

# Traffic Impact Assessment

Peppertree Hill Estate

For: Peppertree Hill Estate

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## Document History

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## Prepared by

**Metafora Consultants Pty Ltd**

ABN: 48 676 429 842

A: 18 Clifton St, Balmain East NSW 2041

## Prepared for

[Redacted]

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# 1 Introduction

## 1.1 Summary of the project

Metafora has been engaged by Peppertree Hill Estate to prepare a Traffic Impact Assessment (TIA) in relation to the proposed development at the Peppertree Hill Estate located at 85 Rocky Waterhole Road in Mount Frome, NSW.

The proposal is to construct 16 accommodation villas, renovate the existing dwelling and renovate and expand the existing restaurant on the site. A new internal road is proposed to enable access to the accommodation buildings and facilities. The expansion is proposed to be supported by 87 parking spaces within the site.

The development site is located within the Mid-Western Regional Council LGA, and the application will be submitted to the local Council for approval. Therefore, the traffic and parking aspects for this project have been assessed based on the local statutory documents.

The location of the site is shown in Figure 1.

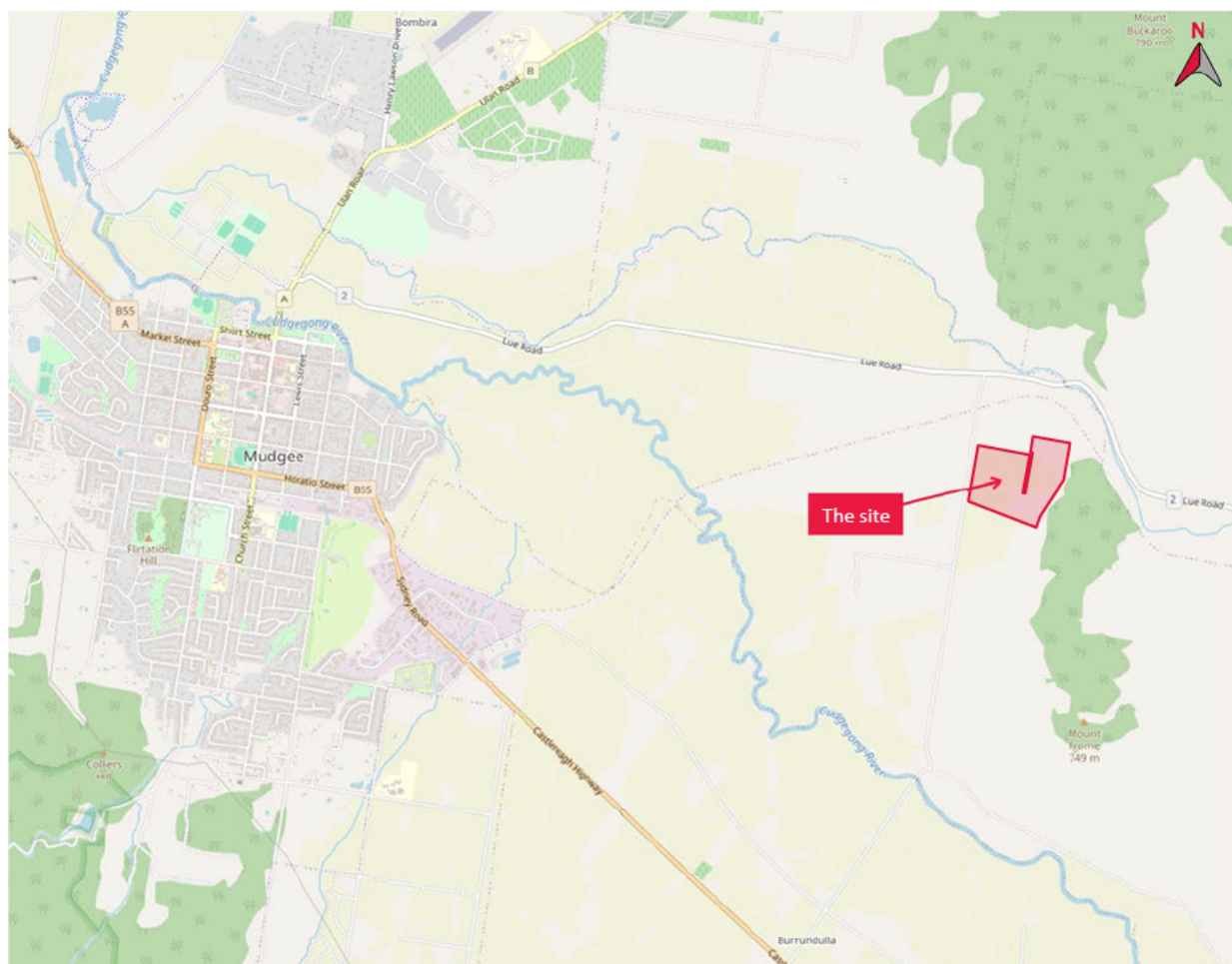


Figure 1: Location of the site (Source: OpenStreetMap)

## 1.2 Purpose of the report

The purpose of this report is to assess the potential traffic and parking impacts onto the surrounding road network and other road users in relation with the vehicle activity during the operation of the proposed development.

This TIA will be submitted to Mid-Western Regional Council for approval.

## 2 Site context

### 2.1 Site location

The subject site has a listed street address of 85 Rocky Waterhole Road in Mount Frome, NSW, and comprises the western part of Lot 2 DP1283989.

The site is located approx. 7km east of Mudgee and approx. 2km north of Mount Frome.

The property has a road frontage to Rocky Waterhole Road on its western boundary.

The location of the site in the broader context is shown in Figure 1, while a zoomed-in map is shown in Figure 2.



Figure 2: Zoomed-in location of the site (Source: OpenStreetMap)

## 2.2 Land zoning

The site is located within the Primary Production Small Lots zone (RU4), adjacent to the Environmental Management zone (C3) on which the remaining part of the lot is positioned. To the south is an area zoned Primary Production (RU1).

The immediate surroundings of the site comprise mostly RU4 and C3 zones, with more urban residential, commercial and industrial areas located to the west in Mudgee.

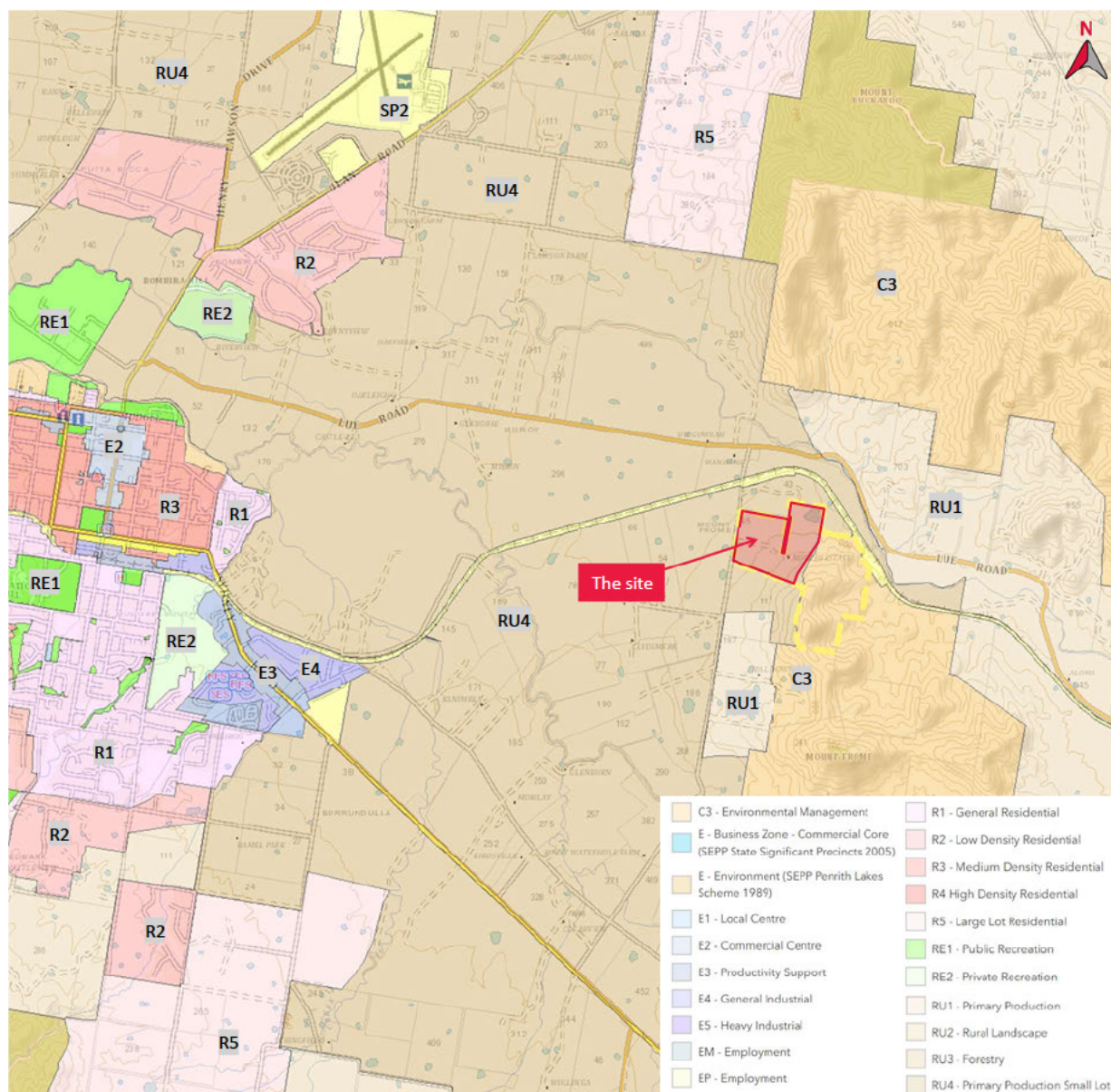


Figure 3: Land zoning (Source: [planningportal.nsw.gov.au](http://planningportal.nsw.gov.au))



### 2.3 Current site use

The site operates as a winery and consists of a cellar door, 2 residences, a commercial kitchen and a restaurant. Relevant metrics are listed below:

- Residences: 2
- Staff: 3
- Restaurant GFA: 350m<sup>2</sup>
- Additional outdoor licensed floor: 40m<sup>2</sup>
- Retail / cellar door GFA: 50m<sup>2</sup>
- Car parking: Min 30

The existing site access is directly off Rocky Waterhole Road.

