



Christian Brothers College – Junior Campus

School Travel Safety Review – Draft Report

City of Adelaide

CLC003491
12 July 2024
Ref: 240706



Document History and Status

Rev	Description	Author	Reviewed	Approved	Date
A	Draft Report	Eli Alabaster	John Devney	John Devney	12 July 2024

DRAFT



Contents

Project: Christian Brothers College – Junior Campus | School Travel Safety Review – Draft Report
Client: City of Adelaide
Ref: 240706

Executive Summary	i
Overview	i
Key Findings	i
Key Recommendations	i
Abbreviations	iii
Glossary of Terms	iii
1 Introduction	1
1.1 Background	1
1.2 Study Purpose and Scope	1
1.3 School Location	2
2 Existing Conditions	3
2.1 School Operations	3
2.2 Student Enrolment Analysis	3
2.3 Student Travel Demand	5
2.4 Transport Access	7
3 Issues and Opportunities	14
3.1 Stakeholder Discussions	14
3.2 Site Observations	14
3.3 Summary of the Issues and Opportunities	16
4 Travel Safety Options and Assessment	17
4.1 Student Travel Safety Options	17
4.2 Recommended School Travel Safety Initiatives	19
4.3 Assessment and Indicative Cost Estimates	22
5 References	23



Tables

Table 2.1 Student Transport Mode Shares by Year Group in June 2024.....	6
Table 2.2 Local Streets at the CBC Junior Campus.....	7
Table 2.3 Local Road Network Attributes at the CBC Junior Campus	7
Table 2.4 Local Road Network Attributes at the CBC Junior Campus	7
Table 2.5 Parking Types at Adelaide High School	9
Table 4.1 School Travel Safety Options for the CBC Junior Campus.....	17
Table 4.2 Options to Improve Pedestrian Crossing Safety in Wakefield Street.....	20
Table 4.3 Indicative Cost Estimates for the Travel Safety Options at the CBC Junior Campus	22

Figures

Figure 1.1 Christian Brothers College Junior Campus Location	2
Figure 1.2 Entrances to the CBC Junior Campus	2
Figure 2.1 CBC Junior Campus Student Residence Location Analysis	4
Figure 2.2 CBC Junior Campus Student Residence Area Analysis	4
Figure 2.3 CBC Junior Campus R to Year 3 Students Transport Mode Shares in June 2024	5
Figure 2.4 CBC Junior Campus Years 4-6 Students Transport Mode Shares in June 2024	6
Figure 2.5 Koala Pedestrian Crossing and 25 km/h School Zone in East Terrace	8
Figure 2.6 Crashes from 2018 to 2022 near the CBC Junior Campus.....	8
Figure 2.7 On-street Parking and Kiss and Drop Areas for the CBC Junior Campus.....	9
Figure 2.8 Timed Parking Spaces at the CBC Junior Campus.....	10
Figure 2.9 CBC Junior Campus Parking Brochure Map.....	10
Figure 2.10 Public Transport Services to the CBC Junior Campus	11
Figure 2.11 Cycling Network to the CBC Junior Campus	12
Figure 2.12 Walkable Access Catchment to the CBC Junior Campus	13
Figure 3.1 AM Peak Conditions at the CBC Junior Campus	15
Figure 3.2 PM Peak Conditions at the CBC Junior Campus	15
Figure 4.1 Recommended Initiatives at the CBC Junior Campus	19
Figure 4.2 Alternative School Precinct Warning Signage	21

Appendices

Appendix A – Student Travel Survey Form

Appendix B – CBC Junior Campus Parking Information

Appendix C – School Travel Access Guide in NSW



Executive Summary

Overview

The Christian Brothers College (CBC) Junior Campus is a private school located in Wakefield Street between Hutt Street and East Terrace. The college has classes from Reception to Year 6 with an enrolment of 266 students in Term 2 2024 with 118 students in Reception to Year 3 and 148 students in Years 4 to 6.

Key Findings

The CBC Junior Campus does not have an enrolment restriction area and students live in wide range of locations in Greater Adelaide. However, most students reside in inner east or north-west Adelaide suburbs.

The student travel surveys that were conducted in June 2024 showed the following:

- The AM and PM periods are not significantly between different travel modes indicating that students travel to and from school using the same transport modes.
- The primary travel mode is private vehicle, with 93 per cent of children being driven to and from school attending Reception to Year 3 and only five per cent by bus. This car mode share decreases to over 82 per cent in the older students in Years 4-6. The parents of the younger students mostly dropped off and picked up their children by private vehicle.
- Over 82 per cent of students in Years 4 to 6 were driven to school. 14 per cent of the students in Years 4 to 6 travelled by bus in the AM period and 13 per cent in the PM period.
- Less than two per cent of the students travelled by train or tram.
- The bicycle and walking mode share is less than two per cent which indicates a very low interest in travelling by active transport modes.

From the discussions with the school and the site observations, the following student travel safety issues were identified:

- Travel across Wakefield Street is limited to the signalised crossing at the Hutt Street
- Several near misses have been observed at the koala crossing in East Terrace with drivers not stopping.
- Heavy vehicles short-cut from Wakefield Street to Bartels Road using East Terrace.
- Vehicles are travelling at speeds on Wakefield Street not typically associated with school zones.
- The no-parking requirements on Wakefield Street and the eastern side of East Terrace between 3 pm and 4 pm was disobeyed by over 20 vehicles during the 30-minute period of pick-up time.
 - If the parking controls were followed by drivers in East Terrace, the parking supply would not be sufficient for overall pick up activities.
- A dedicated Kiss and Drop (15-minute zone) in Wakefield Street with parallel (not angle) parking.
- The bicycle lanes in Wakefield Street are a hazard for motorist's parking and reversing out.

Key Recommendations

Infrastructure Treatments

- Reinvestigate the inclusion of a signalised pedestrian crossing (PAC) east of Wakefield Street in East Terrace immediately south of the Glover (East) Playspace. It is not proposed in front of the school entrance to avoid the impact of the removal of car parking.
- Install a pedestrian refuge in Wakefield Street between Hutt Street and East Terrace.



Operational Efficiencies

- Change the parking controls on Wakefield Street at the main school entrance to allow for 15-minute Kiss and Drop activities during critical peak school periods.
- Change the parking controls in East Terrace (eastern side) to allow for 15-minute kiss and drop activities during critical peak school periods.
- Consider changing the posted speed in Wakefield Street between Frome Street and East Terrace from 50 km/h to a slower speed limit, such as 40 km/h. This would extend to Frome Street to provide a continuous environment across the Senior and Junior campuses.
- Enforce stricter rules on providing heavy vehicles permit based activity along East Terrace. This could be implemented during peak periods to avoid conflicts with pedestrians.

Safety Promotions

- Install additional signage to promote the school area for traffic approaching the school zones at East Terrace and Wakefield Street.
- Prepare a consolidated travel access guide for students and parents that would be promoted on the school website in location that is easy to find, in addition to the school newsletter.



Abbreviations

Abbreviation	Description
DfE	Department for Education, South Australia
DIT	Department for Infrastructure and Transport, South Australia
PAC	Pedestrian Actuated Crossing with traffic signals

Glossary of Terms

Term	Description
Bicycle lane	On-road kerbside lane allocated for bicycles with pavement markings
Emu crossing	A pedestrian crossing with white road markings, red and white posts and operate only when the children's crossing flags are displayed. They are placed within school zones and a speed limit of 25 km/h applies to drivers when children are present. Drivers must stop for pedestrians using or about to use the crossing.
Kiss and Drop zone	A location designated on the street or on the school grounds for parents and carers in vehicles to drop-off or pick-up students typically with a 2-minute waiting limit. Parents are to stay in the vehicle.
Koala crossing	A pedestrian crossing with white road markings, red and white posts and two yellow alternating flashing lights. They are only operational when the yellow lights are flashing and a speed limit of 25 km/h applies to drivers between signs on the approach to the crossing. Drivers must stop for pedestrians using or about to use the crossing.
Shared path	Off-road pathway for pedestrians and cyclists
Go Zone	A high frequency bus corridor with one or more bus routes with a service headway of every 15 minutes on weekdays and every 30 minutes at other times. Stops and stations within a 'Go Zone' provide a bus, train or tram operating: • every 15 minutes between 7.30 am and 6.30 pm, Monday–Friday • every 30 minutes between 6.30 pm and 10 pm, Monday–Friday • every 30 minutes on Saturday, Sunday and South Australian public holidays.



1 Introduction

This section provides the background for the school travel safety reviews and the study purpose and scope with an overview of the school location.

1.1 Background

The City of Adelaide is conducting School Travel Safety Reviews with the key objectives to:

- Investigate the current speed limits to assess the requirement of reducing the speed to 40km/h or less to help support more vibrant businesses and for a safer urban environment with the provision of higher quality amenity in the residential streets in the City of Adelaide.
- Consider always extending the time periods for the 25 km/h speed limit at and near all schools in the City of Adelaide when children are present and to work with DIT to further understand what responsible safety measures may be added to assist with drop off/pick up of children.

