

Mixed-Use Development, Erf 7379 Pacaltsdorp

Prepared for Pacaltspropdev (Pty) Ltd
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1. Introduction

SMEC South Africa (Pty) Ltd was appointed by Pacaltspropdev (Pty) Ltd to conduct a Traffic Impact Assessment for the proposed mixed-use development on Erf 7379, Pacaltsdorp, George. The site is bounded by Church Street to the north, Mission Street to the south, and Beach Road to the west. A locality plan is shown in Figure 1-1.

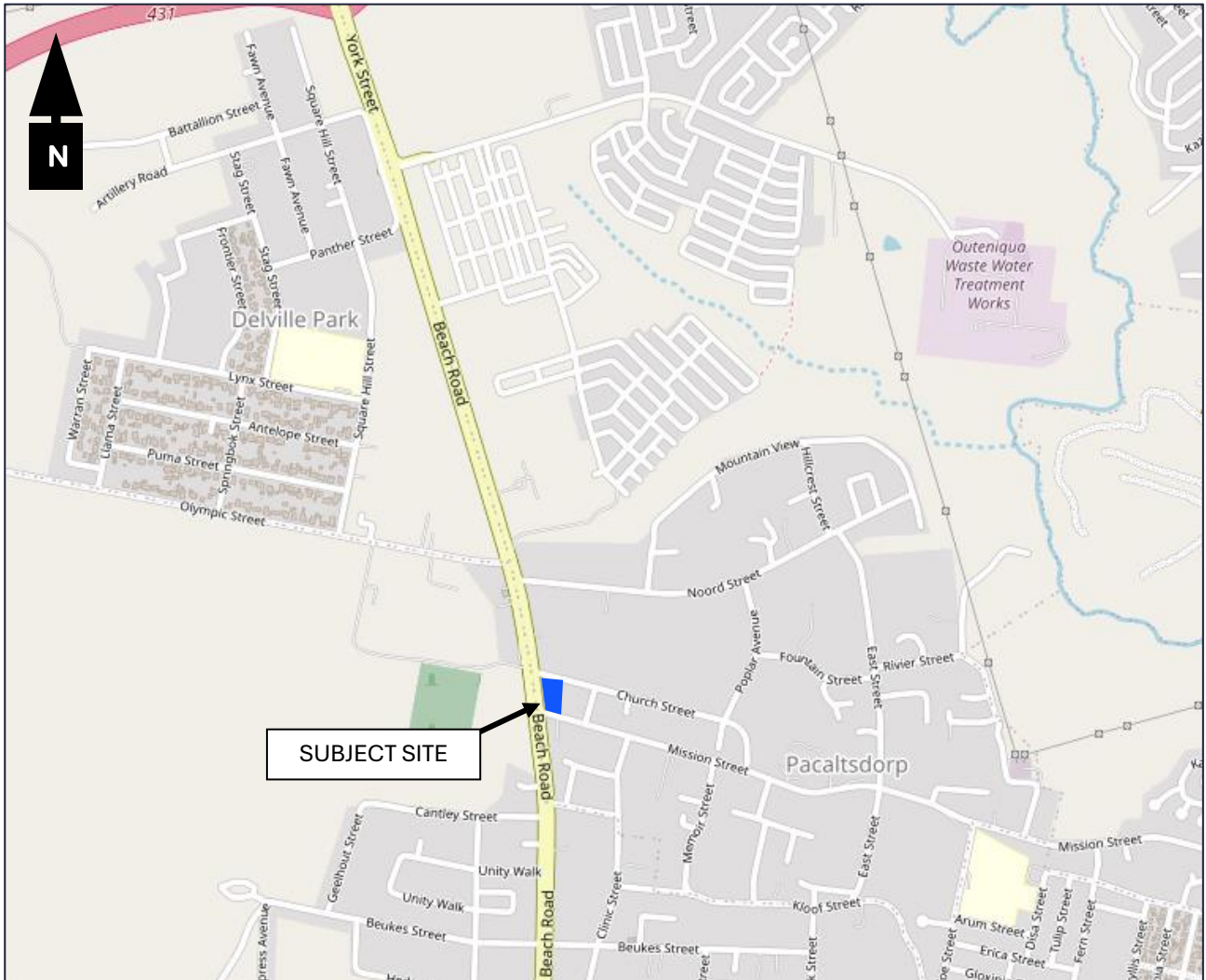


Figure 1-1: Locality Plan (Source: OpenStreetMap)

The subject site measures approximately 0.46 hectares in extent and will comprise of a filling station with a convenience store, line shops and a Drive Thru. The site development plan for the proposed development is shown in Figure 1-2.

The purpose of the Traffic Impact Assessment is to quantify the anticipated impact of the development traffic on the surrounding road network, and recommend remedial measures as required. The study was conducted in accordance with The Committee of Transport Officials South African Traffic Impact and Site Traffic Assessment Manual (COTO, TMH 16 Volume 1).