An aerial view of the existing site is shown in Figure 4.



Figure 4: Aerial view of the existing site buildings and driveways (Source: NearMap)

### 3 Proposed development

The proposal is to construct 16 accommodation villas, renovate the existing dwelling and renovate and expand the existing restaurant on the site. A new internal road is proposed to enable access to the accommodation buildings and facilities, as well as some work will be undertaken to the paper-road north of the site for servicing purposes. The expansion is proposed to be supported by additional parking spaces within the site. Relevant metrics are listed below:

- Units: 16-18 (9 x 1-bedroom + 7 x 2-bedroom. 2 of the 2-bedroom units have 1 accessible bedroom each; these bedrooms can be separated and rented out individually, effectively providing a total of 18 units)
- Staff: 15 in total, max 10 during a shift
- Restaurant GFA: 320m<sup>2</sup>
- Additional outdoor licensed floor: 145m<sup>2</sup> (external balcony seating area)
- Retail / cellar door GFA: 100m<sup>2</sup>
- Bath House GFA: 265m<sup>2</sup> (ancillary to the accommodation business)
- Car parking: 87 formal and 26 informal
- Opening hours:
  - Accommodation: 24/7
  - Restaurant: Mon-Sun: 10am-10pm
  - Cellar door: Mon-Sun: 10am-5pm
  - Bath House: Mon-Sun: 10am-5pm

The site plan is shown in Figure 5, while the architectural drawings are included in Appendix 1.

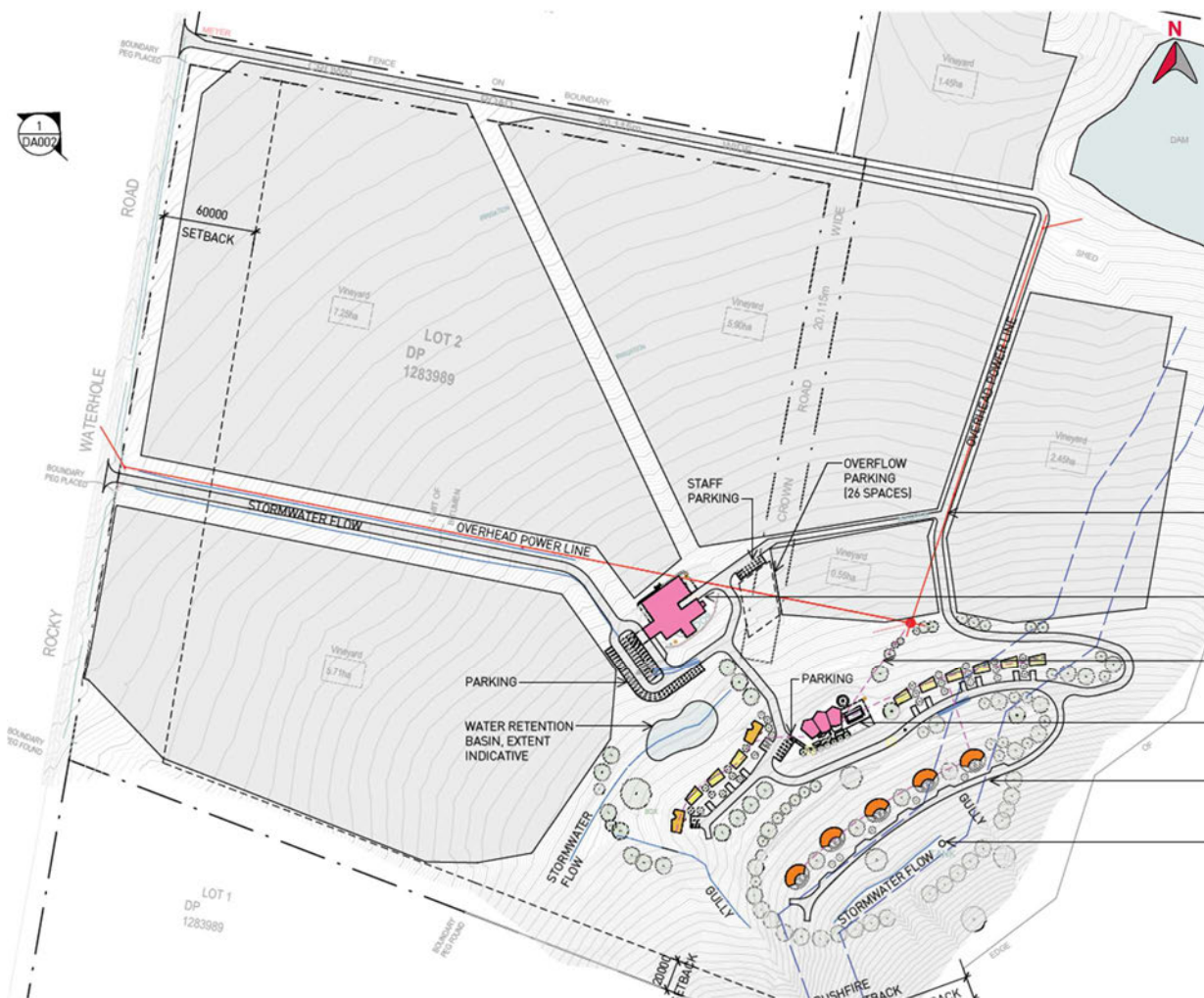


Figure 5: Proposed site layout (Source: Wild Modular)

## 4 Surrounding transport infrastructure

### 4.1 Road network hierarchy

The site's frontage road – Rocky Waterhole Road – is a local, Council managed road, as shown in Figure 6. This road connects to another local road – Lue Road – to the north, which then connects to the regional road – Ulan Road – leading to the north. To the south, a TfNSW managed road – the state road Castlereagh Highway, provides connectivity to the south-east and west.

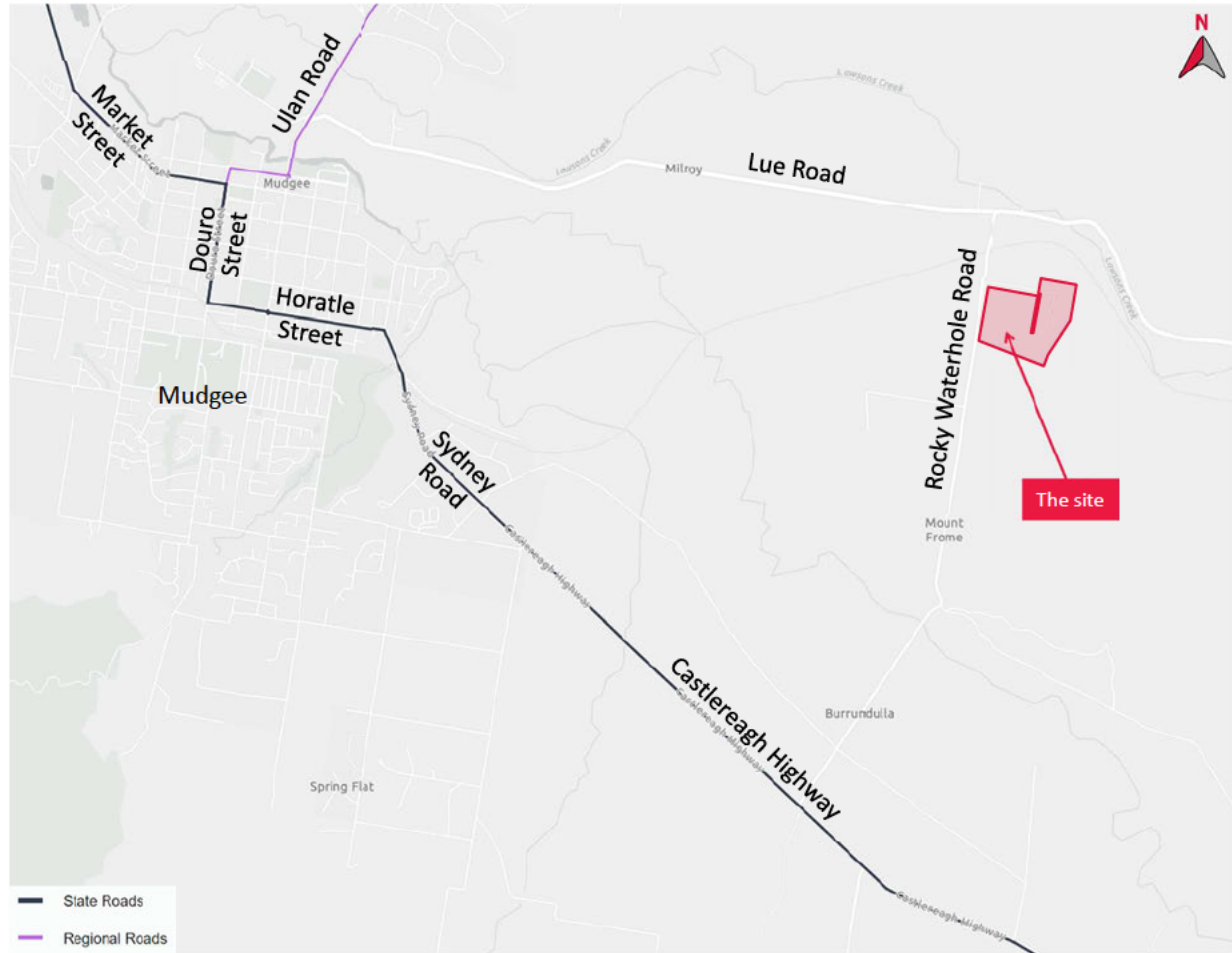


Figure 6: NSW Road Network Classifications (Source: [maps.transport.nsw.gov.au](https://maps.transport.nsw.gov.au))



#### 4.2 Key intersections

Based on the location of the site in relation to the surrounding road network hierarchy, the following key intersections have been identified:

- Rocky Waterhole Road / Lue Road 3-legs, priority controlled
- Rocky Waterhole Road / Castlereagh Highway 3-legs, priority controlled

These are shown in Figure 7.

