

9 Development codes

9.1 Preliminary

- (1) Development codes are codes for assessment where identified as an applicable code in Part 5.
- (2) The following codes and requirements apply to development under schedule 6 of the Regulation are relevant for the planning scheme.
- (3) Use codes and other development codes are specific to each planning scheme area.
- (4) The following are the codes and requirements under the Regulation for development in the planning scheme area:
 - (a) Community residence code requirements applying to development that may not be made assessable development under the planning scheme
 - (b) Cropping (involving forestry for wood production) code applying to development that may not be made assessable development under the planning scheme
 - (c) Reconfiguring a lot (subdividing one lot into two lots) and associated operational works code applying to development for which code assessment is required under schedule 10, part 12 and schedule 10, part 14 division 2 of the Regulation.
- (5) The following are the use codes for the planning scheme:
 - (a) Advertising devices
 - (b) Development design
 - (c) Extractive industry
 - (d) Home based business
 - (e) Landscaping
 - (f) Operational works
 - (g) Reconfiguring a lot
 - (h) Telecommunications facility use
- (6) The following are the other development codes for the planning scheme:
 - (a) State Development Areas – *State Development and Public Works Organisation Act 1971*
 - (b) Port of Gladstone and Port Alma (part)
 - (c) Priority Development Areas – *Economic Development Act 2012*.

9.2 Development that cannot be made assessable in accordance with Schedule 6 of the Planning Regulation 2017

Editor's note — the following schedules of the Regulation are relevant to the Gladstone Regional Council planning scheme:

- Schedule 6, Part 2, 6 of the Regulation, Material change of use for community residence
- Schedule 13 of the Regulation, Requirements for cropping involving forestry for wood production
- Schedule 12 of the Regulation, particular reconfiguring a lot requiring code assessment.

9.3 Use codes

9.3.1 Advertising devices

9.3.1.1 Application

This code applies to the assessment of operational work for placing an advertising device on a road corridor or on premises, where the code is identified as applicable in the tables of assessment.

9.3.1.2 Purpose

- (1) The purpose of the advertising devices code is to:
 - (a) Facilitate economic activity through the advertising of business, products, services and to share information with the community.
 - (b) Provide unique and creative static and digital signage that contributes to the character and vibrancy of the setting.
 - (c) Ensure that advertising devices do not adversely affect visual amenity, the character of the local area and public safety.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) An advertising device complements, and does not detract from, the desirable characteristics of the natural and built environment in which the advertising device is exhibited.
 - (b) An advertising device is designed and integrated on the site so as to minimise visual clutter, particularly along major road corridors.
 - (c) An advertising device does not pose a hazard for pedestrians, cyclists or drivers of motor vehicles.
 - (d) An advertising device does not unreasonably impede views, sunlight or breezes for residents on adjoining sites, or create nuisance as a result of noisy, flashing or illuminated devices.

9.3.1.3 Description of advertising devices

Advertising device type	Written description
On premises advertising device 	An advertising device intended to display the name or occupation of the use on the site or use on another site irrespective of particular design features.

Advertising device type	Written description
Transport corridor advertising device 	A free standing or roof mounted advertising device located near or adjacent to a transport corridor for the purpose of advertising to the community.

9.3.1.4 Description of urban and non-urban zones

Urban zone	Non-urban zone
Low density residential Low-medium density residential Medium density residential Centre Community facilities Principal centre Neighbourhood centre Sport and recreation Low impact industry Medium impact industry Special industry Major tourism Minor tourism Mixed use Specialised centre Township	Character residential Open space Environmental management Conservation Industry investigation Emerging community Limited development Rural Rural residential Special purpose

Note - Table 9.3.1.4 is only to be used in conjunction with the Advertising devices code and is not to be used for assessment with any other code of the planning scheme.

9.3.1.5 Assessment benchmarks

Table 9.3.1.5.1— Accepted development subject to requirements and assessable development

Performance outcomes	Acceptable outcomes
Character and amenity	
PO1 The advertising device is designed and sited in a manner that: (a) results in a size that does not adversely impact on: (i) the visual amenity of a building, streetscape, locality or natural landscape setting (ii) the visual amenity of a main transport entrance into an urban area or township, and (f) is integrated with the design of other development on premises (g) does not visually dominate the premises, streetscape, locality or natural landscape setting (h) does not resemble traffic or road signs, and (i) are separated by distance so that the character and amenity of the locality and existing view and vista corridors are not adversely impacted.	AO1.1 Advertising devices do not exceed 8.5m in height from natural ground level in an urban zone and no greater than the permissible building height in a non-urban zone. AO1.2 On premises advertising device do not exceed more than 10% of the total building façade where in a non-urban zone. OR AO1.3 On premises advertising device do not exceed more than 30% of the total building façade where in a urban zone. AO1.4 Transport corridor advertising device do not exceed a maximum face area of 48m² per advertising device. AO1.5 Transport corridor advertising devices, are located a minimum distance of at least 800 meters from any other existing or approved advertising device where in a non-urban zone. OR AO1.6 Transport corridor advertising devices, are located a minimum distance of at least 200 meters from any other existing or approved advertising device where in a urban zone.

Performance outcomes	Acceptable outcomes
PO2 An advertising device only incorporates illumination, lighting, sound, odour or movement where it: (a) is appropriate to its setting and is compatible with the amenity of the local area (b) does not cause nuisance or distraction to pedestrians, vehicle traffic or adjoining land uses (c) does not create glare, reflecting or flaring of colours, and (d) will not create a potential safety hazard, including a traffic safety hazard.	AO2.1 (a) the advertising device is only illuminated, includes sound or odour where it is located within a urban zone other than residential zones; or (b) associated with a business that operates at night. AO2.2 Where the advertising device is illuminated it: (a) has a maximum luminance of 350 candelas per m² (b) does not incorporate flashing lights or digital displays, and (c) is switched off between 11:00pm and 5am the following day or at any time the business is not operating between these hours. AO2.3 The advertising device does not revolve, contain moving parts or have a moving border.
Safety of pedestrians and vehicles	
PO3 An advertising device is designed so as not to create a traffic or pedestrian safety hazard.	AO3.1 The advertising device does not physically obstruct the passage of pedestrians or vehicles. AO3.2 The advertising device does not mimic, and is not able to be confused with, a traffic control device or traffic signage. AO3.3 The advertising device does not restrict sight lines at intersections and site access points.
Services and Infrastructure	
PO4 Advertising devices do not impact, damage or cause consequential damage to public utilities or services.	AO4.1 The footings of an advertising device are not located within the zone of influence of any public utilities or services. Note—A Building Section Plan is provided to demonstrate compliance with AO4.1 and Council Policy 19.7 - Revision 1 - Building Adjacent to and Over Sewers, Stormwater and Water Assets (or relevant policy).
Heritage places	

Performance outcomes	Acceptable outcomes
PO5 Advertising adjacent to or located at a place of local heritage significance is designed and sited in a manner that: (a) is compatible with the significance of the local heritage place (b) does not detrimentally impact on the values or setting of the heritage place (c) does not obscure the appearance or prominence of features of the local heritage place when viewed from adjacent public or semi-public streets or open spaces, and (d) does not intrude into that place.	AO5.1 The advertising device is not proposed on or adjoining a premises that is listed as a local heritage place or shown on the heritage overlay.

9.3.2 Development design

9.3.2.1 Application

This code applies to assessing all development within the Gladstone Regional Council area where indicated in the Table of assessment.

9.3.2.2 Purpose

- (3) The purpose of the development design code is to:
- (a) Ensure all development is provided with appropriate infrastructure, services and parking provisions.
 - (b) Ensure development manages stormwater and wastewater as part of the integrated total water cycle and in ways that help protect the environmental water values specified in the *Environmental Protection (Water) Policy 2009*.
 - (c) Protect surface water and ground water.
 - (d) Ensure adverse impacts of development on the environment and the amenity of the locality are avoided.
- (4) The purpose of the code will be achieved through the following overall outcomes:
- (a) Development is adequately serviced by utility and access infrastructure including roads, water, waste water, power, telecommunications, stormwater management and waste management.
 - (b) The integrity and efficiency of utility and access infrastructure systems is maintained.
 - (c) Environmental values of receiving water are protected from adverse development impacts arising from stormwater quality and flow.
 - (d) Environmental values of receiving water are protected from waste water impacts.
 - (e) Environmental values of receiving water are protected from development impacts arising from the creation or expansion of non-tidal artificial waterways.
 - (f) Public health and safety are protected and damage or nuisance caused by stormwater is avoided.
 - (g) Stormwater is designed to maintain or recreate natural hydrological processes and minimise run-off.
 - (h) The function, safety and efficiency of the transport network is optimised.
 - (i) Development within close proximity to existing or future public passenger transport facilities supports an integrated approach to land use and transport integration.
 - (j) Development provides adequate on-site vehicular access and adequate parking and servicing facilities for vehicles and parking facilities for bicycles.
 - (k) Access, parking, servicing and associated manoeuvring areas are designed to be safe, functional and meet the reasonable demands generated by the development.
 - (l) Provision of safe and non-discriminatory public and pedestrian access is provided.
 - (m) Works in public streets and spaces enhance the pedestrian amenity and improve streetscape appearance.
 - (n) Sensitive land uses in close proximity to activities generating amenity impacts are located and designed to mitigate their impacts.
 - (o) Waste generation is minimised and re-use and recycling increased.
 - (p) Development provides for the storage of generated waste in an environmentally acceptable and nuisance free manner and waste storage facilities are functionally appropriate for users of the facilities, and
 - (q) Developments accessed by common private title have appropriate fire hydrant and infrastructure and unimpeded access to emergency service vehicles for the protection of people, property and environment from fire and chemical incidents.

Note—The term common private title covers areas such as roads in community title developments or strata title unit access which are private and under group or body corporate control.

9.3.2.3 Assessment benchmarks

Table 9.3.2.3.1— Accepted development subject to requirements and assessable development

Performance outcomes	Acceptable outcomes
Utility infrastructure and services	
PO1 Development is serviced by an adequate, safe and reliable supply of potable and general use water, connected to reticulated water supply where possible. Note—Council's documented Maximum Service Level (MSL) is to be considered.	AO1.1 Development is connected to Council's reticulated water supply network, including the installation of easily accessed water meters, in accordance with the <i>Engineering design planning scheme policy</i>. OR AO1.2 If connection to Council's reticulated water supply network is not possible, a potable on-site water supply is provided in accordance with the <i>Engineering design planning scheme policy</i>.
PO2 Development is serviced by appropriate sewerage disposal infrastructure which ensures: (a) no adverse ecological impacts on the receiving environment (b) cumulative impacts of onsite waste water treatment is considered in assessing the likely environmental impacts (c) public health is maintained (d) the location, site area, soil type and topography is suitable for any on site waste water treatment, and (e) the reuse of waste water does not contaminate any surface water or ground water.	AO2.1 Development is connected to Council's reticulated sewerage treatment system, in accordance with the <i>Engineering design planning scheme policy</i>. OR AO2.2 If connection to Council's reticulated sewerage treatment system is not possible, development waste water is treated in accordance with Council's <i>Engineering design planning scheme policy</i> and relevant Australian Standards (including AS1547) and State requirements as amended.
PO3 Where not located in the Rural zone, electricity supply network and telecommunication service connections are provided to the site and are connected.	AO3.1 The development is connected to electricity and telecommunications infrastructure in accordance with the standards of the relevant regulatory authority prior to the commencement of any use of the site. AO3.2 Where not included in the development, provision is made for future telecommunications services (such as fibre optic cable) in accordance with the standards of the relevant regulatory authority.