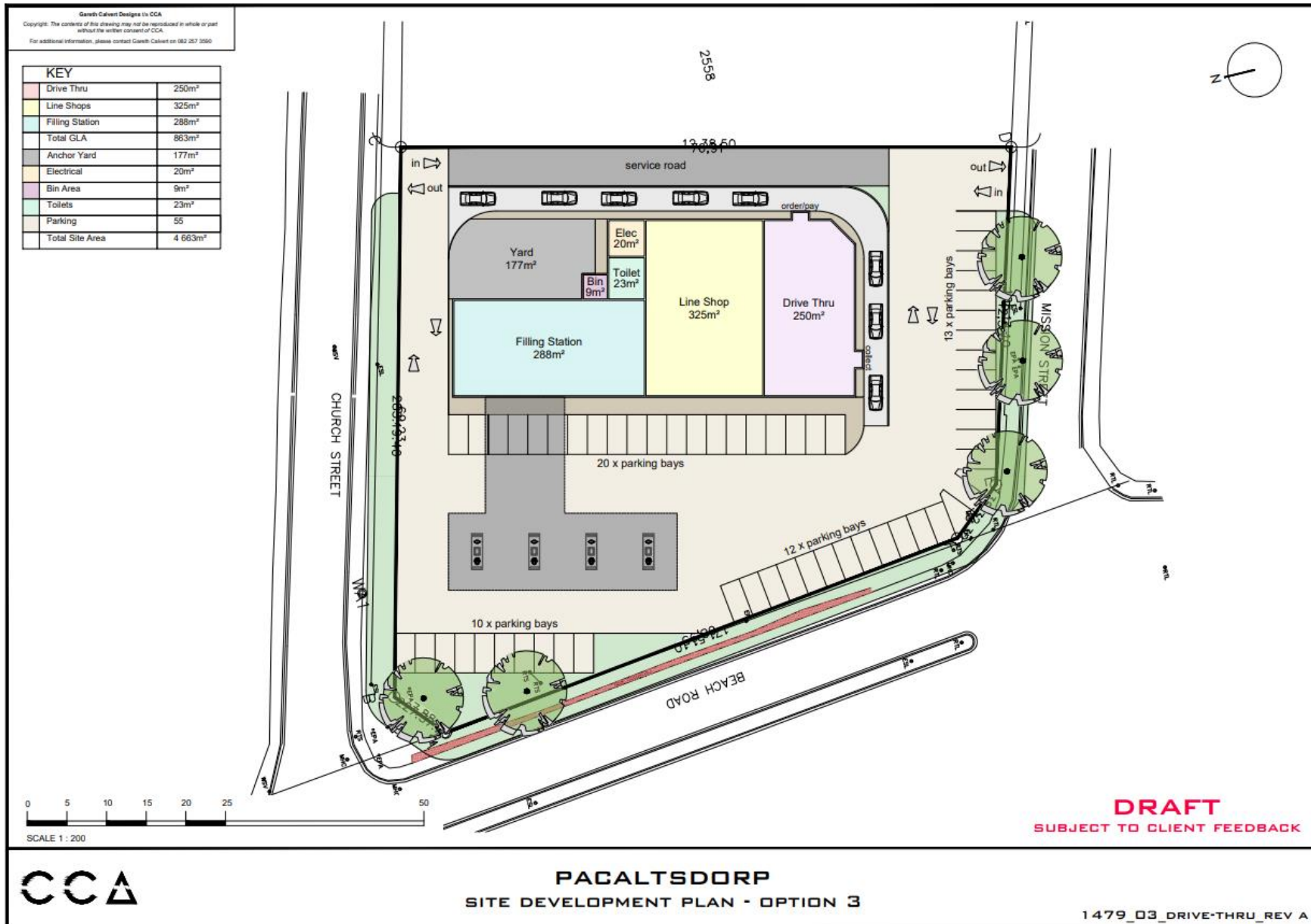


Figure 1-2: Site Development Plan (Gareth Calvert Designs t/a CCA, November 2024)

2. Background Information

2.1 Existing Roads

Beach Road is classified as a Class 3 Minor Arterial. It comprises of one lane per direction in the vicinity of the site and experiences low traffic flows during peak hours.

Mission Street is also a Class 4 Minor Collector, serving the surrounding residential area. The road comprises of one lane per direction in the vicinity of the subject site. It experiences low traffic flows during peak hours and operates at an acceptable Level of Service.

Church Street is a Class 4 Minor Collector, serving the surrounding residential area. The road comprises of one lane per direction in the vicinity of the subject site. It experiences low traffic flows during peak hours and operates at an acceptable Level of Service.

Refer to Figure 2-1.

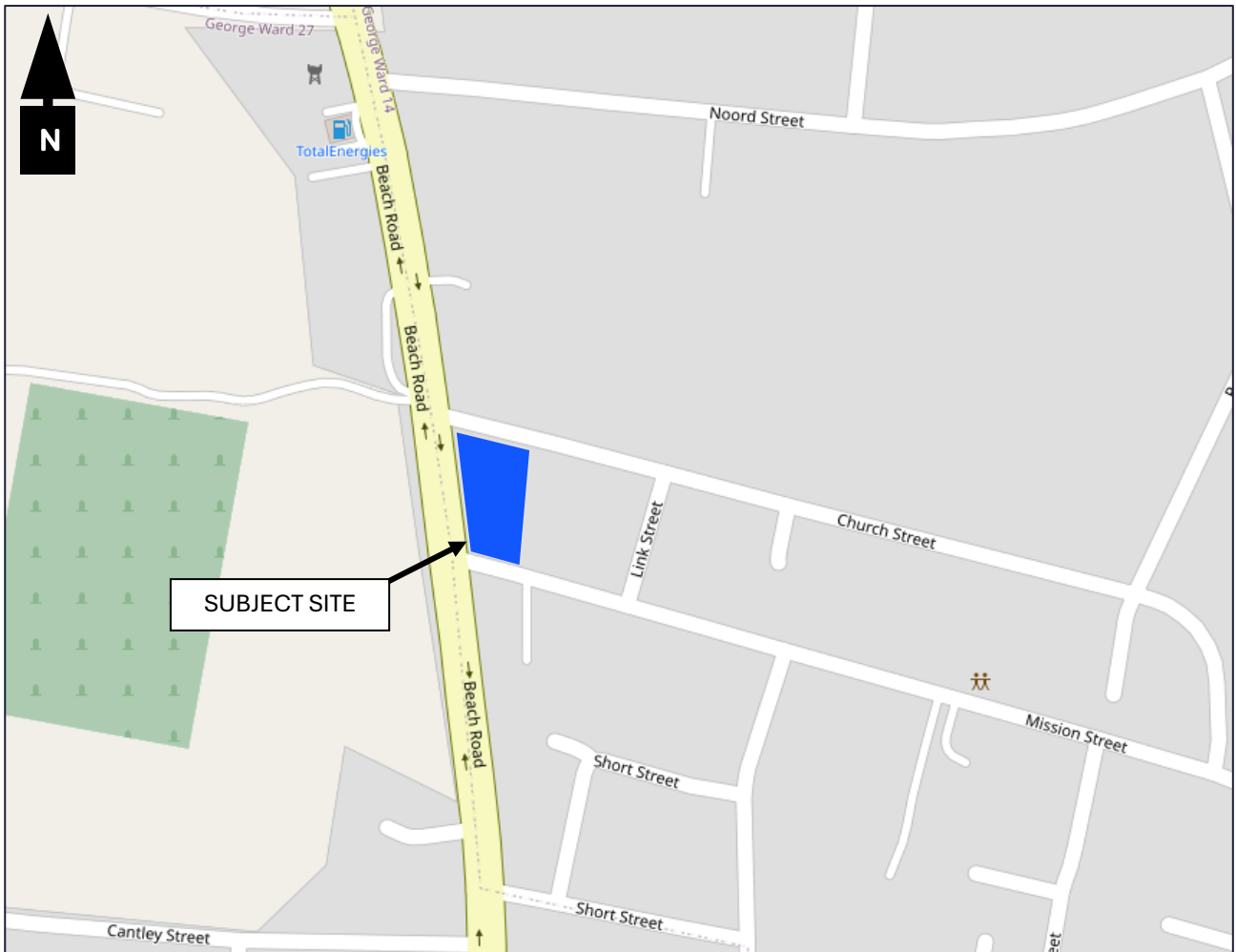


Figure 2-1: Existing Road Network (Source: OpenStreetMap)

2.2 Public Transport Facilities

The greater surrounding area of Pacaltsdorp is well served by the existing Go George service, with routes running along Beach Road and Mission Street. Bus stops serving routes: Pacaltsdorp Community, CBD- Loerie Park – Garden Route Mall, Harmony Park – CBD, New Dawn Park – CBD, Pacaltsdorp – Garden Route Mall and Pacaltsdorp - Industria are located within close vicinity of Erf 7379. Refer to Figure 2-2.