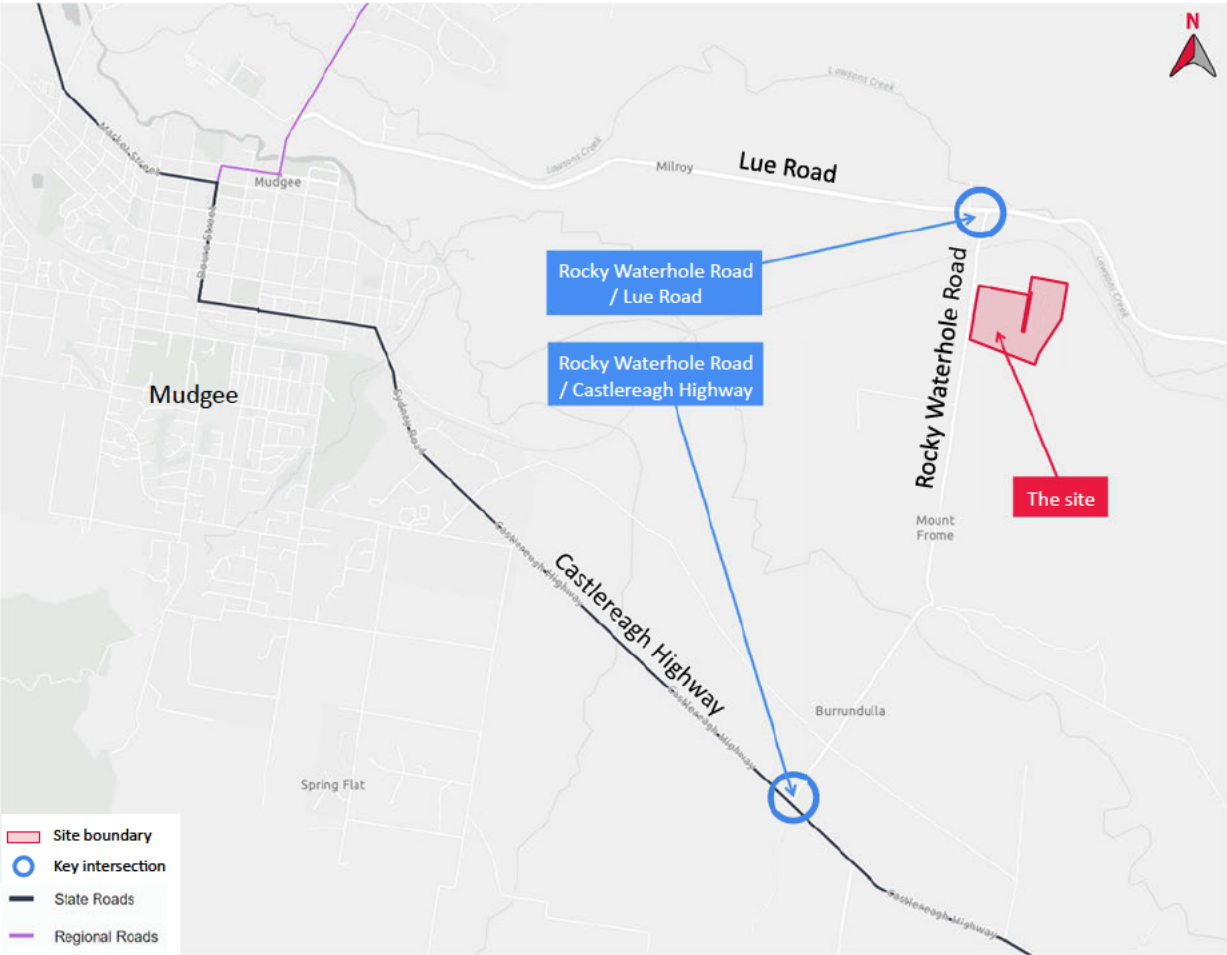


Figure 7: Key intersections (Source: maps.transport.nsw.gov.au, amended)

### 4.3 Road characteristic

The site is located within the area of Mount Frome, approx. 7km east of Mudgee. The characteristic of relevant surrounding roads is detailed below.



**Rocky Waterhole Road**

<b>Classification</b>	local	<b>Width</b>	6m
<b>Sealed</b>	Yes	<b>Divided</b>	No
<b>Site frontage</b>	Yes	<b>School Zone</b>	No
<b>Speed limit</b>	80km/h		
<b>Alignment</b>	North-south		
<b>Travel lanes</b>	1 in each direction		
<b>Parking</b>	N/A		
<b>Other</b>	No footpaths		

Figure 8: Rocky Waterhole Road (Photo: StreetView in the southbound direction, Source: Google)



**Lue Road**

<b>Classification</b>	local	<b>Width</b>	6.7m-7m
<b>Sealed</b>	Yes	<b>Divided</b>	No
<b>Site frontage</b>	No	<b>School Zone</b>	No
<b>Speed limit</b>	100km/h		
<b>Alignment</b>	East-west		
<b>Travel lanes</b>	1 in each direction		
<b>Parking</b>	N/A		
<b>Other</b>	No footpaths		

Figure 9: Lue Road (Photo: StreetView in the eastbound direction, Source: Google)



**Castlereagh Highway (B55)**

<b>Classification</b>	state	<b>Width</b>	10.4m
<b>Sealed</b>	Yes	<b>Divided</b>	No
<b>Site frontage</b>	No	<b>School Zone</b>	No
<b>Speed limit</b>	100km/h		
<b>Alignment</b>	North/west-south/east		
<b>Travel lanes</b>	1 in each direction		
<b>Parking</b>	N/A		
<b>Other</b>	No footpaths		

Figure 10: Castlereagh Highway (B55) (Photo: StreetView in the south-eastern direction, Source: Google)



#### 4.4 Public transport

The NSW Guidelines to Walking & Cycling (2004) suggests that 400-800m is a comfortable walking distance when considering public transport accessibility on foot. These distances represent a 5–10-minute walk. With this in mind, the site was reviewed for public transport options within these distances.

The site is considered to be poorly / disconnected from public transport, for the following reasons:

- There are no public transport stops or operating train stations in the defined comfortable walking catchment of up to 800m from the site (refer to Figure 11).
- There are 2 loop bus services within Mudgee (561 and 563), but these services do not operate outside that town.
- There are 13 Train and Coach Booked Seat Services travelling through Mudgee, some via Lou Road and some via Castlereagh Highway (refer to Figure 12), but there are no bus stops near Rocky Waterhole Road. Even if the buses were to stop near that road, the actual walking distance to / from the site would be at least 1.3km, which lies outside the comfortable walking distance.
- The services are sparse, mostly only one per day and some services do not operate on the weekends.

Based on the above, it is considered that any prospective employees, customers and visitors would not be able to rely on public transport for travel to and from the site.

