of; and impacts on Low Sensitivity terrestrial fauna and avifauna habitat.</p> <p>Which in turn will lead to potential displacement of fauna and avifauna species inhabiting/visiting the site.</p> <p>No indigenous fauna or avifauna species were recorded during the survey and due to the location of the site within an active urban setting as well as the significant transformed state of the natural habitat on site it is not expected that any indigenous fauna or avifauna of conservation concern inhabits this site and may only occasionally visit the site for short periods of time.</p>
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	55 - Medium
Degree to which the impact can be avoided:	Low
Degree to which the impact can be managed:	High

APPENDIX J - IMPACT TABLES

Degree to which the impact can be mitigated:	Low
Proposed mitigation:	<p>The southern concrete stormwater channel and its associated 1:100 year floodline area are to be demarcated as a “no-go” area for the duration of the construction phase of the development unless activities relate to installation of service and road infrastructure or rehabilitation of disturbed area.</p> <p>No construction related disturbance should be allowed outside of the proposed development areas. This includes no dumping of fill, no roads, and all forms of temporary disturbance.</p> <p>Implement site specific erosion and storm water runoff management measures to prevent (or if prevention is not possible limit) any erosion from occurring on the development footprint area and surrounds.</p>
Residual impacts:	None.
Cumulative impact post mitigation:	Ongoing protection of hydrological functioning of stormwater channel and areas around the channel is to be excluded from the developable area and is to be zoned as public open space.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	With ongoing protection and maintenance of the southern stormwater channel to ensure hydrological functioning it is not expected that the operational phase will have any significant impact on fauna or avifauna occurring within the area.
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase, but with a high positive impact of site rehabilitation after decommissioning.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Impact on terrestrial Critical Biodiversity Areas and Ecological Support Areas
Nature of impact:	Loss of areas mapped as terrestrial CBA and ESA
Extent and duration of impact:	Extent 2 & Duration 5
Consequence of impact or risk:	<p>Approximately 2ha of the south and south-eastern sections of the site is mapped as terrestrial Critical Biodiversity Area, Ecological Support Areas and Ecological Support Area 2 (Restore).</p> <p>There are no natural habitat nor flora or fauna species of conservation concern remaining on site, only a concrete storm water channel along the southern border of the site.</p> <p>The hydrological functioning of the stormwater channel along the southern border is to be maintained due to the supporting role which it plays in replenishing water resources which in turn maintains ecological functioning of remaining undeveloped areas surrounding Louville, therefore this area has been mapped as important to maintain current hydrological functioning. The concrete stormwater channel and its associated 1:100 year floodline area which includes most of the mapped CBA, ESA and ESA2 areas on site have been excluded from the proposed development area (accept for required services infrastructure i.e. the access road which will be along existing access road over the channel) to be maintained as Public Open Space and therefore hydrological functioning of the stormwater channel will be maintained</p>
Magnitude:	4
Probability of occurrence:	5
Degree to which the impact may cause irreplaceable loss of resources:	Partial loss of resource will occur (restricted to proposed development area)
Degree to which the impact can be reversed:	100% Reversible with rehabilitation
Indirect impacts:	Habitat fragmentation and loss of ecological connectivity associated with mapped CBAs and ESAs.
Cumulative impact prior to mitigation:	Habitat fragmentation and loss of ecological connectivity associated with mapped CBAs and ESAs.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	55- Medium
Degree to which the impact can be avoided:	Low
Degree to which the impact can be managed:	High

