

Parking Plan

High Wycombe Train Station

CW1200110



Prepared for
City of Kalamunda

12 July 2022



now





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1 Introduction

Cardno, now Stantec (Cardno) has prepared a strategy and designs for parking controls associated with the new High Wycombe Train Station through an understanding of existing parking demand and future development growth for the precinct.

2 Background

It is understood that the train station will be opened in mid-2022 and that the City is looking to put parking controls in place at opening; with appropriate plans for expanding and modifying these controls over the first five years of opening. In order to determine the best parking control mechanisms to reach the intended outcomes for the area, the current and future uses/requirements of the location were reviewed. Therefore, the following were considered as part of this parking plan:

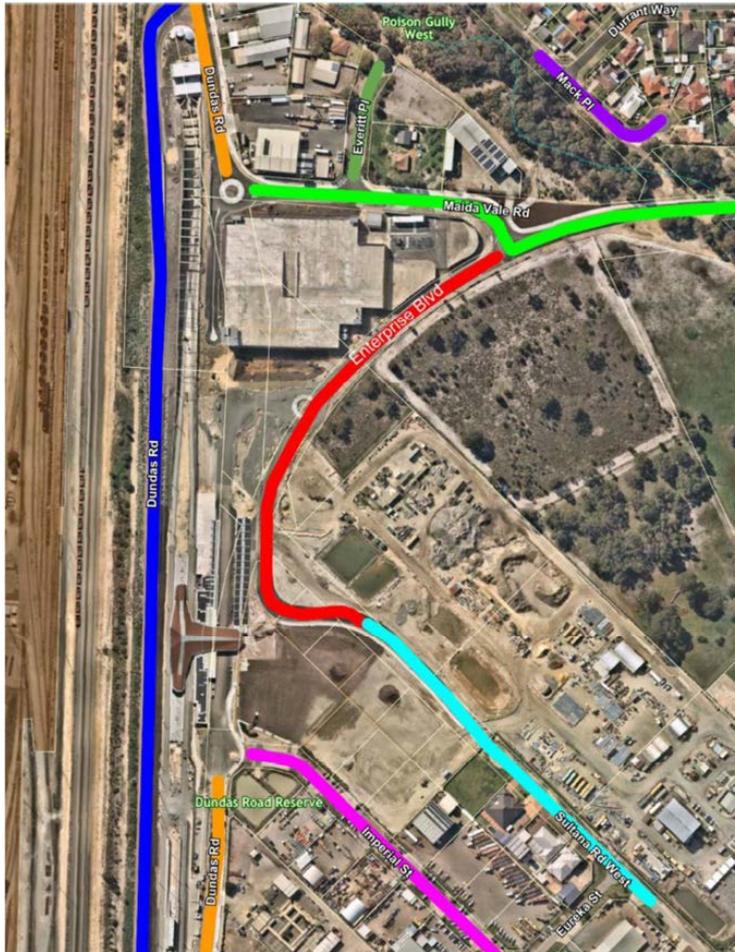
- > State and local planning policies and structure plans were reviewed in relation to the High Wycombe Train Station;
- > Land use profile of the area;
- > Existing pedestrian and cycling amenity;
- > Public transport connections (existing and proposed);
- > Existing on and off-street parking supply;
- > Proposed cross sections of streets as presented in the local structure plan; and
- > Walking distance to the train station.

The High Wycombe Station Precinct is currently a mix of light industrial and low density residential, with intentions to transform the area into a transit-oriented development (see **Section 2.3.1.2**). The existing land uses were taken into consideration as part of this Parking Control Plan, with specific regard to industry vehicle movements and business needs.

2.1 Study Area

The project location is the area around the High Wycombe Train Station within a 400-600m drive/walk catchment. Specifically, Enterprise Boulevard, Mack Place, Dundas Road, Everett Place, Maida Vale Road, Sultana Road West and Imperial Street, as shown in **Figure 2-1**, were provided with parking control plans.

Figure 2-1 Study Area



Source: City of Kalamunda

2.2 Case Studies in Perth

2.2.1 Aubin Grove

The Aubin Grove Station opened in April 2017 and included parking restrictions, with parking permits available to residents of affected streets. The parking rules were:

- > Time restricted parking between 8am and 5pm weekdays.
- > 1/4P (15 minute) restriction, Flourish Loop
- > 2P (two hours) Harvest Lakes
- > 4P (four hours), other streets near the train station

The City of Cockburn removed parking restrictions on many streets around the station after one year when residents raised concerns about the need for parking. A road safety audit showed the station's carpark usual occupancy was only 10 to 20 per cent (of 1948 bays). Now, the surrounding residential streets do not appear to have restrictions on the western side and on the eastern side there is embayed on-street parking designated a '2P.'

Figure 2-2 Aubin Grove Station and Parking



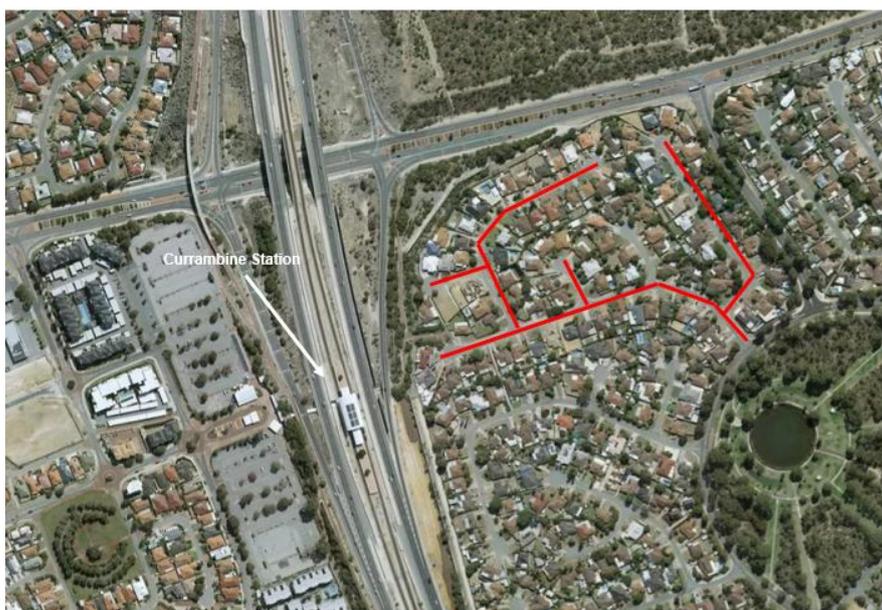
Source: Metromap

This case study brings into consideration that parking restrictions should be reviewed regularly to ensure the restrictions are meeting the needs of the location.

2.2.2 Currambine Station

Currambine Station opened in 1993 and has 1002 parking bays. In January 2021, the Joondalup Council voted to require parking permits in four residential streets near Currambine Station to curb commuter parking. It had been occurring since the station opening and was accepted by residents, with few complaints. Recently more complaints resulted in the residential permit system for the area. The homes on the affected streets will receive up to three annual parking permits free of charge and additional permits will cost \$100 a year.

Figure 2-3 Currambine Station – Streets Requiring Parking Permits (as of 2021)



Source: Metromap

Figure 2-4 City of Joondalup Parking Restrictions near Currambine Station



Source: City of Joondalup

This case study shows the Council amended the existing unrestricted parking on residential streets near the station when residents raised it as a concern. A residential parking permit system was put into place for specific streets.

2.2.3 Warwick Station

The Warwick Station has 1133 bays available for commuters. On Methuen Way, near Warwick Station, there are no parking restrictions aside from no parking directly in front of the entrance to the bridge to the station. Vehicles seen parked in **Figure 2-5** are assumed to be trades for an adjacent house construction.

Figure 2-5 Street View of Methuen Way



Source: Google Street View

Figure 2-6 Location of Methuen Way



Source: Metromap



This street appears similar to Mack Place in High Wycombe and suggests the Council should provide flexibility for the restrictions along Mack Place.

2.3 State Regulatory and Policy

2.3.1 Metronet East Redevelopment Scheme

Development within the High Wycombe Project Area is intended to create a high-quality employment-focused hub centred on High Wycombe Station.

Figure 2-7 Metronet East High Wycombe Project Area Map



Source: Metronet

The long-term vision for the High Wycombe Project Area is to support the delivery of a resilient local economy with a distinct sense of place. This is proposed through medium-to-high density urban neighbourhood focused around the station, including of commercial, retail and community-based development.