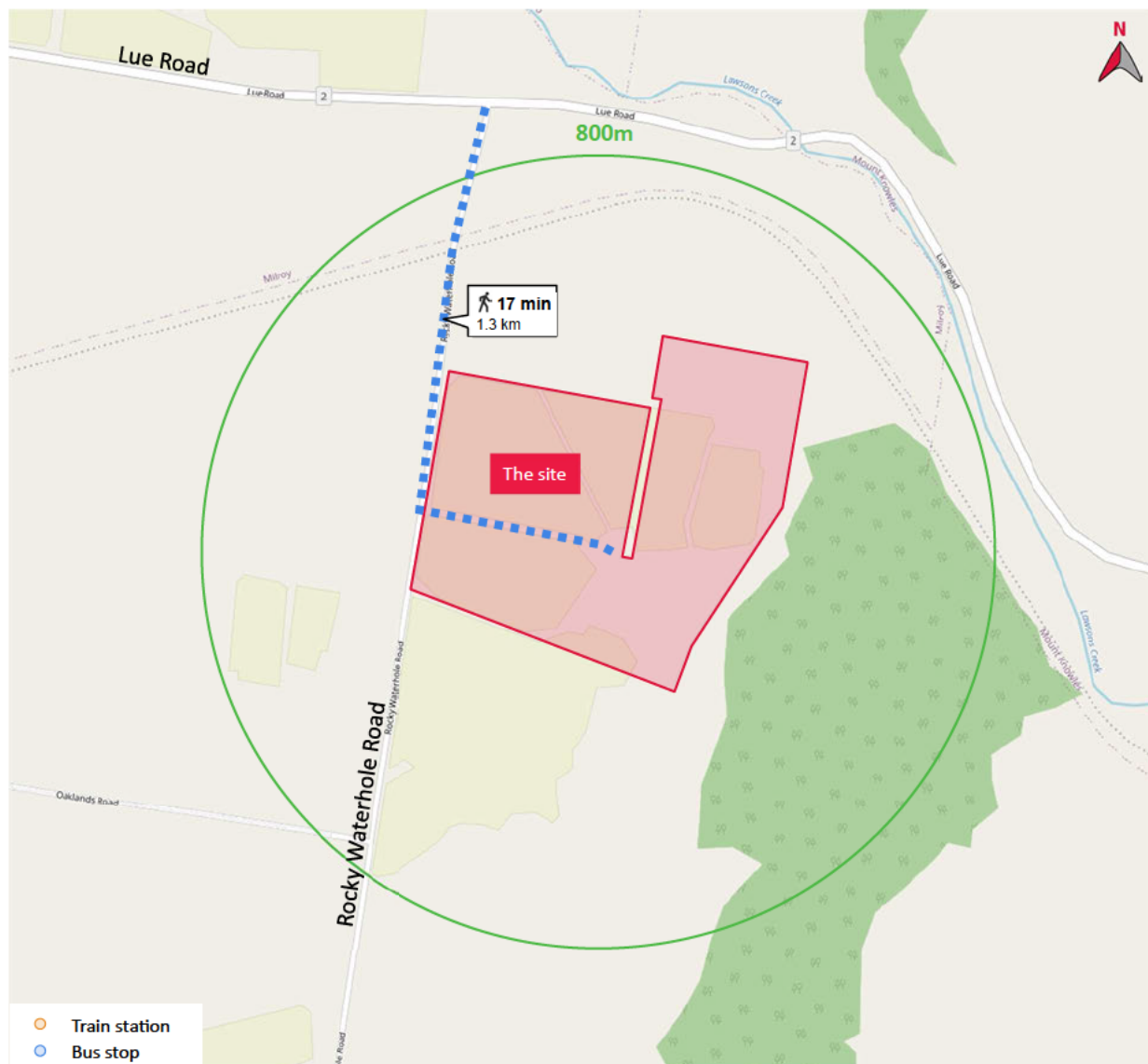


Figure 11: Public transport accessibility catchment (Sources: OpenStreetMap, transportnsw.info)

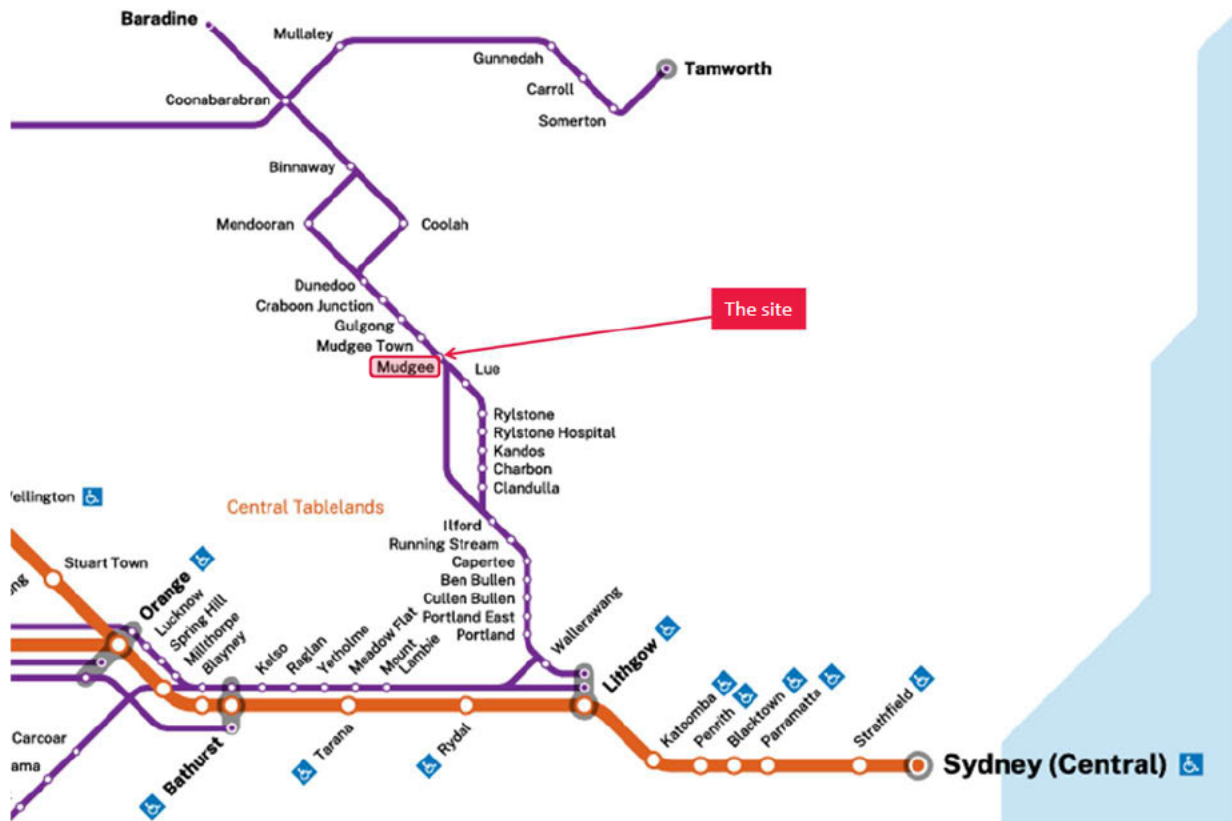


Figure 12: Coverage of train and coach booked seat services (excerpt) (Source: transportnsw.info)

#### 4.5 Active transport

Consistent with the regional character and the remote location of the site, there are no foot- or cycle paths along any of the surrounding roads. Based on this, it is not expected that any prospective employees, customers and visitors would utilise active transport to travel to and from the site.

## 5 Parking assessment

### 5.1 Relevant statutory documents

The following statutory documents and relevant sections have been reviewed and assessed:

- Mid-Western Regional Council Development Control Plan 2013, Amendment No. 6, Part 5.1: Car Parking within the Development Standards section
  - Dwellings (including dual occupancy)
    - 2 spaces per dwelling
  - Restaurants or cafes or Take away food and drink premises
    - 1 space per 7m<sup>2</sup> gfa or 1 space per 3 seats whichever is the greater (Restaurant).
    - 1 space per 4m<sup>2</sup> for licensed floor including outdoor seating or dining
  - Tourist and Visitor Accommodation
    - 1 space per unit, plus
    - 2 spaces per 3 employees, plus
    - if restaurant included: 1 space per 7m<sup>2</sup> gfa or 1 space per 3 seats whichever is the greater (Restaurant).
    - 1 space per 4m<sup>2</sup> for licensed floor including outdoor seating or dining
  - Shops
    - 1 space per 30m<sup>2</sup> gfa
  - Other uses
    - Other uses not listed in this Development Control Plan shall be assessed individually having regard to the expected traffic generation.
  - Spaces shall be provided to the next highest whole number.
- National Construction Code Volume 1 (NCC), D4D6 Accessible Parking Rates
  - (2) For each class of building to which the carpark or carparking area is associated, the number of accessible carparking spaces required is as follows:
    - (a) Class 1b and 3 buildings:
      - (i) For a boarding house, guest house, hostel, lodging house, backpackers' accommodation or the residential part of a hotel or motel, the number of accessible carparking spaces required is to be calculated by multiplying the total number of carparking spaces by the percentage of —
        - (A) accessible sole-occupancy units to the total number of sole-occupancy units; or
        - (B) accessible bedrooms to the total number of bedrooms.
    - (c) Class 6 buildings:
      - with up to 1000 carparking spaces — 1 accessible space for every 50 carparking spaces or part thereof

Relevant metrics for the site for the existing and proposed scenarios are summarised in Table 1.

Table 1: Existing and proposed future yield

Land use	Existing	Proposed
Residences	2	0
Units / villas	0	16-18
Staff	3	15 in total, max 10 during a shift
Restaurant GFA	350m <sup>2</sup>	320m <sup>2</sup>
Additional outdoor licensed floor GFA	40m <sup>2</sup>	145m <sup>2</sup> (external balcony seating area)
Cellar door / retail GFA	50m <sup>2</sup>	100m <sup>2</sup>
Bath House GFA	-	265m <sup>2</sup> (ancillary to the accommodation business)

The required and proposed numbers of car parking spaces are calculated and discussed in the following sections.

## 5.2 Car parking

The car parking requirements and provision for the existing land use are shown in Table 2. The parking requirements for the proposed land use and the proposed parking provision are outlined in Table 3. The net change in car parking provision based on the existing and proposed site use are shown in Table 4.