APPENDIX J - IMPACT TABLES

Degree to which the impact can be mitigated:	Low
Proposed mitigation:	<p>The southern concrete stormwater channel and its associated 1:100 year floodline area are to be demarcated as a “no-go” area for the duration of the construction phase of the development unless activities relate to installation of service and road infrastructure or rehabilitation of disturbed area.</p> <p>No construction related disturbance should be allowed outside of the proposed development areas. This includes no dumping of fill, no roads, and all forms of temporary disturbance.</p> <p>Implement site specific erosion and storm water runoff management measures to prevent (or if prevention is not possible limit) any erosion from occurring on the development footprint area and surrounds.</p>
Residual impacts:	None
Cumulative impact post mitigation:	Ongoing protection of hydrological functioning of stormwater channel and areas around the channel is to be excluded from the developable area and is to be zoned as public open space.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Impact on terrestrial Critical Biodiversity Areas and Ecological Support Areas
Nature of impact:	Loss of areas mapped as terrestrial CBA and ESA
Extent and duration of impact:	3 Local & 5 Permanent
Consequence of impact or risk:	The hydrological functioning of the stormwater channel along the southern border is to be maintained due to the supporting role which it plays in replenishing water resources which in turn maintains ecological functioning of remaining undeveloped areas surrounding Louwville.
Magnitude:	6
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	Partial loss of resource
Degree to which the impact can be reversed:	100% Reversible with rehabilitation
Indirect impacts:	Habitat fragmentation and loss of ecological connectivity associated with mapped CBAs and ESAs.
Cumulative impact prior to mitigation:	Habitat fragmentation and loss of ecological connectivity associated with mapped CBAs and ESAs.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	56- Medium
Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	<p>Disturbed and open space areas must be rehabilitated and planted with indigenous vegetation to promote rehabilitation.</p> <p>If erosion is detected implement erosion rectification and preventions measures as guided by an ECO</p> <p>Frequent (three monthly and/or after heavy rains) litter and debris removal from the stormwater channels must be conducted to prevent potential flooding, erosion and improve water quality.</p> <p>Ongoing protection and maintenance of southern stormwater channel and its associated 1:100 year floodline area to ensure protection of hydrological functioning</p>
Residual impacts:	None
Cumulative impact post mitigation:	Ongoing protection of hydrological functioning of stormwater channel and areas around the channel is to be excluded from the developable area and is to be zoned as public open space.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

SOCIO-ECONOMIC IMPACTS

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Jobs
Nature of impact:	Increased jobs for the local community.
Extent and duration of impact:	Extent 3 & Duration 1

APPENDIX J - IMPACT TABLES

Consequence of impact or risk:	Increase in household income
Magnitude:	8 (POSITIVE)
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	R
Degree to which the impact can be reversed:	Positive
Indirect impacts:	Improves economy
Cumulative impact prior to mitigation:	Positive
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	48 - Medium (POSITIVE)
Degree to which the impact can be avoided:	Positive
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Positive
Proposed mitigation:	Contractor should employ disadvantaged persons from the community as far as reasonability practicable.
Residual impacts:	None
Cumulative impact post mitigation:	Positive
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Medium (Positive)
OPERATIONAL PHASE	
Potential impact and risk:	Not applicable
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Traffic
Nature of impact:	Increased traffic along Kootjieskloof street as a result of construction vehicles.
Extent and duration of impact:	Extent 3 & Duration 2
Consequence of impact or risk:	Congestion and noise for surrounding landowners / residents and other road users. Impact on the natural environment.
Magnitude:	6
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Impacts on the environment, surrounding land uses, landowners, and personnel working on site.
Cumulative impact prior to mitigation:	Congestion and noise.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	44 - Medium
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	<p>Contractors will at all times be responsible for compliance by their delivery service providers as engaged. Delivery times will be limited to working times as defined in this document.</p> <p>Contractors have the responsibility of advising the property security staff of deliveries expected and to be executed. Contractors must further ensure that drivers of service providers are informed of all procedures and restrictions e.g. which access road to use, speed limits, no-go areas, demarcated construction areas, and maximum allowed vehicle mass etc., as applicable before their first visit to site. Washing of service provider delivery vehicles and equipment will not be allowed on the property and must be carried out elsewhere.</p>
Residual impacts:	Congestion and noise.
Cumulative impact post mitigation:	Site is secure and there is no unauthorised entry. No members of the public/ landowners injured.

