



Gladstone Regional Council

Council Policy

Title	ROAD HIERARCHY
Policy Number	P-2014/31
Responsible Directorate	ENGINEERING SERVICES
Responsible Officer	MANAGER TECHNICAL SERVICES
Date of Adoption	2 SEPTEMBER 2014
Resolution Number	G/14/2143
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1.0 PURPOSE:

This policy sets out Council's requirements for a road classification scheme which defines the function of a road in terms of traffic mobility and access/amenity functions. A road hierarchy provides the basis for determination of appropriate road design elements such as widths, speeds and management devices etc. that would be compatible with the function of the road.

2.0 SCOPE:

This policy applies to:-

- Existing gazetted roads and proposed new road reserves, that currently (or will) fall under the jurisdiction of Council;
- Private roads within gated or private communities; and
- New Development Applications (made after the policy is adopted) and where economically feasible, to projects that Council undertakes on the existing road network.

This policy is subordinate to Federal; State (Queensland) and Local (Gladstone Regional Council) Laws

3.0 RELATED LEGISLATION:

- Local Government Act 2009
 - Local Government Regulation 2012
 - Gladstone Regional Council Local Laws No 4 (Local Government Controlled Areas, Facilities and Roads) 2011
 - Gladstone Regional Council Subordinate Local Law No. 4 (Local Government Controlled Areas, Facilities and Roads) 2011
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4.0 RELATED DOCUMENTS:

- Council Development Manual
- AUSTRROADS Guides
- Queensland Streets, Australian
- AMCORD
- Australian Standards

5.0 DEFINITIONS:

To assist in the interpretation of this policy, various terminology relating to road cross sections (ie carriageway, formation etc) are described in Figure 1 (Urban Areas) and Figure 2 (Rural Areas).

The Local Government Act 2009 Section 59 defines a Road as:-

(1) *This division is about roads.*

(2) *A road is—*

(a) *an area of land that is dedicated to public use as a road; or*

(b) *an area of land that -*

(i) *is developed for, or has as 1 of its main uses, the driving or riding of motor vehicles; and*

(ii) *is open to, or used by, the public; or*

(c) *a footpath or bicycle path; or*

(d) *a bridge, culvert, ford, tunnel or viaduct.*

(3) *However, a road does not include -*

(a) *a State-controlled road; or*

(b) *a public thoroughfare easement.*

6.0 POLICY STATEMENT:

The road system within the Gladstone Regional Council shall be designed to achieve the following objectives:-

- Provide a convenient, efficient and safe access for pedestrians, vehicles and cyclists that is economical to the community in terms of capital, cost of construction, maintenance costs and user costs;
- Provide a safe, logical and hierarchical transport linkage within the existing system;
- Provide a convenient, efficient and safe access for emergency and service vehicles;
- Provide a convenient and efficient access for public transport;
- Provide a convenient and efficient space for public utilities;
- Provide an opportunity for street landscape that would enhance the amenity of the environment;
- Provide convenient parking for visitors;
- Have appropriate regard for the climate, geology and topography of the area;
- Provide an acceptable layout for the community to socially interact;
- Provide a safe and efficient Major Drainage System; and
- Provide ease of recognition for the function of each street.

6.1 Function

Council recognises four distinct road functions, Arterial, Distributor, Collector and Local.

Arterial

These are the highest order roads, whose main function is to provide the principal links between urban centres, or between urban centres and rural regions. Within an urban area, they should have the capacity to be developed into multi-lane facilities with access control being a desirable feature to enhance traffic flow. Consequently, development of maximum traffic capacity must be the prime consideration. Aspects of noise, intrusion etc must be accepted and where this creates an unacceptable disturbance, solutions should be found elsewhere, other than by the removal of traffic. Such roads could be expected to be candidates for the full range of traffic management schemes, including intersection upgrading, full access control and parking restrictions. Application of these techniques would be consistent with the movement of traffic through given localities.

In summary:-

- Through traffic movements between towns;
- Longer distance strategic traffic movements;
- Primary connection between suburbs and employment, economic, education or entertainment centres;
- Line haul, public transport task;
- Primary freight and dangerous goods routes;
- Regional cycle movements;
- Access to commercial properties in some instances from Sub Arterial Roads; and
- Car parking in some instances along Sub Arterial Roads.

Distributor

These are roads whose main function is to connect arterial roads to local areas and supplement the arterial roads in providing for traffic movements from one part of the urban area to another. They may be either two-lane or multi-lane roadways and as with roads classified as arterial, aspects of noise, intrusion etc must be accepted or reduced by means other than removal of traffic. The prime concern is still with the movement of traffic, so that on a two-lane roadway, extensive use of traffic management techniques could be expected to be applied. This could mean promotion of the movement of traffic through the locality, even at some inconvenience to local traffic.

In summary:-

- Through traffic between arterial roads;
- Connections between local areas and arterial roads;
- Access to public transport;
- Through movement of public transport;
- Regional – local cycle movements;
- Pedestrian movements; and
- Access to properties (certain cases).