Table 2: Existing car parking calculation

Land use	Relevant quantity	DCP Parking rate	Parking required	Parking provided
<b>Dwellings</b>				Approx. 25 gravel & unmarked spaces outside restaurant. More informal spaces on grass behind restaurant and throughout the site.
Residence	2	2 spaces per dwelling	4	
<b>Restaurants</b>				
Restaurant GFA	350	1 space per 7m <sup>2</sup> gfa or 1 space per 3 seats whichever is the greater	50	
Additional outdoor licensed floor GFA	40	1 space per 4m <sup>2</sup> for licensed floor including outdoor seating or dining	10	
<b>Shops</b>				
Celler door / retail GFA	50	1 space per 30m <sup>2</sup> gfa	2	
<b>Total:</b>			66	Min 30

Table 3: Proposed future car parking calculation

Land use	Relevant quantity	DCP Parking rate	Parking required	Parking provided
<b>Tourist and Visitor Accommodation</b>				
Units / villas	16-18	1 space per unit, plus	18	18
Staff (max at any time)	10	2 spaces per 3 employees, plus	6.6	7
Restaurant GFA	320	1 space per 7m <sup>2</sup> gfa or 1 space per 3 seats whichever is the greater	45.7	
Additional outdoor licensed floor GFA	145	1 space per 4m <sup>2</sup> for licensed floor including outdoor seating or dining	36.3	86
<b>Shops</b>				62 formal +26 informal
Celler door / retail	100	1 space per 30m <sup>2</sup> gfa	3.3	
<b>Other</b>				
Bath House	265m <sup>2</sup>	assessed individually		0, ancillary to the accommodation business
<b>Total:</b>			111	87 formal +26 informal -> 112

Table 4: Net change in car parking provision based on the existing and proposed land use

Site use	Parking required based on DCP	Parking provided / proposed	Shortfall
Existing	66	30 unsealed	33
Proposed	111	87 formal + 26 informal -> 112	0
<b>Net change:</b>	<b>+45</b>	<b>Max +82</b>	

It is proposed to provide a total of 87 formal and an area capable of accommodating 26 informal parking spaces, resulting in a total supply of 112 spaces. The following is noted:

- It is expected that the villa guests will make use of the restaurant and the licensed floor. As each villa has a dedicated parking space, it is considered that the required capacity of 86 within the main car park can be reduced by the 18 spaces dedicated to the villas.
- The remaining shortfall of 6 formalised parking spaces is considered minor, and can be accommodated informally if needed.
- Should a larger parking demand be met, the area identified behind the staff parking can be used as overflow parking area.
- The existing site has a shortfall of 33 semi-formal spaces, with any overflow parking accommodated throughout the site. This arrangement is proposed to be retained.

The bath house is proposed to be primarily used by the villas' residents. Therefore, it is considered that no additional parking is required for this use.

Based on the above, it is considered that the proposed site layout will sufficiently accommodate the expected parking demand.

### 5.3 Accessible car parking

The accessible car parking requirements and proposed provision are summarised in Table 5.

Table 5: Accessible car parking requirements and proposed provision

Building class / land use	Relevant quantity	NCC accessible parking rate	Accessible parking required	Accessible parking provided
<b>Class 1b and 3 buildings</b>				
Units / villas	11% accessible units (2 out of 18 units) 18 parking spaces	Total number of carparking spaces * % of accessible units	2 (11% out of 18 car parking spaces)	2
<b>Class 6 buildings</b>				
Restaurant	Parking spaces:	1 accessible space for every	6, of which:	6, of which:
Licensed floor	• 7 for staff	50 carparking spaces or part thereof	• 1 behind restaurant	• 1 behind restaurant
Cellar door / retail	• 56 in the car park • 6 near bath house		• 2 in the car park • 1 near bath house	• 2 in the car park • 1 near bath house
<b>Total:</b>			6	6

It is proposed to provide accessible spaces in accordance with the NCC requirements, being 1 accessible space per accessible unit, 1 accessible space for staff, 2 in the main car park and 1 near the bath house.

## 6 Traffic impact assessment

The following sections of the Guide to Transport Impact Assessment by TfNSW, TS 00085, Version 1.1 (the Guide) have been reviewed and assessed:

- Residential – Low density residential dwellings (regional)
  - AM peak hour vehicle trips = 0.83 per dwelling
  - PM peak hour vehicle trips = 0.84 per dwelling
  - Weekend peak hour vehicle trips = 0.83 per dwelling
- Casual accommodation
  - Hotels: N/A due to a large variance and dependant of other facilities
  - Motels: PM peak hour vehicle trips = 0.4 per unit, may be at 85% occupancy  
Subject to the nature of the facility.
- Food service establishments – Restaurants
  - Varies widely, depending on restaurant characteristics including type and location
  - It is preferable to assume 85 per cent occupancy.
  - PM peak hour vehicle trips = 5 per 100m<sup>2</sup> site area

The following outlines the site-specific considerations with regard to the trip generation rates:

- The proposed accommodation business is envisaged to largely attract different clients compared with a typical hotel or a motel. With stays expected to be for longer periods of time, it is envisaged that the villas will attract holiday makers for several days or weekend-escapes, rather than one-night stays. With the view on a first-principal perspective, the following is considered:
  - Typically, check-outs can occur until 10:00am, and the majority of guests would be expected to leave at around that time. Therefore, there is not envisaged to be any AM peak hour trips to / from the site. This is consistent with the trip generation rates outlined in the Guide for a motel.
  - Typically, check-ins occur after 2:00pm, with guests arriving throughout the entire day. Prospective guests may make their way to the villas after their work, thus arriving well after the typical PM peak traffic, or throughout the day. It is considered that using the rate outlined in the Guide for the motel of 0.4 trips per unit at an 85% occupancy rate may be a conservative representative of the expected trip generation rate of the proposed villas.
- Restaurant
  - The Guide specifies that the peak travel associated with a restaurant is during the PM peak hours. However, due to the restaurant being located outside the town at a winery, it is expected that the peak attendance will occur on weekends and during lunches. Therefore, the trip generation rate for the PM peak outlined in the Guide has been applied for the weekend peak.
  - Traffic generation around mid-day during the week is generally not considered relevant for the purpose of assessing traffic impacts.
  - It is expected that guests staying in the villas will attend the restaurant, thus the future trip generation for the restaurant is considered conservative.
- Cellar door
  - The Guide does not provide any trip generation rates for cellar doors or any other small specialty shops. Therefore, for the proposed future trip generation calculation, an assumption has been made based on the number of parking spaces. The latter is based on the parking provision rate from the DCP.
  - The existing trip generation has been set to equal the proposed future trip generation, due to a lack of trip generation rates for this site use or a dedicated number of spaces.
- Staff are assumed to arrive in the AM and leave in the PM weekday peak. No trips are assumed during the weekend peak, as this is when staff will work. This approach is considered conservative, as not all staff would arrive and leave at the same time (i.e. some will be shift workers or not needed in the morning). The rate has been assumed to be equivalent to the parking rate from the DCP.

The trip generation rates for the existing and proposed future site uses are shown in Table 6 and Table 7. A comparison between the existing and proposed future trips is shown in Table 8.

Table 6: Existing trip generation calculation

Land use	Relevant quantity	Trip generation rate	Number of trips
Dwellings			
Residence	2	AM peak = 0.83 trips per dwelling PM peak = 0.84 trips per dwelling Weekend peak = 0.83 trips per dwelling	AM peak = 2 trips PM peak = 2 trips Weekend peak = 2 trips
Staff			
Staff	3	2 per 3 employees (per parking rate)	AM peak = 2 trips PM peak = 2 trips
Restaurants			
Restaurant GFA	350	Peak = 5 trips / 100m <sup>2</sup> site area	Weekend peak = 20 trips
Additional outdoor licensed floor GFA	40		
Shops			
Celler door / retail		Equal to the proposed future trips	Weekend peak = 12 trips
Total:			AM peak = 4 trips PM peak = 4 trips Weekend peak = 34 trips

Table 7: Proposed future trip generation calculation

Land use	Relevant quantity	Trip generation rate	Number of trips
Tourist and Visitor Accommodation			
Units / villas	18	PM peak = 0.4 per unit at 85% occupancy	PM peak = 6 trips
Staff			
Staff (max at any time)	10	2 per 3 employees (per parking rate)	AM peak = 7 trips PM peak = 7 trips
Restaurants			
Restaurant GFA	320	Peak = 5 trips / 100m <sup>2</sup> site area	Weekend peak = 24 trips
Additional outdoor licensed floor GFA	145		
Shops			
Celler door / retail parking	3	4 trips per parking space (1 in and 1 out trip per space, with a 30-minute turnaround)	Weekend peak = 12 trips
Other			
Bath House		N/A, ancillary to the accommodation business	
Total:			AM peak = 7 trips PM peak = 13 trips Weekend peak = 36 trips

Table 8: Net change in vehicular trips based on the existing and proposed land use

Site use	AM peak	PM peak	Weekend peak
Existing	4	4	34
Proposed	7	13	36
<b>Net change:</b>	<b>+3</b>	<b>+9</b>	<b>+2</b>

Based on the calculations of the existing and proposed future land use, the expected traffic increase is 3, 9 and 2 trips during the AM, PM and weekend peaks. Based on this, the proposed development is considered to have a negligible traffic impact onto the surrounding road network.



## 7 Site access and design

The following sub-sections represent an assessment of the proposed development with reference to the requirements of the following car parking design standards, and industry best practice:

- AS 2890.1:2004 (Off-street car parking)
- AS 2890.2:2018 (Off-street commercial vehicle facilities)
- AS 2890.6:2018 (Off-street parking for people with disabilities)

The site has been designed and assessed based on access to the site by the following vehicles:

- B99, being a general vehicle for staff, visitors and taxis.
- 7.35m long 2012 Mercedes Sprinter. Similar vehicles are expected to access the site as part of winery tours or groups of guests without own transport.
- 8.8m long Medium Rigid Vehicle (MRV) simulating a fire truck – general appliance. This is the largest vehicle expected to require access to the site via the main driveway.
- 12.5m long Heavy Rigid Vehicle (HRV), which is expected to be the largest vehicle accessing the site. Large truck access is proposed to occur via the northern driveway only.

This section is to be read in conjunction with the architectural plans provided by Wild Modular included in Appendix 1. The design review is discussed in the sections below, and shown in the drawings included in Appendix 2.

### 7.1 Access points

The site has 2 access points:

- The southern access point, which is proposed to be the main driveway into the property used by staff, visitors, mini-buses and emergency vehicles.
- The northern access point, which is proposed to provide access for large service vehicles and emergency vehicles.

Each access point is assessed below.

#### 7.1.1 Main / southern access

The access to the 87-space Class 1A and 2 at-grade facility is via the Rocky Waterhole Road, which is a local road. According to the AS2890.1:2004, a Category 2 driveway (combined entry and exit) requires a width of 6.0m-9.0m. The proposed driveway is 6.0m wide at the property boundary, with splays enabling two-way traffic for mini-buses.