Performance outcomes	Acceptable outcomes
PO4 Development in areas serviced by a reticulated water supply where: (a) areas of the development are accessed by common private title or (b) the council infrastructure is not sufficient to provide fire fighting service in terms of pressure, flow or proximity, (c) is serviced with appropriate privately owned internal fire hydrant infrastructure and provides unimpeded emergency access.	AO4.1 Development, including buildings, both attached and detached, and not covered in other legislation or planning provisions mandating fire hydrants, conform with SPP Code: Fire services in developments accessed by common private title. AO4.2 Fire fighting infrastructure located within private property (excluding reticulated mains and hydrants on reticulated mains) is owned maintained by a party other than Council.
Stormwater management	
PO5 Stormwater management is designed and operated to: (a) ensure that adjoining land and upstream and downstream areas are not adversely affected through any ponding or changes in flows, and (b) direct stormwater to a lawful point of discharge through competently designed and constructed outlet works in a manner that reflects the predevelopment status.	AO5.1 Development does not result in an increase in flood level flow velocity or flood duration on upstream, downstream or adjacent properties. AO5.2 Stormwater (including roof and surface water) is conveyed to the kerb and channel or other lawful point of discharge in accordance with the requirements of the <i>Engineering design planning scheme policy</i> .
PO6 Stormwater drainage network elements are designed and constructed with the capacity to control stormwater flows under normal and minor system blockage conditions for the applicable defined flood event ensuring there is no damage to property or hazards for motorists.	AO6 Stormwater infrastructure is designed and constructed in accordance with the requirements of the <i>Engineering design planning scheme policy</i> .
Wastewater	
PO7 Wastewater is managed to: (a) avoid wastewater discharge to any waterway, and (b) if wastewater discharge to waterways cannot be practically avoided, discharge is minimised by re-use, recycling, recovery and treatment for disposal to sewer, surface water and groundwater. Note—Wastewater is defined in accordance with Environmental Protection (Water) Policy 2009, schedule 2). Note—A wastewater management plan (WWMP) is prepared by a suitably qualified person and addresses: • wastewater type, and • climatic conditions, and	AO7 Development does not discharge wastewater into any waterways.

Performance outcomes	Acceptable outcomes
- water quality objectives (WQOs), and - best-practice environmental management.	
Earthworks and retaining walls	
PO8 Development is designed such that earthworks and any associated retaining structures: (a) result in a landform that is stable, (b) maintain as far as practical, and minimise alteration to, the existing landforms, (c) minimise height of batter faces and retaining structures, (d) do not unduly impact on the amenity or privacy for occupants of the site or on adjoining land, (e) do not unduly impact on the amenity of the streetscape, (f) achieves a high level of visual amenity, (g) does not prevent or obstruct the function of adjacent sites including land in Council ownership; and (h) are designed and constructed so that they do not cause unintentional ponding (i.e. ponding not associated with stormwater control) on the site or on nearby land.	AO8.1 Earthworks and any retaining structures (including anchors, sheet piling, seepage drains, construction requirements and retained soil etc.) and their zone of influence must: (a) be wholly contained within the development site; (b) ensure the top and toe of any batter slope (excluding those associated with road works) is a minimum of 0.9m horizontally from the boundary of the development site; (c) not be located on land in Council ownership (e.g. road reserves, parks and drainage reserves) (d) not include any services within the retained soil (as determined by the internal friction angle of the soil being retained) or the zone of influence of the retaining structures' foundation; and (e) allow for the installation and maintenance of services within any retaining structures (f) excavating or filling is no greater than 1m. AO8.2 Development is designed such that the steepest formed batter slope is 1 vertical to 4 horizontal AO8.3 Earthworks and any associated retaining structures are designed and constructed in accordance with the Engineering Design Planning Scheme Policy AO8.4 For Reconfiguring A Lot applications: (a) constructed embankment slopes are located along the rear and side boundaries of adjoining allotments and are designed and constructed: i. within the development site, ii. on land which is not to enter Council ownership, iii. within the allotment located on the low side of the common boundary, and iv. with a top and toe at least 0.9m

Performance outcomes	Acceptable outcomes
	horizontally from the boundary (b) retaining walls are located along the rear and side boundaries of adjoining allotments and are designed and constructed either: - on the low side of the common boundary with a top at least 0.9m horizontally from the boundary; or - on the high side of the common boundary with a toe at least 5m horizontally from the boundary
Parking and access	
PO9 Development includes the provision of adequate and convenient car and bicycle parking on-site to satisfy the anticipated requirements of the activity.	AO9 Car parking and bicycle parking is provided on site in accordance with the rates specified in the <i>Parking rates planning scheme policy</i> .
PO10 Where in urban areas, development provides end of trip facilities to encourage people to engage in active transport (bicycles and pedestrians): - to meet the needs of users and promote active modes of travel - at convenient, easily identifiable, safe locations, and - in locations that do not obstruct vehicular, bicycle or pedestrian movement paths.	AO10 Development provides cycling and pedestrian end of trip facilities, in accordance with the requirements of the <i>Queensland Development Code</i> .
PO11 Access driveways are designed and constructed to: - provide convenient access to the site and maintain the safety and efficiency of the road - minimise conflicts with traffic and pedestrians, and - are constructed to a standard that is appropriate to the location and to meet the anticipated volume and type of traffic.	AO11.1 Access driveways are: - designed and constructed in accordance with the <i>Engineering design planning scheme policy</i>, and - in accordance with AS2890 as amended, and - certified by a Registered Professional Engineer of Queensland.
	AO11.2 Access driveways allow vehicles (with the exception of dwelling house and dual occupancy) to enter and exit the site in a forward gear.
PO12 - Vehicle movement areas (including internal driveways, access aisles, manoeuvring areas, parking areas (car and bicycle) and service bays) are designed to ensure: - a gradient appropriate for the type of vehicles - a surface suitable for the	AO12 Manoeuvring, loading and unloading areas, and parking areas (car and bicycle) are: - designed and constructed in accordance with the <i>Engineering design planning scheme policy</i> <i>Imperviously sealed using concrete or asphalt bitumen</i>

Performance outcomes	Acceptable outcomes
(iii) proposed use (iv) effective stormwater drainage (v) clearly marked and signed spaces (v) convenience and safety for drivers and pedestrians, and (vi) adequate dimensions to meet user requirements, including access and egress for emergency vehicles.	(c) In accordance with AS2890 as amended, and (d) certified by a Registered Professional Engineer of Queensland.
PO13 Footpaths provide pedestrian and bicycle access to the site, which is designed to: (a) provide safe movement; (b) avoid unnecessary conflict between pedestrians, bicycles and motor vehicles; (c) include durable and stable materials; and (d) match any adjacent footpath.	AO13 Footpaths are: (a) provided to the full road frontage and designed in accordance with the Engineering Design Planning Scheme Policy (b) connected to the existing footpath network, and (c) certified by a Registered Professional Engineer of Queensland.
PO14 Pedestrian access to buildings: (a) does not obstruct pedestrian movement (or form physical clutter) on public footpaths (b) are not visually overbearing (or form visual clutter) in the streetscape, and (c) provide safe, efficient, equitable and convenient access including wheelchair access.	AO14 Pedestrian access steps, escalators, ramps and lifts are: (a) located wholly within the site (b) setback a minimum of 1.5m from the front boundary, and (c) compliant with the Disability Discrimination Act 1992.
Acoustic and air quality	
PO15 Development minimises potential conflicts with, or impacts on, other uses having regard to odour, dust or other emissions.	AO15 Development achieves the air quality design objectives set out in the <i>Environmental Protection (Air) Policy 2008, as amended</i>.
PO16 Development prevents or minimises the generation of any noise or vibration so that: (a) nuisance is not caused to adjoining premises or other nearby sensitive land uses, and (b) desired ambient noise levels in residential areas are not exceeded.	AO16 Development achieves the noise generation levels set out in the <i>Environmental Protection (Noise) Policy 2008, as amended</i>. Note—To achieve compliance, development is planned, designed and managed to ensure emissions from activities to achieve the appropriate acoustic objectives (measured at the receptor dB(A)).
PO17 Sensitive development adjacent to State controlled roads or Council controlled arterial and sub-arterial roads minimise through their own design the nuisance caused by noise, vibration and dust emissions.	AO17 Sensitive development (other than Class 1, 2, 3 or 4 buildings) complies with the requirements of the Department Main Roads – <i>Road Traffic Noise Management Code of Practice and the Environmental Protection (Noise) Policy 2008</i>.

Performance outcomes	Acceptable outcomes
Lighting	
PO18 External lighting is provided in urban areas to ensure a safe environment.	AO18 Technical parameters, design, installation, operation and maintenance of outdoor lighting comply with the requirements of <i>AS4282 – Control of the Obtrusive Effects of Outdoor Lighting</i> as amended.
PO19 Outdoor lighting does not cause undue disturbance to any person, activity or fauna because of emission, either directly or by reflection.	AO19 The vertical illumination resulting from direct, reflected or other incidental light coming from a site does not exceed 8 lux when measured at any point 1.5m outside of the boundary of the property at any level from ground level up.
PO20 Street lighting and signs are provided to ensure the safety of both vehicles and pedestrians, and to facilitate access and movement.	AO20 Street lighting and signage comply with the requirements of the <i>Engineering design planning scheme policy</i> .
Waste management	
PO21 Development: (a) minimises waste generation (including construction, demolition and operational waste) (b) provides adequate facilities on-site for the storage of waste and recyclables.	AO21 Waste storage and management arrangements are sited, screened and designed in accordance with the <i>Waste Management Planning Scheme Policy</i> .
PO22 Development is designed to allow for safe and efficient servicing of waste and recycling containers through: (a) a development layout that is designed to facilitate direct and unobstructed servicing of waste and recycling containers, and (b) minimising the potential for nuisances to be caused by way of noise and odour.	AO22.1 Where on-site waste and recycling collection services are proposed: (a) collection vehicle entry and exit from the site is carried out in a forward motion, and (b) the proposed point of servicing is designed in accordance with the <i>Waste Management Planning Scheme Policy</i>.
	AO22.2 Where on-street (kerbside) collection is proposed for any standard waste and recycling containers or bulk bin waste and recycling, waste management is designed in accordance with the <i>Waste Management Planning Scheme Policy</i> .
For all assessable development	
Stormwater management	
PO23 Stormwater management systems: (a) implement water sensitive urban design	AO23 Stormwater management systems are designed and constructed in accordance with the <i>Engineering Design Planning</i>

Performance outcomes	Acceptable outcomes
(WSUD) principles that: (i) protect natural systems and waterways (ii) allow for the detention of stormwater instead of rapid conveyance (iii) minimise impervious areas (iv) utilise stormwater to conserve potable water (v) integrate stormwater treatment into the landscape (vi) ensure water quality values are protected (b) where privately owned must be maintained (including costs) for the life of the system (c) provide for safe access and maintenance (d) maintain natural drainage lines and adequate filtering and settlement of sediment for the protection of watercourses, coastal wetlands and beaches from point source and non-point source stormwater discharges, and (e) are designed to minimise ongoing maintenance costs	<i>Scheme Policy.</i> Note—A site stormwater quality management plan (SQMP) is prepared in accordance with Engineering Design Planning Scheme Policy and the State Planning Policy requirement for stormwater quality treatment measures.
PO24 Development allows for sufficient site area to accommodate an effective stormwater management system.	No acceptable outcome specified.
PO25 Development provides for the orderly development of stormwater infrastructure within a catchment, having regard to: (a) existing capacity of stormwater infrastructure and ultimate catchment conditions (b) discharge for existing and future upstream development.	No acceptable outcome specified.