APPENDIX J - IMPACT TABLES

Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Traffic (vehicular and pedestrian)
Nature of impact:	Increased traffic along Kootjieskloof street, and within Louvville as a result of the additional residents.
Extent and duration of impact:	Extent 3 & Duration 5
Consequence of impact or risk:	Congestion, vehicular noise, and pedestrian safety.
Magnitude:	6
Probability of occurrence:	3
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Accidents and injuries to pedestrians.
Cumulative impact prior to mitigation:	Increased congestion of Kootjieskloof Road as a result of the access road proposed on Kootjieskloof Road. Vehicular noise as a result of the additional cars / public transport needed for the proposed development. Increased pedestrian traffic.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	42 - Medium
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	Traffic control to be implemented such as speed restrictions / speed humps. The implementation of stop streets and traffic control to regulate traffic and maintain flow in Kootjieskloof Road. Vehicular noise would be similar to that currently experienced within the existing suburb of Louvville. Pedestrian safety can be increased by placing lights along footpaths. Safety awareness should be increased within the community and with the community policing forums to the extent that they exist.
Residual impacts:	None.
Cumulative impact post mitigation:	Decrease in potential congestion due to traffic control implementation. Pedestrian safety awareness within the Louvville community.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Medium
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Property value and unforeseen opportunity costs
Nature of impact:	Construction activities associated with the proposed development may impact on property values of the adjacent land owners.
Extent and duration of impact:	Extent 3 & Duration 2
Consequence of impact or risk:	Loss of potential income as a result of the construction activities affecting adjacent residential erven and property sales adjacent to the proposed development.
Magnitude:	2
Probability of occurrence:	2
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Nuisance and loss of sense of place.
Cumulative impact prior to mitigation:	Potential decrease in property value due to the loss of sense of place.

APPENDIX J - IMPACT TABLES

Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	14 - Low
Degree to which the impact can be avoided:	Low
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Low
Proposed mitigation:	Effective communication with affected and surrounding landowners; Addressing of any issues and concerns raised as far as possible in as short a timeframe as possible. Construction activities to be strictly within working hours as per the EMPr.
Residual impacts:	None.
Cumulative impact post mitigation:	Nuisance and loss of sense of place. It must be noted that this will only be during construction activities which is not a long term activity.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Property value and unforeseen opportunity costs
Nature of impact:	Increased medium density housing adjacent to existing medium density housing may impact on property values of the adjacent land owners.
Extent and duration of impact:	Extent 3 & Duration 2
Consequence of impact or risk:	Increased medium density housing adjacent to existing medium density housing may impact on property values of the adjacent land owners.
Magnitude:	2
Probability of occurrence:	2
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Residents may move out of the area as a result of the proposed development. Loss of sense of place.
Cumulative impact prior to mitigation:	Increased medium density housing adjacent to existing medium density housing may impact on property values of the adjacent land owners.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	14 - Low
Degree to which the impact can be avoided:	Low
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Low
Proposed mitigation:	It is not foreseen that the value of property will be affected as the proposal will result in the increase of medium density housing adjacent to existing medium density housing.
Residual impacts:	None.
Cumulative impact post mitigation:	None.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Crime and security
Nature of impact:	Increased crime as a result of the influx of temporary workers within the Louville community.
Extent and duration of impact:	Extent 3 & Duration 2
Consequence of impact or risk:	Security risk for adjacent land owners and land users.
Magnitude:	6
Probability of occurrence:	3
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Nuisance, disturbance of the peace, fear within the community.
Cumulative impact prior to mitigation:	Increased risk of crime and a sense of insecurity for adjacent land owners / land users.