In January 2023, the Council requested the administration to investigate and report by the end of the 2023 school year on the need for and the nature of any additional measures to enhance the safety of primary and secondary, public and private school students entering and leaving schools at the beginning and end of the school day, including the introduction of supervised or unsupervised so called “kiss and drop zones” at all schools in the City of Adelaide.

A School Safety Report was completed for St Aloysius College and presented to the Infrastructure and Public Works Committee held on 19 March 2024. At the Council Meeting on 26 March 2024, Council decided to complete school travel safety reviews for 11 other schools in the City of Adelaide.

1.2 Study Purpose and Scope

The purpose of the work is to develop and document an evidence-based approach using the Safe System approach to address road safety concerns for children, parents and carers, with recommended changes such as safer crossing outcomes and measures to reduce the danger from motorised vehicle movements. The key objectives of the school transport safety reviews are to:

- Review the extents of the existing school speed zones to achieve Safe System speed outcomes, and
- Identify and prioritise opportunities to improve safety outcomes around schools.

The following tasks were completed for this school travel safety review:

- Engage with each school Principal or relevant representative to discuss issues with student travel to and from the school and opportunities to improve school travel safety.
- With the support from the teachers, undertake a student travel mode survey.
- Conduct AM and PM site investigations to observe any unsafe movements, in particular at the Kiss and Drop areas.
- Identify and map the location of the:
 - Existing pick up and drop off areas.
 - Existing school zones and other speed limits, including signs.
 - Existing crossings by type and informal crossing points and pedestrian desire lines.
 - Proposed locations of any measures, such as indicative locations of new crossings, new/changed school zones and of pick-up and drop off areas.
- Document the research and site investigation findings with options and prioritised recommendations for infrastructure projects to improve school travel safety.



1.3 School Location

The Christian Brothers College (CBC) Junior Campus is located in Wakefield Street west of East Terrace and south of Nil Street. The school site and the existing surrounding environs are shown in Figure 1.1.

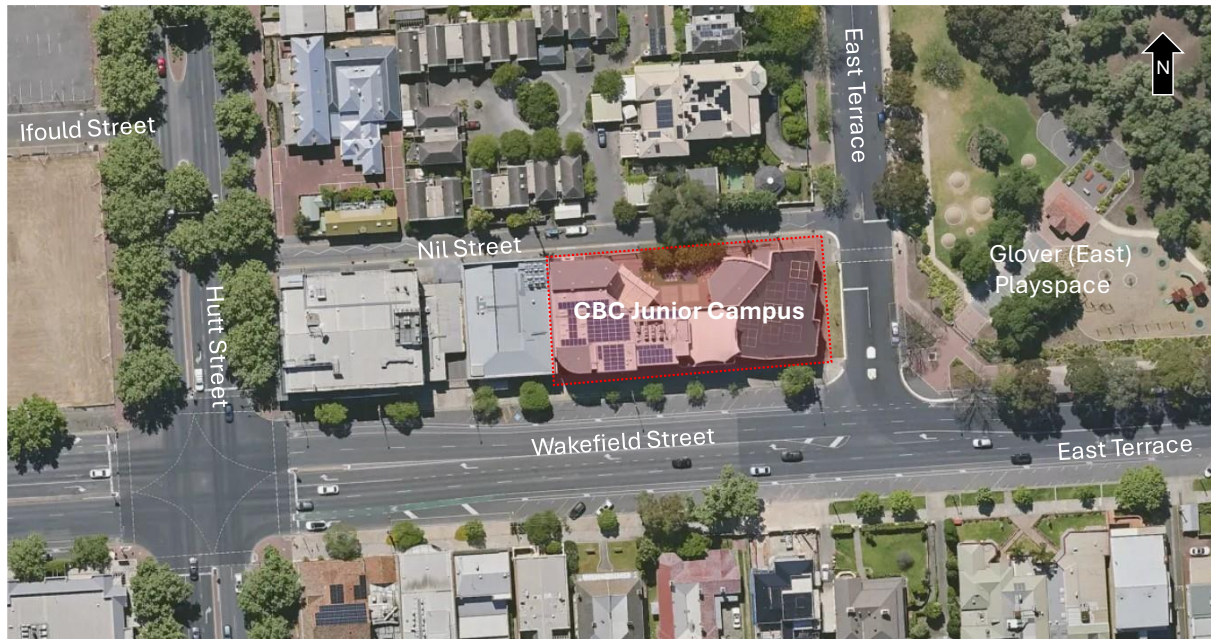


Figure 1.1 Christian Brothers College Junior Campus Location

The CBD Junior Campus has the main student entrance on Wakefield Street and a rear access in Nil Street as shown in Figure 1.2.



Main student entrance on Wakefield Street west of East Terrace



Rear entrance to the school in Nil Street west of East Terrace

Figure 1.2 Entrances to the CBC Junior Campus



2 Existing Conditions

The section provides the analysis of the existing school operations, the student population and travel patterns and an overview of transport access to the school by all transport modes.

2.1 School Operations

The Christian Brothers College (CBC) Junior Campus comprises years R to 6. The school building opens at 8:25 am on school days. The bell times are:

- AM Bell time of 8:48 am for the start of classes at 9:05 am
- PM Bell time of 3:15 pm for all students

The school office hours are:

- Monday to Friday from 8.20 am to 4.00 pm
- Out of School Care school is open at 7:15 am and ends at 6:00 pm

2.2 Student Enrolment Analysis

The school enrolment in Term 2 2024 is for 266 students with a distribution by year as follows:

- 19 students in Year R
- 33 students in Year 1
- 29 students in Year 2
- 37 students in Year 3
- 40 students in Year 4
- 51 students in Year 5
- 57 students in Year 6

By year group, 118 students are in Reception to Year 3 and 148 students are in Years 4 to 6.

The current enrolment is 280 students with a maximum capacity for 310 students. The annual enrolment ranges from 280 to 310 students.

The CBC Junior Campus does not have an enrolment boundary. Students can live anywhere in Greater Adelaide. The number of students by sub areas of suburbs in Adelaide is shown in Figure 2.1.

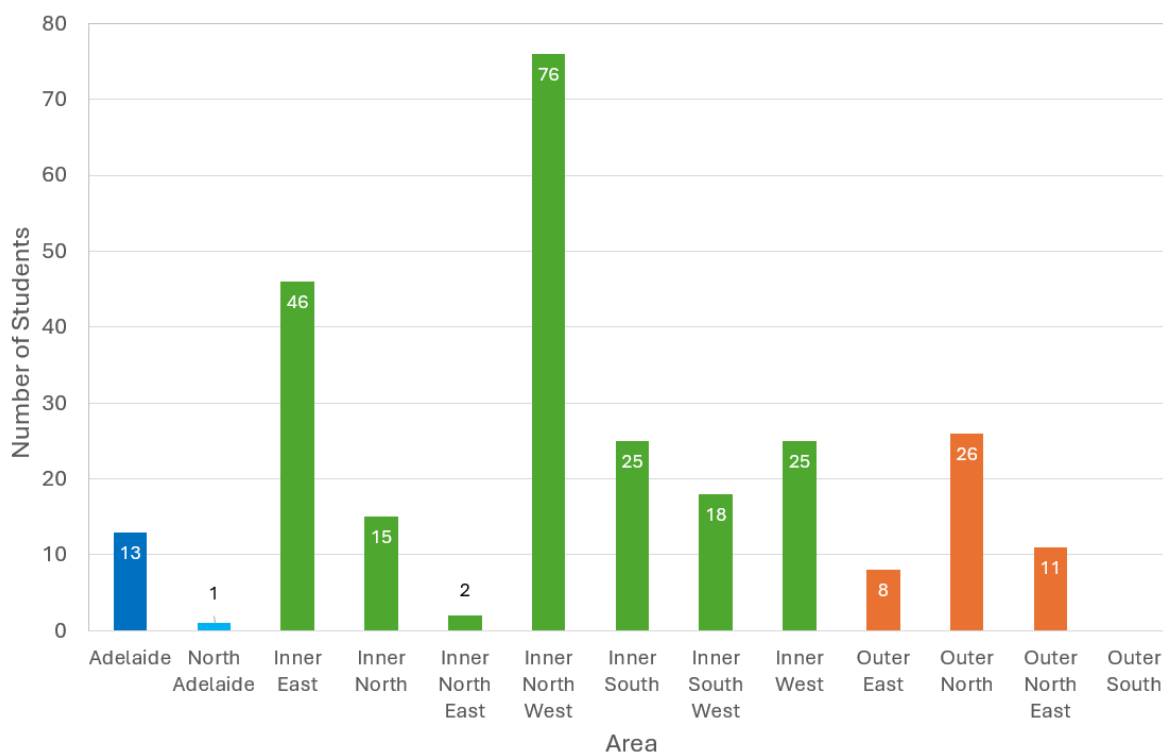


Figure 2.1 CBC Junior Campus Student Residence Location Analysis

The student residence data was used to determine the distribution of the total student population in sub-areas of suburbs in metropolitan Adelaide with the results shown in Figure 2.2. 78 per cent of the students live in the inner suburbs and 17 per cent live in the outer metropolitan suburbs. About five per cent of the students live in the City of Adelaide.

