

City of Melville

Report for Heathcote Lower
Land Analysis
Traffic Assessment

November 2007



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1. Introduction

GHD have been commissioned by City of Melville to undertake the Heathcote Lower Land Environmental, Traffic and Visual Resource Study.

This report considers the traffic aspects.

1.1 Purpose

To provide an assessment on the environmental and visual values and traffic and parking issues impacting the Heathcote lower land. Key tasks to include:

- » Environmental assessment of the lower land, adjacent escarpment and foreshore, including a feature survey, hydrological assessment of the site and adjacent foreshore and a tree and flora survey and assessment (including Bush Forever implications, escarpment stabilisation, foreshore revegetation etc)
- » Visual Resource assessment of the lower land as viewed from the adjacent residential area, Heathcote upper land and from the Swan River
- » Examine and report on traffic generation, primary vehicle movement patterns to and from the site and car parking activity based on existing patterns of traffic activity in the local area with the aim of identifying the 'whole of site' capacity.

1.2 Background

The City of Melville is preparing a master plan for the lower Heathcote Land and adjacent reserves and in so doing is sourcing updated studies and information to inform community workshops for the future development of the plan.

Heathcote is a former State Hospital situated on Point Heathcote occupying a prominent position on the bank of the Swan River in the City of Melville. The upper land was redeveloped in 2000 via an adaptation and reuse of the heritage buildings existing on the site for a range of uses including a state of the art playground facility (the Adventure Playground), museum, child care facilities, community arts, learning centre and restaurants.

The lower land has remained undeveloped and recently was transferred from the State Government of Western Australia and vested with the City of Melville for management and administration purposes. The subject land will add a significant area of land to the foreshore reservation to complement the well used upper land at Heathcote Point. The additional land area available has recreation, landscape and aesthetic benefits for the community in general and the City of Melville in particular.

The Heathcote site (both upper and lower lands) has significant historic (Colonial and Federation history), social, natural and Aboriginal associations including being the landing and campsite of Captain James Stirling during his exploration of the Swan River in 1827, to the first chosen site for the capital city of Perth. Like most land adjoining the Swan River, this site was used extensively by the Aboriginal people and was within the territory of the Beeliar sub-group of Nyungars and was owned by Midgegooroo and his son Yagan. Natural assets on the site included hot springs and wetlands, open woodlands,



foreshore and steeply sloping hill faces. European history includes the development of the Pt Heathcote Reception home for the mentally ill.

1.3 Traffic Generation/Movement Patterns

The following tasks were be undertaken:

- » Site inspection and identification of configuration of existing road network;
- » Undertake automatic traffic counts at 7 locations;
- » Undertake parking survey within the area on a Saturday/Sunday 12-2pm to identify current demand and capacity;
- » Undertake turning movement surveys at Canning Beach Rd/Duncraig Rd, Carron Rd/Duncraig Rd, Strome Rd/Duncraig Rd, 12-2 pm Sunday;
- » Obtain any existing data from City of Melville;
- » Liaison with the South Perth Yacht Club regarding existing car parking supply and future activity;
- » Review parking and traffic activity associated with the Heathcote Complex;
- » Estimate traffic generation from the site at the lower end;
- » Review previous available car parking surveys at riverside parks;
- » Prepare a report identifying:
 - existing traffic movements within the study area
 - existing car parking capacity
 - forecast traffic generation and likely impacts on the road network within the study area
 - recommendations for additional car parking; and
- » Provide recommendations regarding additional traffic activity (if any).

The location plan is shown as follows:

Figure 1 Location Plan





2. Existing Site Conditions

2.1 Existing Road Network

The road network within the vicinity of Heathcote Study area are described as follows:

2.1.1 Canning Beach Rd

Canning Beach Road is classified as a Local Distributor Road in the Perth Metropolitan Area Functional Road Hierarchy.

Canning Beach Road is a single carriageway road and connects Duncraig Road and the Canning Highway. The traffic signals controlled intersection with Canning Highway provides left out, right in and left in only.

There is a roundabout located at the intersection of Canning Beach Road and Duncraig Road.

The road provides access to the South Perth Yacht Club.

Adjacent land use is predominantly residential to the west and recreational and riverside to the east, Raffles Hotel and high-rise unit development.

Road widths are identified as follows:

Canning Beach Road (Duncraig Rd to Flanagan Rd) 2 x 3m lanes with 1.2m and 1.4m shoulder. Parking embayment on east side. 1.7m footpath on west side.