Performance outcomes	Acceptable outcomes
PO26 Construction activities for the development avoid or minimise adverse impacts on stormwater quality.	AO26 The release of sediment-laden stormwater is avoided for the nominated design storm, and minimised when the nominated design storm is exceeded, by addressing design objectives listed below in Table 9.3.1.3.2—Construction phase, or local equivalent for: (a) drainage control (b) erosion control (c) sediment control, and (d) water quality outcomes. Note—An Erosion and Sediment Control Plan (ESCP) is prepared by a suitably qualified person that demonstrates: • erosion and sediment control practices (including any proprietary erosion and sediment control products) are designed, installed, constructed, operated, monitored and maintained, and any other erosion and sediment control practices are carried out in accordance with local conditions, or • how stormwater quality will be managed in accordance with an acceptable regional or local guideline so that target contaminants are treated to a design objective at least equivalent to this Acceptable outcome.
PO27 Reconfiguration of lots includes stormwater management measures in the design of any road reserve, streetscape or drainage networks to: (a) minimise impacts on the water cycle (b) protect waterway health by improving stormwater quality and reducing site run-off, and (c) avoid large impervious surfaces.	No acceptable outcome specified.
Wastewater Management	
PO28 Wastewater discharge maintains ecological processes, riparian vegetation, waterway integrity, and downstream ecosystem health including: (a) protecting applicable water quality objectives for the receiving waters (b) managing soil disturbance or altering natural hydrology in coastal areas (c) avoiding or minimising the release of nutrients of concern so as to minimise the occurrence, frequency and intensity	No acceptable outcome specified.

Performance outcomes	Acceptable outcomes
of coastal algal blooms, and (d) avoiding lowering groundwater levels where potential or actual acid sulfate soils are present in coastal areas. Note—Compliance with part of this performance outcome may be demonstrated by following the management advice in the guideline: Implementing Policies and Plans for Managing Nutrients of Concern for Coastal Algal Blooms in Queensland by the Department of Environment and Heritage Protection.	
PO29 Where involving trade waste or contaminated wastewaters, they are managed so that: (j) the pH of any wastewater discharged is maintained between 6.5 and 8.5 to avoid mobilisation of acid, iron, aluminium, and metals (k) holding times of neutralised wastewaters ensures the flocculation and removal of any dissolved iron prior to release (l) visible iron floc is not present in any discharge (m) precipitated iron floc is contained and disposed of, and (n) wastewater and precipitates that cannot be contained and treated for discharge on site are removed and disposed of through trade waste.	No acceptable outcome specified.
Bridge and culvert work	
PO30 Bridges and culverts for flood immunity: (a) are designed and located to minimise traffic disruption (b) improve public safety (c) provides for fauna habitat movement where possible, and (d) makes appropriate allowance for active transport.	AO30 Bridges and culvert works are provided in accordance with the <i>Engineering Design Planning Scheme Policy</i>.
Road design	
PO31 Roads providing access to the site are provided, constructed and maintained to a standard which is adequate for the traffic type and volume likely to be generated by the activities on site.	AO31 External road works are provided in accordance with the requirements of the <i>Engineering Design Planning Scheme Policy</i>.
Land use and transport integration	
PO32 Development:	No acceptable outcome specified.

Performance outcomes	Acceptable outcomes
(a) supports a road hierarchy which facilitates efficient movement of all transport modes including public transport, and (b) appropriately integrates and connects with surrounding movement networks. Note—Where roads are required for buses refer to the design and construction requirements in the IDAS code in the Transport Planning and Coordination Regulation 2005, schedule, part 2.	
PO33 Development enhances connectivity between existing and future public passenger transport facilities and other transport modes through: (a) providing direct linkages for passengers between existing and future public passenger transport facilities and other transport modes, and (b) way-finding information for existing public transport facilities and interconnecting transport modes.	No acceptable outcome specified.
PO34 Development provides direct, safe and equitable access to and use of public passenger transport facilities.	AO34 Public passenger transport facilities and any through-site pathway connections, including road crossings, to public passenger transport facilities are provided in accordance with the Engineering Design Planning Scheme Policy and the Disability Discrimination Act 1992.
PO35 Development is located and designed to maintain the operational and structural efficiency of public utility infrastructure.	No acceptable outcome specified.
Acoustic and air quality	
PO36 Where located in close proximity to an operational railway corridor, sensitive land uses mitigate amenity impacts and maintain the operational integrity of the rail corridors.	No acceptable outcome specified.
PO37 Utility services and service structures attached to buildings, do not adversely impact on the acoustic or visual amenity of the surrounding area and are: (a) located as far from sensitive land uses, road frontage boundaries and public open spaces as practical, and (b) acoustically shielded and visually screened so as not to be audible or visible from adjoining and nearby sites, public open spaces and roads.	No acceptable outcome specified.

Performance outcomes	Acceptable outcomes
Weed control	
PO38 Weed control practices and plant and equipment cleaning and inspection protocols are: (a) implemented to avoid the introduction and spread of weeds along transport routes and delivery points (b) undertaken to control existing declared weeds and pest animals prior to the commencement of and during works. Note—Refer also to the Queensland Guideline for Limiting Weed Seed Spread (DNR 2000).	No acceptable outcome specified.
If a non-tidal artificial waterway	
PO39 Development protects water environmental values in existing natural waterways by ensuring: (a) environmental values in downstream waterways are protected (b) any groundwater recharge areas are not affected (c) the location of the non-tidal artificial waterway incorporates low lying areas of a catchment connected to an existing waterway, and (d) existing areas of ponded water are included.	No acceptable outcome specified.
PO40 Development is designed such that non-tidal artificial waterways are located: (a) outside natural wetlands and any associated buffer areas (b) to minimise disturbing soils or sediments. and (c) to avoid altering the natural hydrologic regime in acid sulfate soil and nutrient hazardous areas.	No acceptable outcome specified.
PO41 Development is compatible with existing tidal waterways where any tidal flow alteration does not adversely impact on the tidal waterway.	AO41 Where development is located adjacent to, or is connected to, a tidal waterway by means of a weir, lock, pumping system or similar: (a) there is sufficient flushing or a tidal range greater than 0.3m, and (b) there is no introduction of salt water into freshwater environments.
PO42 Any non-tidal artificial waterway associated	No acceptable outcome specified.

Performance outcomes	Acceptable outcomes
with the development is designed and managed to function by: (a) providing amenity including aesthetics, landscaping and recreation (b) incorporating flood management measures (c) including stormwater harvesting as part of an integrated water cycle management plan, and (d) accommodating aquatic habitat.	
PO43 Any non-tidal artificial waterways associated with the development are designed, managed and operated to achieve water quality objectives in natural waterways through: (a) monitoring and maintenance programs adaptively manage water quality in any non-tidal artificial waterway to achieve relevant water-quality objectives downstream of the waterway, and (b) monitoring and maintenance programs that ensure aquatic weeds achieve a low percentage of coverage of the water surface area (less than 10%) and pests and vectors (such as mosquitoes) are managed through avoiding stagnant water areas, providing for native fish predators, and any other best practices for monitoring and treating pests. Note—Achieving compliance with the performance outcomes is to be undertaken by suitably qualified persons such as a registered professional engineer, Queensland (RPEQ) with specific experience in establishing and managing artificial waterways Note—Any non-tidal artificial waterway is managed and operated by a responsible entity under agreement for the life of the waterway. The responsible entity is to implement a deed of agreement for the management and operation of the waterway that: • identifies the waterway • states a period of responsibility for the entity • states a process for any transfer of responsibility for the waterway • states required actions under the agreement for monitoring the water quality of the waterway and receiving waters • states required actions under the agreement for maintaining the waterway to achieve the outcomes of this code and any relevant conditions of a development approval, and	No acceptable outcome specified.

Performance outcomes		Acceptable outcomes
identifies funding sources for the above, including bonds, headworks charges or levies.		
If Port services where a Marina (ship sourced pollutants reception facilities)		
PO44 Development provides facilities for the handling and disposal of ship-sourced pollutants that minimises impacts on the environment and include: (a) facilities that are designed and operated to ensure the risk of spillage from operations is minimised (b) common user facilities are situated in a suitable location with appropriate equipment available for immediate use to contain and remove spillages, and (c) a pollutant reception facility that is connected to sewerage or other waste reception infrastructure, where practical. Note—Refer to Australian and New Zealand Environment and Conservation Council (ANZECC), 1997, Best Practice Guidelines for Waste Reception Facilities at Ports, Marinas and Boat Harbours in Australia and New Zealand. Note—Reception facilities require compliance assessment under the Plumbing and Drainage Act 2002. The plumbing compliance assessment process will ensure that the proposed facilities address 'peak load'.		No acceptable outcome specified.
Structures over multiple lots		
PO45 Where buildings and structures are located on multiple lots, these are amalgamated to form one lot.		AO45 No acceptable outcome specified.

Table 9.3.2.3.2—Construction phase: stormwater management design objectives

Issue		Design objectives
Drainage control	Temporary drainage works	(a) Design life and design storm for temporary drainage works: (i) disturbed area open for < 12 months—1 in 2-year ARI event (ii) disturbed area open for 12–24 months—1 in 5-year ARI event (iii) disturbed area open for > 24 months—1 in 10-year ARI event (b) design capacity excludes minimum 150 mm freeboard (c) temporary culvert crossing—minimum 1 in 1-year ARI hydraulic capacity.

Issue		Design objectives
Erosion control	Erosion control measures	(a) Minimise exposure of disturbed soils at any time (b) divert water run-off from undisturbed areas around disturbed areas (c) determine the erosion risk rating using local rainfall erosivity, rainfall depth, soil-loss rate or other acceptable methods (d) implement erosion control methods corresponding to identified erosion risk rating.
Sediment control	Sediment control measures Design storm for sediment control basins Sediment basin dewatering	(a) Determine appropriate sediment control measures using: (i) potential soil loss rate, or (ii) monthly erosivity, or (iii) average monthly rainfall (b) collect and drain stormwater from disturbed soils to sediment basin for design storm event: (i) design storm for sediment basin sizing is 80th% five-day event or similar (c) site discharge during sediment basin dewatering: (i) TSS < 50 mg/L TSS, and (ii) Turbidity not >10% receiving waters turbidity, and (iii) pH 6.5–8.5.
Water quality	Litter and other waste, hydrocarbons and other contaminants	(a) avoid wind-blown litter; remove gross pollutants (b) ensure there is no visible oil or grease sheen on released waters (c) dispose of waste containing contaminants at authorised facilities
Waterway stability and flood flow management	Changes to the natural waterway hydraulics and hydrology	For peak flow for the 1-year and 100-year ARI event, use constructed sediment basins to attenuate the discharge rate of stormwater from the site.

9.3.3 Extractive industry

9.3.3.1 Application

This code applies to assessing a material change of use for extractive industry development.

9.3.3.2 Purpose

- (1) The purpose of the extractive industry code is to:
 - (a) Facilitate the optimum use of extractive resources in identified areas in the region limited to the Extractive resources and minerals overlay area and parts of the Rural zone.
 - (b) Ensure extractive industry operations occur in a manner that minimises impacts on public safety, amenity, the natural environment, road traffic and the road network.
 - (c) Ensures rehabilitation occurs following extraction.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) Extractive industry activities including haulage routes are separated from sensitive land uses to mitigate encroachment on extractive industry operations by sensitive land uses, and
 - (b) Extractive industry operational impacts on sensitive land uses including visual, light, vibration, air, noise and water quality impacts.
 - (c) Extractive industry activities are designed and managed to mitigate as far as possible, impacts on the site's and surrounding area's environmental values.
 - (d) Extractive industry activities are designed and managed as far as possible to protect the visual amenity and landscape character of the surrounding area.
 - (e) Conflict on the region's road network between public road users and haulage traffic is minimised through the use of specified transport routes by heavy vehicles.
 - (f) Land disturbed by extractive industry activities is progressively rehabilitated to ensure the site is environmentally stable and capable of reuse.

9.3.3.3 Assessment benchmarks

Table 9.3.3.3.1—Assessable development

Performance outcomes	Acceptable outcomes
Design and operation	
PO1 The extractive industry is located and operated to maintain public safety and minimise potential visual, light, vibration, air, noise and water quality impacts on nearby areas and sensitive land uses.	AO1.1 Extractive industry activities are separated from nearby areas in accordance with the following: (a) where the extraction or processing of the extractive resource involves blasting or crushing (namely rock), a minimum distance of 1,000m from: (i) sensitive land uses (ii) public roads, and (iii) driveways of adjoining and nearby properties (b) for any other extractive resource not involving blasting or crushing (namely sand, gravel, clay and soil), a minimum distance of 200m.
	AO1.2 Extractive industry activities visible from outside the property are designed to be screened from surrounding land and protected by a 50m buffer from boundary ridges.