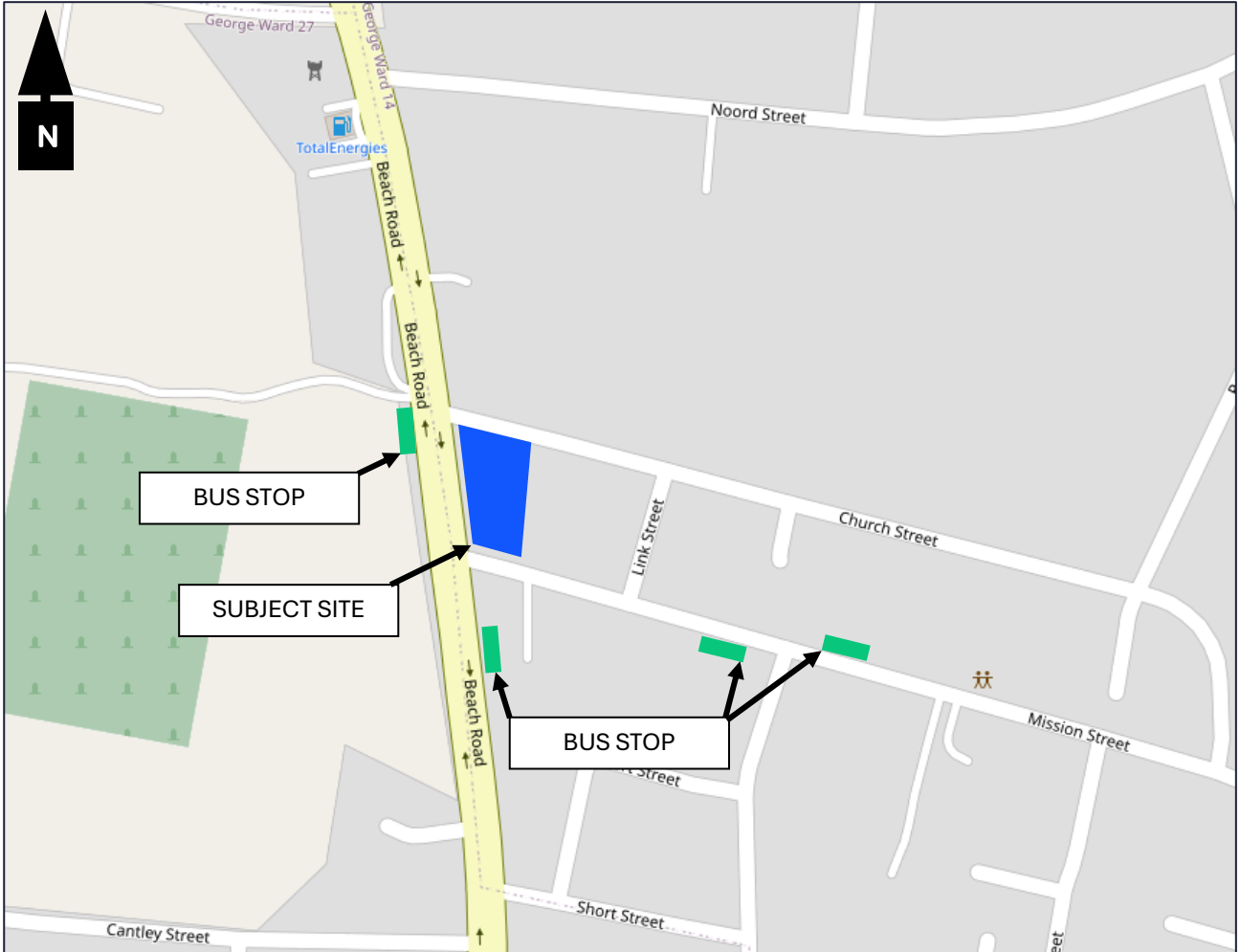


Figure 2-2 Public Transport Facilities (Source: OpenStreetMap)

2.3 Non-motorised Transport Facilities

Paved pedestrian walkways are provided along the eastern and western side of Beach Road along the full length of Beach Road. Paved pedestrian walkways are provided north and south along both Church Street and Mission Street. Refer to Figure 2-3.

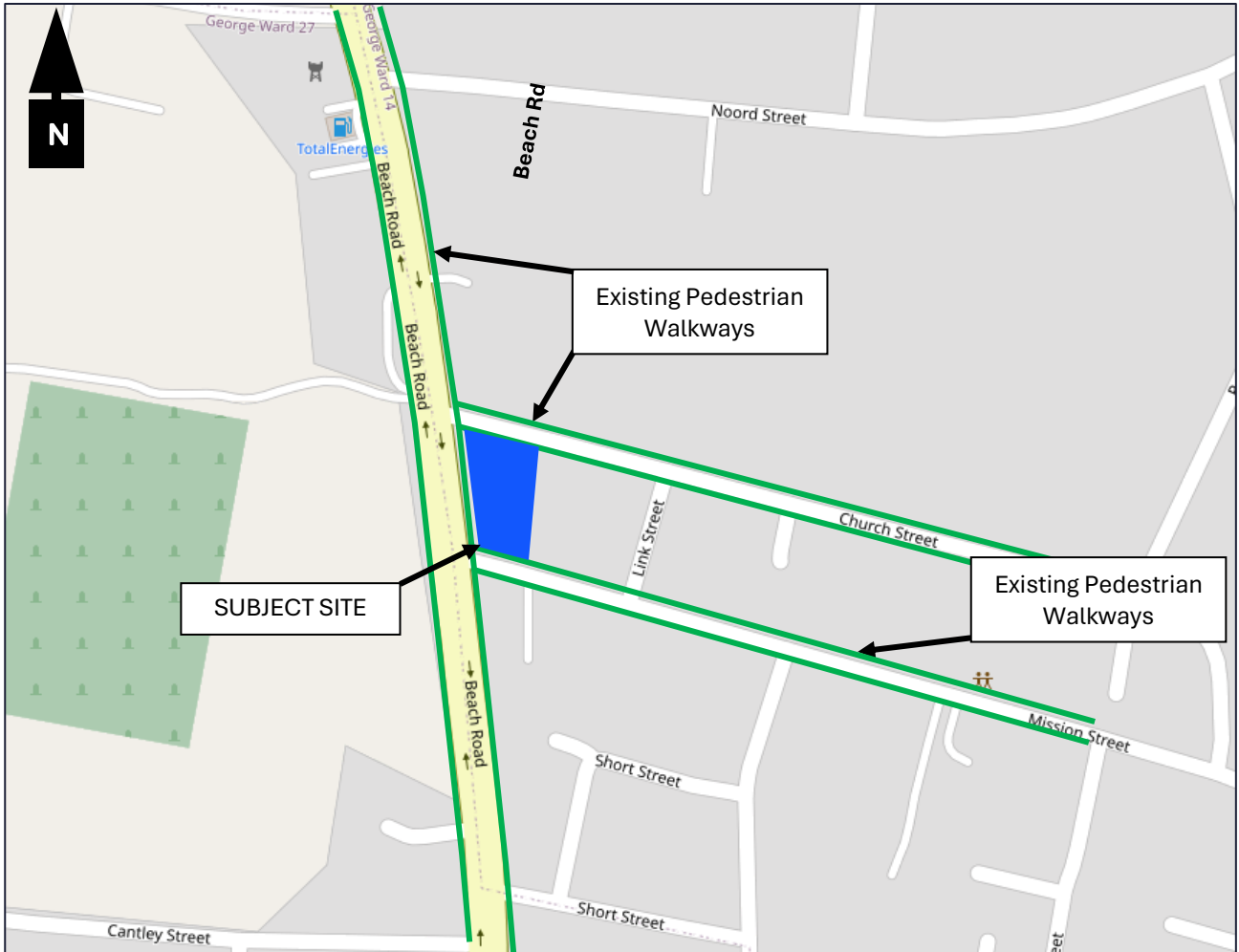


Figure 2-3: Non-motorised Transport Facilities

The commercial component of the development would attract pedestrian traffic thereto. It is therefore recommended that a pedestrian access be provided to the site, allowing patrons to reach the shop frontages safely.

2.4 Site Access

It is planned for the development to be served by two accesses, access 1 along Mission Street and access 2 along Church Street. Access 1 is ~ 45m to the east of the unsignalized full intersection with Beach Road and access 2 is ~ 82m along Church Street also to the east of the signalized full intersection with Beach Road. Refer to Figure 2-4.