Canning Beach Road (Bend south of Flanagan Rd to Dunvegan Rd), 3.3m wide northbound lane and 3.5m wide southbound lane, 1.4m and 1.2m shoulder. Parking embayment on east side. 1.4m footpath on west side.

Canning Beach Road south of Killian Road. Parking embayment east side. Cross section as above.

Canning Beach Road south of Riverway. 2 x 3.7m traffic lanes and 1.5m shoulders. Parking embayment east side. 2.5m footpath west side.

Canning Beach Road south of Moreau Me. 2 x 3.6m traffic lanes and 1.5m shoulders. Footpath continues into Moreau Mews on the north side. Parking embayment east side.

A shared path runs between Canning Beach Road and the river, throughout its length between foreshore to the north of the Yacht Club and Canning Highway to the south.

2.1.2 Duncraig Road

Duncraig Road is classified as an Access Road in the Perth Metropolitan Area Functional Road Hierarchy.

Duncraig Road is a single carriageway road 7.5m wide and connects Canning Beach Road to the east and Garloch Road and Tweedle Road to the west. The eastern and western intersections are roundabout controlled.

Duncraig Road runs east- west and provides direct access to the Heathcote area.

Adjacent land use is predominantly residential.



The footpath on the north side is 2.2m wide.

2.1.3 Strome Rd

Strome Road is classified as an Access Road in the Perth Metropolitan Area Functional Road Hierarchy.

Strome Road is a single carriageway road 6.4m wide and connects Duncraig Road to the north and Tweeddale Road to the south.

Strome Road runs north- south and provides direct access to the Heathcote area.

Adjacent land use is predominantly residential.

There is no footpath.

2.1.4 Carron Road

Carron Road is classified as an Access Road in the Perth Metropolitan Area Functional Road Hierarchy.

Carron Road is a single carriageway road 6.2m wide and connects Duncraig Road to the north and Tweeddale Road to the south.

Carron Road runs north- south and provides direct access to the Heathcote area.

Adjacent land use is predominantly residential.

There is no footpath.

2.2 Traffic Volumes

2.2.1 Automatic Traffic Counts

Automatic traffic counters were installed in November 2007 for one week to identify existing traffic volumes on the surrounding road network. The locations are as follows:

- » Canning Beach Rd between Duncraig and Flanagan Rds;
- » Duncraig Rd between Carron and Canning Beach Rds;
- » Duncraig Road Between Inverie Cl and Strome Rd;
- » Duncraig Rd between Nisbett Rd and Inverie Close;
- » Strome Rd between Dunvegan Rd and Duncraig Rd;
- » Carron Rd between Flanagan Rd and Duncraig Rd;
- » and the entrance to the Heathcote upper car park.

The daily volumes are identified in Table 3.3 and the average daily volumes are plotted on Figure 2 below.