Performance outcomes	Acceptable outcomes
	AO1.3 Extractive industry activities are screened from view from public roads, public vantage points and sensitive land uses by: (a) natural topographic features such as ridgelines, or (b) a minimum 30m wide landscaped native vegetation buffer.
	AO1.4 Noise and vibration impacts do not exceed acceptable levels contained within the <i>Environmental Protection (Noise) Policy 2008</i> , as amended.
	AO1.5 Air quality impacts including dust do not exceed acceptable levels contained within the <i>Environmental Protection (Air) Policy 2008</i> , as amended.
	AO1.6 Blasting and crushing operations are limited to the hours of 9am to 5pm Monday to Friday.
	AO1.7 Other extractive industry operations are limited to the hours of 6am to 6pm Monday to Saturday.
PO2 Extractive industry operations protect the visual and landscape character of hilltops and ridgelines.	AO2 Extractive industry operations areas are located a minimum of 50m from any hilltop or ridgeline (measured horizontally from the peak).
PO3 Extractive industry operations avoid or minimises impact on areas of ecological significance, ecological processes or biodiversity values external to the site.	No acceptable outcome is nominated.
Stormwater management	
PO4 Stormwater drainage systems are designed, constructed and maintained to: (a) prevent ponding in excavated areas (b) minimise and control erosion (c) prevent pollution of ground and surface water, and (d) provide opportunities to conserve and re-use water on site.	No acceptable outcome is nominated.
Public safety and access	

Performance outcomes	Acceptable outcomes
PO5 Public safety is maintained by: (a) preventing public access into operations areas, and (b) informing the public of the presence and nature of operations.	AO5.1 Public entry is prevented through the provision of: (a) security fencing with a minimum height of 1.8m on the perimeter of the site, and (b) security gates a minimum height of 1.8m at all access points. AO5.2 Signs that inform of operations and safety hazards, are installed on: (a) any public road adjoining the site, and (b) gates/fencing surrounding the site.
Haulage	
PO6 Extractive industry activities are located to ensure: (a) the safe and efficient operation of vehicles transporting extractive materials, and (b) extractive industry haulage vehicles access the site on designated haulage routes. Note—Designated haulage routes are identified on the Extractive resources and minerals overlay map.	No acceptable outcome is nominated.
Rehabilitation	
PO7 Progressive and staged rehabilitation of completed extraction sites must be undertaken that incorporates: (a) decontamination of both soil and water (b) land profiling to establish useable and stable landforms and soil profiles (c) revegetation with native plant species, and (d) monitoring and maintenance of works and rehabilitation sites.	No acceptable outcome is nominated.
PO8 Rehabilitation ensures created water bodies will be useable by the establishment of suitable water quality, hydraulic and bed and bank conditions.	AO8 Created water bodies: (a) have a depth and bed and bank profile suitable to establish and sustain aquatic vegetation (b) establish water quality suitable to establish and sustain aquatic vegetation and animal, and (c) are revegetated and stocked to establish native aquatic vegetation and fauna communities and riparian vegetation.

9.3.4 Home based business

9.3.4.1 Application

This code applies to a material change of use for home based business where the code is identified as applicable in the tables of assessment. When using this code, reference should be made to section 5.3.2 and where applicable, section 5.3.3 located in Part 5.

9.3.4.2 Purpose

- (1) The purpose of the home based business use code is to ensure that home based business uses are subordinate to a dwelling and residential activity and do not adversely impact on the amenity of surrounding residential activities.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) The scale and intensity of development is low impact.
 - (b) Development does not compromise the viability of designated centres and employment areas.
 - (c) Development does not adversely impact on the amenity of adjoining premises.
 - (d) Development maintains the character of residential neighbourhoods.

9.3.4.3 Assessment benchmarks

Table 9.3.4.3.1— Accepted development subject to requirements and assessable development

Performance outcomes	Acceptable outcomes
For Accepted development subject to requirements and assessable development	
PO1 Development is of a scale and intensity similar to surrounding dwellings.	AO1.1 Development has a maximum GFA of 100m ² .
	AO1.2 Development generates a demand for no more than 10 vehicular trips to and from the site per day.
	AO1.3 Development generates a demand for no more than 1 delivery per week from a delivery vehicle exceeding 2.5 tonnes in weight.
	AO1.4 The home based business is conducted by: (a) 1 or more of the permanent residents of the principal dwelling house, and (b) no more than 2 non-resident employees at any time.
	AO1.5 Development is wholly contained within the dwelling house or ancillary outbuilding on the site.

Performance outcomes	Acceptable outcomes
	AO1.6 Bed and breakfast accommodation: (a) is wholly contained within the principal dwelling house on the site (b) allows a maximum continuous period of stay for any guest of no more than 4 weeks (c) does not contain more than: (i) 2 guest bedrooms if within a residential, centre, township or rural residential zone, or (ii) 4 guest bedrooms if within the rural zone.
PO2 Development is consistent with the streetscape character of the zone.	AO2 Goods, equipment and activities associated with the development are not visible from the street or adjoining premises.
PO3 Development does not adversely impact on the amenity of area.	AO3 The home based business (where not a Bed and breakfast) is conducted between the hours of: (a) 7am to 7pm on week days, and (b) 7am to 1pm on Saturdays.
PO4 Vehicle parking (not associated with the dwelling): (a) is associated with the onsite home based business, and (b) does not adversely affect the amenity of neighbouring properties.	AO4.1 Not more than 2 vehicles associated with the home based business is parked on the site at any one time.
	AO4.2 Activities on the premises do not involve the repairing, servicing, cleaning, or loading of motor vehicles.

9.3.5 Landscaping

9.3.5.1 Application

This code applies to development where the code is identified as applicable in a table of assessment. When using this code, reference should be made to section 5.3.2 and where applicable, section 5.3.3 located in Part 5.

9.3.5.2 Purpose

- (1) The purpose of the landscape code is to ensure landscaping in both the private and public domain:
 - (a) Complements built form, topography and existing landscape elements.
 - (b) Enhances the visual appeal and local identity of different places throughout the region.
 - (c) Is designed and constructed to a high standard.
 - (d) Is functional for users and remains fit for purpose over the long-term.
- (2) The purpose of the code will be achieved by the following overall outcomes:
 - (a) Landscaping creates shade and shelter on streets and public spaces.
 - (b) Landscaping conserves energy, water usage and creates comfortable microclimates.
 - (c) Landscaping creates high quality streetscapes and enhances local character.
 - (d) Landscape design is used to integrate the natural and built form elements of the site and the locality.
 - (e) Landscape elements contribute to the useability, legibility and understanding of the city and the region and its places.
 - (f) Landscaping is used for screening to soften built form, mitigate adverse aesthetic impacts, improve amenity and provide privacy.
 - (g) Plant species and landscaping materials are suitable for local climatic conditions.
 - (h) Plant species, landscaping materials and surface treatments are suited to their intended function and user requirements and are designed to remain attractive, fit for purpose and be cost effective to maintain over the long-term.
 - (i) Landscape design facilitates an accessible, safe and comfortable environment for all users.
 - (j) Mature on-site vegetation is retained, protected and integrated into the site design wherever practicable.

9.3.5.3 Assessment benchmarks

Table 9.3.5.3.1—Assessable development

Performance outcomes	Acceptable outcomes
General landscape design and works	
PO1 Landscape design of both public and private spaces: (a) complements the intended character of the streetscape and zone, and (b) is functional and designed to be visually appealing in the long-term.	No acceptable outcome is nominated.
PO2 Landscape works and plant selection ensure: (a) climatically appropriate species are planted	AO2.1 Selected tree species within communal recreation areas are to provide at least 30% shade coverage within 5–10 years of planting.

Performance outcomes	Acceptable outcomes
(b) the provision of shade in appropriate locations (c) an appropriate mix of soft and hard elements, and (d) planting densities and stock sizes are suitable for their location, purpose and hardness.	A02.2 A minimum of 50% of landscaped areas are to be covered in soft landscaping (turf areas and planting beds), with at least 25% of that area being planting.
PO3 Street trees are provided in appropriate locations to: (a) provide shade for pedestrians along footpaths (b) reinforce the legibility of the movement network (c) avoid damage to public or private property or infrastructure (d) enhance the character of the streetscape, and (e) ensure visibility is maintained from entrances and exits to properties and at intersections.	A03.1 Street trees are provided at the rate whichever is the lesser of: (a) one street tree per lot frontage or one tree per 10 linear metres of road frontage or (b) a minimum of 1 tree per 400m² of site area. A03.2 Species of street trees are selected in accordance with the plant species list in Table 9.3.4.3.2
PO4 Street treatments including pavement, seating, lighting, rubbish bins are provided to: (a) enhance the usability and amenity of streets and public spaces (b) facilitate social interaction, and (c) maintain clean streetscapes.	No acceptable outcome is nominated.
PO5 Wherever possible, landscape design facilitates the retention and integration of mature existing vegetation, both within and external to the site.	A05.1 Existing mature trees and vegetation are retained and incorporated into the landscape design.
	A05.2 Removed or damaged mature vegetation is replaced with mature vegetation of a comparable quantity and species.
Landscaping along boundaries and edges	
PO6 Planting and landscape elements along boundaries and edges assist in: (a) maintaining privacy between adjoining buildings (b) protecting local views, vistas and sightlines (c) enhancing the visual appearance of the built form (d) screening service, utility and parking areas (e) minimising noise impacts between noise sources and sensitive receiving environments, and (f) reducing the visual impact of acoustic fences, retaining walls and long unbroken walls.	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
Open air car parking	
PO7 Open air car parking areas are provided with suitable levels of shade through the use of appropriate planting.	A07.1 Shade trees are located at the rate of 1 tree per 6 car spaces.
	A07.2 Wheel stops are provided to protect vegetation.
	A07.3 Tree selection is in accordance with plant species list.
Sustainability	
PO8 Landscape design including irrigation methods optimise water and energy efficiency and responds appropriately to local conditions, by: (a) maximising the exposure to the prevailing summer breezes and the north–east winter morning sun (b) minimising exposure to the prevailing winter winds and western summer sun (c) optimising shade to create useable and comfortable areas, and (d) maintaining infiltration to subsurface soil.	No acceptable outcome is nominated.
Safety	
PO9 Landscape elements enhance the safety, legibility of places and do not undermine the surveillance of paths, walkways, parking areas, streets and public spaces by ensuring: (a) landscape elements (including signage and other infrastructure) does not interfere with sightlines (b) spaces are well lit, free from obstructions and clearly defined by landscape treatments, and (c) public and private areas are clearly distinguishable and accessible. Note—Applicants should have regard to Crime Prevention through Environmental Design Guidelines for Queensland .	A09.1 Plant selection adjacent to pedestrian movement areas provides a clear trunk of at least 2m at maturity.
	A09.2 Understorey planting maintains a height of less than 600mm at maturity.
Maintenance	
PO10 Landscape elements do not adversely affect stormwater quantity or quality by ensuring: (a) the flow of water along overland flow paths is not restricted (b) opportunities for water infiltration are maximised, and (c) areas of pavement, turf and mulched garden beds are appropriately located and	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
adequately drained.	
PO11 Landscape elements: (a) provide high levels of durability and robustness (b) are cost effective, and (c) have the ability to be maintained conveniently over the long-term.	No acceptable outcome is nominated.
PO12 Drainage of podium planters allows for flush out in future and is adequately drained.	No acceptable outcome is nominated.
PO13 Landscape works and plant selection protects the structural integrity and function of: (a) buildings and structures; (b) overhead and underground services, and (c) other forms of infrastructure.	No acceptable outcome is nominated.