Early activation of the precinct will be supported through the provision of a plaza and temporary or short-term retail and dining and entertainment-based businesses, as well as short term and/or permanent community facilities, that promote social inclusion and service local demand generated by the new station. As demand increases, these temporary land uses can be replaced with larger mixed-use development.

Land uses located opposite industrial development within the southern portion of the Precinct will primarily be commercially focused and low impact development to appropriately manage this interface and provide a transition to the more activated centre of the precinct, which will also include a residential component over time.

Mixed use development may be included where amenity impact from the proximity to the airport is mitigated. Extensions to existing light-industrial uses in the short term can be considered where it does not increase the intensity of the use overall and is well designed having regard to the other objectives of the Project Area and Precinct.

Development east of Milner Road and bound by Sultana Road West, will have regard to the objectives of the adjacent low-density residential land outside of the Project Area. Development on the periphery is to ensure the amenity of lots outside of the Precinct are not unduly impacted upon, while also acknowledging it represents a gateway to the Project Area.

2.3.1.2 Forrestfield-Airport Link – High Wycombe Station

The space will be transformed into a future transit-oriented development once the land is no longer required for construction activities. It will integrate community and transport by providing the sustainable infrastructure needed for people to live, work and play near the station, as well as easily connect with other communities across Perth via train.

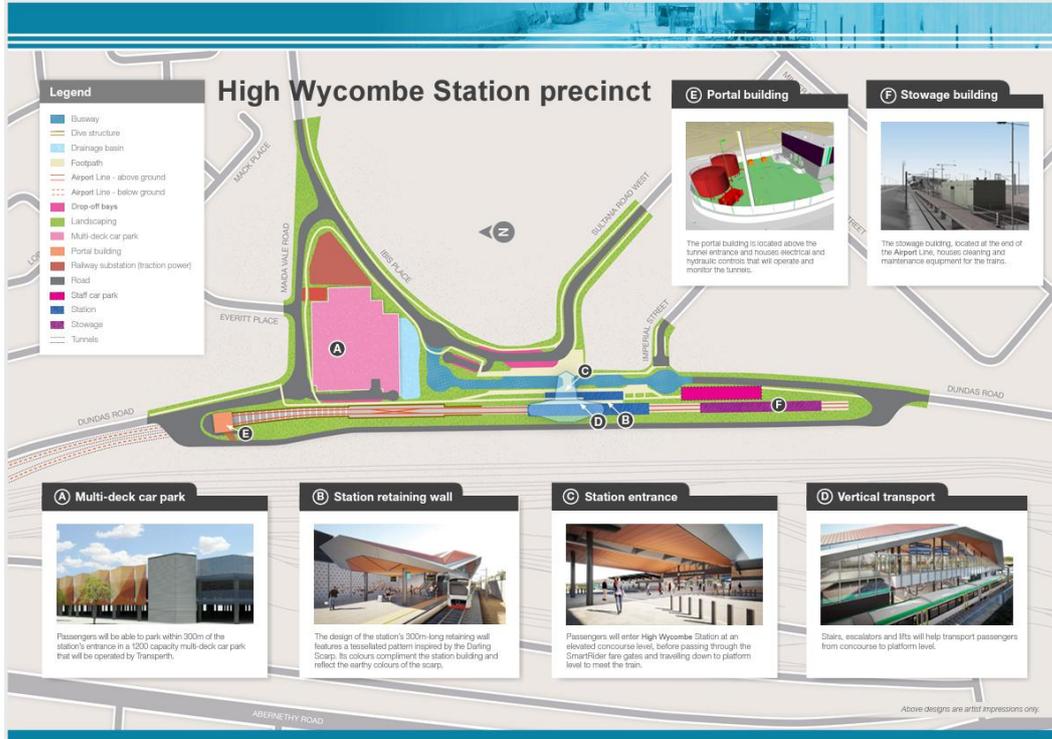
The vision for the area is to include a mix of commercial, retail, residential and community development. Metronet estimates significant daily passenger trips to and from High Wycombe Station in the first year.

Figure 2-8 Artist Impression of High Wycombe Station



Source: Metronet

Figure 2-9 High Wycombe Station Precinct



Source: Metronet

In addition, the PTA High Wycombe Station Access Strategy was reviewed as part of this plan.

2.4 Local Regulatory and Policy

2.4.1 City of Kalamunda Parking and Parking Facilities Local Law 2019

There are several key considerations with respect to the City's parking local laws which inform the basis for proposed parking controls. The system of linemarking and signage proposed within this Parking Plan is intended to reinforce these restrictions, and to mitigate the impact of the significant increase in parking demand within the High Wycombe Station Precinct.

In particular:

- > Property owners are entitled to parking on the verge in front of their property, and to permit others to do so. Where the frontage is owned by State, Local or Federal Government, that power to permit parking is retained.

However, the perception by drivers is that parking is *de facto* permissible along verges adjacent to reserves. As such, parking restrictions are recommended to prohibit parking where safety or function would be affected.
- > No portion of the footpath is to be blocked by a vehicle. This suggests that in spaces too narrow to support a vehicle within the verge, no signage would be necessary. However, if there is any ambiguity that might induce parking in such a way that impedes pedestrian movements, prohibition would be warranted.

In addition to these key points, parking is already prohibited in many locations due to proximity to intersections or other infrastructure. Parking signage must be cognisant of these restrictions and reinforce the requirements of the Road Traffic Code 2000.

2.4.2 Local Planning Scheme No. 3

The Local Planning Scheme (LPS) No. 3 specifies car parking requirements which states any development must provide parking rates as listed in Table 3 (**Figure 2-10**). It states that the City may impose conditions concerning:

- a) the number of bays to be provided;
- b) the proportion of car bays to be roofed or covered;
- c) the proportion of car bays to be below natural ground;
- d) the means of access to each car bay and the adequacy of any vehicle manoeuvring area;
- e) the location of the car bays on the site and their effect on the amenity of adjoining development, including the potential effect if those bays should later be roofed or covered;
- f) the locations of proposed public footpaths, vehicular crossing, or private footpaths within the lot, and the effect on both pedestrian and vehicular traffic movement and safety;
- g) the suitability and adequacy of proposed screening or landscaping;
- h) the design and construction type of car parking areas and access ways.

It also includes policy for reciprocal parking and cash in lieu parking.

Figure 2-10 Table 3 Parking Requirements

Use	Car parking Standards
Aged Residential Care	1 per employee plus 1 bay per 10 beds.
Amusement Parlour	7 bays per 100m ² of NLA.
Art Gallery	1 per employee plus visitor bays at the discretion of the local government.
Bed & Breakfast	1 bay per bedroom used for accommodation and 2 for residence.
Betting Agency	7 bays per 100m ² of NLA.
Child Care Centre/Day Care	1 bay per staff member, plus 1 bay for every 10 children allowed under the approval.
Cinema/Theatre	1 bay per employee or staff member, plus 1 bay for every 2.5 m ² of seating area.
Civic Use	1 bay for every 5 persons the facility is designed to accommodate.
Club Premises	As per Hotel where applicable to a particular use, or as otherwise determined by the local government.
Community Purpose	1 bay for every 5 persons the facility is designed to accommodate.
Consulting Rooms	4 bays per practitioner plus 1 bay per employee.
Convenience Store	6 bays per 100m ² NLA for shop plus 1 bay per bowser.
Educational Establishment	
• Pre Primary	1 bay for every staff member, plus 1 bay for every 3 students.
• Primary School	1 bay for every staff member, plus 14 drop off bays for every 100 students.
• Secondary School	1 bay for every staff member, plus 7 drop off bays for every 100 students.
Fast Food Outlet	10 bays per 100m ² NLA. Min of 6 bays (excl. drive through).
Factory/Factory Units	3 bays per 100m ² NLA or 1 per employee plus one customer bay, whichever is the greater.
Funeral parlour	1 bay for every staff member plus 2 visitor bays.
Garden Centre	2 bays per 100m ² display and sales plus 1 bay per staff member.
Health/Fitness Centre	5 bays per 100m ² GLA
Homestore/Cornerstore	2 bays per 100m ² of NLA with a minimum of 5 bays.
Hospital	1 bay for every 4 beds provided, plus 4 bays for every 100m ² of out patient treatment area including waiting rooms.
Hotel/Motel	1 bay for each unit and 1 bay for 4 persons proposed to be accommodated for the restaurants plus 1 bay for every 5m ² of bar and public area.
Industry — Cottage	2 bays per 100m ² of industrial area or 1 bay per person employed, whichever is the greater.