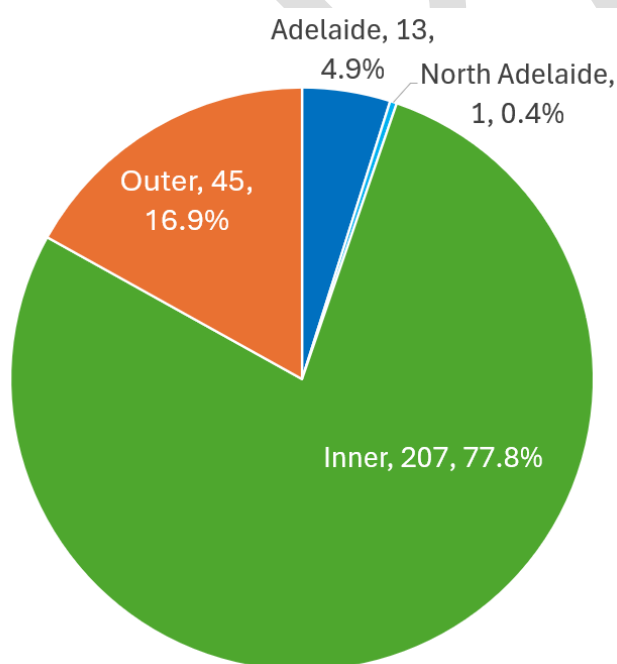


Figure 2.2 CBC Junior Campus Student Residence Area Analysis



2.3 Student Travel Demand

The existing school travel activity to and from the the CBC Junior Campus was reviewed through site observations and a student travel mode survey on typical school days. The student travel mode survey form is included in **Appendix A**.

The student travel mode survey was conducted during the first morning class during the week of Monday June 3rd to Friday June 7th. The findings from the surveys were used to confirm the existing transport mode shares for:

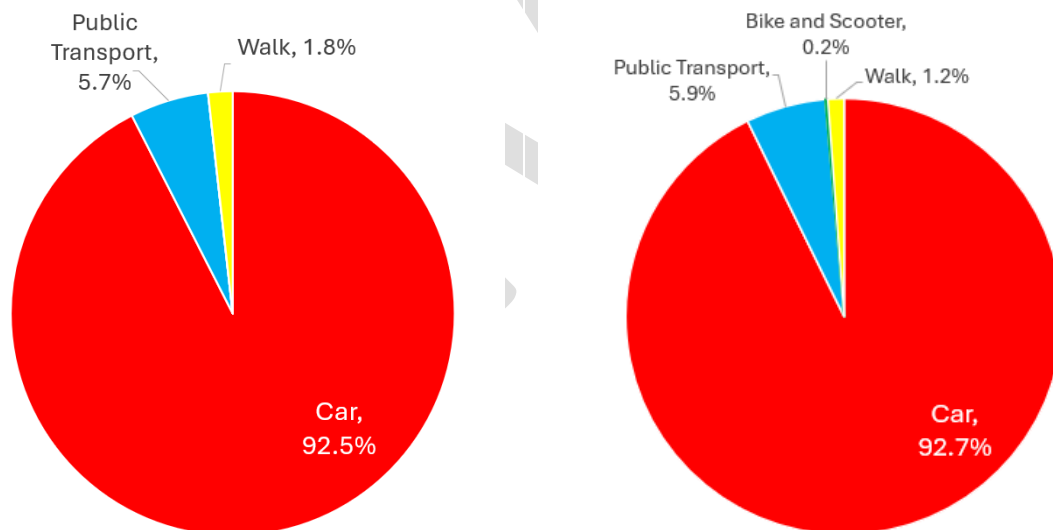
- Car (as passenger with drop-off)
- Walk for the entire trip
- Bus, Train or Tram
- Bicycle or e-bike
- Scooter

A total of 1316 student entries were conducted during the morning session of the school week.

The student travel mode shares to school in the AM period and from school in the PM period are shown for the students in Reception to Year 3 and Years 4 to 6 in Figure 2.3 and Figure 2.4 respectively.

The AM and PM periods are not significantly between different travel modes indicating that students travel to and from school using the same transport modes. The parents of the younger students mostly dropped off and picked up their children by private vehicle.

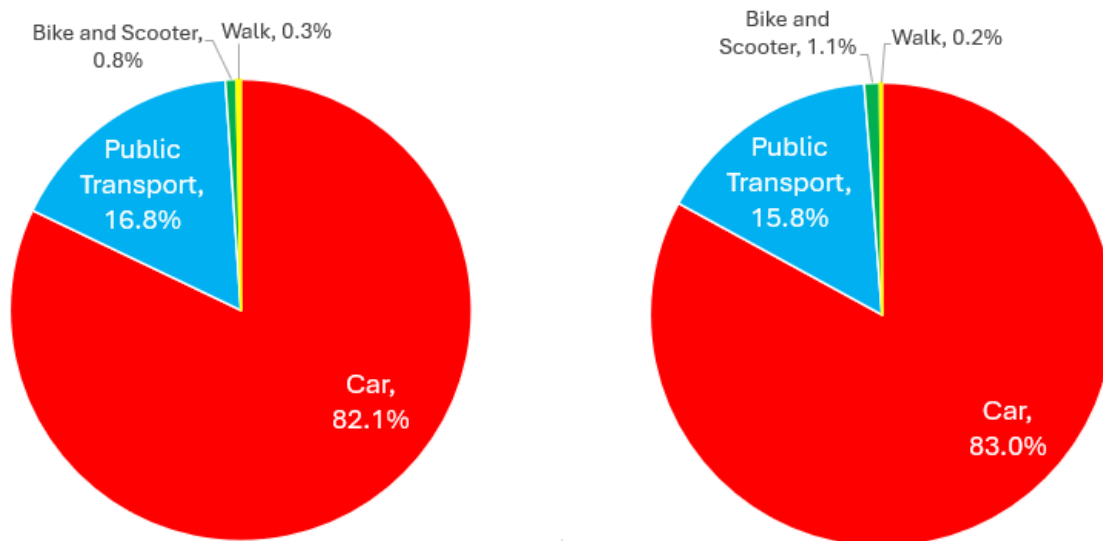
For the students in Reception to Year 3, the primary travel mode is by private vehicle with 93 per cent of children being driven to and from school and only five per cent by bus. This car mode share decreases to over 82 per cent in the older students in Years 4-6.



AM Period Arrival Transport Mode Share

PM Period Departure Transport Mode Share

Figure 2.3 CBC Junior Campus R to Year 3 Students Transport Mode Shares in June 2024



AM Period Arrival Transport Mode Share

PM Period Departure Transport Mode Share

Figure 2.4 CBC Junior Campus Years 4-6 Students Transport Mode Shares in June 2024

A breakdown of the student mode shares by year group for the AM arrivals and PM departures from the survey conducted in June 2024 is provided in Table 2.1. Key insights from the survey results are:

- The students in Reception to Year 3 were mostly driven to school at 93 per cent with about five per cent travelling by bus.
- Over 82 per cent of students in Years 4 to 6 were driven to school. 14 per cent of the students in Years 4 to 6 travelled by bus in the AM period and 13 per cent in the PM period.
- Less than two per cent of the students travelled by train or tram.
- Cycling to school for the boys was very low for all year groups.

Table 2.1 Student Transport Mode Shares by Year Group in June 2024

Transport Mode	AM Arrivals R to 3	AM Arrivals 4 to 6	AM Arrivals Total	PM Departures R to 3	PM Departures 4 to 6	PM Departures Total
Car	92.5%	82.1%	87.3%	92.7%	83.0%	87.8%
Train	0.8%	2.1%	1.5%	1.6%	2.5%	2.0%
Bus	4.7%	14.1%	9.4%	4.3%	12.7%	8.5%
Tram	0.2%	0.6%	0.4%	0.0%	0.6%	0.3%
Bike and Scooter	0.0%	0.8%	0.4%	0.2%	1.1%	0.6%
Walk	1.8%	0.3%	1.0%	1.2%	0.2%	0.7%



2.4 Transport Access

Transport access to the school via road, public transport, cycling and walking and the availability of on-street, on-site and off-site parking is provided in this section.