Collector

These roads are intended to carry traffic between the arterial or distributor roads and local streets. They are not expected to carry high traffic volumes, and are not used for longer distance travel, except at the beginning or end of the journey. These roads help to collect traffic at the neighbourhood level and may provide access to abutting properties. Ideally they should discourage through traffic by not providing continuous through routes between arterials or distributors. They are generally the lowest order road that may be used as a bus route.

In summary:-

- Carry traffic having a trip end within the specific area;
- Direct access to properties;
- Access to public transport;
- Pedestrian movements;
- Access to grouped/commercial properties and community facilities; and
- Local cycle movements.

Local

These are the lowest order roads in the tributary local system and they exist to provide access to residential properties. Their main functions are to provide both property access and residential amenity (resident safety and amenity are dominant). Residential amenity can be preserved if traffic volumes are limited to 1000 vehicles per day.

In summary:-

- Direct access to properties;
- Pedestrian movements; and
- Local cycle movements.

6.2 Performance Criteria

Council has identified the performance criteria in Tables 1-4. Council's Chief Executive Officer (CEO) is delegated the authority to clarify, define and amend the performance criteria in specific instances to ensure that the function of the road is realised.

6.3 Acceptable Solutions

Council has identified the acceptable solutions in Tables 5-8. Council's Chief Executive Officer (CEO) is delegated the authority to clarify, define and amend the acceptable solutions in specific instances to ensure that the function of the road is realised.

Table 1 - Performance Criteria - Urban Areas (Road)

Criterion	Road			
	Arterial Road		Distributor Road	
	Arterial	Sub Arterial	4 Lane Distributor	2 Lane Distributor
	<i>Functional Characteristics</i>			
1. Traffic Carrying Function	Volumes Not Restricted	<20,000vpd	<12,000vpd	<6,000vpd
2. Residential Access Function	Nil	Nil	Multi-Dwelling Sites Only	Individual
3. Through Road	Yes	Yes	Yes	Yes
4. Commercial Access Function	Nil	Nil	Consolidated	Individual
5. Industrial Access Function	Nil	Nil	Consolidated	Consolidated
6. Traffic Speed Environment	100km/h ³	80km/h	70km/h	60km/h
7. Maximum Design Vehicle Access ¹	TMR Permitted Vehicles	Class 10	Class 10	Class 10
8. Dangerous/Hazardous Goods Movement	Primary Routes	Primary Routes	Nominated Routes Only	Inappropriate Except for Business Access
9. Public Transport Facilities	Line Haul, Priority Treatments	Bus Route	Bus Route	Bus Route
10. Minimum Flood Immunity for Access	1 in 100 years	1 in 100 years	1 in 50 years	1 in 50 years
11. Cycle Facilities	Within Road Reserve, Max Separation from Road Formation	Lanes on Road (in shoulder) Within Road Reserve (verge), Max Separation from Road Formation	Lanes on Road (in shoulder) Within Road Reserve (verge), Max Separation from Road Formation	Lanes on Road (in shoulder) Within Road Reserve (verge), Max Separation from Road Formation
12. Pedestrian Movement Facilities	Within Road Reserve, Max Separation from Road Formation	Pathways Both Sides within the verge (see Pathway Hierarchy)	Pathways Both Sides within the verge (see Pathway Hierarchy)	Pathways Both Sides within the verge (see Pathway Hierarchy)
13. Property Access Control	No Access	No Access	Selective Access Control	Selective Access Control
14. Parking Provision	Nil	Nil	Site Specific	Site Specific
15. Longitudinal Linemarking	Edge of Lane & Centre	Edge of Lane & Centre	Edge of Lane & Centre	Edge of Lane & Centre
16. Bus Stopping Provision	On Road Reserve, Separated from Formation	On Road Reserve, Separated from Formation	On Road Reserve, Separated from Formation	Indented, Dedicated Bays where Appropriate
17. Pedestrian Crossings	Grade Separated	① Grade Separated ② Signalised	Grade Separated	Some Controlled Points Underpass Central Refuge
18. Wildlife Corridors	Yes	Yes	Yes	No
19. Intersection Spacing	2km Highway >2km Motorway	1000m (min)	500m (min)	500m (min)
20. Intersection Treatments	Grade Separated	Grade Separated Signalised Roundabout Volume Dependant	Signalised Roundabout Priority "T" Volume dependant	Signalised Roundabout Priority "T" Volume dependant

¹ Austroads Vehicle Classification System

² These roads are to be No Through Roads only

³ Desirable Future level is legal limit

Table 1 - Performance Criteria - Urban Areas (Road) cont'd.....