Use	Car parking Standards
Industry - General	2 bays per 100m ² of industrial area, or 1 bay per employee plus 2 visitor bays, whichever is greater.
Industry - Light	2 bays per 100m ² of industrial area, or 1 bay per employee plus 2 visitor bays, whichever is greater.
Industry - Rural	1 bay per 100m ² NLA or 1 bay per employee whichever is greater.
Industry - Service	4 bays per 100m ² of floorspace open to the public plus 2 bays per 100m ² of industrial area, or 1 bay per employee, whichever is greater.
Lodging House	1 bay per bedroom or 10 bays per 100m ² NLA whichever is greater.
Lunch bar	6 bays per 100m ² NLA.
Market	6 bays per 100m ² of market area.
Medical centre	6 bays per practitioner and 1 per staff
Motor vehicle repair	4 bays to each working bay, plus 1 bay for employee on site.
Motor vehicle, boat and caravan sales	1 bay for every 100m ² display area plus 1 bay for every employee
Museum	1 per employee plus visitor bays at the discretion of the local government.
Night club	1 bay per every 2.5m ² of public bar area, plus 1 bay for every 5m ² of lounge/garden area.
Office	4 bays per 100m ² of NLA.
Place of Worship	1 bay for every 5m ² of NLA.
Reception Centre	1 bay for every 4 persons to be accommodated, or 1 bay for every 5 square metres of dining area, whichever is the greater.
Private Hospital	1 bay per staff member and 1 visitors bay for every bed.
Restaurant	1 bay for every 4 persons to be accommodated.
Retirement Village	0.5 bays per residential unit plus 1 bay per employee.
Service Station	5 bays (excl. bowser area).
Shop AMD 63 GG 15/08/14	5 bays per 100m ² of NLA.
Showroom	4 bays per 100m ² of NLA.
Tavern	1 bay for every 5m ² of bar and public area.
Veterinary Centre	4 bays per 100m ² of NLA plus 1 bay per staff member.
Warehouse AMD 7 GG 2/11/10	3 bays for up to the first 200m ² of floor area and thereafter 1 bay for every 100m ² of NLA or part thereof.
Winery	2 bays per 100m ² floorspace, or 1 bay per person employed, whichever is the greater, plus 1 bay per 5m ² of area used for eating or drinking.

2.4.3 High Wycombe South Transit Oriented Development Precinct Activity Centre Structure Plan

The Activity Centre Plan area encompasses the land generally bounded by Dundas Road and the Forrestfield Freight Yard, Access Park bulk grain depot and Mainline Freight Rail to the west, Poison Gully Creek and Maida Vale Road to the north and Milner Road to the east and southeast. It covers 84 landholdings and seeks to create a planning framework to coordinate the future subdivision and development within the TOD Precinct.

The station is expected to have 50% of its patronage arrive by bus, therefore reduced parking requirement for non-residential land uses are proposed.

A detailed Transport Impact Assessment (TIA) was prepared to inform the movement network and design of the TOD ACSP. It anticipates that the additional traffic generated is likely to be 17,185 vehicular trips per day, 2,696 trips in the AM Peak and 2,955 trips in the PM peak.

The most notable changes to the movement network in the TOD precinct identified by the TIA include:

- > Realignment of Dundas Road to construct the High Wycombe Train Station;
- > Construction of the TOD Connector Boulevard which will connect through to the Residential Precinct; and
- > Modification of Sultana Road West to become a cul-de-sac west of Milner Road and the TOD Connector.

The TIA includes conceptual road cross sections for key roads in the ACSP movement network. These conceptual cross sections have been prepared consistent with the requirements of LN, and varied only where it can be justified that:

- > Traffic modelling supports the variation,
- > The variation is necessary to achieve an environmental outcome(s),
- > There is no potential to expand the existing road reservation due to infrastructure constraints,
- > That liveable neighbourhood principles are not compromised, and e) A high level of urban amenity is achieved.

In addition to road cross sections, the TIA outlines proposed intersection controls for key intersections in the TOD Precinct.

Figure 2-11 High Wycombe South Activity Centre Plan



Source: City of Kalamunda

The proposed pedestrian and cyclist paths are taken from the City of Kalamunda Bike Plan.

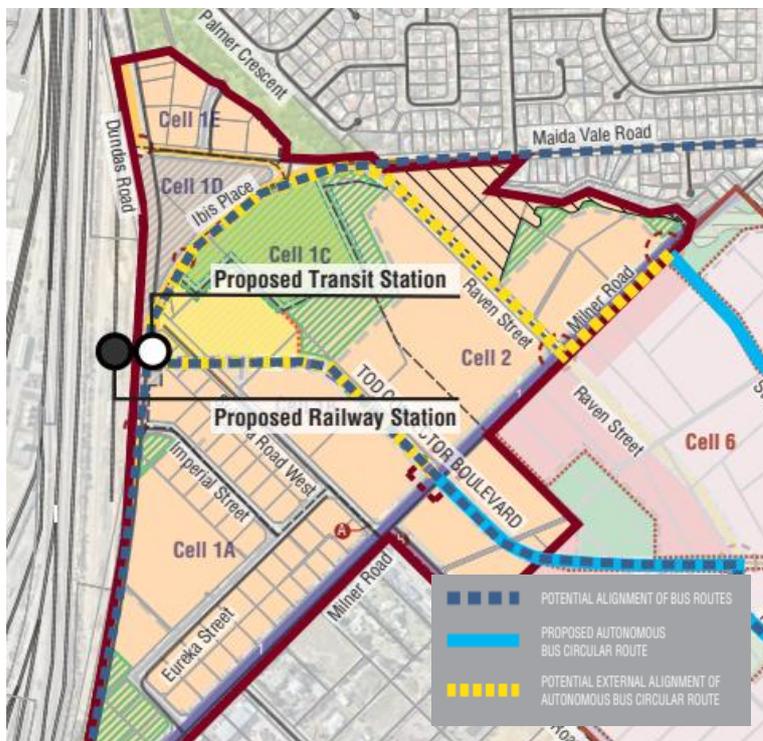
Figure 2-12 Proposed Pedestrian and Cyclist Paths



Source: City of Kalamunda

The public transport plan proposed in the activity centre structure plan is shown in **Figure 2-13**.

Figure 2-13 Public Transport Plan



Source: City of Kalamunda

2.4.4 High Wycombe South Local Structure Plan

To facilitate the District Structure Plan, the site has been divided into two Local Structure Plan precincts. This area is essentially outside the study area for this report but it does include a Transport Impact Assessment. A new TOD Connector Boulevard can be seen in **Figure 2-14**.

Figure 2-14 High Wycombe South Residential Precinct



Source: City of Kalamunda

The residential precinct consists primarily of rural residential development including single houses and associated outbuildings on lots generally around one hectare in area. Located immediately north of the Residential Precinct area are Poison Gully Creek (Bush Forever Site 45) and the High Wycombe residential area. Existing light industrial uses and the initial Stage 1 of the Forrestfield/High Wycombe Industrial Area are located to the south, which provide a buffer to nearby general industrial land uses. The Residential Precinct is also located within close proximity of the High Wycombe South Transit Oriented Development (TOD) and Activity Precincts to the immediate west, the Forrestfield Freight Yard, Access Park bulk grain depot and Mainline Freight Rail.

This area is outside the 400-600m catchment of the study but the residents may still access the station by walking or riding. It is unlikely that park and ride commuters would park in this area to reach the station.