2.4.1 Road Network

The streets in the local road network at the CBC Junior Campus are provided in Table 2.2. The front entrance and rear entrance to the school are provided on Wakefield Street and Nil Street respectively.

Table 2.2 Local Streets at the CBC Junior Campus

Road	Classification	Relevance to School
Wakefield Street	District	Front entrance, informal Kiss and Drop area
East Terrace	Local	50 m from school, informal Kiss and Drop area
Nil Street	Local	Rear entrance, Kiss and Drop area
Hutt Street	Regional	100 m from school

The attributes of the local road network at the CBC Junior Campus are summarised in Table 2.3. In areas where no data was provided, the field was labelled as not applicable (n/a).

Table 2.3 Local Road Network Attributes at the CBC Junior Campus

Road	Number of Lanes	Daily Traffic Volumes	Posted Speed (km/h)	Average Speed	85 th Percentile Speed
Wakefield Street	4	15,200	50	n/a	n/a
East Terrace	2	21,000	50	n/a	n/a
Nil Street	2	n/a	50	n/a	n/a
Hutt Street	4	9,887	50	38.1	47.5

The surrounding road network does include a 25km/h school zone during AM and PM peak times on East Terrace and Nil Street. An emu crossing is provided at East Terrace, which is heavily utilises for kiss and drop activities and also for excursions across in the parklands. A signalised pedestrian crossing is provided at the Wakefield Street/Hutt Street intersection.

Table 2.4 Local Road Network Attributes at the CBC Junior Campus

Road	25 km/h School Zone in Street	Type of Crossing in Street
Wakefield Street	No	Signalised at Hutt Street/Wakefield Street
East Terrace	Yes	Koala crossing
Nil Street	Yes	N/A
Hutt Street	No	Signalised at Wakefield Street

The CBC Junior Campus has a koala pedestrian crossing in East Terrace north of Wakefield Street that is used for students to safely cross to the Glover (East) Playground and to parents with Kiss and Drop activity in East Terrace. The koala crossing and 25 km/h school zone is shown in Figure 2.5.



Koala pedestrian crossing in East Terrace looking towards Wakefield Street from Nil Street



Koala crossing and the 25 km/h school zone in East Terrace looking north

Figure 2.5 Koala Pedestrian Crossing and 25 km/h School Zone in East Terrace

2.4.2 Crash Analysis

The latest crash data from 2018 to 2022 was sourced from DataSA. Over the five-year period, the crashes that occurred close to the college are:

- Hutt Street / Wakefield Street intersection: 2 minor injury crashes
- Wakefield Street: 2 property damage crashes and 2 minor injury crashes

The location of the crash statistics in the vicinity of the school are shown in Figure 2.6.

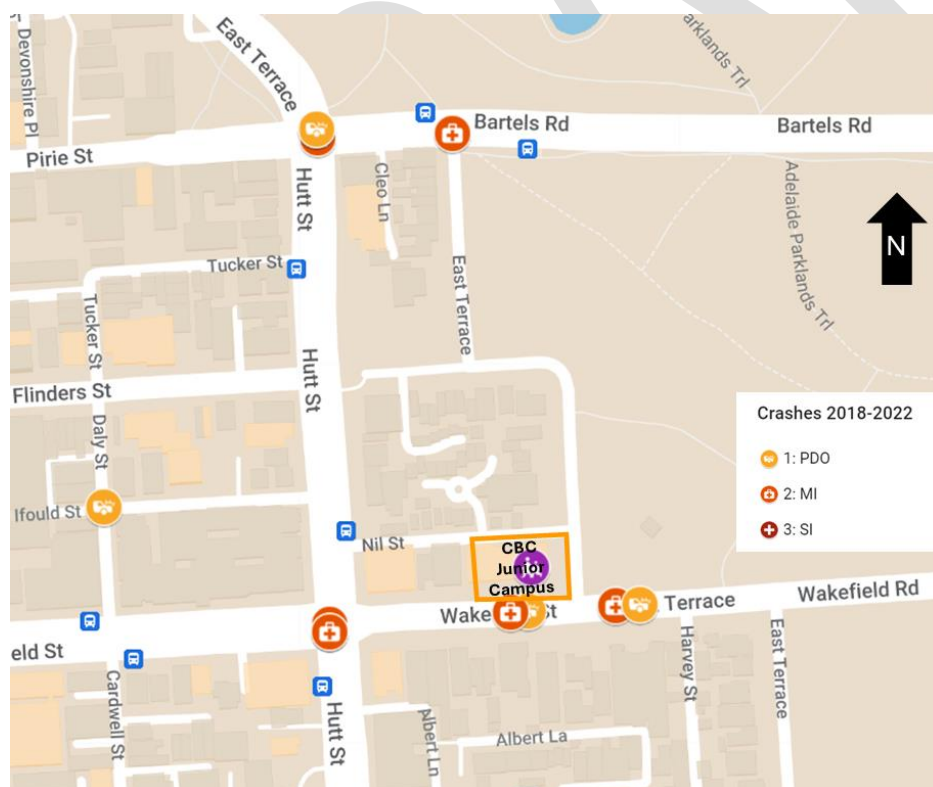


Figure 2.6 Crashes from 2018 to 2022 near the CBC Junior Campus

On-street parking is available in all streets surrounding the school on. The primary parking arrangements are summarised in Table 2.5. The on-street car parking controls along the streets in the vicinity of the school are shown in Figure 2.7.

Road	Type of Parking
Wakefield Street	Angled Timed with 15-minute, 1-hour and 2-hour parking restrictions
East Terrace	Parallel Timed with 2-hour parking limits
Nil Street	Parallel Timed with 15-minute parking Monday to Friday from 8 am to 6 pm
Hutt Street	Parallel Timed with 2-hour paid parking and 3-hour disabled parking



- East Terrace
 - No parking between 8 am-9 am and 3 pm-4 pm with 12 spaces
 - 2-hour parking between 8 am – 6 pm with 14 spaces
- Nil Street
 - 15-minute parking between 8 am-6 pm with 3 spaces
 - No parking between 8 am-9 am and 3 pm-4 pm with 4 spaces



Kiss and Drop activity occurs at the front entrance on Wakefield Street, however this is an informal area for short-term parking and vehicle movements with the angle parking arrangement. The total capacity for vehicles in this area is 20 car parks.

CBC Junior School has short term parking available in Wakefield Street and East Terrace that is shown in Figure 2.8. Short term parking is also on the northside of Nil Street on the northern side of the college.



2-hour angled parking spaces in Wakefield Street

2-hour parallel parking spaces in East Terrace

Figure 2.8 Timed Parking Spaces at the CBC Junior Campus

The CBC Junior Campus has prepared a car parking information with the map shown in Figure 2.9. The full brochure that is on the college website is included in **Appendix B**.



Figure 2.9 CBC Junior Campus Parking Brochure Map



2.4.4 Public Transport

Adelaide CBD is the focus of the bus, tram and train network with the walkable access from the CBC Junior Campus at bus stops in Wakefield Street and Hutt Street.