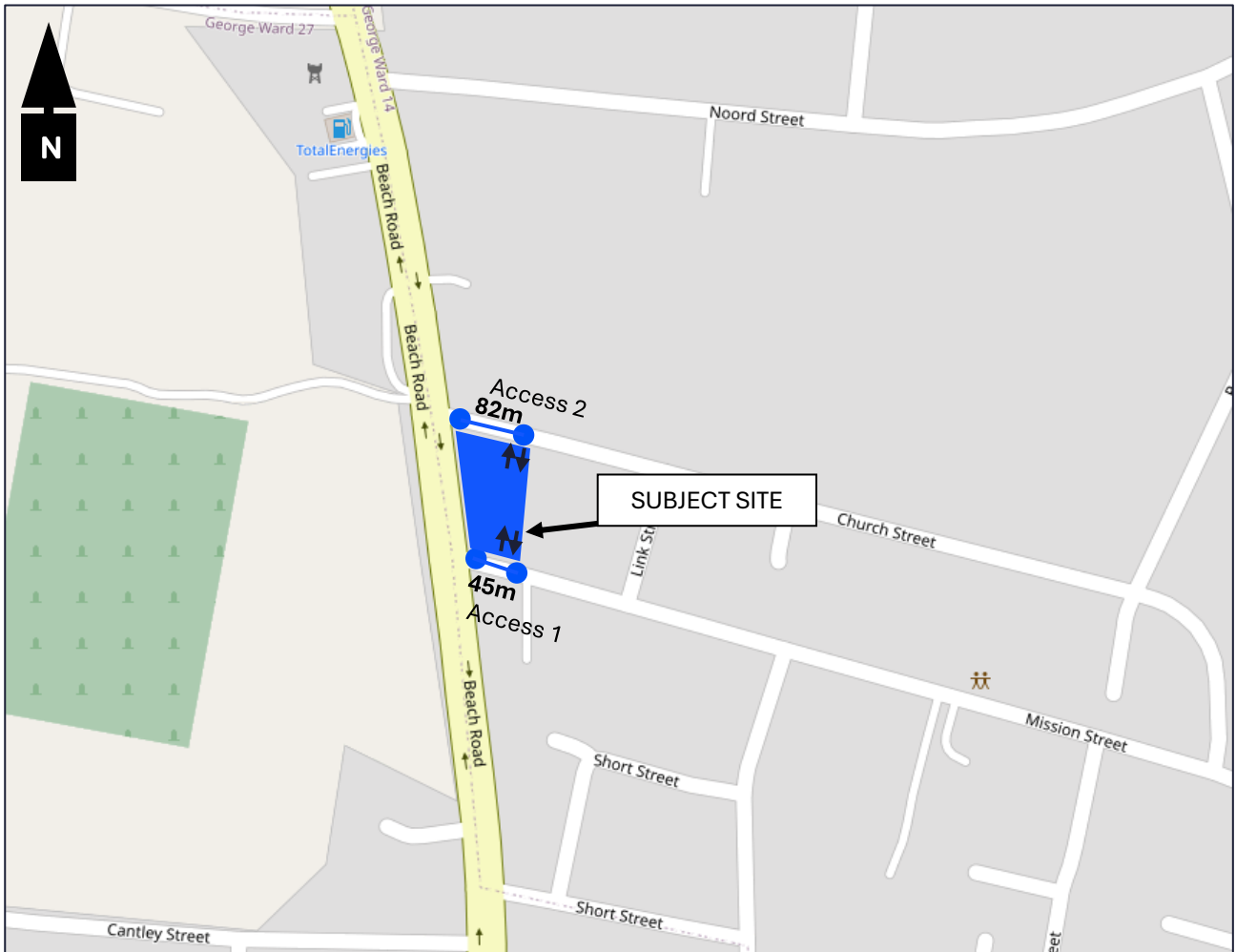


Figure 2-4: Proposed Site Access

The access spacing requirements were derived from the Western Cape Government (WCG) Access Management Guidelines (2020).

Access 1 is classified as an equivalent collector as it is anticipated to serve 60 – 500 vehicles per hour per direction, whereas access 2 is classified as a high-volume driveway as it is anticipated to serve 30 – 60 vehicles per hour per direction.

The minimum spacing requirement along a Class 4 Road within a suburban roadside development environment is as follows:

- 180 metres from a signalised full intersection to an unsignalized full intersection, Access 1.
- 115 metres from the second last driveway, Access 2, to an unsignalized full intersection.

It is noted that the site accesses spacing of Site Access 1 and Site Access 2 do not conform to the requirements of the WCG Access Management Guidelines, however these accesses were approved prior to the latest requirements being adopted.

3. Traffic Demand Estimation

3.1 Assessment Years

A base year assessment was undertaken to identify shortcomings in the road-based capacity in the short term, if any. In addition, it is required to grow traffic flows to an acceptable forecast year to ensure that the proposed road network would be able to operate satisfactorily once the development traffic is added to the surrounding road network.

TMH 16 Volume 1 Version 1.0 states that transportation improvements for developments must be designed for a forecast year of 5 years. Taking the above into consideration, a 2024 Base Year and a 2029 Forecast Year was used for this study.

3.2 Assessment Hours

The assessment has been undertaken considering the periods during which development traffic would result in the highest traffic demand. Taking into consideration the planned land use rights associated with the development, it was deemed suitable to assess the Weekday AM, Weekday PM, and Saturday Peak Hours.

3.3 Traffic Counts

Taking into consideration the location and extent of the proposed development with relation to the surrounding road network, the following traffic count surveys were undertaken as part of this project assignment:

- Counting Station 1: Intersection of Beach Road and Mission Street;
- Counting Station 2: Intersection of Beach Road and Church Street; and

Traffic count locations are shown in Figure 3-1.