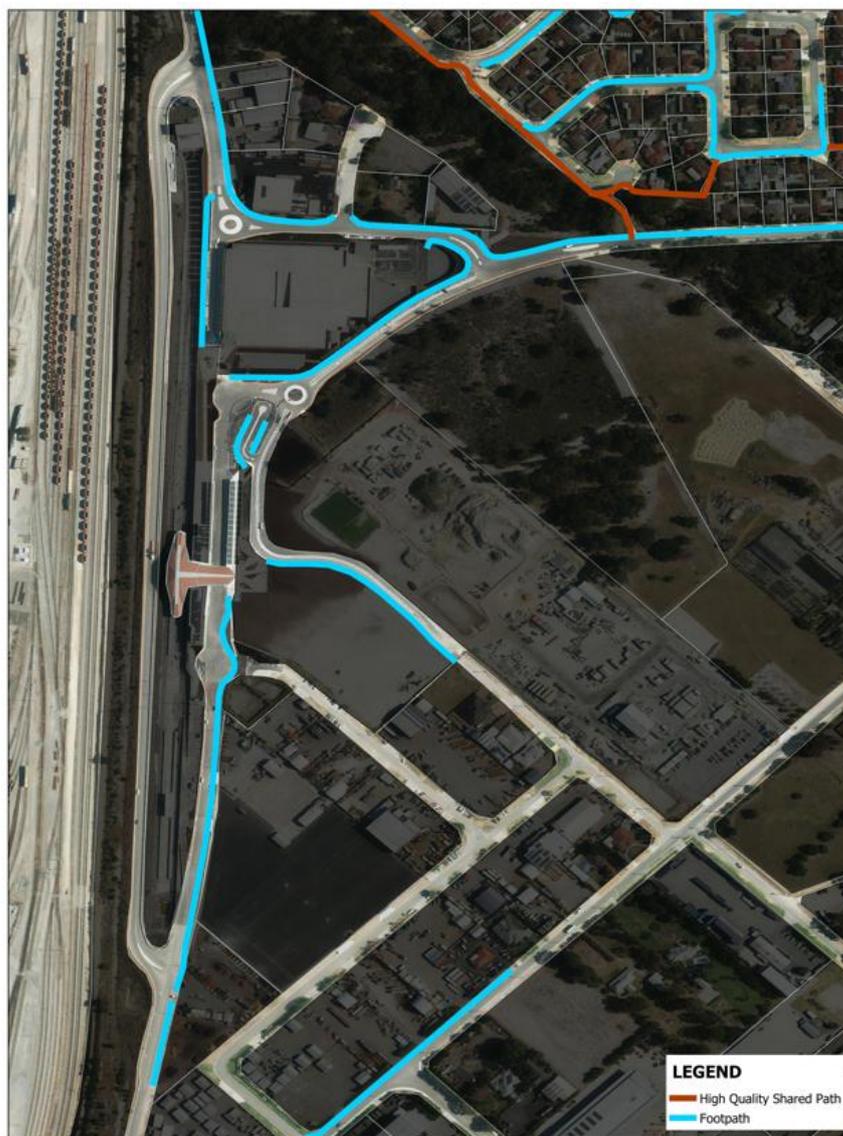
2.5 Land Use Profile

The area is an industrial zone with low density residential development on the periphery. The future planning of the area shows an intensification of uses, as can be seen in the Metronet East Redevelopment Scheme (See **Section 2.3.1**). All streets within 400-600m were reviewed as part of this plan. Also, a proposed new link, TOD Connector, was considered. It is understood that only the new TOD Connector Boulevard and Sultana Road West connection are expected to change in the next five years.

2.6 Existing Pedestrian and Cycling Amenity

There is currently limited pedestrian and cycling amenity in the vicinity of the train station. In order to reduce reliance on park and ride patronage and to meet mode share targets, consideration needs to be given to safe walking and riding amenity to access the station. **Figure 2-15** shows the existing pedestrian and cycling infrastructure on the surrounding streets is lacking, with no footpath on many streets.

Figure 2-15 Existing Pedestrian and Cycling Infrastructure

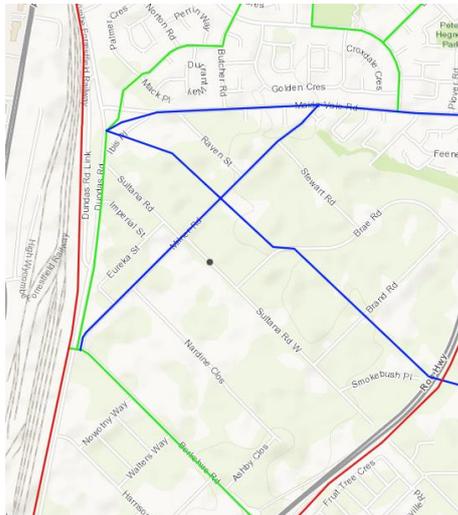


Source: Metromap

2.6.2 Long Term Cycle Network

The State Government’s Long-Term Cycle Network shows Maida Vale Road, Milner Road and a future road north of Sultana Road West as Secondary Routes. Everitt Place and Dundas Road are shown as local routes, as shown in **Figure 2-16**.

Figure 2-16 Long Term Cycle Network



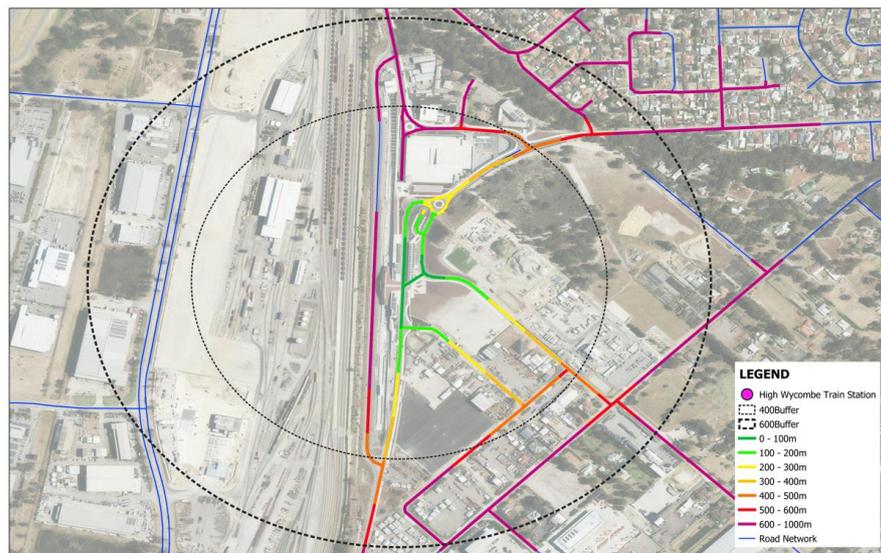
Source: Department of Transport

2.7 Walking Distance to Train Station

Generally, the local residential areas are within an acceptable walking distance to the train station, with 800m usually the distance a person will walk to public transport at a station (**Figure 2-17**).

For those driving to use the station, the distance tolerated to walk is much less and would generally be within 400m of the station. Of course, if there are no options within close proximity, the level of tolerance for walking from a parked car will increase.

Figure 2-17 Walking Distances to High Wycombe Train Station



2.8 Public Transport Connections

There are very few existing bus connections to the project study area, though this will be improved following the completion of the station. Currently no services link directly with the station.

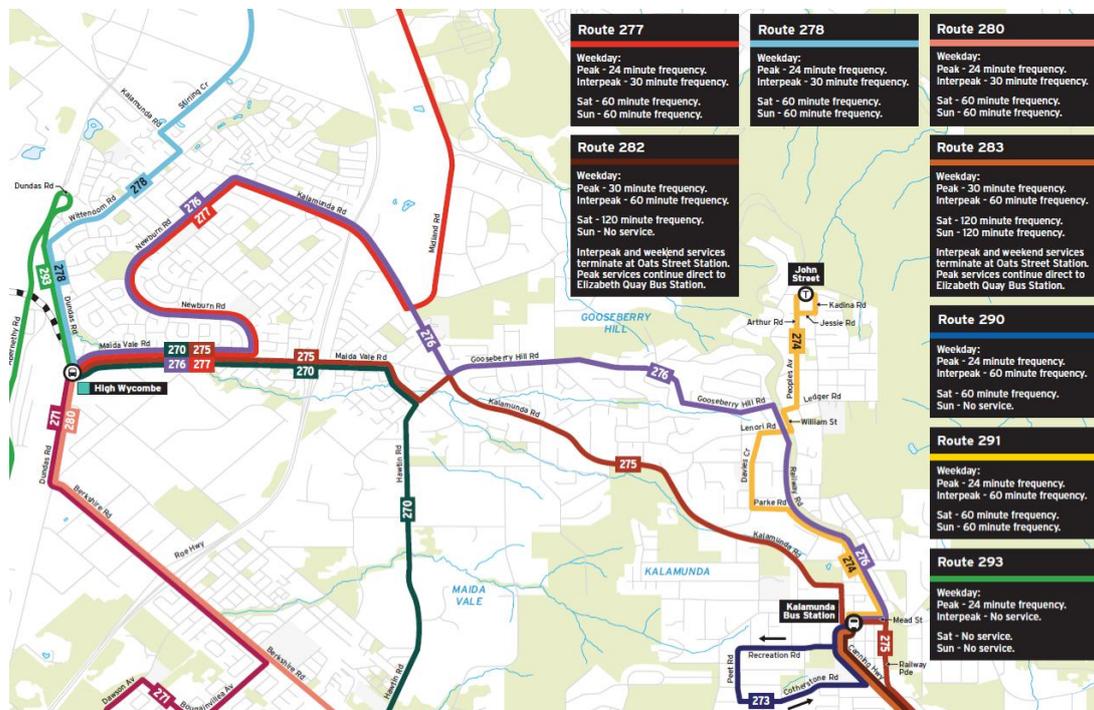
Figure 2-18 Transperth Network



Source: Transperth

The PTA have proposed a supporting bus network, the Forrestfield-Airport Link Support Bus Network – East. It shows six bus routes servicing the High Wycombe Station. These routes will use Maida Vale Road, Dundas Road and Berkshire Road.