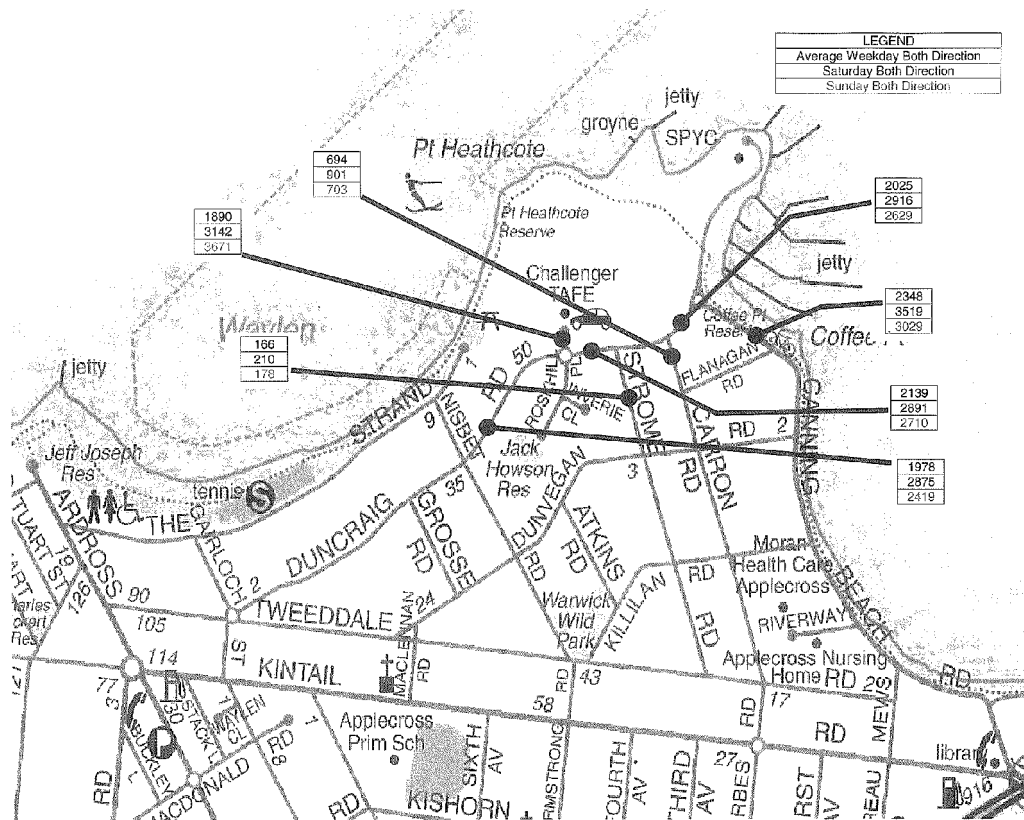


Figure 2 Daily Traffic Volumes (14 November to 22 November 2007)

2.2.2 Peak Hour Turning Counts

Peak hour turning counts were undertaken at the following locations between 11am - 1 pm and 4-6pm Sunday 2 December 2007:

- » Canning Beach Rd/DunCraig Rd,
- » Carron Rd/DunCraig Rd,
- » Strome Rd/DunCraig Rd,
- » Heathcote access/DunCraig Rd,
- » Nisbet/DunCraig.

The results are summarised in Appendix B.

No traffic or safety issues were observed at the time of the survey.

2.2.3 Shared Path Volumes

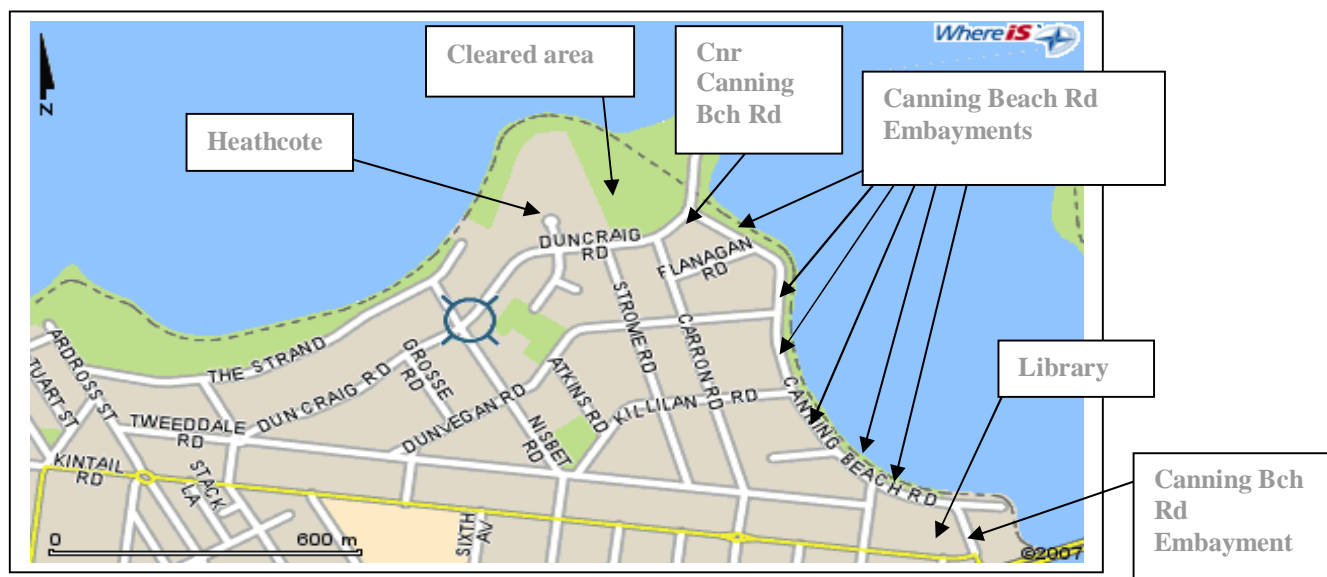
The Department for Planning and Infrastructure have provided data for the shared path to the west of the area. The location is Alfred Cove near Cunningham Street. Details are shown in Appendix A.

The total cyclists monitored on Sunday 6 May from 0730 to 1030 were 413 and 96 pedestrians. No data is available for the path adjacent to Canning Beach Road.