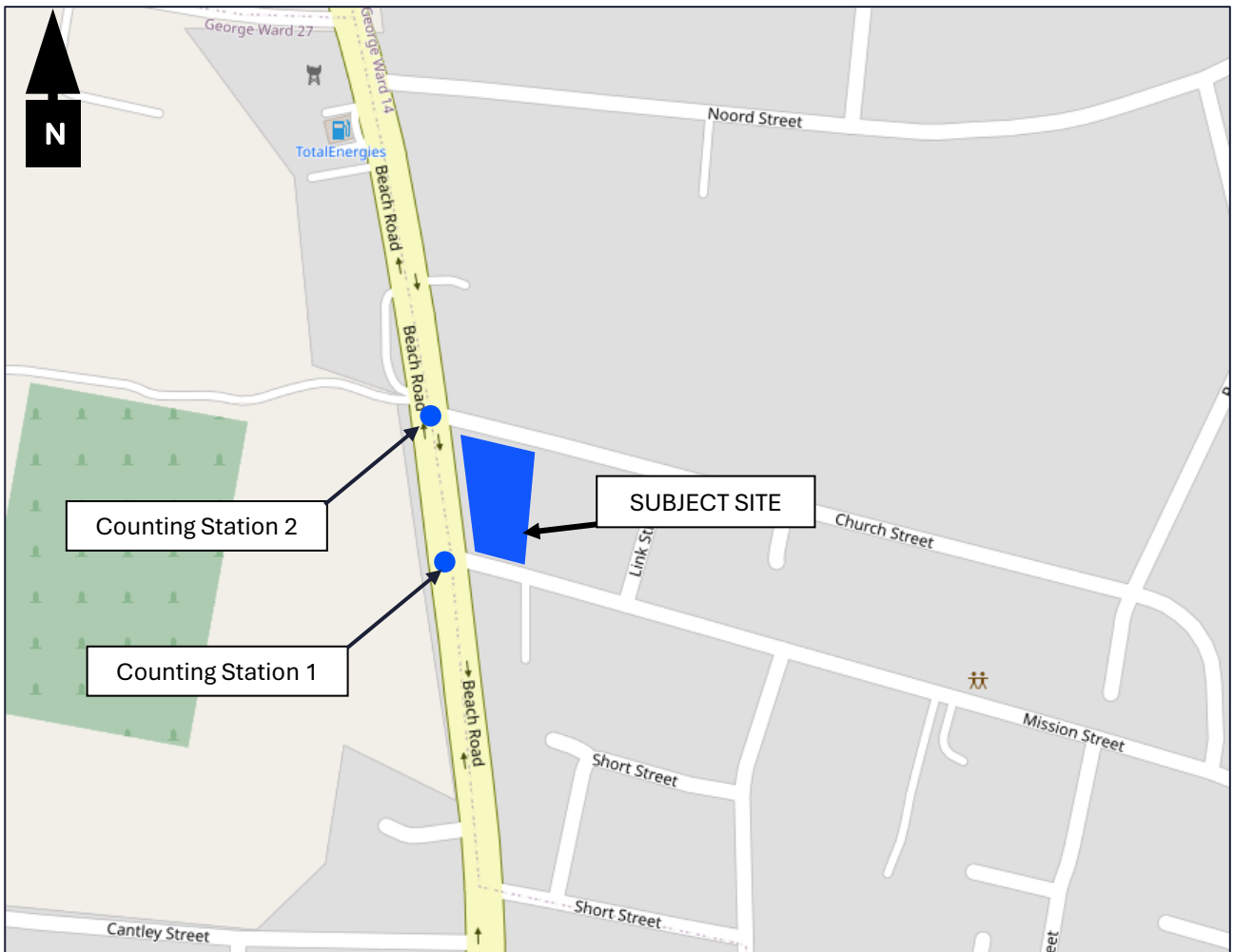


Figure 3-1: Traffic Count Locations

Details of the traffic survey are provided below:

- Date counted 15 and 16 November 2024
- Day Weekday AM, Weekday PM, and Saturday Midday counts
- Congestion levels High
- Enumerator SMEC South Africa (Pty) Ltd

The detailed traffic survey data is provided in Appendix A.

Typical peak hours for the intersections under discussion are as follows:

- Weekday AM Peak Hour 06h30 – 07h30
- Weekday PM Peak Hour 16h45 – 17h45
- Weekend MD Peak Hour 13h00 – 14h00

The 2024 Base Year peak hour traffic flows are shown in Figure 3-2.

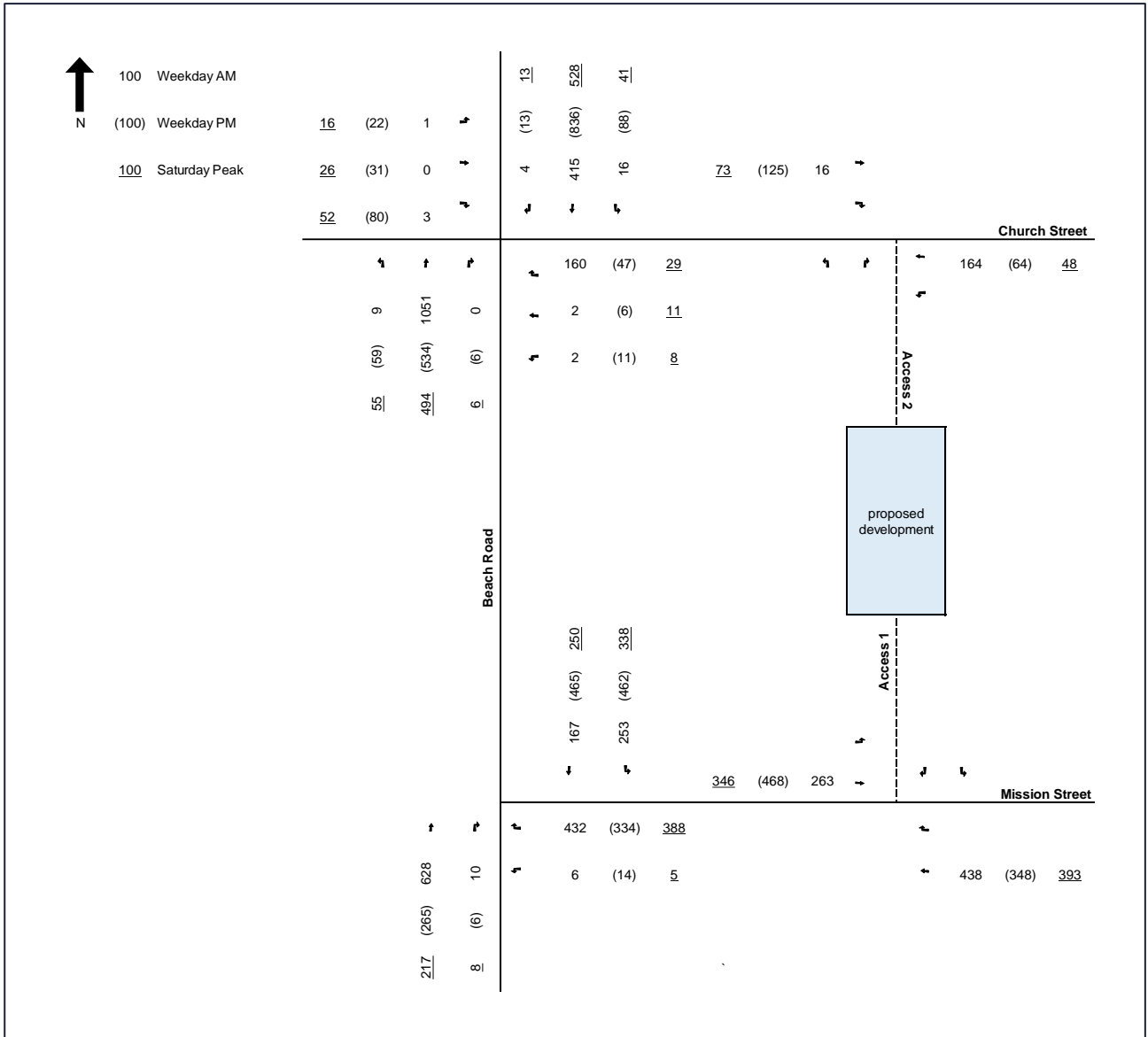


Figure 3-2: 2024 Base Year Peak Hour Traffic Flows

3.4 Traffic Growth Rates

A traffic growth rate is applied to background traffic in order to determine the anticipated growth in this traffic besides that relating to planned and new developments. The Committee of Transport Officials Trip Data Manual (COTO, TMH 17 Volume 1 Version 1.01) provides typical growth rates to be used for growth areas based on the existing/anticipated rate of growth. Refer to Table 3-1.