Criterion	Road			
	Arterial Road		Distributor Road	
	Arterial	Sub Arterial	4 Lane Distributor	2 Lane Distributor
<i>Functional Characteristics</i>				
21. Intersection Interaction				
- Arterial				
- Sub Arterial				
- Distributor				
- Industrial Collector				
- Residential Collector				
- Access Street				
- Access Place				
22. Cross Section	Divided Carriageway	Divided Carriageway	Divided Carriageway	2 Lanes Undivided
<i>Impact Characteristics</i>				
23. Abutting Land Use Types	Non Sensitive to Traffic	Non Sensitive, Vehicle Associated	Non Sensitive to Traffic	Retail Commercial Light Industrial
24. Land Use Impact Amelioration	Barriers Buffers Setbacks	Barriers Buffers Setbacks	Buffers Streetscaping Setbacks	① Streetscaping ② Traffic Management (Site Specific)

¹ Austroads Vehicle Classification System

² These roads are to be No Through Roads only

³ Desirable Future level is legal limit

Table 2 - Performance Criteria - Urban Areas (Street)

Criterion	Street			
	Collector Street		Local Street	
	Industrial	Residential/ Commercial	Residential Access Street	Residential Access Place ²
	<i>Functional Characteristics</i>			
1. Traffic Carrying Function	<6,000vpd	<3,000vpd	<1,000vpd	<150vpd
2. Residential Access Function	Nil	Individual	Individual	Individual
3. Through Road	Yes	Yes	Preferred	No (cul-de-sac only)
4. Commercial Access Function	Individual	Individual	No	No
5. Industrial Access Function	Individual	Nil	No	No
6. Traffic Speed Environment	60km/h	60km/h	50km/h	50km/h
7. Maximum Design Vehicle Access ¹	Class 10	Class 9	Service Vehicles only (Class 8)	Service Vehicles only (Class 8)
8. Dangerous/Hazardous Goods Movement	Nominated Routes Only	Inappropriate Except for Business Access	No	No
9. Public Transport Facilities	Bus Route	Bus Route	School Bus Only	No
10. Minimum Flood Immunity for Access	20	20	10	10
11. Cycle Facilities	District/ Neighbourhood Routes, Preference ① Separate Lanes ② Sealed Shoulders Lane ③ On Road Lane	Neighbourhood Routes, Shared Road Space with Cars	Neighbourhood Routes, Shared Road Space with Cars	Neighbourhood Routes, Shared Road Space with Cars
12. Pedestrian Movement Facilities	Pathways Both Sides within the verge (see Pathway Hierarchy)	Pathways Both Sides within the verge (see Pathway Hierarchy)	On Verge, Path on One Side	On Verge
13. Property Access Control	Individual Sites	Individual Sites	Individual Sites	Individual Sites
14. Parking Provision	Kerbside	Kerbside	No Specific (Marked) Provision	No Specific (Marked) Provision
15. Longitudinal Linemarking	Edge of Lane & Centre	Edge of Lane & Centre	Not Required	Not Required
16. Bus Stopping Provision	No Provision	No Provision	No Provision	No Provision
17. Pedestrian Crossings	Controlled Points, as per Pathway Hierarchy	Controlled Points, as per Pathway Hierarchy	No Specific Provision	No Specific Provision
18. Wildlife Corridors	No	No	No	No
19. Intersection Spacing	200m (min)	100m (min)	80m (min)	Nil
20. Intersection Treatments	Roundabout Priority "T" Volume Dependant	Roundabout Priority "T" Volume Dependant	Priority "T"	Priority "T"

¹ Austroads Vehicle Classification System

² These roads are to be No Through Roads only

³ Desirable Future level is legal limit

Table 2 - Performance Criteria - Urban Areas (Street) cont'd.....

Criterion	Street			
	Collector Street		Local Street	
	Industrial	Residential/ Commercial	Residential Access Street	Residential Access Place ²
<i>Functional Characteristics</i>				
21. Intersection Interaction				
- Arterial				
- Sub Arterial				
- Distributor				
- Industrial Collector				
- Residential Collector				
- Access Street				
- Access Place				
22. Cross Section	2 Lanes Undivided	2 Lanes Undivided	2 Lanes Undivided	2 Lanes Undivided
<i>Impact Characteristics</i>				
23. Abutting Land Use Types	As Specified Under Zoning	As Specified Under Zoning	As Specified Under Zoning	As Specified Under Zoning
24. Land Use Impact Amelioration	① Streetscaping ② Intersection Control	① Streetscaping ② Intersection Control	① Streetscaping	① Streetscaping

¹ Austroads Vehicle Classification System

² These roads are to be No Through Roads only

³ Desirable Future level is legal limit

Table 3 - Performance Criteria - Rural Areas (Road)