2.3 Parking Survey

Parking surveys were undertaken on Saturday 24 November 2007 and Sunday 25 November 2007 of the parking areas identified on Figure 3 and are summarised as follows:

Figure 3 Parking Survey Locations



The full results of the parking surveys undertaken on the weekend of 24/25 November 2007 are included in Appendix A.

The following tables summarise the observed parking demand at peak times at locations within close proximity to Heathcote.

Table 2.1 Summary of Parking Demand – Heathcote Complex

Location	Capacity	Sat 12.30-1pm	Sat 4.30-5pm	Sat 9.30-10pm	Sun 12.30-1pm	Sun 4.30-5pm
Heathcote West	44	42	44	26	54	36
Heathcote East (including grass marked bays area)	110 (52)	48	33	62	114	38
Heathcote Inside	14	23	16	23	28	25
Total	168 (100%)	113 (67%)	93 (55%)	111 (66%)	196 (116%)	99 (59%)



The above table indicates a capacity of around 168 parking bays at the Heathcote Centre and a peak demand recorded on Sunday between 12.30pm and 1pm of 196.

There would appear to be a shortfall of available car parking bays in the order of 30 at peak times.

Table 2.2 Summary of Parking Demand – Canning Beach Road (Dun Craig to just south of Killian Road)

Location	Capacity	Sat 12.30-1pm	Sat 4.30-5pm	Sat 9.30-10pm	Sun 12.30-1pm	Sun 4.30-5pm
Canning Beach Road	59 (100%)	26 (44%)	28 (47%)	10 (17%)	18 (31%)	15 (25%)

The above table indicates a capacity of around 59 parking bays in Canning Beach Road between Dun Craig Road and just south of Killian Road and a peak demand recorded on Saturday between 4.30pm and 5pm of 28, leaving around 31 spaces available.

Based on observations, capacity of the parking areas in Canning Beach Road was not exceeded.

Table 2.3 Summary of Parking Demand – Cleared area north side of Dun Craig Road

Location	Capacity	Sat 12.30-1pm	Sat 4.30-5pm	Sat 9.30-10pm	Sun 12.30-1pm	Sun 4.30-5pm
Dun Craig Road (Cleared area north side)	36 (approx)	36 (100%)	36 (100%)	19 (53%)	30 (83%)	29 (81%)

The above table indicates a capacity of around 36 parking bays in the cleared area on the north side of Dun Craig Road and a peak demand recorded on Saturday between 12.30pm and 1pm and 4.30pm and 5pm of 36.

The available space within this area is often fully utilised, therefore approximately 36 cars will be displaced if this is developed for passive recreation and/or other purposes.

Table 2.4 Summary of Parking Demand – Corner of Canning Beach Road/Dun Craig Road/Carron Road

Location	Capacity	Sat 12.30-1pm	Sat 4.30-5pm	Sat 9.30-10pm	Sun 12.30-1pm	Sun 4.30-5pm
Corner of Canning Beach Road/Dun Craig Road/Carron Road. Verge area	46 (approx)	39 (85%)	46 (100%)	6 (13%)	23 (50%)	21 (46%)



The above table indicates a capacity of around 46 parking bays in the vacant area on the corner of Canning Beach Road/Duncraig Road and Carron Road and a peak demand recorded on Saturday between 4.30pm and 5pm of 46.

Following redevelopment of this area up to 46 vehicles will be displaced.

The following table considers the overall availability and demand in the vicinity of Heathcote.

Table 2.5 Summary of Overall Parking Demand

Location	Capacity	Sat 12.30- 1pm	Sat 4.30- 5pm	Sat 9.30- 10pm	Sun 12.30- 1pm	Sun 4.30- 5pm
Heathcote West	44	42	44	26	54	36
Heathcote East (including grass area)	110 (52 marked bays)	48	33	62	114	38
Heathcote Inside	14	23	16	23	28	25
Canning Beach Road	59	26	28	10	18	15
Duncraig Road (Cleared area north side)	36 (approx)	36 (100%)	36 (100%)	19 (53%)	30 (83%)	29 (81%)
Corner of Canning Beach Road/Duncraig Road/Carron Road. Verge area	46 (approx)	39 (85%)	46 (100%)	6 (13%)	23 (50%)	21 (46%)
Total	227 (Excluding temporary areas)	214	203	146	267	164

The above table indicates a shortfall of 40 spaces in the surrounding parking facilities at peak times on a Sunday assuming the cleared parking area in Duncraig Road and the verges are not available.