Figure 2-19 Proposed Forrestfield-Airport Link Supporting Bus Network - East



Source: Metronet

2.9 Existing On and Off-Street Parking Supply

There is a relatively small existing off-street parking supply and formalised on-street parking supply within the study area, as can be seen in **Figure 2-20**.

The primary public parking supply consists of unrestricted on-street parking and for Transperth customers, a multi-story car park providing 1,200 bays. As the multi-storey carpark fills, or for drivers who want to avoid the Transperth \$2 fee, there is a possibility of overspill into the surrounding streets. This includes potential for non-compliant parking within 400-600m of the train station.

Any on-street parking locations without restrictions would be available for these commuters, with a range of potential impacts on residents and businesses in the Precinct. Where demand exceeds the total available supply (formal and informal), some commuters may attempt to park in illegitimate locations (on-street, vacant lots and verges).

Figure 2-20 Existing Parking Supply



Source: MetroMap

Observations of current behaviour show a generally low demand for on-street parking within the study area. Most parking requirements are fulfilled within the business lots, with a few exceptions noted in the following Sections.

2.10 Site Visit

A site visit was conducted on Tuesday 22nd February to observe the current parking demand within the surrounding area and identify areas where potential parking issues may arise after the opening of the station. The observations are included under each Section below, followed by parking control recommendations.

3 Sultana Road West

3.1 Site Observations and Analysis

Though no verge parking was observed along **Sultana Road West**, it is possible that the northern verge could be used for parking (refer to **Figure 3-1**). The verge is relatively obstruction-free, has no imposed parking restrictions and is easily accessible to the station.

Furthermore, an unfenced vacant lot along Sultana Road West was identified (refer to **Figure 3-2**) which could potentially accommodate a large number of vehicles making Sultana Road West an ideal location for park and ride patrons. Any parking within the lot would not be legal.

Figure 3-1 Sultana Road West

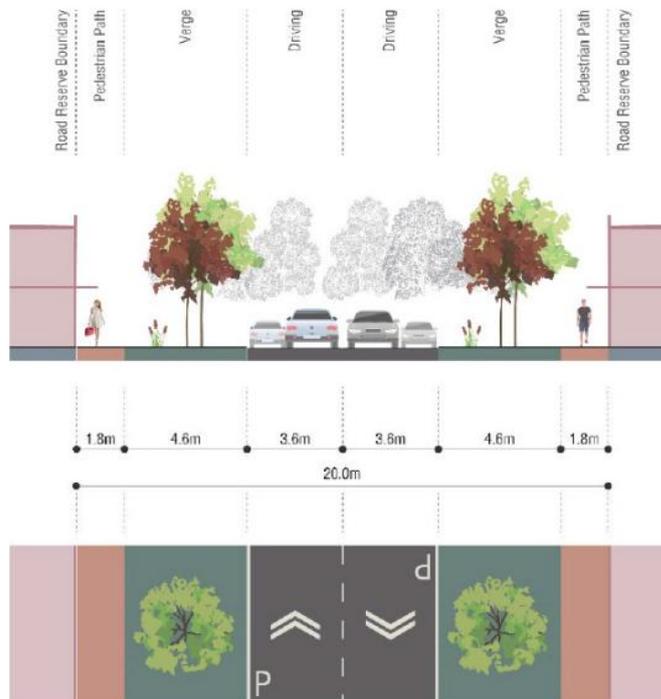


Figure 3-2 Unfenced Vacant Lot Sultana Road West



The proposed cross section, as provided in the High Wycombe South TOD Activity Centre Structure Plan, is shown in **Figure 3-3**. This indicates an allowance of on-street parking.

Figure 3-3 Sultana Road West – West of Milner Road Proposed Cross Section



Source: City of Kalamunda

3.2 Recommendations

In the short term, the former construction site to the north will leave an existing wide verge and the businesses to the south are due to remain indefinitely. The northern verge may provide opportunity for commuter parking but this will not impede on the existing business needs.

The southern side is primarily residential with landscaped verges. One lot is unfenced and vacant (refer to **Figure 3-2**) which could potentially accommodate a large number of vehicles until such a time as it is developed. It is recommended to monitor this location, it may require fencing to prevent illegal parking.

If parking is observed on residential verges, then parking controls are recommended for the southern side of Sultana Road West in the form of ‘No Parking on Verges 7am - 5pm.’ (Drawing Numbers SK010B and SK011A)

4 Imperial Street

4.1 Site Observations and Analysis

Verge parking was observed along Imperial Street (refer to **Figure 4-1**) and likely to be visitors and/or staff of the nearby industrial sites. Parking along Imperial Street will be highly desirable to park and ride patrons as this area is located within close proximity to the station entrance (approximately 150m from the Station, which is closer than the multi-storey car park).

Figure 4-1 Imperial Street Verge Parking



No cross section is provided for Imperial Street as part of the High Wycombe South TOD Activity Centre Structure Plan.

4.2 Recommendations

On Imperial Street, the existing businesses will remain indefinitely, with the vacant properties at the north end under the control of the PTA. The close proximity to the station entrance makes parking along this street highly desirable to park and ride patrons. In addition, there is existing demand for verge parking for staff/visitors from nearby properties.

Future discussions with businesses may lead to the need for clarification that verge parking is only for their staff and visitors. Therefore, the City will need to consider a local sign for this purpose.

Parking controls are recommended for Imperial Street in the form of ‘No Parking on Road’ on both sides. (Drawing Numbers SK012A and SK012B)

5 Mack Place

5.1 Site Observations and Analysis

No vehicles were parked along the verges of Mack Place during site observations (other than by local residents) though google images indicated parking along the shared path. Though Mack Place is relatively distant from the station (approximately 600m), it provides an opportunity for residents of the High Wycombe suburb without driving to and through the Station Precinct.

Figure 5-1 Mack Place Shared Path



Mack Place represents the closest potential parking location within the adjacent residential cell. The circuitous route and congested network could induce parking along this stretch by local residents. The new curb along the Shared Path is mountable and may see cars parking across the path in violation of *Local Laws*.

Figure 5-2 Mack Place PSP Parking



Source: Metromap

No cross section is proposed as part of the High Wycombe South TOD Activity Centre Structure Plan.

5.2 Recommendations

A new shared path along the south side connects to Maida Vale Road and the train station. The path removes the opportunity for formalisation of on-street parking within the verge area, but supports better access by active modes to and from the station.

On road parking can be permitted on the southern side of Mack Place given the lack of demonstrable impact on adjacent residences.

Parking is not permitted on road in a cul-de-sac but for clarification ‘No Parking on Road’ signs are recommended.

If commuter parking becomes a concern of the residents, then the remaining portion of the north side of Mack Place is to be signed ‘No Stopping on Road’ as well as visualised with a yellow line extending around the corner up Durrant Way and Palmer Crescent.

If parking on the path is observed, then physical barriers such as bollards are recommended to prevent this behaviour, but they must not encroach on the shared path space. (Drawing Number SK014)

6 Dundas Road

6.1 Site Observations and Analysis

Parking anywhere along the **Dundas Road Link** is very unlikely as there are no safe or convenient access routes to the station for vehicles parking at this location.