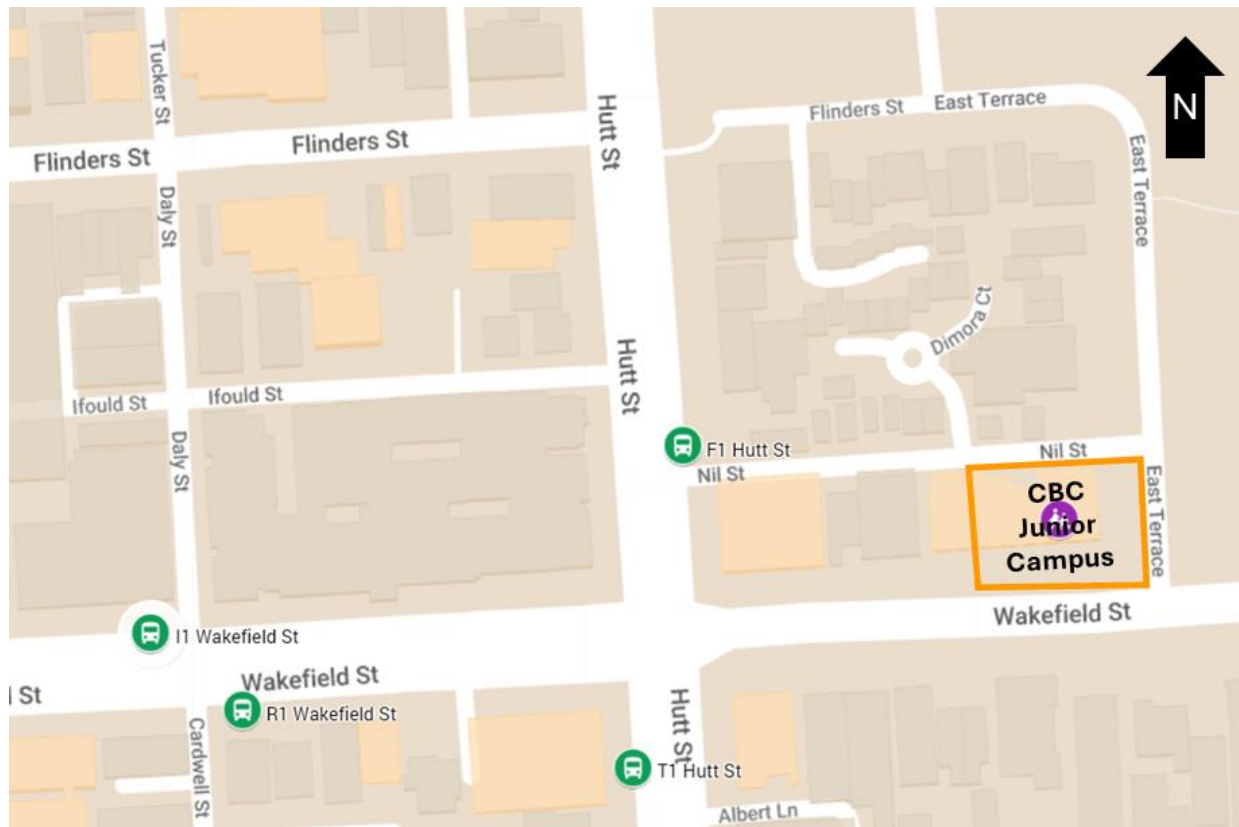


Figure 2.10 Public Transport Services to the CBC Junior Campus

The Adelaide Metro bus services in Wakefield Street and Hutt Street are considered sufficient for the demand based on the site observations. Less than 30 students are using public transport on a typical school day.



2.4.5 Cycling

The bicycle network in vicinity of the school with the connecting link to surrounding Park Land trails and the inner metropolitan cycling network is shown in Figure 2.11. Wakefield Street has an on-road bicycle lane on both sides of the road. Sealed shared paths exist throughout the Adelaide Park Lands. The Frome Street Bikeway is about 500 m west of the school.

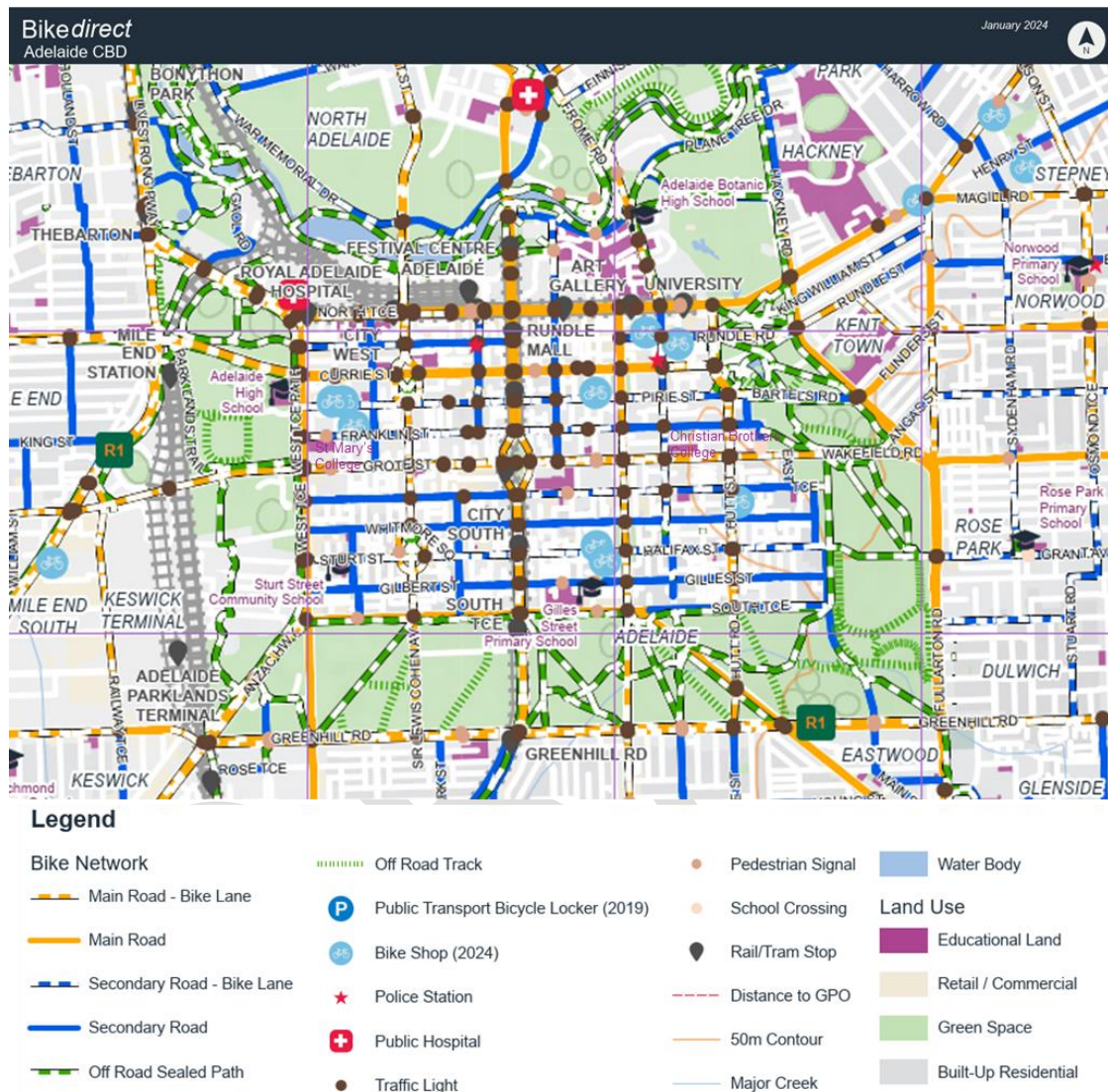


Figure 2.11 Cycling Network to the CBC Junior Campus

2.4.6 Pedestrian Access

Walking to and from the school is an important transport mode for students, staff and visitors who walk for their entire trip or as an access mode to the bus stops in Wakefield Street and Hutt Street. The footpath network along Wakefield Street and East Terrace is used by students in both the AM and PM school periods travelling between the Kiss and Drop areas.

The school has good pedestrian access from all directions from Adelaide CBD. The signalised intersection at Hutt Street and Wakefield Street has pedestrian crossings. Sealed footpaths are along on both sides of Wakefield Street and Hutt Street.



The 1 km, 1.5 km and 2 km walkable access catchment areas to the CBC Junior Campus that were calculated using the footpath network are shown in Figure 2.12. Students who walk their entire trip to school are likely walking from the Adelaide CBD, coming from the nearby bus stops or other public transport modes.