Table 9.3.5.3.2—Plant species list

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
<i>Acanthus mollis</i>					
<i>Acmena brachyandra</i>	Red Apple	12	6	N	
<i>Acmena smithii</i>	Lilly Pilly	6	5	Y	
<i>Acronychia imperforata</i> *	Fraser Island Apple	3	2	Y	
<i>Adiantum</i> spp.	Maidenhair Ferns	0.5	0.5		
<i>Alectryon connatus</i>		4	2	N	
<i>Aleurites moluccana</i>	Candle Nut	12	6	Y	
<i>Allocasuarina littoralis</i>	Black She-Oak	8	5	Y	
<i>Allocasuarina torulosa</i>	Forest She-Oak	6	5	Y	
<i>Alphitonia excelsa</i>	Red Ash	6	5	Y	
<i>Alphitonia petriei</i> Pink Ash	Pink Ash	12	8	Y	
<i>Angophora leiocarpa</i>	Smooth Barked Apple	10	4	Y	
<i>Anigozanthos</i> spp.	Kangaroo Paws				
<i>Araucaria bidwillii</i>	Bunya Pine	20	6	Y	
<i>Araucaria cunninghamii</i>	Hoop Pine	20	6	Y	
<i>Archontophoenix alexandrae</i>	Alexandra Palm	15	5	Y	
<i>Archontophoenix cunninghamiana</i>	Bangalow / Piccabeen Palm	12.5	3	Y	
<i>Argyrodendron</i> spp.		Various	Sizes	Y	
<i>Aristolochia praevensis</i>	Birdwing Butterfly Vine		Vine	Y	
<i>Aristolochia tagala</i>		Vine			
<i>Arytera divaricata</i>	Twin Leaved Coogera	8	4	Y	
<i>Arytera lautereriana</i>	Corduroy Tamarind	8	4	Y	

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
	– Mischarytera				
Austromyrtus dulcis	Midyim	1	2	Y	
Backhousia citriodora	Lemon Scented Myrtle	4	2	Y	
Backhousia myrtifolia	Sweet Carro / Grey Myrtle	4	2	Y	☒
Baeckea spp.		Various	Sizes	Y	
Baeckea spp. (suggested B. la petite, camphorate, virgata mt tozer)		Various	Sizes		
Baeckea virgata miniature		3	3		
Banksia aemula	Old Man Banksia	5	3	Y	
Banksia ericifolia	Heath Banksia	4	4	N	
Banksia integrifolia*	Coastal Banksia	6	4	Y	☒
Banksia oblongifolia		2	2	Y	
Banksia robur	Swamp Banksia	2	2	Y	
Banksia serrata	Saw Banksia	5	6		
Banksia spinulosa	Honeysuckle Banksia	3	2	Y	
Banksia spp.		Various	Sizes	Y	
Barklya syringifolia	Crown of Gold	8	5		
Bauera rubiodes	Wiry Dog Rose	1	1		
Bauera ruby glow		1	1		
Brachychiton acerifolius	Flame Tree	8	4	Y	☒
Brachychiton discolour	Queensland Lace Bark	6	3	Y	☒
Brachyscome spp.	River Daisies	0.5	0.5		
Buckinghamia celcissima	Ivory Curl	6	4		☒
Caldcluvia paniculosa	Rose Leaf Marara	8	6	N	
Callicarpa pedunculata	Velvet Leaf	4	2	Y	
Callicoma serratifolia	Black Wattle	4	4	Y	
Callistemon little john		1	1		
Callistemon spp.		Various	Sizes	Y	☒
Callistemon spp. (Allocasuarina spp.) (suggested C. anzac, captain cook, candy pink, dawson river, endeavour, formosis, pachyphyllus, pink champagne, salignus, viminalis, wildfire)		Various	Sizes	Y	
Callitris columellaris	Bribie Island Pine	8	4	Y	
Calophyllum inophyllum	Beauty Leaf	10	7		
Carpobrotus glaucescens	Pigface	0.3	1	Y	
Cassia brewsteri	Leichardt Bean	8	4		☒
Castanospermum australe	Black Bean	10	6	Y	☒

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
Castanospora alphandii	Brown Tamarind	10	5	N	
Casuarina cunninghamiana	River She-Oak	12	6	Y	
Casuarina spp. (suggested C. glauca, littoralis, cunninghamia, torulosa)		Various	Sizes	Y	
Casuarina equisetifolia*	Horsetail She-Oak	6	6	Y	
Casuarina glauca	Swamp Oak	8	3	Y	
Cinnamomum oliveri	Oliver's sassafras	10	6	Y	
Cissus antarctica	Kangaroo Vine	Vine		Y	
Clerodendrum floribundum	Lolly Bush	3	2	Y	
Clerodendrum inerme	Scrambling Clerodendrum	3	2	Y	
Clivia miniata					
Commersonia bartramii	Brown Kurrajong	6	3	Y	
Cordyline spp.		Various	Sizes	Y	
Corymbia citriodora	Spotted Gum				
Correa reflexa					
Corymbia intermedia	Pink Bloodwood	8	4	Y	
Crinum pedunculatum	Spider Lily / Crinum Lily	1	1	Y	
Crocea exalta	Small Crocea	1	1		
Cryptocarya glaucescens	Laurel	8	4	Y	
Cryptocarya spp.	Laurel	Various	Sizes	Y	
Cryptocarya McDonaldii	Brown Beech	10	4	Y	
Cryptocarya triplinervis	Brown Laurel	8	4	Y	
Cupaniopsis anacardioides	Tuckeroo / Cupania	6	6	Y	☒
Cupaniopsis spp.	Tuckeroo / Cupania	6	4	Y	
Cyathea cooperi	Tree Fern	4	3	Y	
Cymbopogon ambiguus	Lemon Scented Grass	1	1		
Cymbopogon refractus	Barbed Wire Grass	1	1	Y	
Dampiera hederacea		0.3	1		
Dampiera purpurea					
Dampiera stricta		0.3	0.5	Y	
Danthonia racemosa	Wallaby Grass	1	1		
Darlingia darlingiana	Brown Silky Oak	10	4	N	
Darwinia spp. (suggested D. fraserianum, muelleri)		0.5	1		
Davallia pyxidata	Fleur Lily	0.5	0.5	Y	
Davidsonia pruriens	Davidson Plum	8	3		
Dianella caerulea	Flax Lily	0.5	0.3		
Dianthus hybrids					
Dicanthium sericeum	Queensland Blue Grass	0.5	0.5		

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
Dietes robinsoniana					
Diploglottis australis	Native Tamarind	10	6	N	
Diploglottis campbelli	Small Leaved Tamarind	10	6	N	☒
Dysoxylum spp. (suggested D. fraserianum, muellen)	Rosewood	10	6	Y	☒
Echinopogon ovatus	Hedgehog Grass				
Elaeocarpus kirtonii	Blueberry Ash	8	3	N	
Elaeocarpus grandis	Blue Quandong	35	10	Y	
Elaeocarpus obovatus	Blueberry Ash	10	6	Y	
Elaeocarpus reticulatus	Blueberry Ash	8	6	Y	
Elaeocarpus sp. (suggested E. angustifolius, eumundi, grandis, obovatus, reticulatis)	Quandongs	Various	Sizes	Y	☒
Elaeocarpus spp.		Various	Sizes	Y	
Endiandra discolour	Tickwood	7	3	Y	
Endiandra sieberi	Corkwood	10	4	Y	
Endiandra spp. Suggested E. discolour, globosa, sieberi)	Walnut	12	4	Y	
Eucalyptus crebra	Narrow Leaf Grey Ironbark				
Eucalyptus major	Grey Gum				
Eucalyptus robusta	Swamp Mahogany	10	5	Y	
Eucalyptus racemosa	Scribbly Gum	8	5	N	
Eucalyptus tereticornis	Forest Red Gum/ Queensland Blue Gum	10 to 15	5 to 6	Y	
Corymbia tessellaris*	Moreton Bay Ash	10	6	Y	
Eugenia reinwardtiana*	Beach Cherry	2	1	Y	
Euroschinus falcatus*	Ribbonwood	12	6	Y	
Ficus obliqua	Small Leaved Fig	15	5	Y	
Ficus rubiginosa	Small Leaved Moreton Bay Fig	10	4	Y	
Ficus spp. (including sandpaperfigs but excluding F. elastica)	Fig Trees	Various	Sizes	Y	☒
Flindersia australis	Crows Ash / Australian Teak	30	4	Y	
Flindersia collina	Leopard Wood	8	4	N	
Flindersia schottiana	Bumpy Ash	12	3	Y	
Geissis benthami	Red Carabeen	8	4		
Glochidion ferdinandii	Cheese Fig	8	5	Y	
Gmelina leichardtii	White Beech	12	6	Y	
Goodenia spp.		0.3	1	Y	

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
Graptophyllum excelsum	Scarlet Fuschia	2	1		
Grevillea lanigera – dwarf					
Grevillea baileyana	White Oak	8	4		
Grevillea bronze Rambler		0.3	3		
Grevillea forest Rambler		0.3	3		
Grevillea hilliana	Yiel yiel	8	5	Y	
Grevillea robusta	Silky Oak	15		N	
Grevillea royal mantle		0.3	3		
Grevillea spp.		Various	Sizes	Y	
Grevillea spp. (suggested shrubs – G.banksii, coastal glow, honey gem, majestic, moonlight, orange marmalade, pink surprise, Sandra Gordon and trees – G. baileyana, hilliana, robusta)		Various	Sizes		☒
Hardenbergia violacea	Native Sarsparilla		Vine	Y	
Harpullia pendula	Tulipwood	6	4	Y	
Hibbertia scandens	Snake Vine / Guinea Flower	0.2	2.5	Y	
Hibbertia spp.					
Hibbertia vestita		0.3	0.5	Y	
Hibiscus tiliaceus	Cottonwood	6	6	Y	
Hoya australis	Wax Flower	Vine		Y	
Hymenosporum flavum	Native Frangipani	8	3	Y	
Indigofera australis					
Ipomea pes-caprae*	Goats Foot Creeper	0.3	3		
Jacksonia scoparia	Dogwood /Native Broom	4	6	Y	
Jagera pseudorhus	Foambark Tree	6	3	Y	☒
Lagerostroemia indica					
Lavandula angustifolia					
Leptospermum cardwell	Cardwell Tea Tree	2	2		
Leptospermum polygalifolium	Tea Tree	3	2	Y	
Leptospermum neglectum	Coast Tea Tree	4	2		
Leptospermum petersonii	Lemon Scented Tea Tree	4	2	Y	☒
Leptospermum Pacific Beauty		Various	Sizes	Y	☒
Licuala ramsayi	Fan Palm	8	3	Y	
Linospadix monostachya	Walking Stick Palm				
Livistonia australis	Cabbage Tree Palm				
Livistonia decipiens	Weeping Cabbage Plam	8	3		