A swept path assessment demonstrating 2 mini-buses manoeuvring in and out of the site is shown in drawing MF-DR-10 in Appendix 2.

#### 7.1.2 Northern access

This access is proposed to be used solely by large, up to 12.5m long trucks. The access has been designed to accommodate the swept paths of an entering and exiting vehicle independently. This is shown in drawing MF-DR-10 in Appendix 2.

### 7.2 Internal circulation

The main internal access road has been designed to 6.0m in width (3.0m per lane) to accommodate 2-way movements of mini-buses. This width meets the requirements of the AS2890.1:2004.

The aisle around the car park is 5.8m wide between parking spaces and 6.1m between parking spaces and a higher obstruction. This complies with the AS2890.1:2004.

The road beyond the bath house is 5.5m in width, which complies with the minimum two-way roadway width prescribed by the AS2890.1:2004.

The internal roads where fire truck access is required are 5.5m wide, in accordance with fire access regulations.

The road along the 5 villas on the southern portion of the site is 4m wide, with a road shoulder and parallel parking spaces along the road. At the end of this road section is a turning facility. The reduced width is considered acceptable, given that this road only caters to the 5 villas; Any unoccupied parking spaces can be used for passing purposes. Based on this, it is considered that the chances of 2 vehicles requiring to pass each other is minor.

The roads to be used by larger service vehicles are 5.5m in width, with one section measuring approx. 3.5m. The reduction in width means that this section can be used in a one-way arrangement only. This is considered acceptable given the expected low frequency of such large vehicles requiring access to the site.

### 7.3 Car parking spaces

Based on the AS2890.1:2004, car parking space requirements for the Class 1A (employee) and Class 2 (medium-term parking) user are as follows:

- General car space dimension
  - Class 1A: 2.4m x 5.4m
  - Class 2: 2.5m x 5.4m
- Accessible car space dimension: 2.4m x 5.4m
- Shared bay dimension: 2.4m x 5.4m
- Aisle width: 5.8m
- Additional clearance opposite high obstructions: 300mm
- Door opening clearance: 300mm
- Entry flanges at entry: 300mm

All parking spaces have been individually assessed and have been found to comply with the relevant requirements.

### 7.4 Pick-up and drop-off

There is a dedicated pick-up and drop-off bay for mini-buses and taxis just outside the restaurant entrance. The mini-bus can enter the site, pick-up / drop-off guests and the loop around the car park to exit the site in a forward direction. This manoeuvre is shown on drawing MF-DR-20 in Appendix 2.

### 7.5 Waste collection and servicing

It is proposed to accommodate waste collection on-site.

All waste collection and servicing by large, up to 12.5m long trucks will occur via the northern access point. There is a turning area behind the restaurant building, so that all trucks can enter and exit the site in a forward direction.

A swept path assessment showing the manoeuvring by the largest expected truck (12.5m long HRV) is shown in Appendix 2.

## 8 Summary and conclusion

Metafora has been engaged by Peppertree Hill Estate to prepare a Traffic Impact Assessment in relation to the proposed development at the Peppertree Hill Estate located at 85 Rocky Waterhole Road in Mount Frome, NSW.

The development encompasses the following:

- 16-18 short-term accommodation units
- Redevelopment of the restaurant
- Bath house, ancillary to the accommodation business
- 87 formal and 26 informal car parking spaces

The following key findings were made:

- Existing transport infrastructure
  - Due to the rural location of the site, active and public transport are not considered feasible transport options for the prospective staff, guests and customers.
  - The site is well connected via the state (Castlereagh Highway) and local (Lue Road and Rocky Waterhole Road) road network to both Mudgee and the wider areas.
- Parking assessment
  - It is proposed to provide a total of 87 formal and an area capable of accommodating 26 informal parking spaces, resulting in a total supply of 112 spaces. The proposal for a reduced number of formal spaces is considered acceptable, as it is expected that the villa guests will make use of the restaurant and the licensed floor, effectively reducing the parking demand within the main car park. Should a larger parking demand be met, the area identified behind the staff parking can be used as overflow parking area.
  - The bath house is proposed to be primarily used by the villas' residents. Therefore, it is considered that no additional parking is required for this use.
  - Based on the above, it is considered that the proposed number of parking spaces will sufficiently accommodate the expected parking demand.
  - It is proposed to provide accessible spaces in accordance with the NCC requirements, being 1 accessible space per accessible unit, 1 accessible space for staff, 2 in the main car park and 1 near the bath house.
- Traffic impact assessment
  - A review of traffic generation was undertaken for the existing site use and compared with the proposed future traffic generation.
  - Based on the calculations of the existing and proposed future land use, the expected traffic increase is 3, 9 and 2 trips during the AM, PM and weekend peaks.
  - Based on this, the proposed development is considered to have a negligible traffic impact onto the surrounding road network.
- Design assessment
  - A design assessment was undertaken based on the relevant AS2890 suite of standards. The design was found to generally comply with all aspects of the standards.

In light of the above, the development is endorsed from a parking and traffic perspective.















## Appendix 1. Architectural drawings

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NOT FOR CONSTRUCTION

ISSUE	REASON	DATE
A	For Coordination	07/05/25
B	DA	16/05/25

### LEGEND

-  1 BED VILLA
-  2 BED ACCESSIBLE VILLA
-  2 BED LUXURY VILLA
-  BOUNDARY SETBACK
-  PROPERTY BOUNDARY
-  BUSHFIRE REQ SETBACKS
-  OVERHEAD POWER LINE
-  POWER POLE
-  PROPOSED UNDERGROUND ELECTRICAL LINE
-  SEWER INSPECTION POINT
-  STORM WATER FLOW
-  SERVICE WATER
-  EXISTING TREE
-  PROPOSED TREE

NOTE:  
Ref to consultant reports for on-site  
waste water management, services,  
traffic, infrastructure, civil works,  
landscape and bushfire.