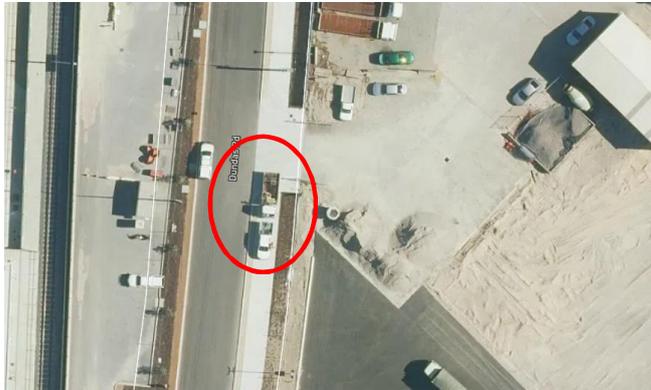
It appears some businesses use their verges along **Dundas Road north** but it is unlikely commuters would park on this street as it is more than 600m from the station. It is assumed that the observed parking along the shared path on **Dundas Road south** was due to construction. However, should this behaviour continue, it will need to be managed.

Figure 6-1 Dundas Road North Observed Verge Parking



Source: Metromap

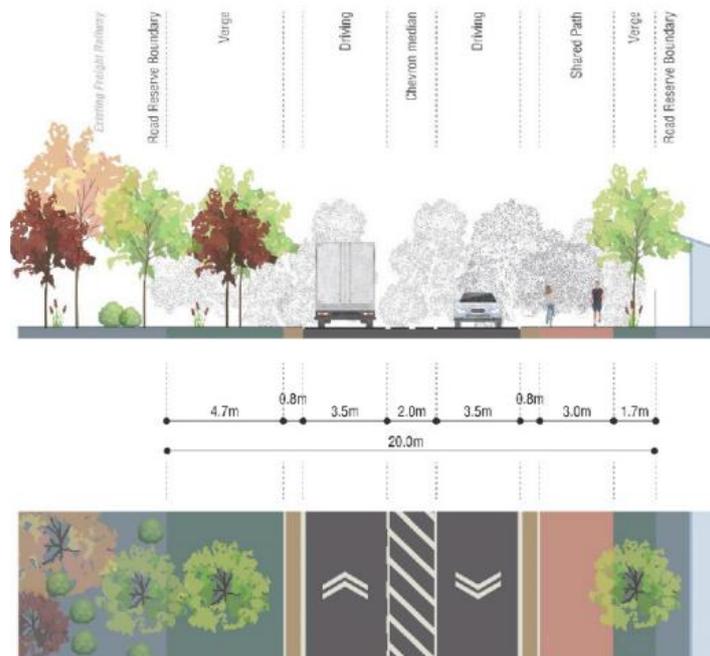
Figure 6-2 Dundas Road South Observed Path Parking



Source: Metromap

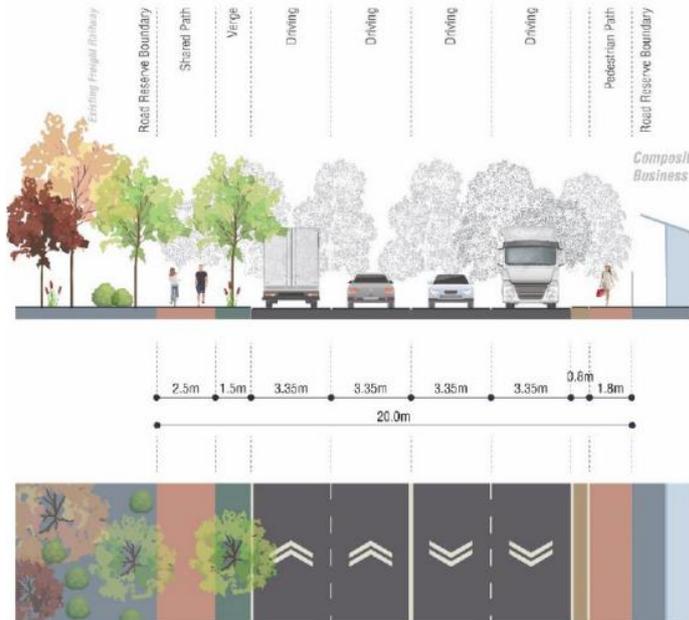
Figure 6-3 and **Figure 6-4** show proposed cross sections for Dundas Road as part of the High Wycombe South TOD Activity Centre Structure Plan. These do not indicate on street parking is to be provided.

Figure 6-3 Dundas Road South of Old Dundas Road



Source: City of Kalamunda

Figure 6-4 Dundas Road



Source: City of Kalamunda

6.2 Recommendations

6.2.1 North

The distance to the station from the north leg (approx. 600m) suggests there will be little demand for commuters to use it for parking. There is an existing crash barrier on the western side along the PTA site. The eastern side will likely see demand for verge parking with a low curb and landscaped verges.

Properties on the eastern side appear to use their verge for parking in this location with a low curb and landscaped verges. The verge is an insufficient width for a vehicle at approximately 1.8m wide, and in the location where the verge does have capacity, it is considered too close to the station.

Therefore, ‘No Stopping Road or Verge’ signs are recommended on the eastern side. (Drawing Number SK005 and SK006)

6.2.2 South

The south leg has a new shared path along its east side with existing light industrial property accesses and verges. The proximity to the Station and general legibility is likely to make Dundas Rd south a key location for on-street parking and informal overspill. It is expected that because it will be a bus route, commuters will not likely park along the street. The shared path may entice commuters to park on it (See **Figure 6-2**).

As a precaution, it is recommended to provide ‘No Stopping Road or Verge’ signage. (Drawing Number SK001 and SK002)

6.2.3 Dundas Link

The walking distance from the train station is expected to limit parking desires, however there are extensive verges on the west side. As there are no safe or convenient access routes to the station the usage of this redeveloped section of road for parking will largely be determined by the extent of overspill.

No treatment is necessary along Dundas Road, but if it is observed that commuters are parking along the street ‘No Parking on Road’ signage is recommended and ‘No Stopping Road or Verge’ signage is recommended at the intersections. (Drawing Numbers SK003, SK004 and SK005)

7 Maida Vale Road

7.1 Site Observations and Analysis

No vehicles were observed to be parked along **Maida Vale Road** however, several areas were identified to be potentially used as park and ride, as shown in **Figure 7-1** and **Figure 7-2**. The lack of any physical barriers allows for vehicle to easily drive over to these areas to park, which is undesirable due to the presence of critical infrastructure (along the southern verge) and difficulties associated in managing an informal parking area.

Figure 7-1 Maida Vale Road Intersection

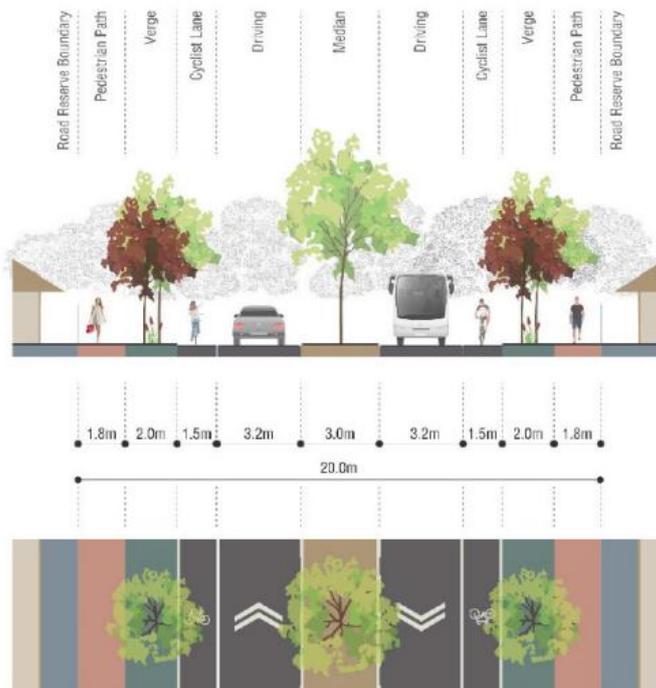


Figure 7-2 Maida Vale Road Southern Verge



No on street or verge parking is shown in the cross section presented for Maida Vale Road as part of the High Wycombe South TOD Activity Centre Structure Plan (**Figure 7-3**).