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
Livistonia decora	Cabbage Tree Palm	10 to 12	3 to 4	Y	
Lobelia membranacea		0.3	0.5	Y	
Lomandra confertifolia		0.3	1	Y	
Lomandra hystrix	Mat Rush	1	1	Y	
Lomandra longifolia	Mat Rush	1	1	Y	
Lophostemon confertus	Brush Box	10 to 23	6	Y	☒
Macadamia spp.		Various	Sizes		
Macaranga tanarius	Macaranga	4	4	Y	
Mallotus discolor	Yellow Kamala	6	4	Y	
Mallotus philipensis	Red Kamala			Y	
Melaleuca bracteata	Revolution Gold and Green	7	5	Y	
Melaleuca erubescens	Swamp Tea Tree (Qld)	4	3		
Melaleuca linariifolia	Snow in Summer	4	3	Y	
Melaleuca linariifolia "snowstorm"		2	2		
Melaleuca nodosa	Prickly Leaf Paperbark	3	2.5	Y	
Melaleuca quinquenervia	Broadleaved Paperbark	8 to 10	3 to 4	Y	☒
Melaleuca sieberi	Swamp Tea Tree (NSW)	6	3	N	
Melaleuca spp.		Various	Sizes	Y	
Melaleuca stypheloides	Prickly Leaf Paperbark	6	3	Y	
Melaleuca viridiflora	Red Flowering Paperbark / Broad Leaved Paperbark	6	4		☒
Melia azedarach	White Cedar	8	4	Y	
Melicope elleryana	Pink Euodia	6	4	Y	☒
Metrosideros spp.					
Metrosideros thompsonii	New Zealand Christmas Bush	6	4		
Myoporum ellipticum		0.5	3	Y	
Myoporum ellipticum					
Nauclea orientalis	Leichardt Tree	8	6	Y	☒
Neolitsea dealbata	White Bolly Gum	8	4	Y	
Omalanthus populifolius	Bleeding Heart	5	3	Y	
Omolanthus populifolius	Native Bleeding Heart	8	6	Y	
Orthosiphon aristatus	Cats Whiskers	2	1		
Pandanus tectorius*	Pandanus	8	4	Y	
Parachidendron priunsum	Snow Wood	6	4	Y	
Peperomia tetraphylla		0.3	1		

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
<i>Petalostigma pubescens</i>	Quinine Bush	5	4	Y	
<i>Phaleria clerodendrum</i> (Poisonous fruit)	Scented Daphne	4	4		
<i>Phebalium woombye</i>	Woombye	2	2	Y	
<i>Phebalium woombye</i> prostate form		0.3	1	Y	
<i>Pilidostigma glabra</i>	Plum Myrtle	3			
<i>Pilidostigma rhytisperma</i>	Small Leaved Plum Myrtle	2	1	N	
<i>Pittosporum rhombifolium</i>	White Holly	6	2	Y	☒
<i>Pittosporum</i> spp.		Various	Sizes	Y	
<i>Pittosporum undulatum</i>	Mock Orange	6	4	N	
<i>Plumbago auriculata</i>					
<i>Poa australis</i>		0.5	0.5		
<i>Poa labillardieri</i>	Tussock Grass	1	1		
<i>Podocarpus elatus</i>	Plum Pine / Brown Pine	10	5	Y	☒
<i>Polyscias elegans</i>	Celerywood	6	2	Y	
<i>Polyscias murrayi</i>	Pencil Cedar		4	N	
<i>Pongamia pinnata</i>		6	4		☒
<i>Proiphys cunninghamii</i>	Brisbane Lily	0.5	0.5	Y	
<i>Ptychosperma elegans</i>	Solitaire Palm				
<i>Pultenea stutzeri</i>	Hard Alder	4	3	Y	
<i>Pultenea</i> spp.		Various	Sizes	Y	
<i>Pultenea</i> spp. (suggested <i>P. villose</i> , wallum gold)		1	1	Y	
<i>Randia</i> spp. (suggested <i>P. chartacea</i> , <i>fitzalanii</i>)		Various	Sizes	Y	
<i>Baloskion tetraphyllum</i>	Foxtails	1	0.5	Y	
<i>Rhodospaera rhodanthema</i>	Deep Yellow Wood	8	4	N	
<i>Ricinocarpus pinifolius</i> prostrate form	Wedding Bush	0.3	2	Y	
<i>Scaevola</i> spp.					
<i>Scaevola</i> spp. (Suggested <i>S. aemula</i> , <i>albida</i> , <i>calendulaceae</i> , purple clusters)		0.3	1		
<i>Scleranthus biflorus</i>					
<i>Sloanea woollsii</i>	Yellow Carabeen	6	3	Y	
<i>Smilax australis</i>	Austral sarsparilla /Barbed Wire Vine			Y	
<i>Sowerbaea juncea</i>	Vanilla Lily	0.3	0.5	Y	
<i>Stenocarpus sinuatus</i>	Firewheel Tree	10	4	N	☒
<i>Stipa verticillata</i>	Slender Bambo Grass	0.3		Y	

Botanical name	Common name	Height metres	Spread metres	Endemic Y/N	Street trees
<i>Sterelitzia reginae</i>	Bird of Paradise				
<i>Stylidium graminifolium</i>					
<i>Syncarpia glomulifera</i>	Turpentine	8	3	Y	
<i>Syzygium francissii</i>	Francis' Water Gum	6	4	Y	
<i>Syzygium australe</i>	Scrub Cherry (sth form)	6	4	Y	☒
<i>Syzygium fibrosum</i>	Fibrous Satinash	4	3		
<i>syzygium leuhmanii</i>	Small Leaved Lilly Pilly	6	4	Y	☒
<i>Syzygium oleosum</i>	Blue Lilly Pilly	6	4	Y	☒
<i>Syzygium paniculatum</i>					
<i>Syzygium</i> spp.		Various	Sizes	Y	☒
<i>Tecomanthe hillii</i>	Fraser Island Creepervine	0.5	Vine	N	
<i>Tecomanthe</i> spp. Roaring meg		0.3	Vine		
<i>Terminalia sericocarpa</i>	Damson Tree	10	5		
<i>Tetradlea thymifolia</i>	Black-eyed Susan	0.5	0.5	N	
<i>Themeda triandra</i>	Kangaroo Grass	1	1.5	Y	
<i>Melastoma malabathricum</i>	Dwarf Lasiandra	1	1		
<i>Toona australis</i>	Red Cedar	12	6	Y	
<i>Tristanopsis laurina</i>	Water Gum	7	3	N	
<i>Viola hederacea</i>	Native Violet	0.3	1	Y	
<i>Vitex ovata</i> (compact)	Beach Vitex	0.5	2		
<i>Waterhousia floribunda</i>	Weeping Lilly Pilly	8	4	Y	☒
<i>Waterhousia unipunctatum</i>	Roly Poly Satinash	5	3		
<i>Westringia fruticosa</i>	Coastal Rosemary	2	2		
<i>Xanthorrhoea</i> spp.	Grass Trees	2	1	Y	
<i>Xanthostemon chrysanthus</i>	Golden Penda	4	2	N	

9.3.6 Operational works

9.3.6.1 Application

This code applies to assessing all development within the Gladstone Regional Council area.

9.3.6.2 Purpose

- (1) The purpose of the Operational Works code is to:
 - (a) Ensure all operational works (earthworks) are undertaken to appropriate levels and standard.
 - (b) Maintain a high standard of environmental amenity.
 - (c) Protect surface water and ground water.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) Operational works involving filling and excavation does not impact adversely on the site or the surrounding area in terms of the physical services and the environment or social values.
 - (b) The use of fill material that is safe and uncontaminated.
 - (c) Maintain the amenity of adjoining land, particularly the visual amenity of residential land.
 - (d) Operational works are located in areas that do not result in increased flooding and drainage problems on upstream and downstream property.
 - (e) Works are undertaken such that soil erosion is properly controlled to avoid unacceptable increased erosion and sediment loads into watercourses.

9.3.6.3 Assessment benchmarks

Table 9.3.6.3.1—Assessable development

Performance outcomes	Acceptable outcomes
Earthworks	
PO1 Earthworks are undertaken in a manner that: (a) produces stable landforms and structures (b) maintains natural landforms (c) minimises height of retaining walls and batter faces (d) does not unduly impact on the amenity or privacy for occupants of the site or on adjoining land, and (e) does not unduly impact on the amenity of the streetscape.	AO1.1 Earthworks and retaining walls comply with the <i>Engineering Design Planning Scheme Policy</i> .
	AO1.2 Retaining walls are certified by a Registered Professional Engineer of Queensland.
	AO1.3 The extent of filling or excavation with a depth of 200mm or greater does not exceed 40% of the site.
	AO1.4 Excavating or filling is no greater than 1m, and height or depth and the combined height of retaining walls and fences does not exceed 2m.
	AO1.5 Soil to be used for filling if stockpiled for more than 1 month is stabilised and grassed.
	AO1.6 Retaining walls are set back from any boundary and are stepped or terraced so that landscaping can soften the visual impact.

Performance outcomes	Acceptable outcomes
PO2 Earthworks maintain the efficiency of the road network and do not adversely impact upon residents or road infrastructure, including not creating any difficulty for access to the site.	No acceptable outcome is nominated.
PO3 Earthworks do not result in the contamination of land or water, and avoids risk to people and property.	AO3 No contaminated material or acid sulfate soil is used as fill.
PO4 Earthworks do not generate a dust nuisance.	No acceptable outcome is nominated.
Bridge and culvert work	
PO5 Bridges and culverts for flood immunity minimise traffic disruption, improve public safety, consider fauna habitat movement and allow for bikeways during and after construction.	No acceptable outcome is nominated.
Road design	
PO6 Roads providing access to the site are provided, constructed and maintained to a standard which is adequate for the traffic type and volume likely to be generated by the activities on site.	AO6 External road works are provided in accordance with the requirements of the <i>Engineering Design Planning Scheme Policy</i> .
Erosion and sediment control	
PO7 Earthworks do not create or worsen any flooding, drainage issues, ponding or an increase in flow directions or volumes, on the site or adjoining or nearby sites to ensure that: (a) environmental values and water quality objectives of receiving waters within or downstream of the proposal are protected or enhanced during the construction, operation and maintenance phases, and (b) The release of sediment-laden stormwater for all land disturbances is minimised through the use of all reasonable and practicable erosion and sediment control measures with degraded areas reinstated.	AO7 Earthworks comply with flooding, drainage and erosion sediment control requirements of the <i>Engineering design planning scheme policy</i> .

Performance outcomes	Acceptable outcomes
PO8 Construction activities for the development avoid or minimise adverse impacts on stormwater quality.	AO8 The release of sediment–laden stormwater is avoided for the nominated design storm, and minimised when the nominated design storm is exceeded, by addressing design objectives listed below in Table 9.3.5.3.2 (construction phase) or local equivalent, for: (a) drainage control (b) erosion control (c) sediment control, and (d) water quality outcomes. Note—An Erosion and Sediment Control Plan (ESCP) is prepared by a suitably qualified person that demonstrates: • erosion and sediment control practices (including any proprietary erosion and sediment control products) are designed, installed, constructed, operated, monitored and maintained, and any other erosion and sediment control practices are carried out in accordance with local conditions; or • how stormwater quality will be managed in accordance with an acceptable regional or local guideline so that target contaminants are treated to a design objective at least equivalent to this Acceptable outcome.
PO9 Progressive rehabilitation of disturbed areas within the site is undertaken, as part of the completion of each stage of development, or where there are no stages, prior to the issuing of certificates of classification for building work or certificates of completion for operational work.	No acceptable outcome is nominated.
PO10 Development provides for a comprehensive rehabilitation program which ensures that disturbed areas are stabilised, temporarily and long term, within reasonable timeframes to minimise erosion on site and sediment discharge from the site.	AO10 Development provides the following: (a) Erosion control is undertaken in a staged manner, such that disturbed areas are exposed for 30 days or less, in accordance with the Engineering Design Planning Scheme Policy (b) Grading and reshaping of the disturbed areas to provide controlled and stable drainage flow paths (c) High velocity flows are diverted away from disturbed areas, and (d) The site is long term stabilised by preparing the site for planting, re–spreading stored topsoil stripped from the site or new topsoil, planting the disturbed area with native species of