Criterion	Road		
	Arterial Road		Distributor Road
	Arterial	Sub Arterial ²	Distributor ³
	Functional Characteristics		
1. Traffic Carrying Function	As Per State Road Authority Requirements	Volumes not Restricted	<5,000 vpd
2. Residential Access		1 per Property	1 per Property
3. Commercial Access		Via a Lower Order Road ⁴	Via a Lower Order Road ⁴
4. Industrial Access		Via a Lower Order Road ⁴	Via a Lower Order Road ⁴
5. Traffic Speed Environment		100km/h	100km/h
6. Heavy Traffic Movement		Available	Available
7. Dangerous Goods Movement		Primary Routes	Nominated Routes Only
8. Maximum Design Vehicle Access ¹		Class 10	Class 10
9. Wildlife Corridors		Yes	No
10. Public Transport Facilities		Line Haul, Priority Treatments	Bus route
11. Cycle Facilities (where Required by Council Cycle Strategy)		Separate From Road	Separate From Road
12. Pedestrian Movement Facilities		Separate From Road	Separate From Road
13. Parking Provision		Nil	Nil
14. Bus Stopping Provision		Dedicated Bays	Dedicated Bays
15. Pedestrian Crossings		No Specific Provision	No Specific Provision
16. Intersection Spacing		>500m	>500m
17. Intersection Treatments		Priority "T"	① Priority "T" ② Roundabout (3 or 4 leg)
18. Intersection Interaction			
- Arterial			
- Sub Arterial			
- Distributor			
- Collector			
- Access Place			
	Impact Characteristics		
19. Abutting Land Use Types		Non Sensitive to Vehicle Associated Noise	Non Sensitive to Vehicle Associated Noise
20. Land Use Impact Amelioration		Setbacks ⁶	Setbacks ⁶

¹ Austroads Vehicle Classification System

² Where Road is to be State Controlled, Criteria must follow the State Road Authority Requirements

³ Traffic Distributor is to be used as Industrial Road

⁴ Access is to be to an existing lower order road, or to a newly created lower order road located at an adjoining property boundary.

⁵ Subject to B-Double permit approval

⁶ Distance is to be as specified in the Planning Scheme

Table 4 - Performance Criteria - Rural Areas (Road)

Criterion	Road	
	Collector Road	Local Road
	Collector	Access
	<i>Functional Characteristics</i>	
1. Traffic Carrying Function	<1,000vpd	<150vpd
2. Residential Access	1 per Property	1 per Property
3. Commercial Access	1 per Property	1 per Property
4. Industrial Access	1 per Property	1 per Property
5. Traffic Speed Environment	100km/h (80km/h - Rural Residential)	80km/h (60km/h - Rural Residential)
6. Heavy Traffic Movement	Access Only ⁵	Access Only ⁵
7. Dangerous Goods Movement	Access Only	Access Only
8. Maximum Design Vehicle Access ¹	Class 10	Class 10
9. Wildlife Corridors	No	No
10. Public Transport Facilities	Bus route	No
11. Cycle Facilities (where Required by Council Cycle Strategy)	On Road	No Specific Provision
12. Pedestrian Movement Facilities	No Specific Provision	No Specific Provision
13. Parking Provision	Nil	Nil
14. Bus Stopping Provision	On Widened Shoulder, Coinciding with Property Access	Nil
15. Pedestrian Crossings	No Specific Provision	No Specific Provision
16. Intersection Spacing	>500m	>100m
17. Intersection Treatments	Priority "T"	Priority "T"
18. Intersection Interaction		
- Arterial		
- Sub Arterial		
- Distributor		
- Collector		
- Access Place		
	<i>Impact Characteristics</i>	
19. Abutting Land Use Types	Not Applicable	Not Applicable
20. Land Use Impact Amelioration	Setbacks ⁶	Setbacks ⁶

¹ Austroads Vehicle Classification System

² Where Road is to be State Controlled, Criteria must follow the State Road Authority Requirements

³ Traffic Distributor is to be used as Industrial Road

⁴ Access is to be to an existing lower order road, or to a newly created lower order road located at an adjoining property boundary.

⁵ Subject to B-Double permit approval

⁶ Distance is to be as specified in the Planning Scheme

Table 5 - Acceptable Solutions - Urban Areas (Road)

Criterion	Units	Road			
		Arterial Road		Distributor Road	
		Arterial	Sub Arterial	4 Lane Distributor	2 Lane Distributor
1. Design speed	km/h	90km/h	90km/h	70km/h	70km/h
2. Posted Speed	km/h	80km/h	80km/h	60km/h	60km/h
3. Reserve Width ¹	m	60m (min)	40m (min) Depends on Ultimate Function	40m (min)	25m (min) Depends on Ultimate Function
4. Carriageway Form	Form	Divided	Site Specific	Divided, 2 Lanes Each Direction	2 Lanes
5. Minimum Curve Radius ²	m	900	900	300	300
6. Through Lane Width	m	3.5m	3.5m	3.5m	3.5m
7. Carriageway Width	m	12m (min, no parking)	11m (min, no parking)	11.5m (min) Each Carriageway	13m (min)
8. Verge Width	m	10m (min)	7.5m (min)	6m (min)	6m (min)
9. Verge Grade ³	Max %	2.5% @ 6m	2.5% @ 6m	2.5% @ 4.5m	2.5% @ 4.5m
	Min %	1% @ 6m	1% @ 6m	1% @ 4.5m	1% @ 4.5m
10. Shoulder Width	m	3.0m (min) Left Side 2.0m (min) Right Side Each Carriageway	2.0m (min) Both Sides	4.5m (min)	Site Specific
11. Median Width	m	10m (min)	5m (min)	5m (min)	Nil
12. Kerb Type	Type	Site Specific	Barrier Kerb	Barrier Kerb	Barrier Kerb
13. Median Surface Drainage ⁴	Grade	2% (max) Vegetated 5% (max) Concrete	2% (max) Vegetated 8% (max) Concrete	2% (max) Vegetated 6% (max) Concrete	2% (max) Vegetated 10% (max) Concrete
14. Off Street Path Width (Pedestrian/Cycle) ⁵	m	Refer to Gladstone Regional Council's Bicycle & Pedestrian Hierarchy	2 x 3.0m	2 x 2.5m	2 x 2.5m
15. Bicycle Lane Width	m	Refer to Gladstone Regional Council's Bicycle & Pedestrian Hierarchy	On Road, Marked 2.5m (min, included in shoulder width)	On Road, Marked 2.0m (min, included in shoulder width)	On Road, Marked 2.0m (min, included in shoulder width)
16. On Street Parking (width)	m	Nil	Nil	3m (min)	3m (min)
17. Bus Stop (width)	m	Separate to Carriageway	Site Specific	3m Indented	3m Indented
18. Lighting ⁶	Item	V3 (Min)	V3 (Min)	V4 (Min)	V4 (Min)