Further observations were undertaken on Saturday 8 December with similar results to the above. Parking within the South Perth Yacht Club was almost at capacity.

Observations undertaken on Monday 10 December (3.30pm) indicated the following:



Table 2.5 Summary of Parking Demand Monday 10 December 2007

Location	Capacity	Mon 10 December 3.30pm
Heathcote West	44	15
Heathcote East (including grass area)	110 (52 marked bays)	25
Heathcote Inside	14	13
Canning Beach Road	59	16
Dun Craig Road (Cleared area north side)	36 (approx)	3
Corner of Canning Beach Road/Dun Craig Road/Carron Road. Verge area	46 (approx)	0
Total	227 (Excluding temporary areas)	72

The above table indicates adequate capacity during the survey period.

2.4 Car Parking in Adjacent Streets

During the weekend surveys observations were made of car parking in adjacent streets in close proximity to Heathcote. Limited on-street car parking was observed. The highest number of cars parked at any one time was 5, in Flanagan Road near Canning Beach Road on Saturday at 4.30pm. Two cars were observed parking on the verge in Dun Craig Road near Heathcote on Sunday at 12.30pm.

On Saturday 8 December up to 10 cars were observed to be parked in Strome Road.

Observations undertaken during Monday 10 December (3.30pm) indicate:

- » 16 cars parked in Carron Road
- » 4 cars parked in Tweeddale Road east of Strome Road
- » and 4 cars parked in Flanagan Road

Limited parking was observed elsewhere.



2.5 Observations at other Regional Parks

Observations were carried out in November 2005 at other Regional Park facilities and the results are included here to gauge use at similar facilities.

2.5.1 Recorded Traffic Generation at Canning Regional Park (Off Kent Street Cannington) - Saturday 26 November and Sunday 27 November 2005

Automatic traffic counters were installed at the main access points to the Canning Regional Park for a weekend period and the traffic generation is summarised as follows.

The daily traffic generation was 158vpd on a Saturday and 282vpd on a Sunday.

2.5.2 Observation of Cars Parked at other Parks

Table 2.6 Car Parking Observations

Location	Date	Time	Cars Parked
Canning Regional Park (Kent Street Cannington)	Saturday 19 November 2005	2pm	11
	Sunday 27 November 2005	11.15am	17
Riverton Jetty Park Wilson	Saturday 19 November 2005	2.40pm	20
Deep Water Point, The Esplanade, Mt Pleasant	Saturday 19 November 2005	3.10pm	57 cars + 30 cars with boat trailers



3. Proposed Development

3.1 Forecast Traffic

It is understood that the community expectation is that the lower land be used for passive recreational purposes, such as a picnic area, bbq etc. The following is based on this assumption in line with discussions with the City of Melville.

3.1.1 Traffic Generation

In view of the likely low impact nature of the lower land potential, traffic generation has been based on that observed at the Canning Regional Park, which is also low impact.

The following table indicates the likely traffic generation based on a survey at the Canning Regional Park. The survey was undertaken at the main access to the Park and would account for most of the associated activity. Observations at other access locations indicate negligible activity.

Table 3.1 Traffic Generation Based on Survey at Canning Regional Park (Sunday)

	Two Way (Vpd)	One Way (Vpd)	One Way (Vpd)
Traffic Generation	282	141	141

3.1.2 Traffic Distribution

The following table indicates the assumed traffic distribution to and from a new recreational area based on existing traffic volumes on these roads and the traffic generation outlined above.

Table 3.2 Assumed Traffic Distribution

Origin/Destination	%	Vpd
Canning Beach Road	48%	135
Carron Road	11%	32
Strome Road	3%	8
Duncraig Road to/from the west	38%	107
	100%	282

3.1.3 Forecast Traffic Volumes on Existing Streets

The following table compares the existing and proposed traffic volumes with those recommended in the 'Liveable Neighbourhoods' document. Assumed distribution based on Table 3.2 has been used to establish likely traffic volumes on the surrounding streets.

The Liveable Neighbourhoods document has been used because it relates to current planning policy by the WA Planning Commission and provides industry recognised indicative traffic volumes for residential areas.

The impacts of the additional traffic are shown in Table 3.3.