Performance outcomes	Acceptable outcomes
	grasses, ground covers and trees, and placing mulch.
PO11 Premises in rural areas adopt a comprehensive approach to soil erosion and sedimentation management by: (a) avoiding land clearing or earthworks in the riparian corridor to a designated stream (b) avoiding land clearing and earthworks on land with a slope steeper than 15% (c) minimising the extent of disturbance on, or the stabilisation of slopes steeper than 10% (or 1:10) (d) managing and controlling surface drainage by using natural flow paths (e) rehabilitating disturbed areas as soon as practical after completion of works by re-establishing the vegetation including seeding with native grasses, ground covers and trees and spreading mulch over the surface, and (f) constructing ponds or small dams off natural flow paths, for collection of surface drainage from areas disturbed for prolonged periods, such as depots, quarries, and stock sales yards.	No acceptable outcome is nominated.
Weed control	
PO12 Weed control practices and plant and equipment cleaning and inspection protocols are: (a) implemented to avoid the introduction and spread of weeds along transport routes and delivery points, and (b) undertaken to control existing declared weeds and pest animals prior to the commencement of and during works.	AO12 Reasonable steps have been taken to ensure that the vehicle or 'thing' being moved by road is free of reproductive material of any Class 1, 2 or 3 declared weeds. For example, compliance with the <i>Queensland Guideline for Limiting Weed Seed Spread (DNR 2000)</i>.
Amenity, acoustic and air quality	
PO13 Development is planned, designed and managed to ensure emissions and odours from activities achieve the appropriate air quality and noise objectives (measured at the receptor). Note—These levels are in accordance with the Environmental Protection (Air) Policy 2008, and Environmental Protection (Noise) Policy 2008.	AO13 No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
PO14 Development does not generate vibration from activities that will affect the amenity of surrounding land uses.	AO14 The development does not result in vibration impacts outside of the development site.
Lighting	
PO15 External lighting is provided in urban areas to ensure a safe environment.	AO15 Technical parameters, design, installation, operation and maintenance of outdoor lighting comply with the requirements of <i>AS4282 – Control of the Obtrusive Effects of Outdoor Lighting</i> .
PO16 Outdoor lighting does not cause undue disturbance to any person, activity or fauna because of emission, either directly or by reflection.	AO16 The vertical illumination resulting from direct, reflected or other incidental light coming from a site does not exceed 8 lux when measured at any point 1.5m outside of the boundary of the property at any level from ground level up.
Operational works and electricity infrastructure	
PO17 The excavation, filling or laying of pipes within the vicinity of electricity supply infrastructure will not create potential damage or hazard. Note—Development involving filling, or excavation or laying of metal pipes on land contiguous to electricity supply infrastructure should be referred to the relevant electricity entity for safety advice on the proposed development.	AO17.1 Excavation or filling does not occur within: (a) 10m of any tower, pole, foundation, ground anchorage or stay supporting electric lines or associated equipment (b) 5m of a substation site boundary (c) 2m of a padmount substation, or (d) 1m of a padmount transformer or an underground cable.
	AO17.2 The laying of metal pipes does not occur within: (a) 5m of any pole, tower, foundation, ground anchorage or stay supporting electric lines or associated equipment (b) 15m of any substation site boundary, or (c) 5m of, and parallel to, an electric line shadow.

Table 9.3.6.3.2—Construction phase: Stormwater management design objectives

Issue	Design objectives
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Issue		Design objectives
Drainage control	Temporary drainage works	(a) Design life and design storm for temporary drainage works: (i) disturbed area open for <12 months—1 in 2-year ARI event (ii) disturbed area open for 12–24 months—1 in 5-year ARI event (iii) disturbed area open for >24 months—1 in 10-year ARI event (b) design capacity excludes minimum 150mm freeboard (c) temporary culvert crossing – minimum 1 in 1-year ARI hydraulic capacity.
Erosion control	Erosion control measures	(a) Minimise exposure of disturbed soils at any time (b) divert water run-off from undisturbed areas around disturbed areas (c) determine the erosion risk rating using local rainfall erosivity, rainfall depth, soil-loss rate or other acceptable methods (d) implement erosion control methods corresponding to identified erosion risk rating.
Sediment control	Sediment control measures Design storm for sediment control basins Sediment basin dewatering	(a) Determine appropriate sediment control measures using: (i) potential soil loss rate, or (ii) monthly erosivity, or (iii) average monthly rainfall (b) collect and drain stormwater from disturbed soils to sediment basin for design storm event: (i) design storm for sediment basin sizing is 80th% five-day event or similar (c) site discharge during sediment basin dewatering: (i) TSS < 50 mg/L TSS, and (ii) turbidity not >10% receiving waters turbidity, and (iii) pH 6.5–8.5.
Water quality	Litter and other waste, hydrocarbons and other contaminants	(a) Avoid wind-blown litter; remove gross pollutants (b) ensure there is no visible oil or grease sheen on released waters (c) dispose of waste containing contaminants at authorised facilities.
Waterway stability and flood flow management	Changes to the natural waterway hydraulics and hydrology	For peak flow for the 1-year and 100-year ARI event, use constructed sediment basins to attenuate the discharge rate of stormwater from the site.

9.3.7 Reconfiguring a lot

9.3.7.1 Application

This code applies to assessing reconfiguring a lot development other than reconfiguring one lot into two to which the state wide code – Reconfiguring a lot (subdividing one into two lots) and associated operational work code applies. When using this code, reference should be made to section 5.3.2 and where applicable, section 5.3.3 located in Part 5.

9.3.7.2 Purpose

- (1) The purpose of the reconfiguring a lot code is to:
 - (a) Ensure that new lots are configured in a manner that facilitates the achievement of the sustainable urban and rural outcomes expressed in the relevant zone codes.
 - (b) Ensure that new lots are provided with infrastructure and access appropriate for their intended use.
 - (c) Minimise adverse environmental impacts and protect the landscape character of Gladstone's natural resources.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) New lots are of a size and shape appropriate for their intended use and the character of the applicable zone.
 - (b) New lot reconfiguration is responsive to topography, natural drainage systems, vegetation and habitat corridors and protects the landscape character of the locality.
 - (c) Lots ensure the amenity of and minimise impacts on adjoining land.
 - (d) Each new lot is provided with a suitable level of infrastructure, services and access.
 - (e) New neighbourhood development is characterised by walkability, housing choice and conveniently located centres providing enhanced opportunities for social interaction.
 - (f) Neighbourhoods are designed to allow development to incorporate climate responsive, energy efficient design principles.
 - (g) Streets are legible, safe, highly interconnected and designed to achieve enhanced streetscapes.
 - (h) Rural areas are not fragmented to the detriment of productive grazing, agricultural or other rural uses.
 - (i) Open space meets the active and passive recreational needs of the community and protects the biodiversity of natural areas and systems.

Note—In order to demonstrate compliance with this code, Council may request the preparation of a Plan of development for the locality, which may include land external to the site. This is likely where the proposed development involves more than 5 lots or the construction of a new road. The Plan of development should be prepared in accordance with the provisions of this code in conjunction with SC6.3 Plans of development particularly in regard to the development of New Neighbourhoods in the Emerging community zone. Plan of development may form the basis of a preliminary approval for development in an area.