Table 3-1: Typical Growth Rates

Development Area	Growth Rate
Low Growth Areas	0% - 3%
Average Growth Areas	3% - 4%
Above Average Growth Areas	4% - 6%
Fast Growing Ares	6% - 8%
Exceptionally High Growth Areas	> 8%

Taking into consideration the nature and extent of development within this area, an annual compounded traffic growth rate of 3.0% was applied to the 2024 Background traffic flows in order to derive the 2029 Forecast Year traffic flows.

The 2029 Forecast Year traffic flows are shown in Figure 3-3.

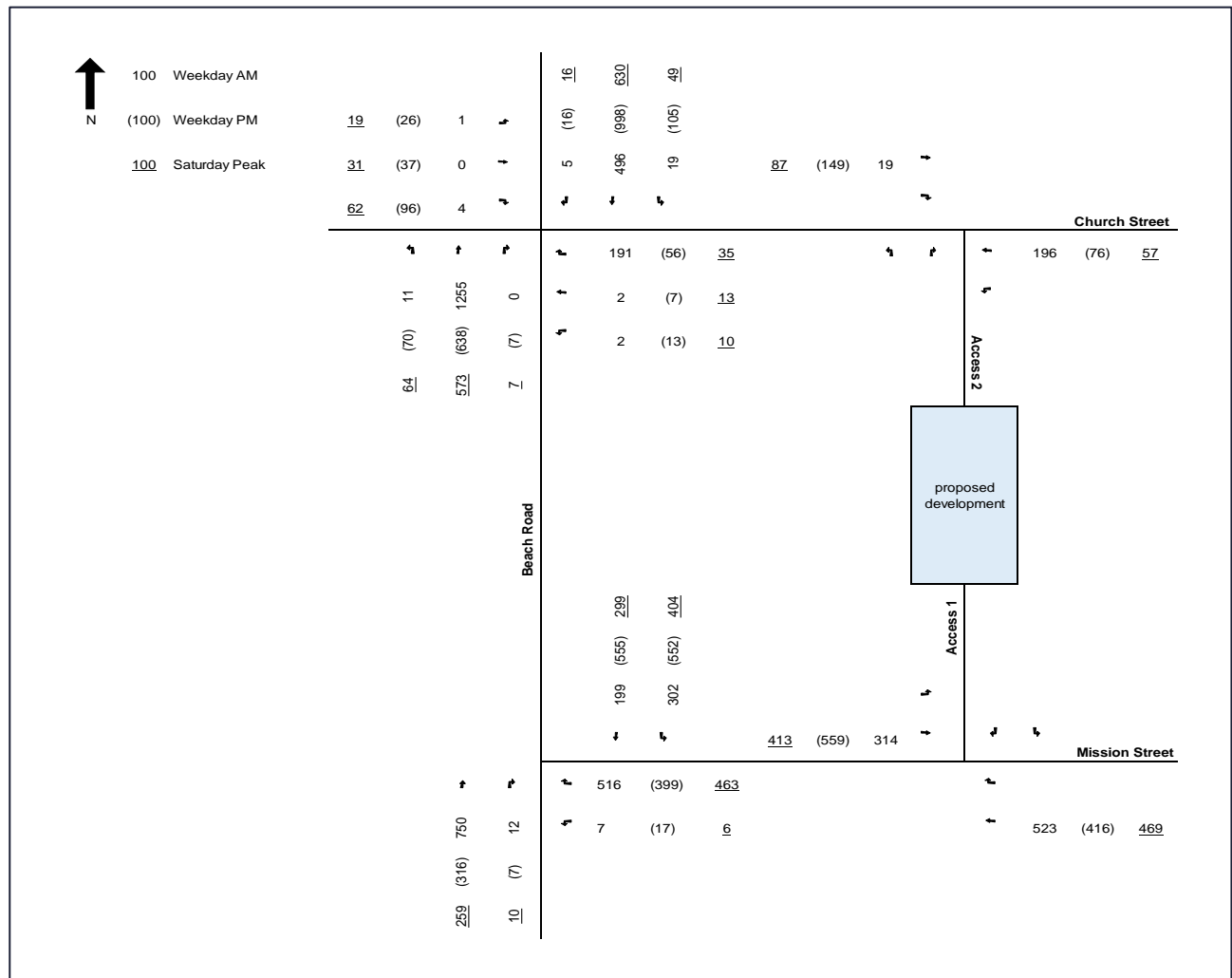


Figure 3-3: 2029 Forecast Year Traffic Flows

4. Trip Generation, Distribution and Assignment

4.1 Trip Generation

The Trip Generation Rates for the land use types forming part of the development were obtained from the COTO TMH 17 South African Trip Data Manual dated September 2013.

The trip generation of the proposed development is shown in Table 4-1.

Table 4-1: Proposed Development Trip Generation

TMH17 Land Use	Quantity	Trip Generation Rates			Adjustment Factors (Mixed-use Development)	Traffic generation (vph)					
						Weekday				Saturday	
		Weekday		Saturday		AM		PM		IN	OUT
		AM	PM			IN	OUT	IN	OUT		
Retail	665 m ²	0.6	3.4	4.5	0%	16	8	68	68	90	90
Fast Food	250 m ²	45.0	50.0	30.0	0%	62	51	69	56	38	38
Filling Station		3%	3%	3%	0%	22	22	23	23	23	23
Retail: New						16	8	39	39	45	45
Retail: Pass-By						0	0	26	26	32	32
Retail: Diverted						0	0	20	20	34	34
Fast Food: New						62	51	16	13	38	38
Fast Food: Pass-By						0	0	36	29	0	0
Fast Food: Diverted						0	0	17	14	0	0
ALL Trips						100	81	160	147	151	151
ALL New Trips						100	81	78	75	106	106
						181		153		212	

It is anticipated that the proposed development would generate 181, 153 and 212 new vehicular trips during the Weekday AM, Weekday PM, and Saturday peak hours respectively.

4.2 Trip Distribution

Trip distribution was estimated manually based on existing traffic flows, traffic generators in the surrounding areas and the development access locations. The trip distribution figures provided are as follows:

- Figure 4-1: Trip Distribution: New Trips
- Figure 4-2: Trip Distribution: Pass-by Trips
- Figure 4-3: Trip Distribution: Diverted Trips