¹ Reserve width to increase in localised areas to accommodate cutting, fill, and intersections ie roundabouts etc

² Based on Austroads Part 3. Table 7.10 (using centreline)

³ Grade to be positive, from top of kerb, with distance measured from 'back' of kerb

⁴ Q100 events to be contained within road/drainage reserve

⁵ Path widths are to be ultimately controlled by the Footpath / cycleway Strategy

⁶ Lighting must be designed in accordance with AS1158 set, and Main Roads Manual

Table 5 - Acceptable Solutions - Urban Areas (Road) cont'd.....

Criterion	Units	Road			
		Arterial Road		Distributor Road	
		Arterial	Sub Arterial	4 Lane Distributor	2 Lane Distributor
19. Grade - Longitudinal	Max %	5% (max)	6% Maximum 8% Maybe Permitted for Maximum Length of 100m (Excluding Transitions)	6% Maximum 8% Maybe Permitted for Maximum Length of 100m (Excluding Transitions)	6% Maximum 8% Maybe Permitted for Maximum Length of 100m (Excluding Transitions)
	Min %	0.5%	0.5%	0.5%	0.5%
20. Noise Attenuation	Priority Order	<ul style="list-style-type: none"> ① Buffer ② Landscaping & Buffer ③ Barrier 	Site Specific	<ul style="list-style-type: none"> ① Buffer ② Landscaping & Buffer 	Site Specific
21. Appropriateness of LATM	Item	Not Acceptable	Not Acceptable	Not Acceptable	Not Acceptable

- ¹ Reserve width to increase in localised areas to accommodate cutting, fill, and intersections ie roundabouts etc
- ² Based on Austroads Part 3. Table 7.10 (using centreline)
- ³ Grade to be positive, from top of kerb, with distance measured from 'back' of kerb
- ⁴ Q100 events to be contained within road/drainage reserve
- ⁵ Path widths are to be ultimately controlled by the Footpath / cycleway Strategy
- ⁶ Lighting must be designed in accordance with AS1158 set, and Main Roads Manual

Table 6 - Acceptable Solutions - Urban Areas (Street)

Criterion	Units	Street			
		Collector Street		Local Street	
		Industrial	Residential/ Commercial	Residential Access Street	Residential Access Place
1. Design speed	km/h	70km/h	70km/h	60km/h	60km/h
2. Posted Speed	km/h	60km/h	60km/h	50km/h	50km/h
3. Reserve Width ¹	m	25m (min)	22m (min)	18m (min)	17m (min)
4. Carriageway Form	Form	2 Lanes	2 Lanes	2 Lanes	2 Lanes
5. Minimum Curve Radius ²	m	300	300	200	200
6. Through Lane Width	m	3.5m	3.0m	3.0m	3.0m
7. Carriageway Width	m	13m (min)	11m (min)	9m (min)	8m (min)
8. Verge Width	m	6m (min)	5.5m (min)	4.5m (min)	4.5m (min)
9. Verge Grade ³	Max %	2.5% @ 4.5m	2.5% @ 4m	2.5% @ 3m	2.5% @ 3m
	Min %	1% @ 4.5m	1% @ 4m	1% @ 3m	1% @ 3m
10. Shoulder Width	m	N/A	N/A	N/A	N/A
11. Median Width	m	Site Specific 2.0m min. (Where Provided)	Site Specific 2.0m min. (Where Provided)	Nil	Nil
12. Kerb Type	Type	Barrier Kerb and Channel (150mm high)	Barrier Kerb and Channel (150mm high)	Mountable Kerb and Channel (100mm high)	Mountable Kerb and Channel (100mm high)
13. Median Surface Drainage ⁴	Grade	2% (max) Vegetated 8% (max) Concrete	2% (max) Vegetated 8% (max) Concrete	Nil	Nil
14. Off Street Path Width (Pedestrian/Cycle) ⁵	m	2 x 1.5m(min)	2 x 1.5m(min)	1 x 1.5m	Nil
15. Bicycle Lane Width	m	On Road, Not Marked	On Road, Not Marked	On Road, Not Marked	On Road, Not Marked
16. On Street Parking (width)	m	2.5m (min)	2.5m (min)	Unmarked	Unmarked
17. Bus Stop (width)	m	Unmarked	Unmarked	Unmarked	Nil
18. Lighting ⁶	Item	P4 (Min)	P4 (Min)	P4 (Min)	P4 (Min)
19. Grade - Longitudinal	Max %	8% max	8% Max Absolute Max 10% Under 75m Length (Exclude Transitions) on one Occasion per road	10% Max Absolute Max 15% Under 25m Length (Exclude Transitions)	10% Max Absolute Max 15% Under 25m Length (Exclude Transitions)
	Min %	0.5%	0.5%	0.5%	0.5%
20. Noise Attenuation	Priority Order	Incorporate in Building/Lot Design (Passive)	Incorporate in Building/Lot Design (Passive)	No	No
21. Appropriateness of LATM	Item	Not Acceptable	Not Acceptable	Not Acceptable	Not Acceptable