Figure 7-3 Maida Vale Road Proposed Cross Section



Source: City of Kalamunda

7.2 Recommendations

This upgraded corridor forms the primary access to the station precinct from the east. It is therefore likely to carry a large proportion of traffic accessing both the industrial area and the park 'n' ride. While trucks and larger combination vehicles can be expected to use Berkshire Road to access Roe Highway, Maida Vale Road serves a large residential catchment. As this is the main approach route, it may experience additional demand for parking beyond its mere proximity to the Station.

The lack of physical barriers along the street allows for vehicles to easily drive to open areas to park. This is undesirable due to the presence of critical infrastructure (along the southern verge).

Parking within these areas should be prevented through the use of landscaping and/or bollards (or removal bollards if service access is still required). 'No Stopping Road or Verge' signage is recommended for both sides, with short stay parking provided in the embayment and '3P' signage installed. (Drawing Numbers SK006, SK007, SK008A, SK008B and SK011)

8 Everitt Place

8.1 Site Observations and Analysis

Few vehicles were observed to be parked along the verge of Everitt Place (refer to **Figure 8-1**). Given this areas' proximity to the multi-story car park, there is a chance people may choose to park along Everitt Place to avoid the parking fee.

Figure 8-1 Everitt Place



No cross section is proposed as part of the High Wycombe South TOD Activity Centre Structure Plan.

8.2 Recommendations

This street is a small cul-de-sac and will be unchanged from its existing condition. The land uses of the properties are light industrial and also results in complementary vehicles to light industrial uses. There is little evidence of existing verge parking needs but it may experience overspill demand from the adjacent multi-deck car park, particularly in the context of the associated price differential.

It is recommended the western side is 'No Stopping Road or Verge,' including the cul-de-sac. The eastern side is also 'No Stopping Road or Verge' to allow for truck movements, the exception is where indicated, formalised on-street parking with '3P' signage to support visitor use by these businesses. (Drawing Number SK007)

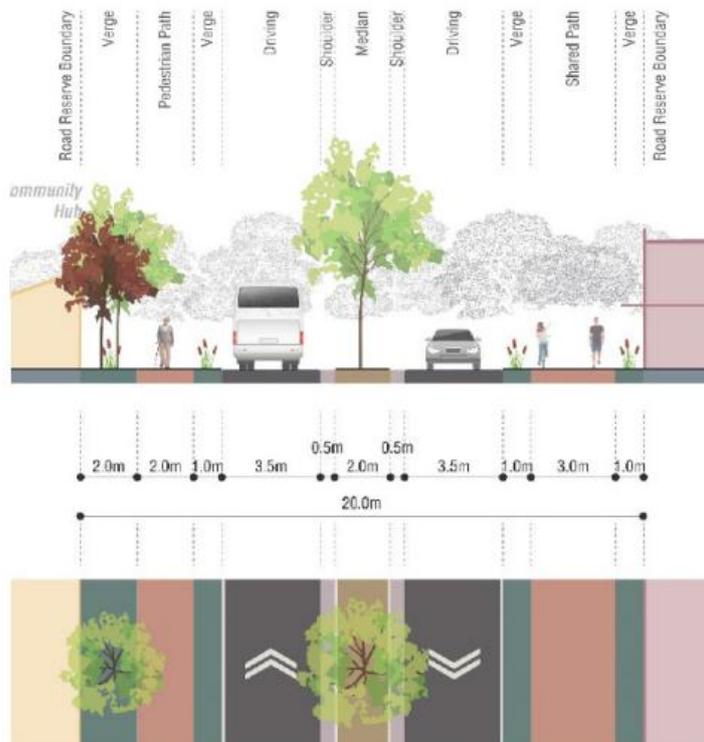
9 Enterprise Boulevard

9.1 Site Observations and Analysis

Enterprise Boulevard was closed at the time of the site visit due to the ongoing construction works at the High Wycombe Train Station. Therefore, current parking issues along this road could not be identified.

A cross section is proposed as part of the High Wycombe South TOD Activity Centre Structure Plan, as shown in **Figure 9-1**. This indicates no on street or verge parking is to be available along the street.

Figure 9-1 Enterprise Boulevard Cross Section



Source: City of Kalamunda

9.2 Recommendations

The former construction site to the east will leave a wide verge. The road reserve boundary (City's responsibility) on the west side at the forecourt stops at the kerb line. On-site assessment was unable to be undertaken due to the road being closed. The location of the street in close proximity to the station makes it appealing for commuters to use for parking.

It is recommended to include embayed drop off/pick up parking (P 5min) on the eastern side, due to no access to the PTA drop off/pick up on the western side for vehicles travelling north on Enterprise Blvd. A footpath will need to be provided as well as safe pedestrian crossings to the train station.

It is recommended to provide embayed parking for drop off/pick up at 'P5min.' 'No Stopping Road or Verge' signage is recommended. (Drawing Numbers SK009A, SK009B and SK010A)

10 Milner Road

10.1 Site Observations and Analysis

Milner Road is 400-600m from the train station, and therefore not as appealing to use as a park and ride location. The current speed limit is 70km/h with a footpath provided on one side. Many of the verges in front of the residential houses are wide and appear cleared for parking.

Figure 10-1 Milner Road near Sultana Road West



Source: Metromap

Closer to Dundas Road, the street is not conducive to on-street or verge parking.

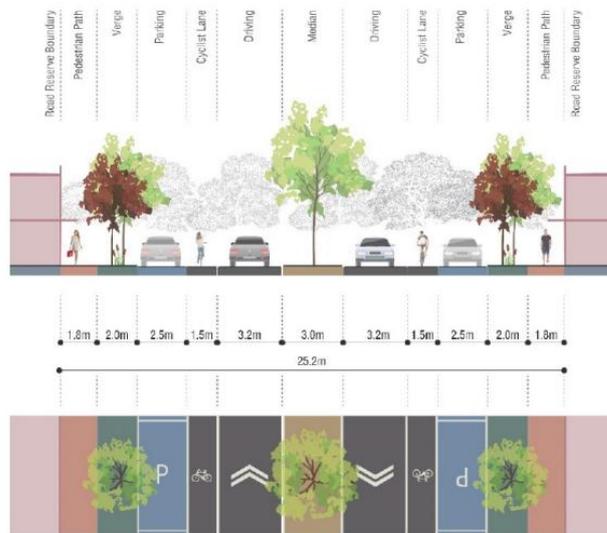
Figure 10-2 Milner Road near Dundas Road



Source: Metromap

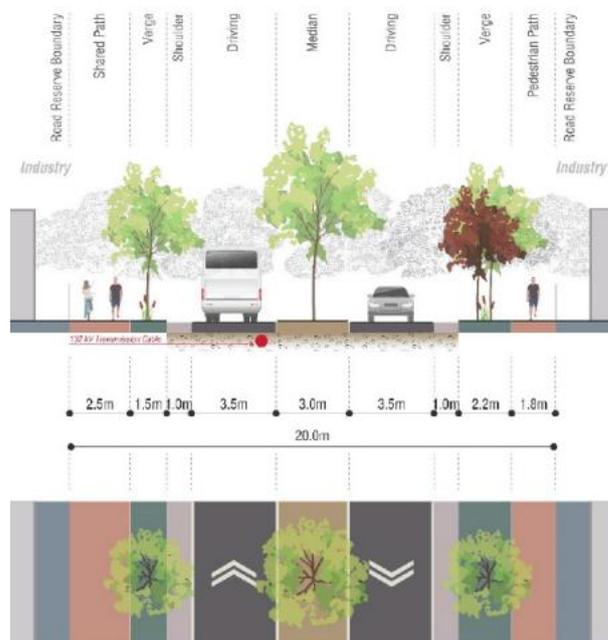
The proposed cross section from the High Wycombe TOD Activity Centre Structure Plan indicates formalised on-street parking is to be provided east of Sultana Road West (**Figure 10-3**). This area of Milner Road is over 600m to the train station and is unlikely to attract park and ride parking. The portion between Sultana Road West and Berkshire Road, though closer to the station, is a 750m walk minimum to the station and unlikely to attract park and ride parking.

Figure 10-3 Milner Road between Sultana Road West and Stewart Road



Source: City of Kalamunda

Figure 10-4 Milner Road between Sultana Road West and Berkshire Road



10.2 Recommendations

The proposed cross section from the High Wycombe TOD Activity Centre Structure Plan indicates formalised on street parking is to be provided between Sultana Road West and Stewart Road (**Figure 10-3**). The portion of Milner Road between Sultana Road West and Berkshire Road, though closer to the station, is unlikely to attract park and ride parking due to the walking distance to the train station of over 750m.