Table 3.3 Traffic Volumes Compared with Liveable Neighbourhoods

Road	Location	Existing Weekday Traffic Volume (a)	Classification (b)	Indicative Maximum Volume (vpd) (c)	Indicative Additional Traffic Volume
Canning Beach Road	between Duncraig and Flanagan Rds;	2348 (W) 3519 (Sat) 3029 (Sun)	Neighbourhood Connector	3000-7000	+135
Duncraig Road	between Carron and Canning Beach Rds;	2025 (Wk) 2916 (Sat) 2629 (Sun)	Access Street	3000	+135
Duncraig Road	between Inverie Cl and Strome Rd;	2139 (Wk) 2891 (Sat) 2710 (Sun)	Access Street	3000	+107
Duncraig Road	between Nisbett Rd and Inverie Close;	1978 (Wk) 2875 (Sat) 2419 (Sun)	Access Street	3000	+107
Strome Rd	between Dunvegan Rd and Duncraig Rd;	166 (Wk) 210 (Sat) 178 (Sun)	Access Street	1000	+8
Carron Rd	between Flanagan Rd and Duncraig Rd;	694 (Wk) 901 (Sat) 703 (Sun)	Access Street	1000	+32

- a. This is the existing recorded average weekday traffic volumes
- b. The road classification is the street type and function eg Access Streets suit a range of typical conditions in predominantly residential areas.
- c. The indicative maximum volume is the maximum daily traffic volume for the class of road and takes into account operating conditions and safety. (Based on the Liveable Neighbourhoods Document)



The above table indicates there are currently no capacity issues and it would appear no capacity issues are indicated following implementation of a passive recreational area. All roads are forecast to carry traffic volumes less than the maximum recommended in Liveable Neighbourhoods.

The above forecast traffic volumes would indicate limited or no impact to the adjacent road network as the current daily variation would be greater than the forecast additional traffic.

3.2 Forecast Parking Demand

Based on observations at other parks a demand of 20 to 30 cars could be expected at any given time to be attracted to a passive recreation area. Additionally the overspill from the existing areas that will no longer be available following development would result in a further 40 cars being displaced. A car park to accommodate approximately 70 cars is therefore likely to be required to minimise overspill into surrounding residential streets.

In view of the occasional special events (i.e. the 'Sky Show', South Perth Yacht Club Functions) it would be desirable to allow for overspill parking on designated grassed or informal areas within the new recreational area. This could be gated at all times other than when it is permitted to use the area. It would not be possible to design an area to cater for the peak Sky Show demand however an area capable of supporting 50-100 cars is suggested.

3.2.1 Tourist Bus Access

In view of the likelihood of tour buses/event buses accessing this area, the provision of a bus embayment could be incorporated into the area. Use of the existing parking embayment in Canning Beach Road would be preferable due to the size required to accommodate a bus.

3.2.2 South Perth Yacht Club

A meeting was held with the General Manager and past Commodore of the South Perth Yacht Club on 6 December 2007 and the following comments were made in relation to car parking and traffic:

- There are regular functions at the Yacht Club at the weekends and which require parking to be accommodated outside the premises, attendance could be 800-1000 people on occasions.
- There are 2600 members, there could be 5-600 people attending member events including members, crew, partners guests etc.
- There are times when member events and other events coincide.
- It was mentioned that non-members usually park outside.
- Access to the site is controlled by a barrier.
- Informal areas are currently used outside for overspill car parking and these areas will be lost when developed. The car parking embayments in Canning Beach Road are often full at peak times, this is also influenced by parking associated with the Raffles Development on Canning Beach Road.
- The need for additional parking is recognised by the Yacht Club and previous discussion has been held with the City of Melville regarding a joint solution. There is a suggestion for a multi storey car park, which straddles the Yacht Club and City of Melville land with access for both



Yacht Club users and the general public. The option of 3 levels with around 70 cars per level was mentioned. No agreements or funding arrangements are in place at this stage.

- The site where the multi storey could possibly be located is currently used for storage of boats, in the interim these boats will be relocated and the area used for car parking. The area could possibly accommodate approximately 50-70 cars.
- The current capacity is around 240 bays.
- The Masterplan includes the area to the northwest corner of the site to be used for cars and boats.
- Car parking security has been raised as an issue when parking outside of the Club. Security Guards are employed.
- There is a demand for cyclists, pedestrians and canoeists along the shared path.
- The provision of bike racks, showers and toilet facilities could be considered as part of the multi storey car park.
- There are around 5-6 delivery vehicles accessing the site every day.
- Buses also drop off patrons at times.

3.2.3 Heathcote Centre – Blue Water Grill (Leanne Taylor -Administration Manager)

Regular complaints are received about a lack of parking at busy times. The restaurant has two function rooms with a total demand of 250 people and this could occur twice a day during busy times. There are competing needs with the Adventure Playground and recreational area. Quite often parking is an issue at weekends and it was suggested that a further 50-100 bays are required.