¹ Reserve width to increase in localised areas to accommodate cutting, fill, and intersections ie roundabouts etc

² Based on Austroads Part 3. Table 7.10 (using centreline)

³ Grade to be positive, from top of kerb, with distance measured from 'back' of kerb

⁴ Q100 events to be contained within road/drainage reserve

⁵ Path widths are to be ultimately controlled by the Footpath / cycleway Strategy

⁶ Lighting must be designed in accordance with AS1158 set, and Main Roads Manual

Table 7 - Acceptable Solutions - Rural Areas (Road)

Criterion	Units	Road		
		Arterial Road		Distributor Road
		Arterial	Sub Arterial	Distributor
1. Design Speed	km/h	As Per State Road Authority Requirements	110km/h	110km/h
2. Reserve Width ¹	m		40m (min)	30m (min)
3. Carriageway Form ²	Form		2 lanes	2 lanes
4. Running Surface	Type		Sealed	Sealed
5. Minimum Curve Radius ³	m		1,100m	1,100m
6. Minimum Formation Width	m		16.0m	13.0m
7. Carriageway Width (cw)	m		12.0m	9.0m
8. Through Lane	m		3.5m	3.5m
9. Shoulder Width	m		2.5m	1.0m
10. Shoulder Surface	Type		Sealed	Sealed
11. Guidepost Lateral Location	Item		At Edge of cw	At Edge of cw
12. Verge Width	m		1m (min)	1m (min)
13. Median Width	m		1x Clear Zone Width (where required)	Not Appropriate
14. Drainage Depth ⁴	m		0.3m (min)	0.3m (min)
15. Clear Zone Width ⁵	m		See Note 2	
16. Off Street Path Width (Pedestrian/Cycle)	m		No Provision	No Provision
17. Bicycle Lane Width	m		Nil (use Sealed Shoulder)	No Provision
18. On Street Parking (Width, Indented)	m		No Provision	No Provision
19. Bus Stop (Width, Indented)	m		3m Shoulder Extensions (where required)	3m Shoulder Extensions (where required)
20. Grade - Longitudinal	%		5% Max	7% Max
21. Noise Attenuation	Item		Not Appropriate	Not Appropriate
22. Appropriateness of LATM	Item		Not Appropriate	Not Appropriate

¹ Minimum Reserve width is carriageway + verge width x 2 + drainage x 2 + Lateral Clearance x 2, width to increase in localised areas to accommodate cutting, fill, and intersections ie roundabouts etc

² Carriageway form is typically located centrally within the road reserve

³ 3% superelevation is utilised for these minimum radii

⁴ Drainage depth is depth below edge of carriageway

⁵ As per Austroads Guide to Road Design Part 6, Table 4.1

⁶ This category includes all unformed unmade roads within Dedicated Road Reserves

⁷ For areas other than rural residential with AADT <10, carriageway width of 4m is acceptable, AADT<50, cw of 5m, AADT<100, cw of 6m

Table 8 - Acceptable Solutions - Rural Areas (Road)

Criterion	Units	Road	
		Collector Road	Local Road
		Collector	Access ⁶
1. Design Speed	km/h	110km/h (90km/h - Rural Residential)	110km/h (70km/h - Rural Residential)
2. Reserve Width ¹	m	25m (min)	25m (min)
3. Carriageway Form ²	Form	2 lanes	2 lanes
4. Running Surface	Type	Sealed	Formed (AADT<10) Gravel (AADT<100) Sealed (AADT >= 100) (Sealed - Rural Residential)
5. Minimum Curve Radius ³	m	1,100m	1,100m
6. Minimum Formation Width	m	12.0m	11.0m
7. Carriageway Width (cw)	m	8.0m	7.0m ⁷
8. Through Lane	m	3.0m	3.0m
9. Shoulder Width	m	1.0m (min)	0.5m (min)
10. Shoulder Surface	Type	Sealed (Sealed with concrete edge protection - Rural Residential)	Gravel (Sealed with concrete edge protection - Rural Residential)
11. Guidepost Lateral Location	Item	At Edge of cw	At Edge of cw
12. Verge Width	m	1m (min)	1m (min)
13. Median Width	m	Not Appropriate	Not Appropriate
14. Drainage Depth ⁴	m	0.3m (min)	0.3m (min)
15. Clear Zone Width ⁵	m	See Note 2	
16. Off Street Path Width (Pedestrian/Cycle)	m	No Provision	No Provision
17. Bicycle Lane Width	m	No Provision	No Provision
18. On Street Parking (Width, Indented)	m	No Provision	No Provision
19. Bus Stop (Width, Indented)	m	3m Shoulder Extensions (where required)	No Provision
20. Grade - Longitudinal	%	8% Max	10% Max (Unsealed) 15% Max (Sealed)
21. Noise Attenuation	Item	Not Appropriate	Not Appropriate
22. Appropriateness of LATM	Item	Not Appropriate	Not Appropriate