ADDRESS: SUITE 50, JONES BAY WHARF,  
26/32 PIRRAMA RD, PYRMONT,  
SYDNEY, NSW, 2009

TEL: (+61) 499 486 663

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SCALE  
1:3000 @ A3 UNO



PROJECT  
**2408 PEPPERTREE HILL ESTATE**  
DRAWN SENIOR QA APP'D  
**DM**

DWG TITLE  
**SITE PLAN**  
DWG NO  
**DA001**

## Appendix 2. Design review

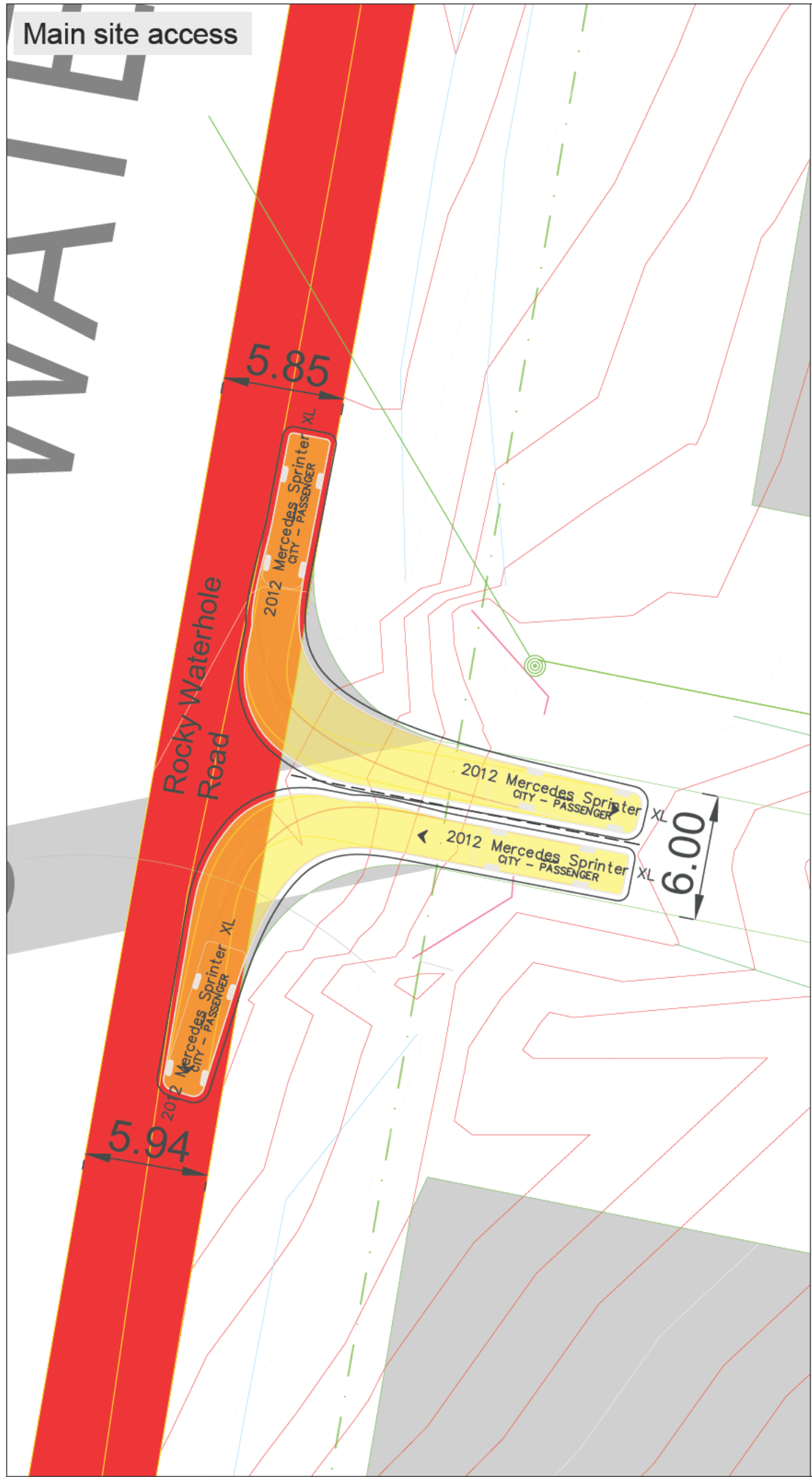
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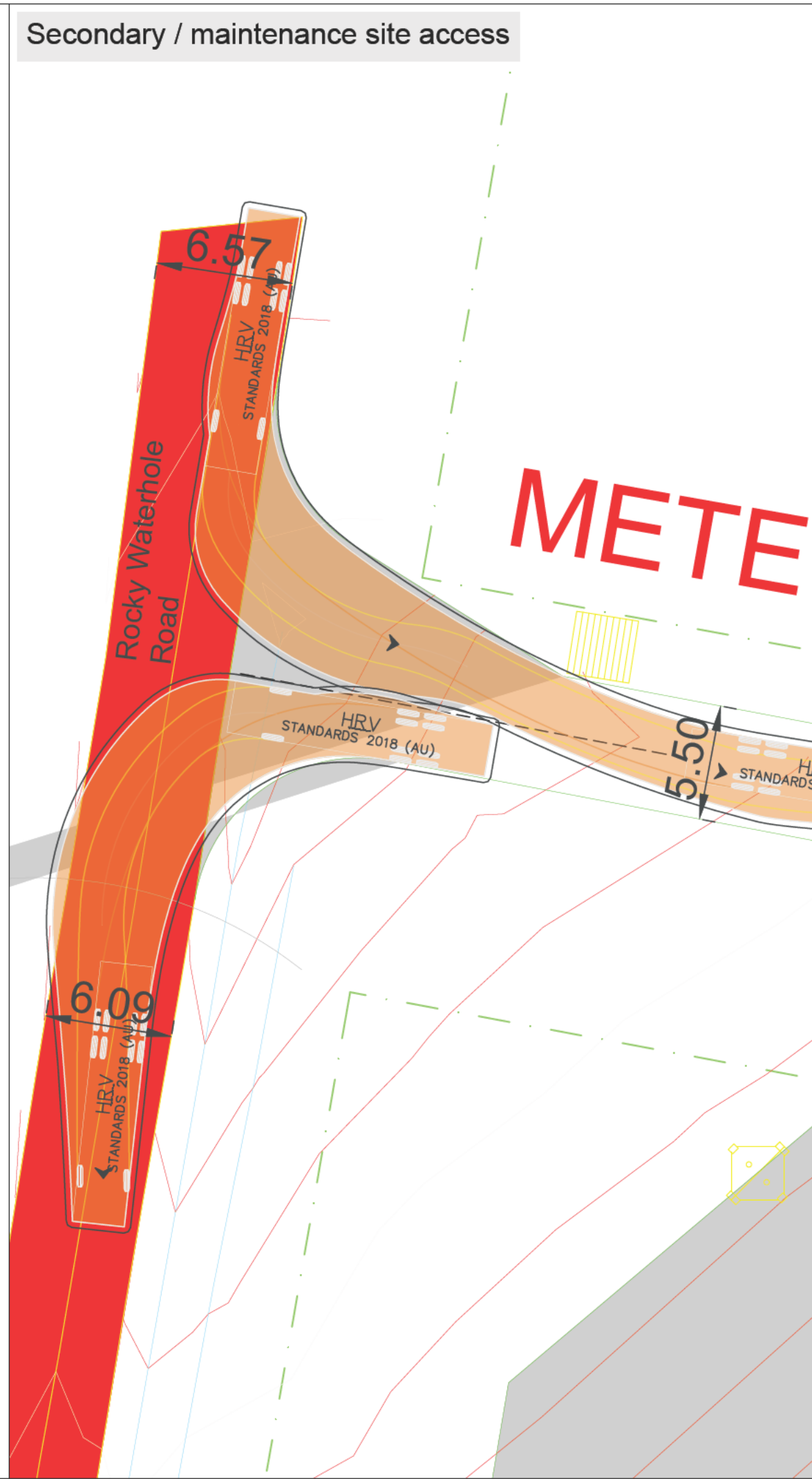




Main site access



Secondary / maintenance site access



- Class 1A car parking envelope (2.4m x 5.4m)
- Class 2 car parking envelope (2.5m x 5.4m)
- Class 4 accessible car parking envelope (2.4m x 5.4m)
- Shared bay envelope (2.4m x 5.4m)
- Unobstructed parallel parking space envelope (2.1m x 5.4m)

B99

Width	: 1.94
Track	: 1.84
Lock to Lock Time	: 6.0
Steering Angle	: 33.9

2012 Mercedes Sprinter XL

Width	: 1.99
Track	: 1.95
Lock to Lock Time	: 6.0
Steering Angle	: 41.0

Fire truck - MRV

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Steering Angle	: 34.0

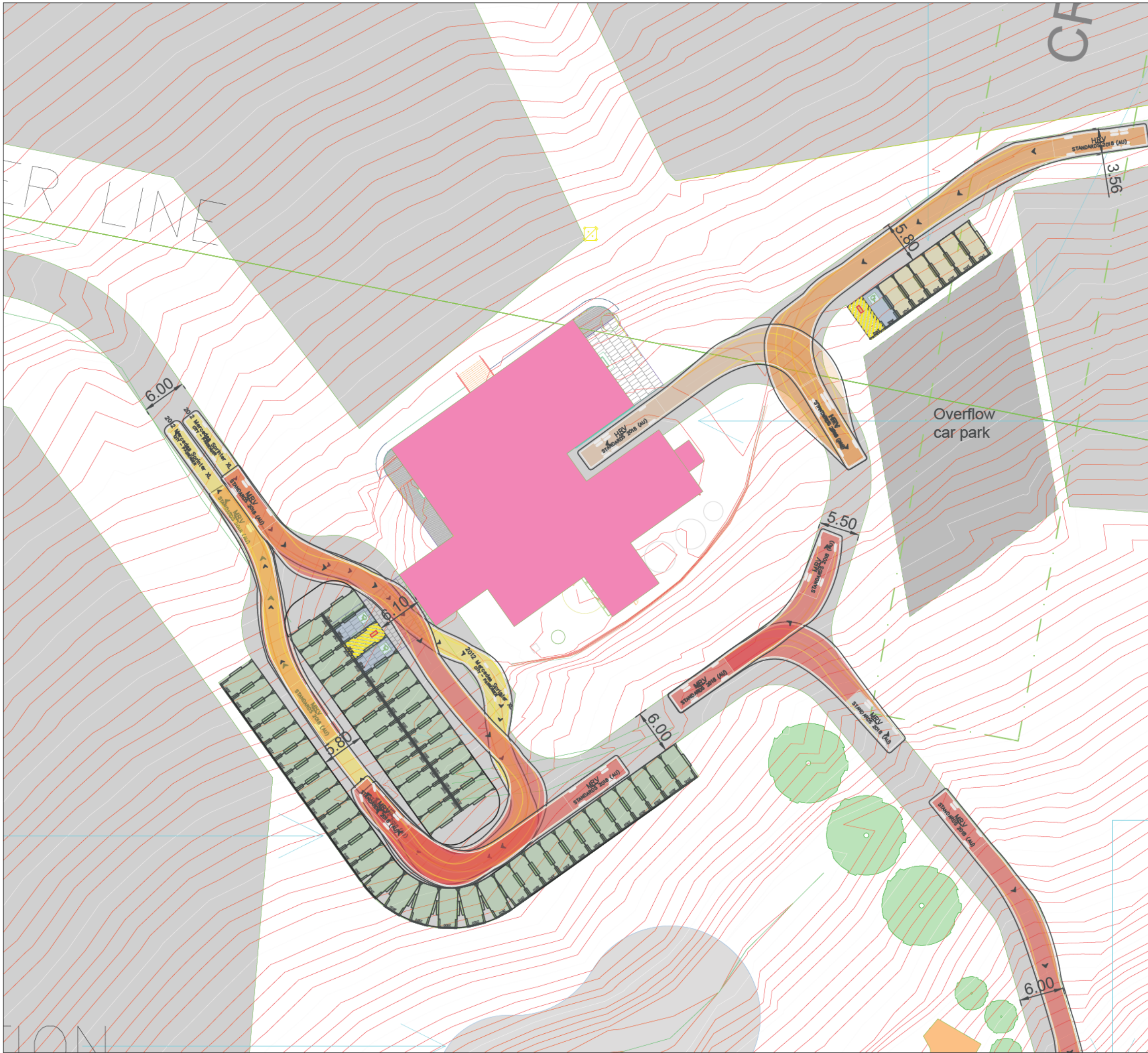
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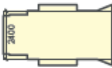




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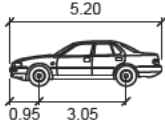
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03	2025/05/15	KB			
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Drawing name Design review - site access			Drawing number MF-DR-10		
Client Pepper Tree Hill Estate			Scale @ A3 1:250		
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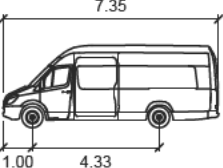
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-  Shared bay envelope (2.4m x 5.4m)
-  Unobstructed parallel parking space envelope (2.1m x 5.4m)



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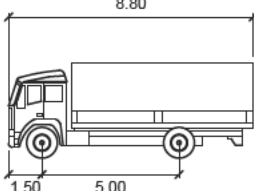