No treatment is necessary for Milner Road in its current form.

It is recommended the future formalised on-street parking has '3P' signage and the remainder have 'No Stopping Road or Verge.' Drawings cannot be provided for the future design of Milner Road.

11 Eureka Street

11.1 Site Observations and Analysis

The businesses on Eureka Street are utilising the verge for parking. Some businesses may be able to absorb this parking within their site, but others, with large truck movements, are not as likely to provide parking. No parking is currently occurring on-street.

A large lot between the station and Eureka Street is undeveloped and it is unsure the future land use plans in this location. The High Wycombe TOD Activity Centre Structure Plan designates the area as RAC-0 development area. Until it is developed, the verge is an appealing location for parking.

The walking distance to the train station is between 400m – 600m and may be desirable to park and ride patrons.

Figure 11-1 Eureka Street and Imperial Street



Source: Metromap

Figure 11-2 Eureka Street near Sultana Road West



Source: Metromap

There is no proposed cross section for Eureka Street in the High Wycombe TOD Activity Centre Structure Plan.

11.2 Recommendations

The ability for businesses to continue to use the verge for their staff and customers should be retained on the southern side. The attractiveness of levelled verge parking in front of a vacant lot necessitates the use of no parking signage.

It is recommended that 'No Parking on Road' signs are installed on Eureka Street. (Drawing Numbers SK011B, SK013A and SK013B)

12 Raven Street

12.1 Site Observations and Analysis

Raven Street is currently a dead end with large block residential on the eastern side and one lot on the western side, consisting of a residence and market gardens with the entrance from Milner Road. The walking distance to the train station and inaccessibility from Maida Vale Road indicate a low level of desire to park along this street for the train station. Conversely, its exclusiveness and lack of development along the street frontage may attract commuter parking.

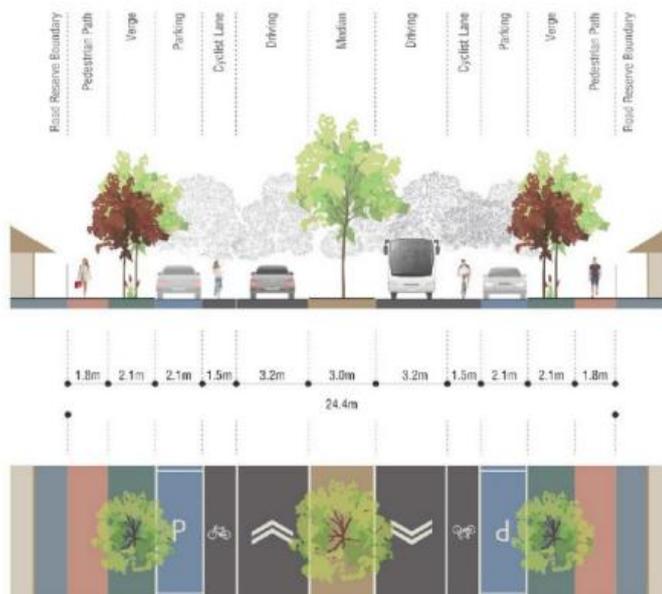
Figure 12-1 Raven Street



Source: Metromap

The proposed cross section indicates formalised on-street parking (**Figure 12-2**).

Figure 12-2 Raven Street Proposed Cross Section



Source: City of Kalamunda

12.2 Recommendations

The distance to the train station makes this street an unlikely attractor to park and ride parking and the land uses are also unlikely to attract significant verge or street parking.

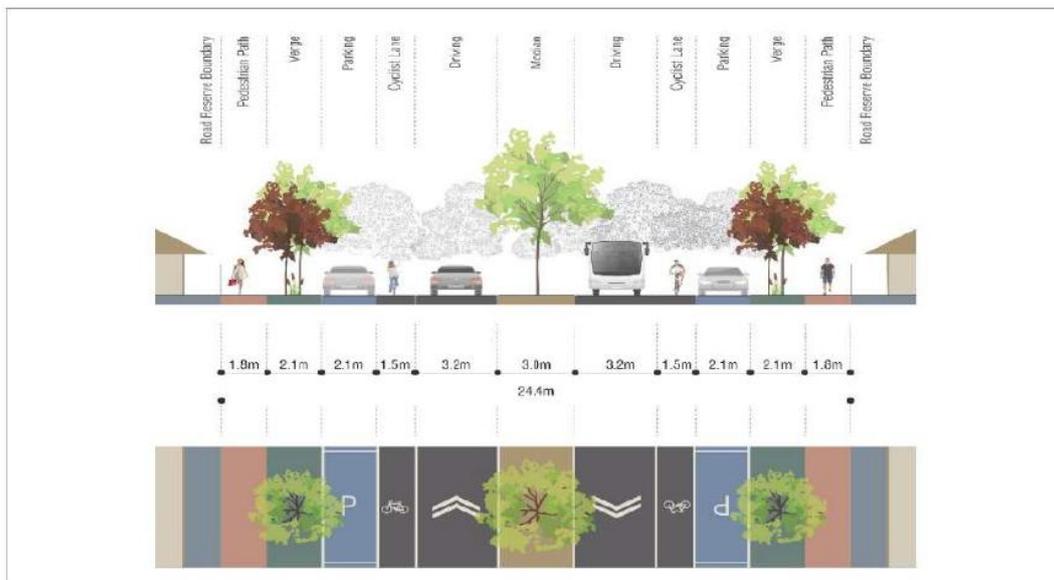
No treatment is necessary along Raven Street. It is recommended the future formalised on-street parking is '3P,' drawings cannot be provided for the future road design.

13 TOD Connector

13.1 Analysis

The projected traffic volumes for the TOD Connector are 1,428 (2031) and 6,432 (2050), and it will have a 1.8m pedestrian path on both sides and a 1.5m cycling lane on both sides. It is expected that new bus routes will be introduced to/from the High Wycombe Station along with an autonomous bus circular route.

Figure 13-1 TOD Connector Proposed Cross Section



Source: City of Kalamunda

13.2 Recommendations

A TOD Connector is proposed through the study area, along a future road alignment north of Sultana Road West and the proposed cross section (**Figure 13-1**) indicates on street parking.

It is recommended the proposed TOD Connector has '2P' signage to support visitor use of the adjacent businesses. No drawing is able to be provided for this proposed road.

14 Parking Control Plan Summary

The existing on and off-street parking supply, cycling and pedestrian amenities, public transport connections and the potential for overspill demand were considered in the development of the parking controls surrounding the High Wycombe Train Station.

METRONET predict the patronage of the High Wycombe Station will be significant but that the Transperth multi-storey carpark, with 1,200 bays, will be available to accommodate drivers upon opening day. Regardless, it is advised that the City implement some parking controls prior to the opening of the station.

The drawings providing are based on the existing road design and will need to be re-considered at the time the proposed cross-sections are implemented, as shown in the High Wycombe TOD Activity Centre Structure Plan.

It is acknowledged that there is a risk of train commuters parking on the verge without permission of the adjacent property owner, but prohibiting all parking on verges by way of signs may not be acceptable to the landowners who would otherwise use the verge for parking themselves.

Table 14-1 summarises the signs and lines recommended for each street within the study area. **Appendix A** provides the design drawings that correspond to these streets.

Table 14-1 Recommended treatments

Street	Signs and Lines
Sultana Road West	'No Parking on Verge 7am – 5pm'
Imperial Street	'No Parking on Road'
Mack Place	'No Stopping on Road', yellow line, 'No Parking on Road'
Dundas Road North	'No Stopping Road or Verge'
Dundas Road South	'No Stopping Road or Verge'
Dundas Link	No requirements, or 'No Stopping Road or Verge' and 'No Parking Road or Verge'
Maida Vale Road	'No Stopping Road or Verge', '3P'
Everitt Place	'No Stopping Road or Verge', '3P'
Enterprise Boulevard	'No Stopping Road or Verge', 'P5min'
Milner Road	No requirements
Eureka Street	'No Parking on Road'
Raven Street	No requirements
TOD Connector	'2P'

APPENDIX
A
PROPOSED PARKING DESIGN DRAWINGS