3.2.4 Challenger TAFE (Kay Heron – Manager)

- Regular parking problems caused by illegal or indiscriminate parking which results in cars or access being blocked.
- Policing needs to be increased to control parking.
- Generally there is adequate parking below.
- Designated bays could be increased.
- Recent lighting has improved security in the main car park.
- The peak times for parking are at night, at weekends and during holiday periods.
- Overflow parking could be provided together with improved policing.
- Delivery vehicles associated with the restaurant vehicles often block cars.
- A number of cars are parked on-street during the day in Carron Road and Duncraig Road. Those parked in Carron would appear to be commuters and cause congestion at peak times.
- A number of tradesmen park in Duncraig Road.
- The proposed rail station could exacerbate on-street car parking due to commuter demand.



3.3 Turning Proportions from Duncraig Road

The following table indicates the observed turning proportions from Duncraig Road into the side roads over the 4 hour survey period on Sunday 2 December 2007;

From Duncraig Road	Canning Beach Road	Carron Road	Strome Road	Nisbet Road
Eastbound to	76%	12%	4%	7%
Westbound to	-	11%	2%	9%

The above table indicates that Canning Beach Road is the predominant access to/from the area.

The following table indicates the observed turning proportions from Heathcote into Duncraig Road over the 4 hour survey period;

From Heathcote	Eastbound to Duncraig Road	Westbound to Duncraig Road
	67%	31%

To Heathcote	From east on Duncraig Road	From west on Duncraig Road
	77%	23%

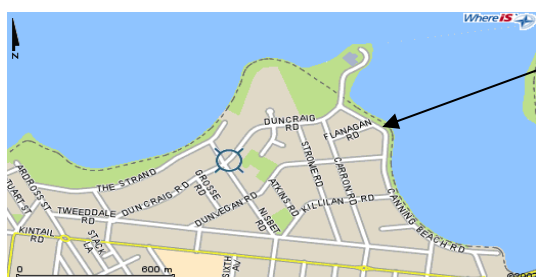
The above proportions indicate that predominant access to and from the Heathcote complex is via Duncraig Road to the east and via Canning Beach Road.

3.4 Traffic Management

As discussed previously the likely additional traffic generated by a passive recreation area is unlikely to impact on the capacity of the road network or adversely affect traffic management or safety.

Access to a new car parking area could be achieved via the existing roundabout at Canning Beach Road/Duncraig Road or off Duncraig Road. If access is gained via the roundabout this will encourage the use of Canning Beach Road and Duncraig Road for access.

It is noted that a chevron sign is required on Canning Beach Road on the bend near Flanagan Road for southbound traffic to improve delineation of the bend.



Chevron required



4. Conclusions

Following the site investigation and traffic and parking surveys the following conclusions are drawn:

Surveys indicate a capacity of around 168 parking bays at the Heathcote Centre (including the lower grassed area) and a peak demand recorded on Sunday between 12.30pm and 1pm of 196.

There would appear to be a shortfall of available car parking bays at the Heathcote Complex on a weekend in the order of 30 at peak times.

Surveys indicate a capacity of around 59 parking bays in Canning Beach Road between Duncraig Road and just south of Killian Road and a peak demand recorded on Saturday between 4.30pm and 5pm of 28, leaving around 31 spaces available.

Based on weekend observations, capacity of the parking areas in Canning Beach Road was not exceeded although it is understood that these bays are fully utilised at times.

Surveys indicate a capacity of around 36 parking bays in the cleared area on the north side of Duncraig Road and a peak demand recorded on Saturday between 12.30pm and 1pm and 4.30pm and 5pm of 36.

Observations in surrounding streets indicated little on street parking at peak times, however when events coincide at Heathcote, South Perth Yacht Club and Raffles additional on-street parking is likely to occur. There are a number of 2 hour and No Parking restrictions in the surrounding streets.

The peak weekday parking demand in the surrounding streets would appear to occur in Carron Road with around 16 vehicles parked, these would appear to be commuters.

The available space within the cleared area on the north side of Duncraig Road area is often fully utilised at weekends, therefore around 36 cars will be displaced if this is developed for passive recreation.

Surveys indicate a capacity of around 46 parking bays in the vacant area on the corner of Canning Beach Road/Duncraig Road and Carron Road and a peak demand recorded on Saturday between 4.30pm and 5pm of 46.

Following redevelopment of this corner lot up to 46 vehicles will be displaced at weekends.