APPENDIX J - IMPACT TABLES

Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	33 - Medium
Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Medium
Proposed mitigation:	The risk can be mitigated through community awareness and by having a community policing forum / neighbourhood watch to assist with policing within the community.
Residual impacts:	None.
Cumulative impact post mitigation:	A more informed public with additional visible policing strategies in place.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Crime and security
Nature of impact:	Increased crime as a result of the influx of residents within the Louville community.
Extent and duration of impact:	Extent 3 & Duration 5
Consequence of impact or risk:	Security risk for adjacent land owners and land users.
Magnitude:	6
Probability of occurrence:	3
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	Nuisance, disturbance of the peace, fear within the community.
Cumulative impact prior to mitigation:	Increased risk of crime and a sense of insecurity for adjacent land owners / land users.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	42 - Medium
Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Medium
Proposed mitigation:	The risk can be mitigated through community awareness and by having a community policing forum / neighbourhood watch to assist with policing within the community.
Residual impacts:	None.
Cumulative impact post mitigation:	A more informed public with additional visible policing strategies in place.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Similar to impacts associated with construction phase.

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Not applicable
OPERATIONAL PHASE	
Potential impact and risk:	Increased demand on services
Nature of impact:	Services would be required to service approximately 154 residential erven within Louville.
Extent and duration of impact:	Extent 3 & Duration 5
Consequence of impact or risk:	Increased demand on the Municipal supply and resources.
Magnitude:	4
Probability of occurrence:	4
Degree to which the impact may cause irreplaceable loss of resources:	PR
Degree to which the impact can be reversed:	PR
Indirect impacts:	None.
Cumulative impact prior to mitigation:	Increased demand on the Municipal supply and resources.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	48 - Medium

APPENDIX J - IMPACT TABLES

Degree to which the impact can be avoided:	Medium
Degree to which the impact can be managed:	Medium
Degree to which the impact can be mitigated:	Medium
Proposed mitigation:	<p>There is sufficient capacity within the Municipality in order to service the demand expected by the proposed development.</p> <p>Please refer to the GLS report for mitigation measures required in order to ensure that there is sufficient capacity within the municipality to meet the additional demand.</p>
Residual impacts:	None.
Cumulative impact post mitigation:	There is sufficient capacity within the Municipality in order to service the demand expected by the proposed development.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Not applicable.

CULTURAL HISTORICAL IMPACTS

Preferred Alternative	
PLANNING, DESIGN AND DEVELOPMENT PHASE	
Potential impact and risk:	Heritage management
Nature of impact:	Disturbance or destruction of heritage finds and sites on the property.
Extent and duration of impact:	Extent 3 & Duration 1
Consequence of impact or risk:	Disturbance of identified graves and human remains.
Magnitude:	2
Probability of occurrence:	3
Degree to which the impact may cause irreplaceable loss of resources:	IR
Degree to which the impact can be reversed:	IR
Indirect impacts:	None.
Cumulative impact prior to mitigation:	Disturbance of identified graves and human remains.
Significance rating of impact prior to mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	18 - Low
Degree to which the impact can be avoided:	High
Degree to which the impact can be managed:	High
Degree to which the impact can be mitigated:	High
Proposed mitigation:	<p>Should any heritage or fossil remains be exposed during any excavation or related activities, these must immediately be reported to the provincial heritage resource authority of the Western Cape, Heritage Western Cape (in terms of the National Heritage Resources Act, 1999 (Act No.25 of 1999) via the ECO.</p> <p>Heritage remains uncovered or disturbed during earthworks must not be disturbed until inspection and verified by the professional.</p>
Residual impacts:	None.
Cumulative impact post mitigation:	Potential disturbance of graves and human remains.
Significance rating of impact after mitigation (e.g. Low, Medium, Medium-High, High, or Very-High)	Low
OPERATIONAL PHASE	
Potential impact and risk:	Not applicable.
DECOMMISSIONING AND CLOSURE PHASE	
Potential impact and risk:	Not applicable.