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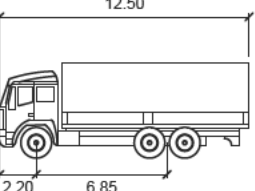




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Steering Angle	: 34.0





**HRV**

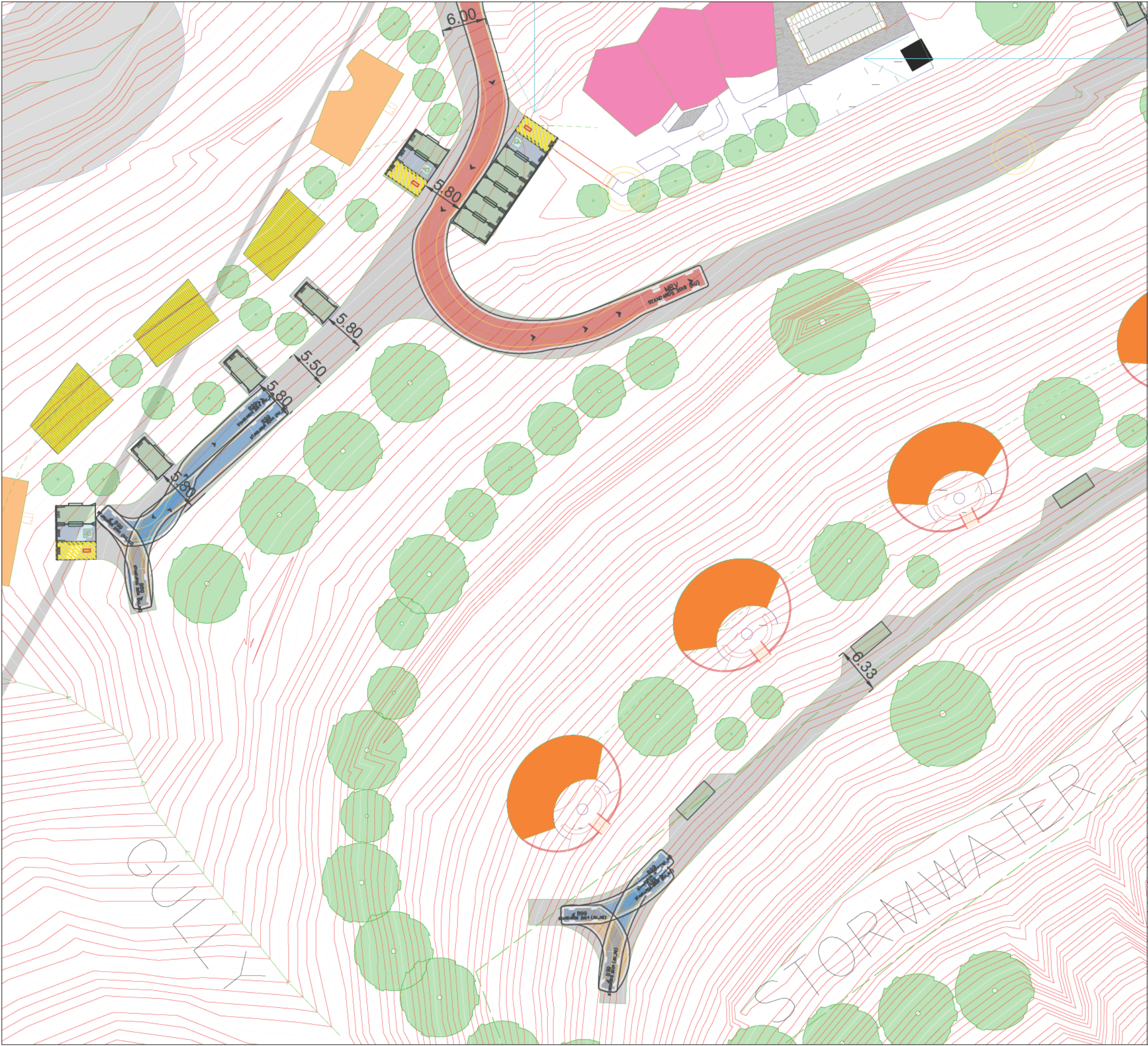
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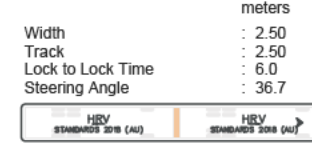
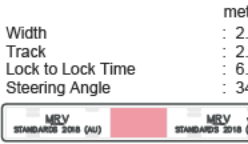
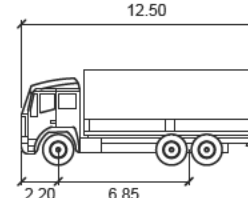
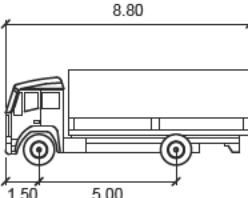
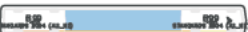
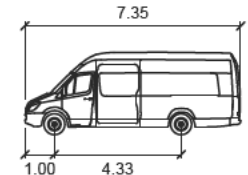
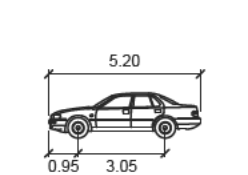
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Client Pepper Tree Hill Estate			Scale @ A3 1:500		
 <b>METAFORA</b>					
E: info@metafora.com.au A: 18 Clifton St, Balmain East NSW 2041					





-  Class 1A car parking envelope (2.4m x 5.4m)
-  Class 2 car parking envelope (2.5m x 5.4m)
-  Class 4 accessible car parking envelope (2.4m x 5.4m)
-  Shared bay envelope (2.4m x 5.4m)
-  Unobstructed parallel parking space envelope (2.1m x 5.4m)



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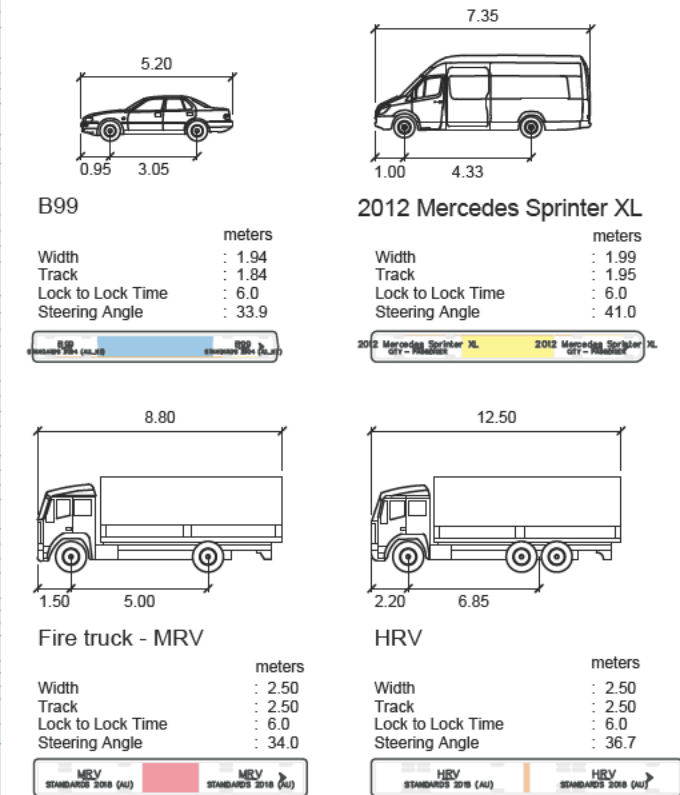
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- Class 4 accessible car parking envelope (2.4m x 5.4m)
- Shared bay envelope (2.4m x 5.4m)
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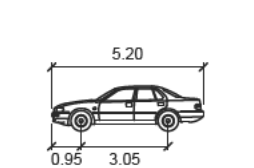
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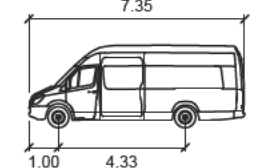
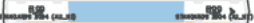
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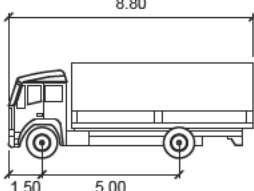
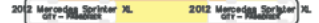
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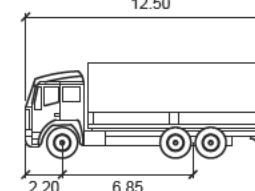
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Fire truck - MRV

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Width	: 2.50
Track	: 2.50
Lock to Lock Time	: 6.0
Steering Angle	: 34.0



HRV

	metres
Width	: 2.50
Track	: 2.50
Lock to Lock Time	: 6.0
Steering Angle	: 36.7



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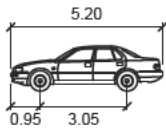




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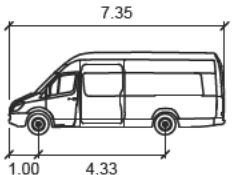
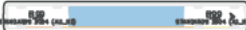
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-  Shared bay envelope (2.4m x 5.4m)
-  Unobstructed parallel parking space envelope (2.1m x 5.4m)



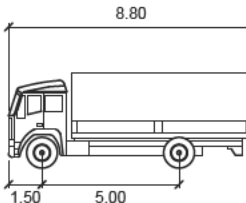
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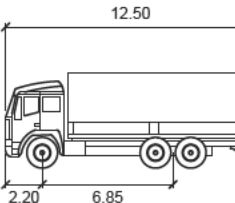
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Fire truck - MRV

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Width	: 2.50
Track	: 2.50
Lock to Lock Time	: 6.0
Steering Angle	: 34.0



HRV

	meters
Width	: 2.50
Track	: 2.50
Lock to Lock Time	: 6.0
Steering Angle	: 36.7



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