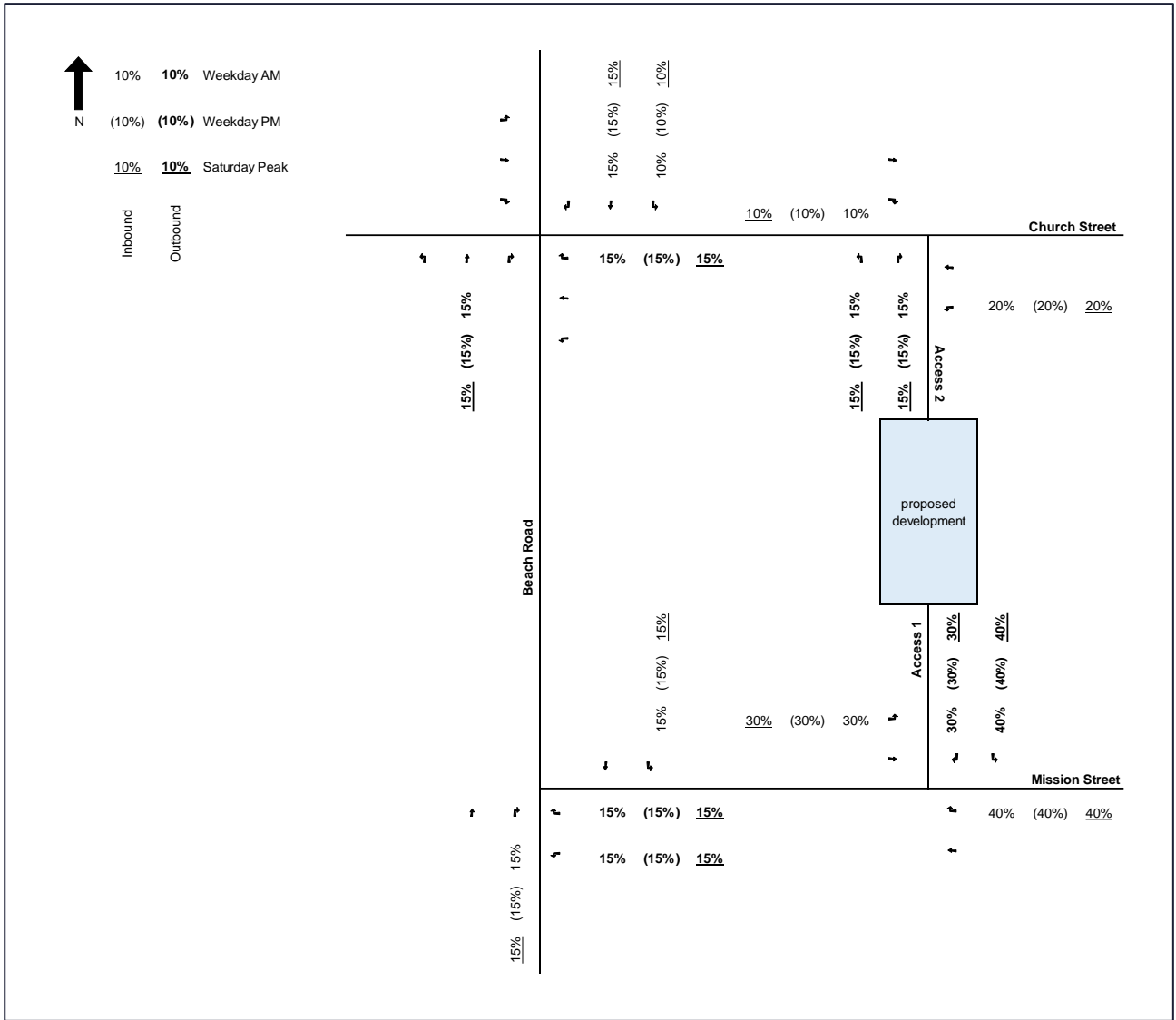


Figure 4-1: Trip Distribution: New Trips

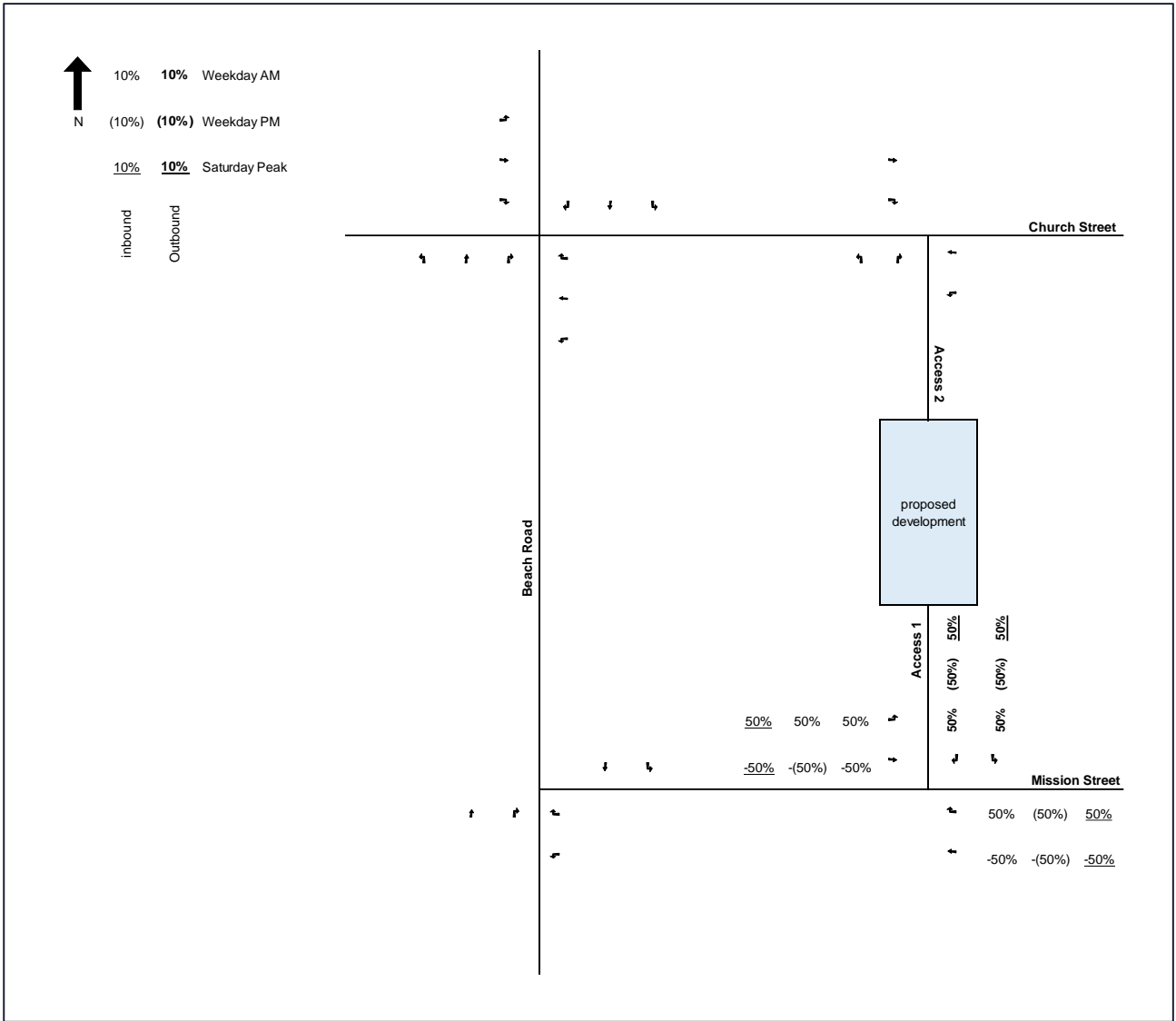


Figure 4-2: Trip Distribution: Pass-by Trips

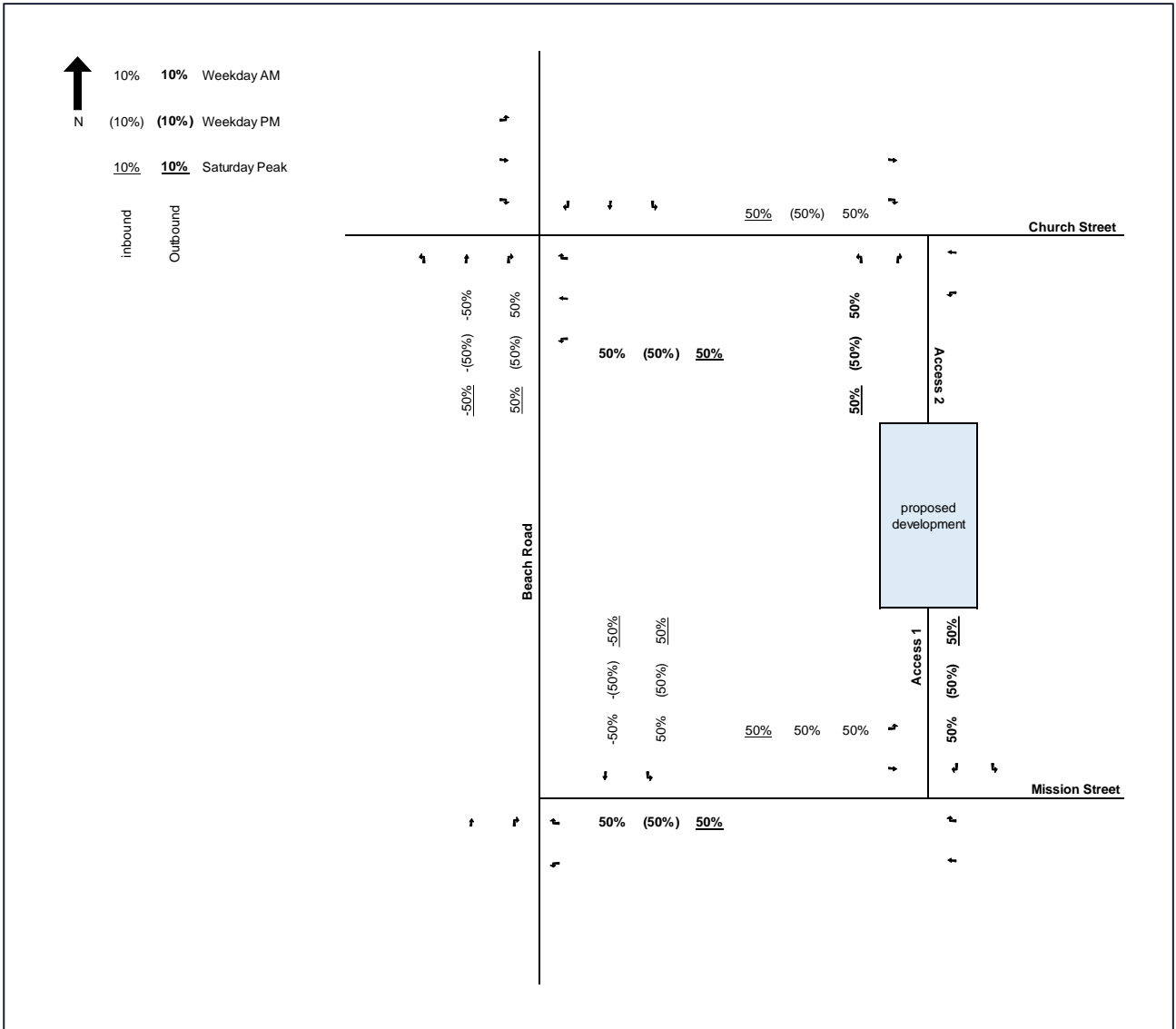


Figure 4-3: Trip Distribution: Diverted Trips

4.3 Traffic Assignment

Traffic assignment involves determining the amount of traffic that will