Surveys indicate a shortfall of 40 spaces in the surrounding parking facilities at peak times on a Sunday, excluding the temporary parking areas, however this could be significantly higher based on discussion with the Yacht Club when events coincide.

There is a requirement to accommodate buses serving the functions at the Yacht Club.

Based on observations at other parks the forecast traffic generated by a passive recreational area is estimated to be in the order of 282vpd.

Analysis indicates there are no capacity issues currently or indicated following implementation of a passive recreational area. All roads are forecast to carry traffic volumes less than the maximum recommended in Liveable Neighbourhoods. During the turning movement surveys no capacity or safety issues were observed.

Based on observations at other parks a demand of 20 to 30 cars at peak times could be expected to be attracted to a passive recreation area. The overspill parking from the existing areas that will no longer be available following development would result in a further 40 cars. A car park to accommodate around 70



cars is therefore likely to be required to minimise overspill into surrounding residential streets based on observation. However when events coincide at the Yacht Club this demand for car parking is likely to be higher.

In view of the occasional special events (i.e. the Sky Show, Yacht Club Functions) it would be desirable to allow for further overspill parking on designated grassed or informal areas within the new recreational area. This could be gated at all times other than when it is permitted to use the area. It would not be possible to design an area to cater for the peak Sky Show demand however an area capable of supporting 50-100 cars is suggested.

Following discussion with the South Perth Yacht Club regarding the possibility of a combined multi storey car park to serve both the Yacht Club and other users it is considered that this proposal should be further investigated. The advantage of this proposal is that traffic movements and parking will be contained and focussed at the destination and will address overspill parking into the surrounding area. This type of facility could also be monitored by security cameras, improving car security in the area.

A multi storey car park in the proposed location could potentially require the existing shared path to be relocated.

Access to a new car parking area could be achieved via the existing roundabout at Canning Beach Road/Duncraig Road or off Duncraig Road. If access is gained via the roundabout this will encourage the use of Canning Beach Road and Duncraig Road for access and deter access via the residential streets.

Predominant access to the area is via Canning Beach Road.

Delineation of the bend in Canning Beach Road could be improved by the provision of a chevron sign.

The provision of a bus embayment for a tour bus would be desirable and could possibly utilise an embayment in Canning Beach Road.

The on-street parking situation and restrictions should be reviewed as part of the proposed rail station at Canning Bridge and likely commuter demand.



Appendix A
Parking Survey Results

Saturday 24 November 2007 and Sunday 25 November 2007



Location		Capacity	Saturday 24 November 2007 (12.30 -1pm)	Saturday 24 November 2007 (4.30- 5pm)	Saturday 24 November 2007 (9.30pm)	Sunday 25 November 2007 (12.30- 1pm)	Sunday 25 November 2007 (4.30- 5pm)
Heathcote West	A	44	42	44	27	54	36
Heathcote East	A	50 + grassed area	48	33	62	114	38
Heathcote Inside Complex	A	14	23	16	23	28	25
North of Dun Craig Rd, Cleared area	B		36	36	19	30	29
Corner of Canning Beach Rd/Dun Craig Rd/ Carron Rd	K		39	46	6	23	21
Canning Beach Rd (Dun Craig Rd to Flanagan Rd)	C	20	19	20	3	13	11
Canning Beach Road (Flanagan Rd to Dunvegan Rd)	D	27	2	4	3	1	0
Canning Beach Road (Dunvegan Rd to Killian Rd)	E	5	2	1	1	1	1
Canning Beach Road (South of	F	7	3	3	3	3	3



Location	Capacity	Saturday 24 November 2007 (12.30 -1pm)	Saturday 24 November 2007 (4.30- 5pm)	Saturday 24 November 2007 (9.30pm)	Sunday 25 November 2007 (12.30- 1pm)	Sunday 25 November 2007 (4.30- 5pm)
Killian Rd)						
Canning Beach Rd (South of Riverway)	G 20	4	3	20	3	3
Canning Beach Road (South of Moreau Me)	H 11	6	12	12	12	10
Canning Beach Road (Library Car Park)	I 33	18	26	36	16	36
Canning Beach Rd Parking Station No 3	I 29	2	13	32	21	29
Canning Beach Road (adjacent to Raffles)	J 9	2	8	9	6	9



Appendix B
Peak Hour Turning Movements

Sunday 2 December 2007

Duncraig Road/ Heathcote Access

Duncraig Road/ Nisbet Road

Duncraig Road/Strome Road

Canning Beach Road/Duncraig Road

Duncraig Road/Carron Road



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Document Status

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