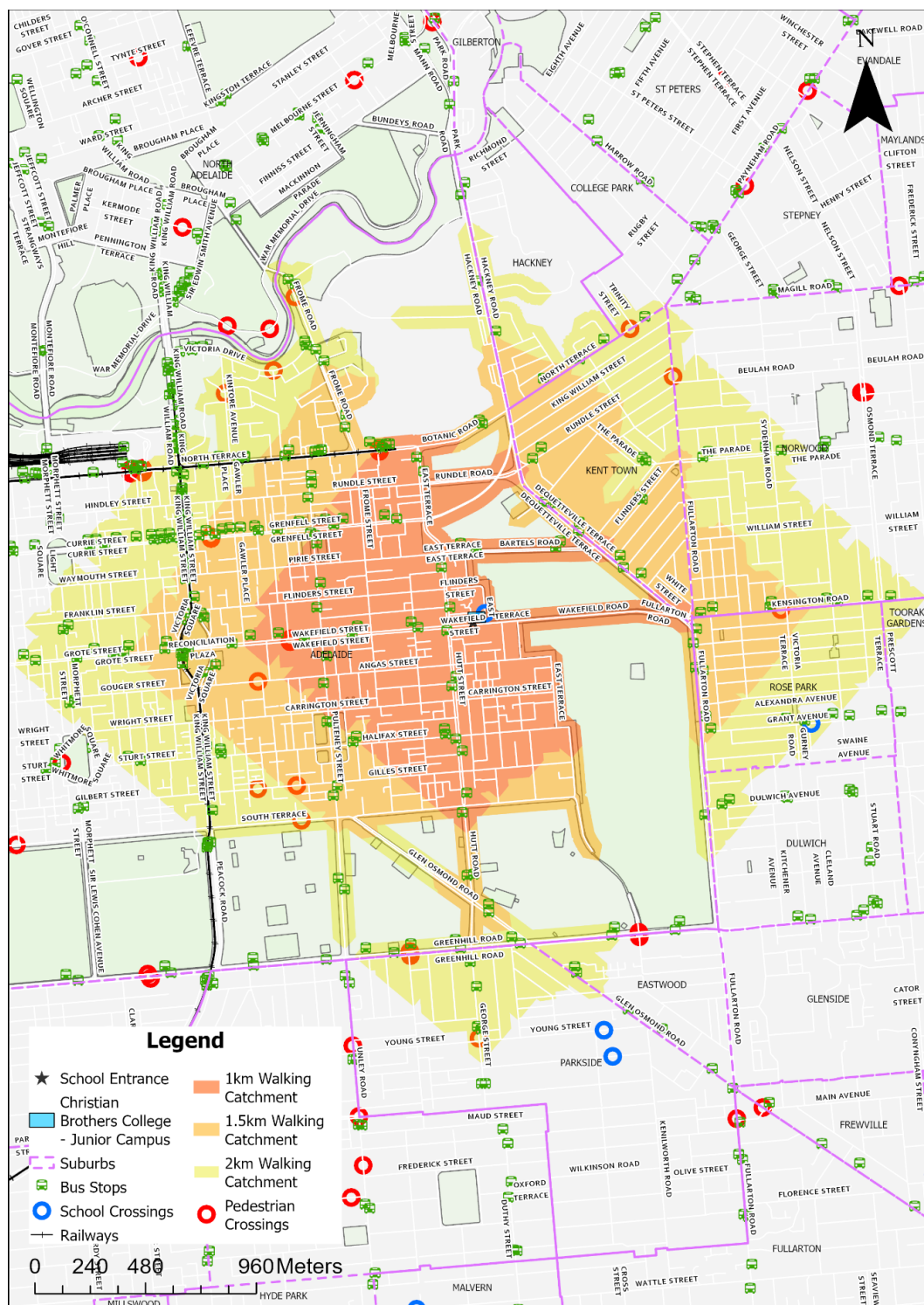


Figure 2.12 Walkable Access Catchment to the CBC Junior Campus



3 Issues and Opportunities

The issues and opportunities were identified with discussions with the school administration staff and site observations conducted during the AM drop-off period and the PM pick-up period.

3.1 Stakeholder Discussions

A meeting was held with the school Principal on Monday 23 May 2024. The issues that affect student safety for travelling to school are provided as follows:

- The Adelaide Supercars race disrupts the school for 2 weeks every year with the entire school to co-locate into the Senior Campus at the end of November with the roads east of Hutt Street are closed for the race set-up and activities. The koala crossing in East Terrace is also removed for the race period. It would be good if the race could be held during the school holidays, but that is unlikely with the Tour Down Under in January and it does not suit the national supercars race calendar.
- It was proposed to install a pedestrian island in Wakefield Street, but Council did not implement it.
- Wakefield Street is 50 km/h west of East Terrace and 60 km/h east of East Terrace. A slower speed would be welcome.
- Parents parking in the angle car parks in Wakefield Street compete with other local businesses and a medical centre for parking.
- Parents are observed double parking in Wakefield Street, making U-turns and other dangerous manoeuvres.
- The safest time of the year is immediately after the Supercars race when Wakefield Street is closed east of East Terrace for the removal of the race event fencing. Wakefield Street is effectively a cul-de-sac, and parents drop off on the north side and U-turn to return to Hutt Street.
- Heavy vehicles short-cut from Wakefield Street to Bartels Road using East Terrace. Heavy vehicles and semis should be banned from using East Terrace.
- Several near misses have been observed at the koala crossing in East Terrace with drivers not stopping.
- Students cross East Terrace to the Park Lands for sports.
- The bicycle lanes in Wakefield Street are a hazard for motorist's parking and reversing out.
- A dedicated Kiss and Drop (2-minute zone) in Wakefield Street with parallel (not angle) parking was suggested.
- High visibility and recognition to motorists that Wakefield Street has a junior school on it.
- Advocate to the State Government for a 40 km/h special school zone. This was in the news on Sunday 2 June 2024.
- No further school building expansion is planned with the school on a constrained site.
- The school has access to use the Glover Playground east of East Terrace and the ovals in the Park Lands is used by the school for outdoor activities and sporting events.

3.2 Site Observations

The existing staff and student transport mode activity to and from the the CBC Junior Campus were observed during the AM peak arrival period and the PM peak departure period on Wednesday 12 June 2024.

3.2.1 AM Arrival Period

The pedestrian, cyclist, bus passenger and Kiss and Drop activity was observed during AM arrival period from 8:00 am to 9:00 am. The AM period arrival profile was relatively distributed over the hour before the school start time, with the peak activity of arrivals between 8:30 am and 8:40 am. The key findings from the observations are shown in Figure 3.1.



Other findings from the AM observations are:

- Most of the drop off activity for students occurred on from the Wakefield Street with some vehicle movement also occurring in East Terrace
- A low level of drop off activity was observed in Plane Tree Drive with less than 20 vehicles.
- The koala crossing on East Terrace was used for parents accompanying students across either side of East Terrace to the school entrance
- Some instances of double parking was observed in Wakefield Street in front of the school entrance.



Parking in Wakefield Street



Parking in East Terrace during the AM period

Figure 3.1 AM Peak Conditions at the CBC Junior Campus

3.2.2 PM Departure Period

The pedestrian, cyclist, bus passenger and Kiss and Drop activity was observed during PM departure period from 2:45pm to 3:30 pm. The PM period departure profile was distributed over the 20 minutes after the school bell, with the peak activity of departures from 3:00 pm to 3:20 pm. The key findings from the observations are shown in Figure 3.2.



PM period parking in East Terrace with parents waiting for students to finish school



Parking in Nil Street with parents waiting for their children

Figure 3.2 PM Peak Conditions at the CBC Junior Campus



Other findings from the PM observations are:

- The Koala Crossing was utilised for over 30 students returning from out of school activities in the eastern parklands, accompanied by teachers.
- The Koala crossing flashing lights turned on at the school bell time of 3:15 pm
- A significant number of students used the Koala crossing on East Terrace after the end of the school day. A minor proportion of these movements were from parents picking up their children on East Terrace and the remaining majority were heading to out-of-school events with teachers.
- The no-parking requirements on the eastern side of East Terrace (between 3 pm and 4 pm) was disobeyed by over 20 vehicles during the 30 minute period of pick-up time.
 - If the parking controls were followed by drivers on East Terrace, the parking supply would not be sufficient for overall pick up activities.
- Pick-up activity occurred on Nil Street within parking control requirements
- Issues were noted with pick up activity on Wakefield Street due to the angled parking arrangement in front of the school.

3.3 Summary of the Issues and Opportunities

Issues for students accessing the Junior School are mostly for the City of Adelaide to address and are:

- Travel across Wakefield Street is limited to the signalised crossing at the Hutt Street
- Several near misses have been observed at the koala crossing in East Terrace with drivers not stopping.
- Heavy vehicles short-cut from Wakefield Street to Bartels Road using East Terrace.
- Vehicles are travelling at speeds on Wakefield Street not typically associated with school zones.
- The no-parking requirements on Wakefield Street and the eastern side of East Terrace between 3 pm and 4 pm was disobeyed by over 20 vehicles during the 30 minute period of pick-up time.
 - If the parking controls were followed by drivers on East Terrace, the parking supply would not be sufficient for overall pick up activities.
- A dedicated Kiss and Drop (15-minute zone) in Wakefield Street with parallel (not angle) parking
- The bicycle lanes in Wakefield Street are a hazard for motorist's parking and reversing out.



4 Travel Safety Options and Assessment

4.1 Student Travel Safety Options

Options to improve the travel safety for students at the school were developed under three categories, namely:

- Infrastructure treatments requiring civil works with changes to signals or pedestrian crossings.
- Operational efficiencies, with changes to parking controls, Kiss and Drop areas or school zones.
- Safety promotions to increase awareness of the school with warning signage or information.

The options for the assessment are provided in Table 4.1 with a description of the initiative and the issue to be addressed.

Table 4.1 School Travel Safety Options for the CBC Junior Campus

Type of Option	Description	Issue Addressed
Infrastructure Treatments	Reinvestigate the inclusion of a pedestrian crossing on Wakefield Street. This would likely need to be implemented east of East Terrace.	Travel across Wakefield Street is limited to the signalised crossing at the Hutt Street.
Operational Efficiencies	Change the parking controls on Wakefield Street (school entrance) to allow for 15-minute kiss and drop activities during critical peak school periods.	The existing no-parking requirements on Wakefield Street (between 3-4pm) was disobeyed during the school pick up time.
	Change the parking controls in East Terrace (eastern side) to allow for 15-minute kiss and drop activities during critical peak school periods.	The existing no-parking requirements on the eastern side of East Terrace between 3 pm and 4pm was disobeyed by over 20 vehicles during the 30-minute period of pick-up time.
	Consider changing the posted speed in Wakefield Street between Frome Street and East Terrace from 50 km/h to a slower speed limit eg. 40 km/h. This would extend to Frome Street to provide a continuous environment across the Senior and Junior campuses.	Vehicles are travelling at speeds on Wakefield Street not typically associated with school zones.
	Enforce stricter rules on providing heavy vehicles permit based activity along East Terrace. This could be implemented during peak periods to avoid conflicts with pedestrians.	Heavy vehicles short-cut from Wakefield Street to Bartels Road using East Terrace.