9.3.7.3 Criteria for assessment

Table 9.3.7.3.1—Assessable development

Performance outcomes	Acceptable outcomes
Lot design	

Performance outcomes	Acceptable outcomes
PO1 Reconfiguration creates lots that are of a sufficient size, shape and dimension: (a) that are consistent with the character of the zone (b) to accommodate development commensurate with the required building footprint, setbacks, private open space, vehicle access and parking and servicing areas for the zone (c) that does not compromise the future development potential of land in the emerging community zone for urban purposes, and (d) are sufficient to protect areas with significant ecological values.	AO1 Lots comply with the minimum lot size and dimensions specified for its zone in Table 9.3.6.3.2—Minimum lot size and dimensions.
PO2 Rear lots are only created where: (a) they are for the purpose of a single dwelling house (b) the topography of the land or other physical features ensure that the amenity of adjoining lots would not be detrimentally affected (c) the circumstances of the particular case are such that it would not be desirable or practical to provide full frontage lots (d) the safety of the frontage road is not adversely affected (including for waste collection), and (e) the access handle has sufficient width to provide vehicular access and services to the rear lot.	AO2.1 Only 1 rear lot is provided behind each full frontage lot. AO2.2 The number of adjoining rear lots does not exceed 2 and not more than 4 lots directly adjoin a rear lot (excluding lots that adjoin at one point). AO2.3 The minimum size of a rear lot, excluding its access handle is: (a) the same as the minimum lot size for the relevant zone in accordance with Table 9.3.6.3.2—Minimum lot size and dimensions, and (b) is capable of containing a building envelope having minimum dimensions of 15m x 20m. AO2.4 The access handle of the rear allotment has a minimum width of 4m.
PO3 Any boundary realignment must: (a) improve the shape or utility of the existing lot (b) be consistent with the character of the zone, and (c) not create additional lots.	AO3.1 No additional lots are created. AO3.2 The realignment meets the minimum lot size and dimensions in accordance with Table 9.3.6.3.2—Minimum lot size and dimensions.
PO4 Any boundary realignment that is resolving a building encroachment must: (a) be an improvement on the existing situation, and (b) not create a situation where, as a result of the reconfiguration the building/s	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
become unlawful.	
General design	
PO5 The layout of lots, streets and infrastructure avoids or minimises impacts on environmental features by: (a) following the natural topography and minimising earthworks (b) avoiding crossing or otherwise fragmenting waterways, wetlands, habitat areas, ecological corridors or steep land, and (c) maintaining natural drainage features and hydrological regimes.	No acceptable outcome is nominated.
PO6 Reconfiguration is designed to ensure integration with the surrounding locality, having regard to: (a) connections to surrounding streets, pedestrian and cycle networks and other infrastructure networks (b) open space networks, habitat areas or corridors (c) connections to centres, employment areas and recreation areas (d) surrounding landscaping and streetscape treatments, and (e) the interface between adjoining land uses.	No acceptable outcome is nominated.
Neighbourhood design in residential zones (Note: This also applies to Plans of development in the Emerging community zone)	
PO7 Reconfigurations are designed to ensure: (a) the creation of seamless interlinked neighbourhoods with residential character and identity (b) pedestrian movement is encouraged, and (c) neighbourhoods are concentrated around community focus points such as neighbourhood centres and parks.	No acceptable outcome is nominated.
PO8 A variety of lot sizes are provided in close proximity to neighbourhood centres and parks to promote a wider housing choice and mix that is consistent with zone outcomes.	No acceptable outcome is nominated.
PO9 Neighbourhood design provides for safer communities by maximising opportunities for casual surveillance and minimising opportunities for crime and vandalism.	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
Note—Applicants may find useful guidance in the Queensland Government's Crime Prevention through Environmental Design Guidelines for Queensland .	
PO10 Movement and open space networks are: (a) safe, clearly legible and have a high degree of connectivity, and (b) interconnected through a grid or modified grid pattern.	AO10.1 Street blocks have a maximum length of 200m and depth of 80m. AO10.2 Where street blocks have a length in excess of 150m a mid-block pedestrian link not less than 5m wide is provided to encourage walkability. AO10.3 Collector roads linking neighbourhoods are provided on a grid of not less than 800m.
PO11 Movement networks prioritise walking, cycling and public transport within neighbourhoods.	AO11 Ninety percent of all dwellings are within 400m walking distance of an existing or planned public transport stop, park and or community facility.
PO12 The permeability and connectivity of streets is not compromised by the use of cul-de-sacs unless no alternative arrangement is possible.	No acceptable outcome is nominated.
Climate responsive design	
PO13 Neighbourhood layouts are designed to respond to local climate conditions and enable energy efficient dwellings.	AO13 Streets are generally configured to run in a north-south direction between 30° east and 20° west of true north or an east-west direction between 20° north and 30° south of east.
PO14 Smaller or wider lots are located as north facing lots and larger or narrower lots are located as south facing lots.	No acceptable outcome is nominated.
Lot reconfiguration in industrial zones	
PO15 Reconfiguration includes a range of lot sizes to facilitate industrial activities applicable to the zone.	No acceptable outcome is nominated.
PO16 Reconfiguration maximises access to any railway, transport route, intermodal terminal or sea port.	No acceptable outcome is nominated.
PO17 Where reconfiguration adjoins land in another zone, lots are of a sufficient size to mitigate any noise, air quality and visual impacts on	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
that adjoining land.	
Lot reconfiguration in the Rural zone	
PO18 Reconfiguration: (a) maintains rural, open space and landscape character (b) protect the productive capacity of rural land resources, and (c) allows for the efficient operation of rural activities.	No acceptable outcome is nominated.
PO19 Reconfiguration of land identified as Agricultural land Class A and B does not: (a) adversely impact on the viability of land for agricultural or grazing purposes, and (b) constrain existing farming activities. Note—Class A and B agricultural land is identified in the Agricultural land classification overlay map.	AO19 Fragmentation of land designated as Agricultural land Class A or B does not occur in the Rural zone.
Infrastructure and services	
Note—Refer also to the Development design code.	
PO20 Each reconfigured lot is provided with infrastructure and services appropriate to its intended use and location in a manner that: (a) is efficient (b) is adaptable to allow for future infrastructure upgrades (c) minimises risk of adverse environmental or amenity-related impacts (d) promotes the efficient use of water resources, and (e) minimises whole of life cycle costs for that infrastructure.	AO20.1 Lots created within a designated Priority Infrastructure Plan area for a reticulated water supply and/or a reticulated sewerage supply, are connected to that supply in accordance with the <i>Engineering design planning scheme policy</i> .
	AO20.2 Lots created include stormwater infrastructure in accordance with the design requirements of the <i>Engineering design planning scheme policy</i> .
	AO20.3 Lots are connected to electricity and telecommunications infrastructure in accordance with the standards of the relevant regulatory authority prior to the commencement of any use of the site.
	AO20.4 Electricity and telecommunications infrastructure is provided underground where the reconfiguration occurs in an urban area and exceeds 5 new lots.
PO21 Where reconfiguration proposes individual on-site waste water disposal, it must be demonstrated that: (a) the soil type and permeability, slope,	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
and hydrology of the land is capable of accommodating the proposed loads within the lot, and (b) individually and collectively, the impacts of the existing and proposed systems do not adversely impact on the groundwater quality of the locality.	
Access and road design Note—Refer also to the Development design code.	
PO22 Lots have safe access for vehicles and pedestrians through: (a) direct frontage to a properly constructed public road or to common property having a direct frontage to a properly constructed public road created under a community management statement, and (b) providing access appropriate for the type of vehicle associated with development.	AO22 Lots are designed to achieve safe vehicle and pedestrian access in accordance with the <i>Engineering design planning scheme policy</i> .
PO23 Reconfiguration involving the creation of new roads must: (a) provide for the safe, efficient and convenient movement for all modes of transport (b) are designed and constructed to support their intended function for all relevant design vehicle types (c) provide safe and easy access to the frontage of lots (d) are designed and constructed to give priority to pedestrian and bicycle pathways at intersections (e) where practicable, facilitate the provision of an integrated public transport system within 400m of lots (f) where practicable, align with open space corridors and waterways, and (g) where appropriate provide connections to adjoining land.	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
PO24 New roads include streetscape and landscape treatments that: (a) create an attractive and legible environment which establishes character and identity (b) maintain important views and vistas where possible (c) enhance safety and comfort, and meet user needs (d) complement the function of the street in which they are located by reinforcing desired traffic speed and behaviour (e) support safe pedestrian and cycling movement (f) maximise infiltration of stormwater runoff wherever practicable, and (g) minimise maintenance and whole of lifecycle costs.	No acceptable outcome is nominated.
PO25 Rear lanes: (a) provide appropriate width to enable safe vehicle movement, including service vehicles (b) connect to other streets at both ends (c) enable safe access into and out of garages (d) avoid a direct through-route alternative for vehicles, cyclists or pedestrians than the adjoining street network (e) ensure rear yards of properties can be fenced for security, and (f) do not provide for visitor parking within the lane. Note— Applicants should have regard to Crime Prevention through <i>Environmental Design Guidelines for Queensland</i>.	AO25 Rear lanes are designed in accordance with the <i>Engineering design planning scheme policy</i>. Note— In accordance with Councils road hierarchy, rear lanes are to be constructed as access lanes.
Pedestrian and cycle infrastructure Note—Refer also to the Development design code.	
PO26 Reconfiguration includes appropriate pedestrian and cycle infrastructure that: (a) provides a high level of connectivity and permeability that links residential areas with schools; centres, community activity uses; parks, employment areas and public transport stops (b) provides for safe street crossings and for safety between pedestrians and cyclists (c) is designed taking into account	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
topography and convenience for users, and (d) meets disability access standards.	
Stormwater management Note—Refer also to the Development design code.	
PO27 Reconfiguring a lot development: (a) manages the stormwater quality, quantity and velocity flow characteristics from the lot to maintain or improve the pre-development levels, and (b) where practicable incorporates stormwater re-use.	No acceptable outcome is nominated.
Parks and open space Note—Where acceptable outcomes are set out in this section, it is acknowledged that they may only be practicable in greenfield developments. Alternative outcomes are likely to be appropriate in existing developed areas. This may include works and embellishment to existing parks or recreational corridors to meet the development's demand, or as part of an infrastructure agreement.	
PO28 Reconfiguring a lot provides parkland or open space which: (a) meets the needs of the community for a range of active and passive uses, and (b) is of a sufficient size and shape to accommodate recreation activities with associated equipment and facilities.	AO28 Parkland is provided in accordance with the Local Government Infrastructure Plan.
PO29 The design of parkland or open space: (a) contributes to the character of the neighbourhood or area (b) is safe and functions as a focal point for the neighbourhood or community (c) minimises the interface between residential lots and open space through appropriate treatments including alignment, fencing and landscaping (d) maximises road frontage to facilitate casual surveillance (e) incorporates natural areas including important local vegetation, waterways, ridgelines, coastal access, wetlands (f) preserves landscape features important to the scenic amenity of a locality (g) is linked to existing parkland or open space networks wherever possible (h) offers a broad range of informal and formal experiences to the community (i) is cost effective to maintain, and	No acceptable outcome is nominated.

Performance outcomes	Acceptable outcomes
(j) is provided in the early stages of staged developments.	
PO30 The location of parkland or open space is conveniently located to residential neighbourhoods.	AO30 Parkland is provided within 400m of all residential dwellings.
PO31 Open space for conservation purposes protects riparian corridors, beach front vegetation, endangered plant communities and wildlife habitat and movement corridors.	No acceptable outcome is nominated.
Volumetric reconfiguration	
PO32 Volumetric reconfiguration (subdivision of space above or below the surface of land): (a) facilitates efficient development that is consistent with the intent for the zone, or (b) is consistent with a development approval.	No acceptable outcome is nominated.
Access easement	
PO33 The access easement must: (a) be of adequate width (b) be constructed to a standard appropriate to the situation, and (c) not result in unreasonable detriment or nuisance to neighbours.	AO33 The access easement is designed in accordance with the design requirements of the <i>Engineering design planning scheme policy</i> .
Community title subdivisions	
PO34 Community title subdivisions are only supported in instances where: (a) reticulated services are unavailable or limited; (b) land is constrained by natural hazards; or (c) land has high value scenic amenity or biodiversity value. Note—Community title subdivisions are not supported in any other instance.	AO34 No acceptable outcome is nominated.

Table 9.3.7.3.2—Minimum lot size and dimensions

Column 1 Zone	Column 2 Minimum lot size	Column 3 Minimum frontage
Low density residential	600m ² ; or 800m ² if in the Calliope neighbourhood precinct	17m

Column 1 Zone	Column 2 Minimum lot size	Column 3 Minimum frontage
Low–medium density residential Medium density residential	400m ² ; or 1,000m ² where in the Beaches village circuit precinct	10m; or 30m where in the Beaches village circuit precinct
Character residential	Not specified	Not specified
Mixed use Principal centre Centre	600m ²	15m
Neighbourhood centre	400m ²	15m
Specialised centre	1,000m ²	15m
Township	800m ² where unsewered, subject to capability of the site to sustainably dispose of effluent on site	20m
Sport and recreation	Not specified	Not specified
Open space	Not specified	Not specified
Conservation	Not specified	Not specified
Low impact industry	1,000m ²	20m
Medium impact industry	4,000m ²	40m
Special industry	Not specified	Not specified
Industry investigation	50ha	Not specified
Community facilities	Not specified	Not specified
Environmental management	Not specified	Not specified
Limited development (constrained land)	50ha where in the Flood affected lands precinct	Not specified
	250ha where in the Major industry buffer precinct	
Rural zone	250ha	300m
Rural residential	6,000m ² (where lots are provided with full service reticulated water supply)	40m
	1.5ha (in all other circumstances including the Beecher/Burua constant flow precinct)	
Emerging community	50ha	Not specified
Major tourism	2ha	40m
Minor tourism	600m ²	15m
Special purpose	Not specified	Not specified

9.3.8 Telecommunications facility use

9.3.8.1 Application

This code applies to a material change of use for telecommunications facilities where the code is identified as applicable in the tables of assessment. When using this code, reference should be made to section 5.3.2 and where applicable, section 5.3.3 located in Part 5.

Note—Low impact telecommunications facilities are not regulated by the planning scheme. *The Telecommunications (Low Impact Facilities) Determination 1997* provides a full list of low impact facilities. Low impact facilities remain the responsibility of the Commonwealth.

9.3.8.2 Purpose

- (1) The purpose of the telecommunications facilities use code is to ensure that telecommunication facilities are located, designed and managed to minimise impacts on the amenity of adjoining premises.
- (2) The purpose of the code will be achieved through the following overall outcomes:
 - (a) Development does not unreasonably impact on the amenity of adjoining premises and the zone.
 - (b) Development facilitates co-location of infrastructure wherever possible.
 - (c) Development does not unreasonably impact on the character and streetscape of the locality.

9.3.8.3 Assessment benchmarks

Table 9.3.8.3.1— Accepted development subject to requirements and assessable development

Performance outcomes	Acceptable outcomes
For accepted development subject to requirements and assessable development	
Design	
PO1 Development minimises visual amenity impacts on surrounding land uses.	AO1.1 Development does not exceed the maximum building height for the zone.
	AO1.2 Where in the Rural zone, development has the following minimum setbacks from all dwellings: (a) 10m, where the height of the structure is less than 20m (b) 15m, where the height of the structure is between 20m and 30m, and (c) 20m, where the height of the structure is greater than 30m.
	AO1.3 Where in any zone other than the Rural zone or residential zones, development has the following minimum setbacks from all property boundaries: (a) 10m, where the height of the structure is less than 20m (b) 15m, where the height of the structures is between 20m and 30m, and (c) 20m, where the height of the structure is greater than 30m.
Noise	
PO2 Development does not generate noise which:	AO2 Development provides that:

Performance outcomes	Acceptable outcomes
(a) causes nuisance, or (b) exceeds ambient noise levels.	(a) noise levels measured as the adjusted maximum sound pressure level L _{Amax} , adj. T at a noise sensitive place do not exceed: (i) background noise level plus 5dB(A) between the hours of 7am and 10pm (ii) background noise level plus 3dB(A) between the hours of 10pm and 7am, and (b) noise levels measured as the adjusted maximum sound pressure level L _{Amax} , adj. T at a business place do not exceed: (i) background noise level plus 10dB(A) between the hours of 7am and 10pm, and (ii) background noise level plus 8dB(A) between the hours of 10pm and 7am.
Screening and landscaping	
PO3 Any building associated with a telecommunications facility is screened: (a) from view from any adjoining use and street, and (b) by vegetation.	AO3.1 A vegetation buffer with a minimum width of 2m surrounds the Telecommunications facility. AO3.2 All vegetation buffers must: (a) be semi-mature vegetation upon planting, and (b) grow to a minimum height of 2m within 3 years of being planted.
Security	
PO4 Fencing prevents unauthorised access to telecommunications facilities.	AO4 A fence with a minimum height of 2m is provided around all buildings and structures.
Co-location	
PO5 Development is designed to facilitate co-location of telecommunication facilities.	AO5 Development: (a) ensures the design facilitates co-masting or co-siting with other carriers, or (b) involves co-location with an existing telecommunications facility.