¹ Minimum Reserve width is carriageway + verge width x 2 + drainage x 2 + Lateral Clearance x 2

² Carriageway form is typically located centrally within the road reserve

³ 3% superelevation is utilised for these minimum radii

⁴ Drainage depth is depth below edge of carriageway

⁵ As per Austroads Guide to Road Design Part 6, Table 4.1

⁶ This category includes all unformed unmade roads within Dedicated Road Reserves

⁷ For areas other than rural residential with AADT <10, carriageway width of 4m is acceptable, AADT<50, cw of 5m, AADT<100, cw of 6m

Figure 1 - Urban Areas

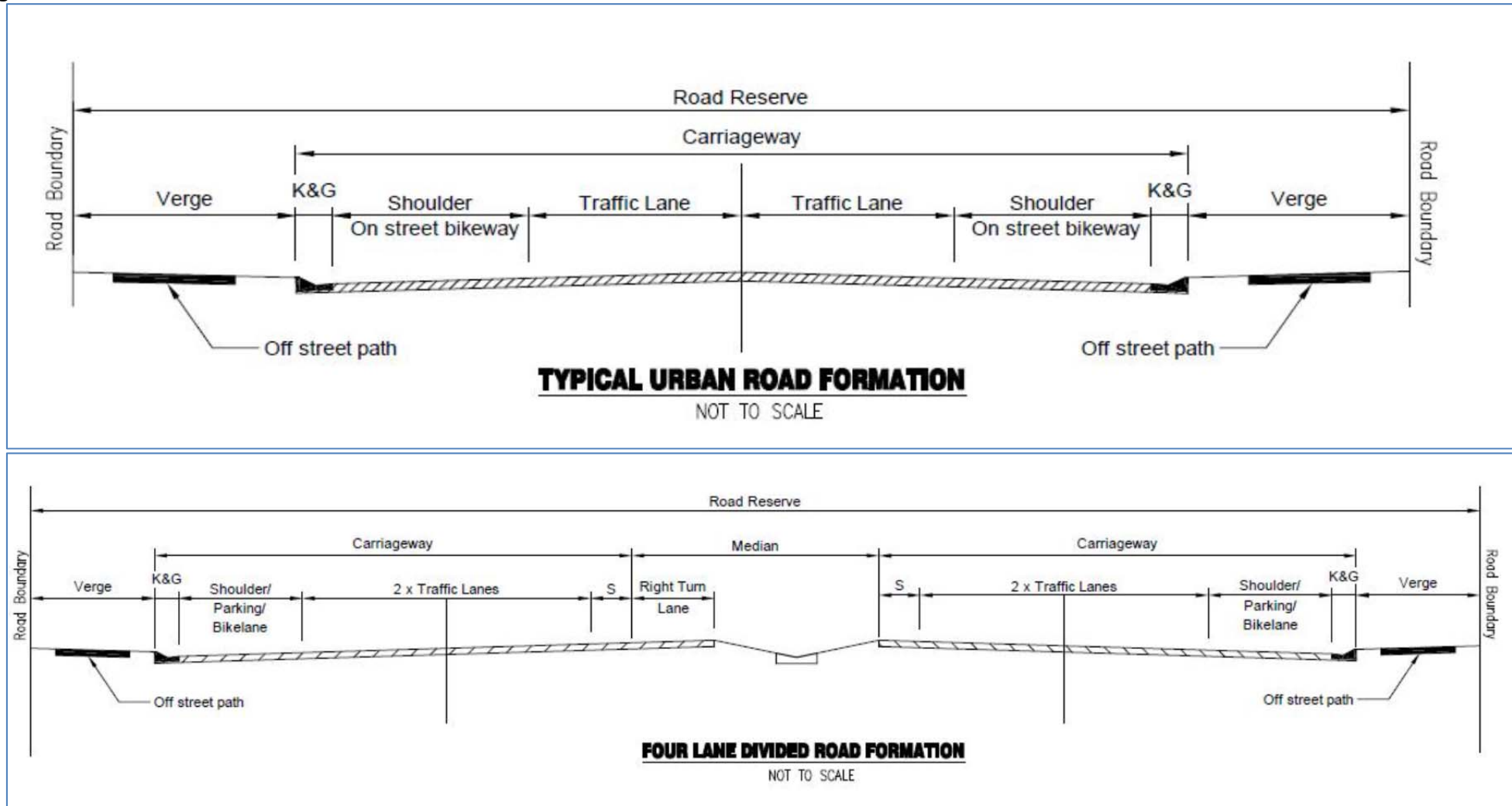
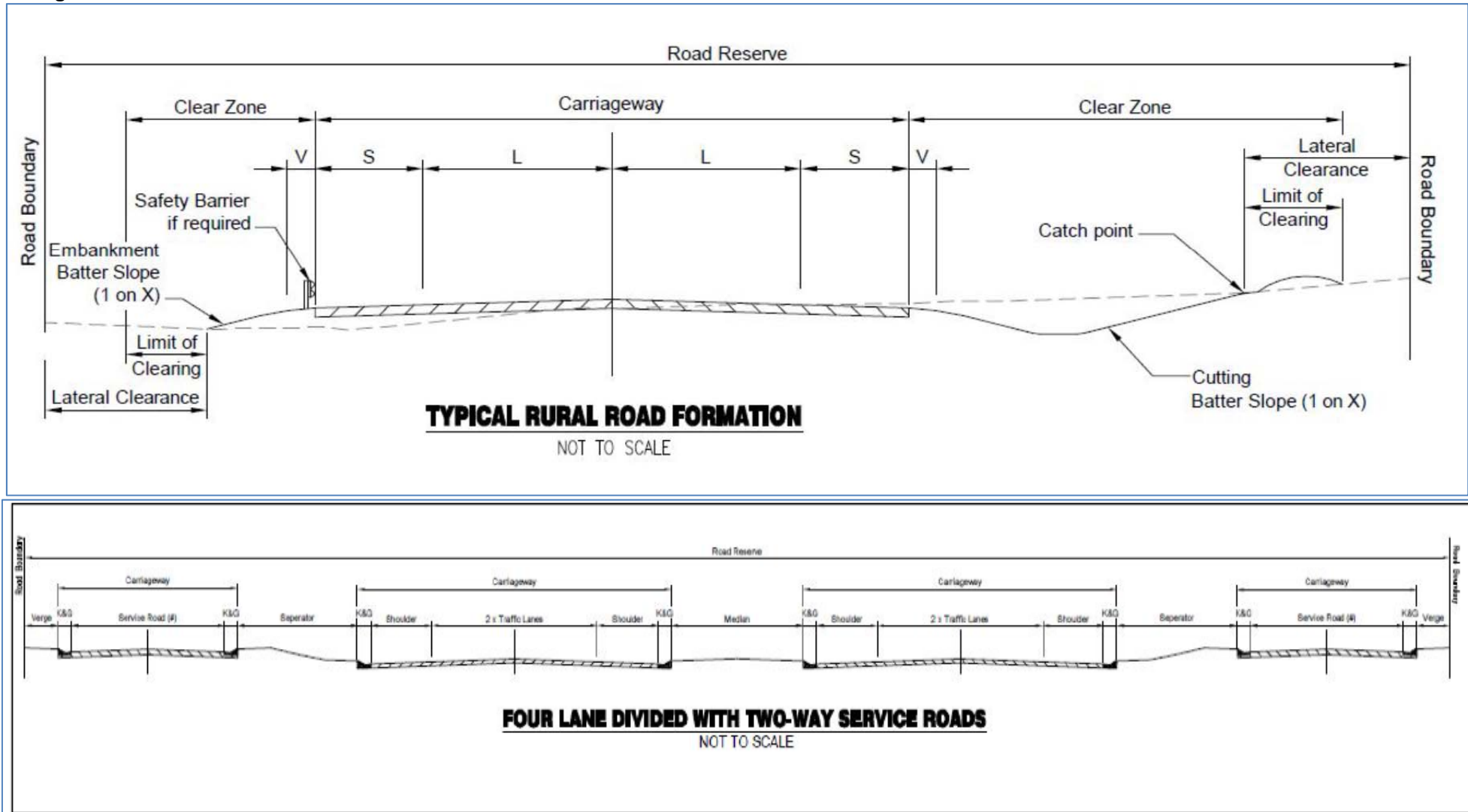


Figure 2 - Rural Areas



7.0 ATTACHMENTS:

Nil

8.0 REVIEW TRIGGER:

This policy will be reviewed when any of the following occurs:

1. The related legislation/documents are amended or replaced.
2. Other circumstances as determined from time to time by a resolution of Council.
3. Periodic Review – 3 years from date of adoption.

TABLE OF AMENDMENTS		
Originally Adopted	2 SEPTEMBER 2014	G/14/2143
Amendment 1	<INSERT DATE COUNCIL MEETING>	<INSERT RESOLUTION NUMBER>
Amendment 2	<INSERT DATE COUNCIL MEETING>	<INSERT RESOLUTION NUMBER>
Amendment 3	<INSERT DATE COUNCIL MEETING>	<INSERT RESOLUTION NUMBER>

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STUART RANDLE
CHIEF EXECUTIVE OFFICER