Type of Option	Description	Issue Addressed
Safety Promotions	Install additional signage to promote the school area for traffic approaching the school zones at East Terrace and Wakefield Street.	Several near misses have been observed at the koala crossing in East Terrace with drivers not stopping.
	Prepare a consolidated travel access guide for students and parents that would be promoted on the school website in location that is easy to find, in addition to the school newsletter.	Students and parents may not be aware of their travel choices for bicycle routes, facilities at the school or public transport services.



4.2 Recommended School Travel Safety Initiatives

The recommended school travel safety initiatives are shown on Figure 4.1. They include:

- Reinvestigate the inclusion of a signalised pedestrian crossing east of Wakefield Street in East Terrace immediately south of the Glover (East) Playspace. It is not proposed in front of the school entrance to avoid the impact of the removal of car parking.
- Install a pedestrian refuge in Wakefield Street between Hutt Street and East Terrace.
- Change the parking controls on Wakefield Street (school entrance) and East Terrace (east side) to allow for 15-minute Kiss and Drop activities during critical peak school periods.
- Investigate options for safer pedestrian movements by parents and students in Wakefield Street opposite the student entrance
- Reduce the speed limit on Wakefield Street from 50 km/h to 40 km/h between Frome Street and East Terrace.
- Enforce stricter rules on providing heavy vehicles permit based activity along East Terrace. This could be implemented during peak periods to avoid conflicts with pedestrians.
- Install additional signage to promote the school area for traffic approaching the school zones East Terrace and Wakefield Street.



Legend



Change carparking requirements to include 15-minute kiss and drop



Rearrangement of parking alignment



New pedestrian crossing opportunities



Posted speed reduction



Existing Koala Crossing



Install new School Zone warning sign at street entry point

Figure 4.1 Recommended Initiatives at the CBC Junior Campus



4.2.1 Options to Improve Pedestrian Crossing Safety in Wakefield Street

In order to improve the pedestrian crossing safety to the school entrance in Wakefield Street, several options are provided for further consideration. These options are provided with the advantages and disadvantages in Table 4.2. They require further site observations, data collection for pedestrian volumes crossings during the AM and PM school peak hours and a more detailed assessment.

Table 4.2 Options to Improve Pedestrian Crossing Safety in Wakefield Street

Option ID	Description	Advantages	Disadvantages
A	Install a PAC east of Wakefield Street in East Terrace immediately south of the Glover (East) Playspace. It is not proposed in front of the school entrance to avoid the impact of the removal of car parking.	Significantly improves safety for pedestrians crossing Wakefield Street with one crossing located where most pedestrians want to cross.	Costly up to \$500,000 to move and reinstate on street parking near the main entrance to the school. May not be installed due to pedestrian demand and proximity to other crossings.
B	Install a pedestrian refuge in Wakefield Street between Hutt Street and East Terrace.	Allows for safe storage for pedestrians on the already popular crossing point. This is less costly than the PAC option. Under \$50,000.	Pedestrians are still required to cross two traffic lanes on either side of Wakefield Street. Issues with sight distance from parked cars may also obscure pedestrians.



4.2.2 Signage to Increase the Awareness of the School for Motorists

An issue for school student travel safety is many motorists in East Terrace and Wakefield Street are not aware that the CBC Junior Campus is located here when approaching the front entrance. It is proposed to install larger and more prominent information signage (not regulatory signage) to increase the awareness of the school. The signs could be installed at either end of East Terrace and Wakefield Street.

Examples of signage at the entry points to a school precinct are shown in Figure 4.2. These information and advisory advance warning signs are not standard for the DIT guidelines. Council will need to discuss with DIT about these types of signs that are intended to increase awareness to traffic in Terrace and Wakefield Street.



Large entry signage that is visible to traffic on the street

Advanced warning sign for a school zone

Figure 4.2 Alternative School Precinct Warning Signage

4.2.3 Information to Promote Safer Student Travel to the School

The school provides limited information to promote safer student travel to school. Examples of the types of information brochures, known as school Travel Access Guides in NSW, are provided for a primary school in **Appendix C**. The Travel Access Guide is prepared with a consistent template for all government schools in NSW in collaboration with the school principals and a school travel coordinator.



4.3 Assessment and Indicative Cost Estimates

The school travel safety options were assessed under the safe systems approach and indicative cost estimates are provided for each travel safety option in Table 4.3. The options were given labels under the following categories:

- T for Traffic control device or treatment that requires civil works and construction with cost estimates.
- P for Parking control with new signage or to pavement markings for the on-street parking or a school zone.
- I for information to the school community with signage or online promotional brochure.

Table 4.3 Indicative Cost Estimates for the Travel Safety Options at the CBC Junior Campus

Option ID	Description	Indicative Cost Estimate	Comments
T1	Investigate a PAC in East Terrace east of Wakefield Street south of the Glover (East) Playspace. This is proposed east of the school entrance in Wakefield Street to avoid the impact on the parking spaces in front of the school.	Up to \$500,000	Council to prepare evidence to support the warrant for a crossing and liaise with DIT for the approval to install. Council responsible for the design and installation if approved.
T2	Install a pedestrian refuge in Wakefield Street between Hutt Street and East Terrace.	Up to \$20,000	Council responsible for the design and installation if approved.
P1	Change the parking controls on Wakefield Street (school entrance) and East Terrace (east side) to allow for 15-minute kiss and drop activities during critical peak school periods.	Less than \$50,000	The parking controls in front of the school are under the control of Council to design and implement.
P2	Consider changing the posted speed in Wakefield Street between Frome Street and East Terrace from 50 km/h to a slower speed limit eg. 40 km/h. This would extend to East Terrace to provide a continuous environment across the Senior and Junior campuses.	Less than \$1,000	The speed limits are under the control of DIT.
I1	Install additional signage and promotion of the school area for traffic approaching the school zones at Wakefield Street and East Terrace	Less than \$1,000	The selection of information signage and installation in Wakefield Street and East Terrace is under the control of Council.
I2	Prepare a consolidated travel access guide for students and parents that would be promoted on the school website in location that is easy to find, in addition to the school newsletter.	No cost to Council	This would be prepared and promoted by the school administration.



5 References

The following references were used in the preparation of the school travel safety review.

- Guide to Traffic Management Part 8, Local Area Traffic Management, Austroads, Sydney, 2016, Section 7.5.7 School Zones, page 114
- Guide to Traffic Management Part 10, Traffic Control and Communication Devices, Austroads, Sydney, 2019, Section 6.5.8 Zig Zag Markings, page 105,
- Speed Limit Guideline for South Australia, Department for Infrastructure and Transport, October 2023, Appendix C School Zones
- Supplement to AS 1742.10, Manual of uniform traffic control devices, Part 10, Pedestrian control and protection, Department for Infrastructure and Transport, April 2024
- Manual of Legal Responsibilities and Technical Requirements for Traffic Control Devices Part 2: Code of Technical Requirements, Department for Infrastructure and Transport, March 2024, Section 9.3 Drop off and pick up zones, page 34
- School Transport Policy, Department for Education, South Australia, January 2024

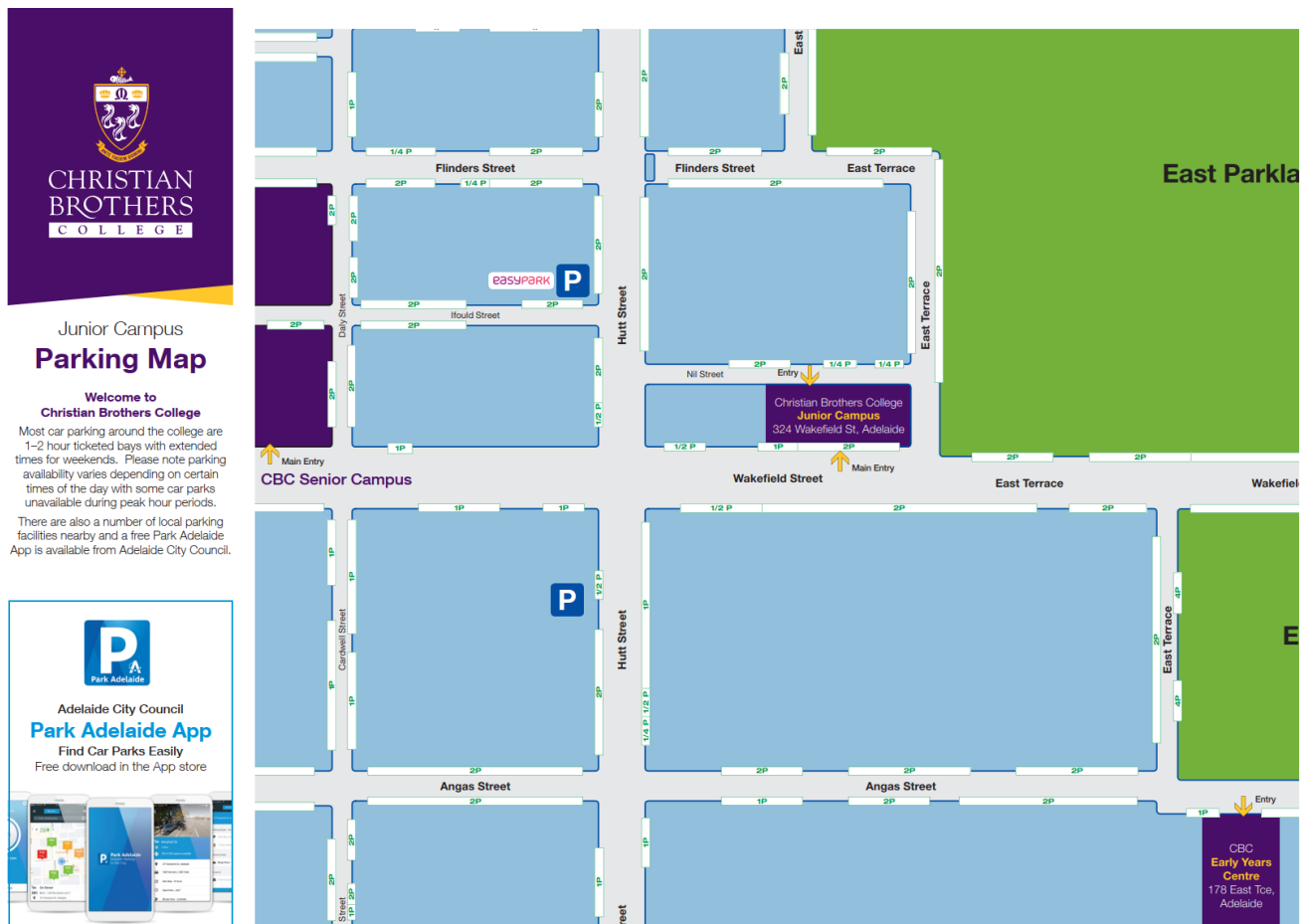


Appendix A – Student Travel Survey Form

 CITY OF ADELAIDE 	
School Travel Survey for Students	
School:	Christian Brothers College Junior Campus
<i>Tonkin on behalf of the City of Adelaide is conducting a survey to determine the main modes of travel for students to understand the travel behaviour to the school. Please assist us by undertaking a short student survey during the first period class.</i>	
Questions for the Teacher	
Date (day/month/year):	
Weather (Daytime temperature and sky conditions):	
Please enter the name or number of your class or year group.	
How many students are absent today in your class?	
Questions for the Students in Your Class / Year Group	
<i>Please ask the students with a 'hands-up' survey in the classroom.</i>	
AM Period Travel	
<i>How did you travel to school this morning? (If you travelled by more than one mode, please answer with the longest part of your journey - e.g. "car" for "car and scooter".)</i>	
Main Mode of Travel in the AM Period	Number of Students
Car (as passenger with drop-off)	
Walk for the entire trip	
Bus	
Train	
Tram	
Bicycle or e-bike	
Scooter	
PM Period Travel	
<i>How will you travel from school this afternoon? (If you will travel by more than one mode, please answer with the longest part of your journey - e.g. "car" for "car and scooter".)</i>	
Main Mode of Travel in the PM Period	Number of Students
Car (as passenger with pick-up)	
Walk for the entire trip	
Bus	
Train	
Tram	
Bicycle or e-bike	
Scooter	
If you travelled by car, would you prefer any of these modes? (multiple answers)	
Walking for the entire trip	
Bicycle, e-bike or scooter	
Public Transport (bus, tram or train)	



Appendix B – CBC Junior Campus Parking Information





Appendix C – School Travel Access Guide in NSW

NSW Department of Education – School Infrastructure



Meadowbank Public School Travel Access Guide

Effective: September 2023

Introduction

Our school community of parents/carers, staff and students live within a reasonable walk or cycle trip of the school. This Travel Access Guide provides suggested safe and accessible options for travelling to and from school.

Active ways to get to school



Walking to and from school

- Walking is a fun way to keep active and healthy.
- Stay alert and watch out for any potential hazards, including cars reversing out of driveways, bikes and other pedestrians.
- Remember to STOP, LOOK, LISTEN and THINK every time you cross the road.



Ride your bike

- 278 bike racks are available for everyone and 42 scooter racks for K-6 students.
- All bicycle riders are required by law to wear a correctly fitted Australian standards approved helmet and is highly recommended when riding a scooter.
- Children under the age of 16 are allowed to cycle on the footpath, keeping them safer and more protected from road traffic.

Kiss and drop expectations

- For parents/carers who drive their child/ren to school, the kiss and drop zone is located along Rhodes Street starting from Hermitage Road.
- This space is a 'No Parking' zone, meaning that you may stop for up to a maximum of 2 minutes and move no more than 3 metres from the vehicle.

Message from our principal

- Meadowbank Public School supports sustainable and environmentally friendly transport practices.
- Students up to 8 years of age should hold the hand of an adult when walking or be accompanied by an adult when riding
- Students from 8 to 10 years of age should be actively supervised by an adult

School bell times

Start Times

8:45 am

End Times

2:45 pm

The outside school hour times for the primary school are: 7:00 am - 8:45 am and 2:45 pm - 6:00 pm.

For more information contact:

School Infrastructure NSW
Email: schoolinfrastructure@det.nsw.edu.au
Phone: 1300 482 651
www.schoolinfrastructure.nsw.gov.au





NSW Department of Education – School Infrastructure

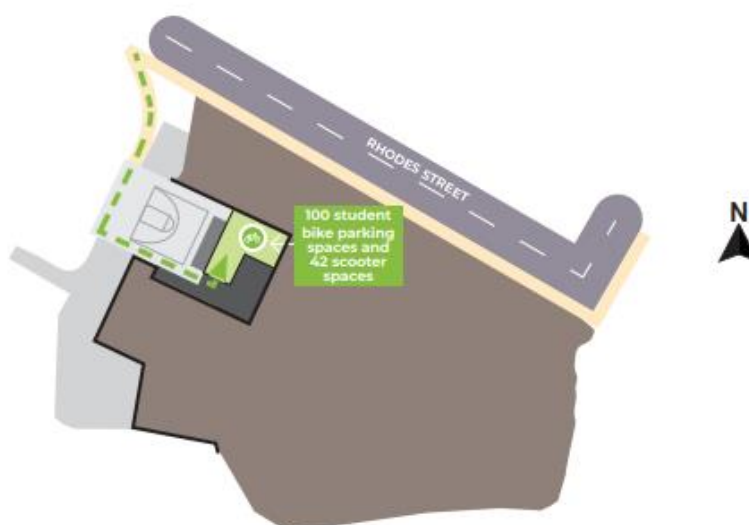


Please use the Trip Planner at transportnsw.info/ for additional information about cycling routes to the school.

End of trip facilities



Playground level:
For students attending
Meadowbank Public School





NSW Department of Education – School Infrastructure

Where do you ride?

Footpath/shared path/cycleway:

- Children under 16 can ride on a footpath.
- Adults supervising children under 16 can also ride on the footpath.
- Be careful of cars entering and exiting driveways.
- Watch out for pedestrians, other riders and animals.

Look out for pedestrians on shared paths.



Crossing the road:

- Be extra careful.
- Walk your bicycle when you cross at a pedestrian crossing.

Give a metre:

Give pedestrians 1 metre of space when riding past.



3 steps to follow when riding a bike:

Clip, check, chime.

Clip your helmet

1



You must always wear a helmet when riding your bike.

Check your brakes

2



Make sure your brakes are working.

Chime your bell

3



If you pass another rider or pedestrian, chime your bell.

Things to remember

- Always ask your parents permission to ride.
- Loose clothing and items can get caught in your wheels. Secure any loose items, like backpack straps.



- Shoes with a good tread on the soles will help you grip the pedals and protect your feet. Make sure your laces are tied.



Always remember to watch out for hazards



- 1 Wet leaves
- 2 Big puddles
- 3 Storm grates
- 4 Gravel or rocks
- 5 Little kids
- 6 Animals
- 7 Changes in the road/footpath/cycleway surfaces

For more information contact:

School Infrastructure NSW
Email: schoolinfrastructure@det.nsw.edu.au
Phone: 1300 482 651
www.schoolinfrastructure.nsw.gov.au