use specific routes in the network based on the associated trip distribution. The traffic assignment figures provided are as follows:

- Figure 4-4 Traffic Assignment: New Trips
- Figure 4-5 Traffic Assignment: Pass-by Trips
- Figure 4-6 Traffic Assignment: Diverted Trips

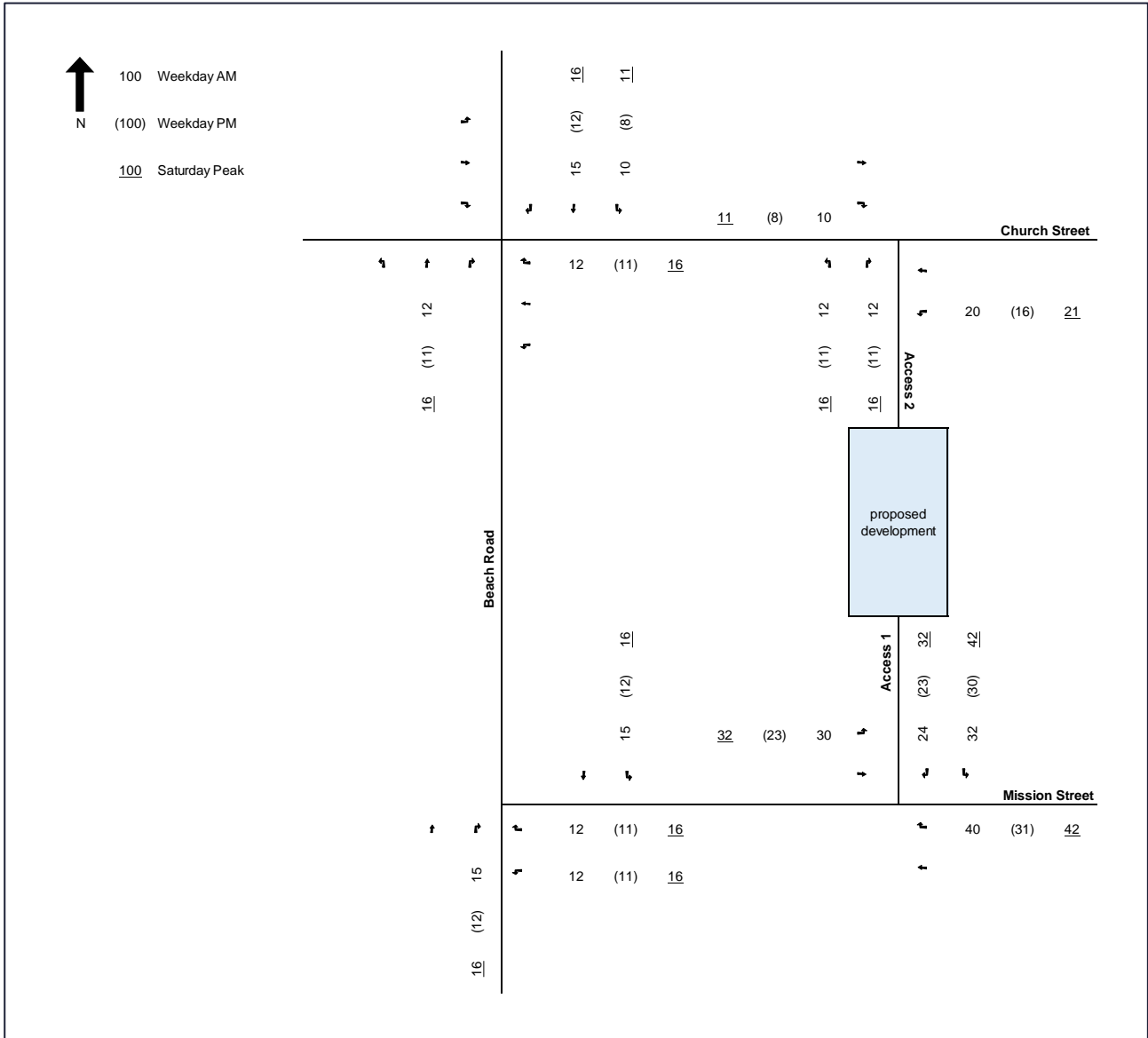


Figure 4-4: Traffic Assignment: New Trips

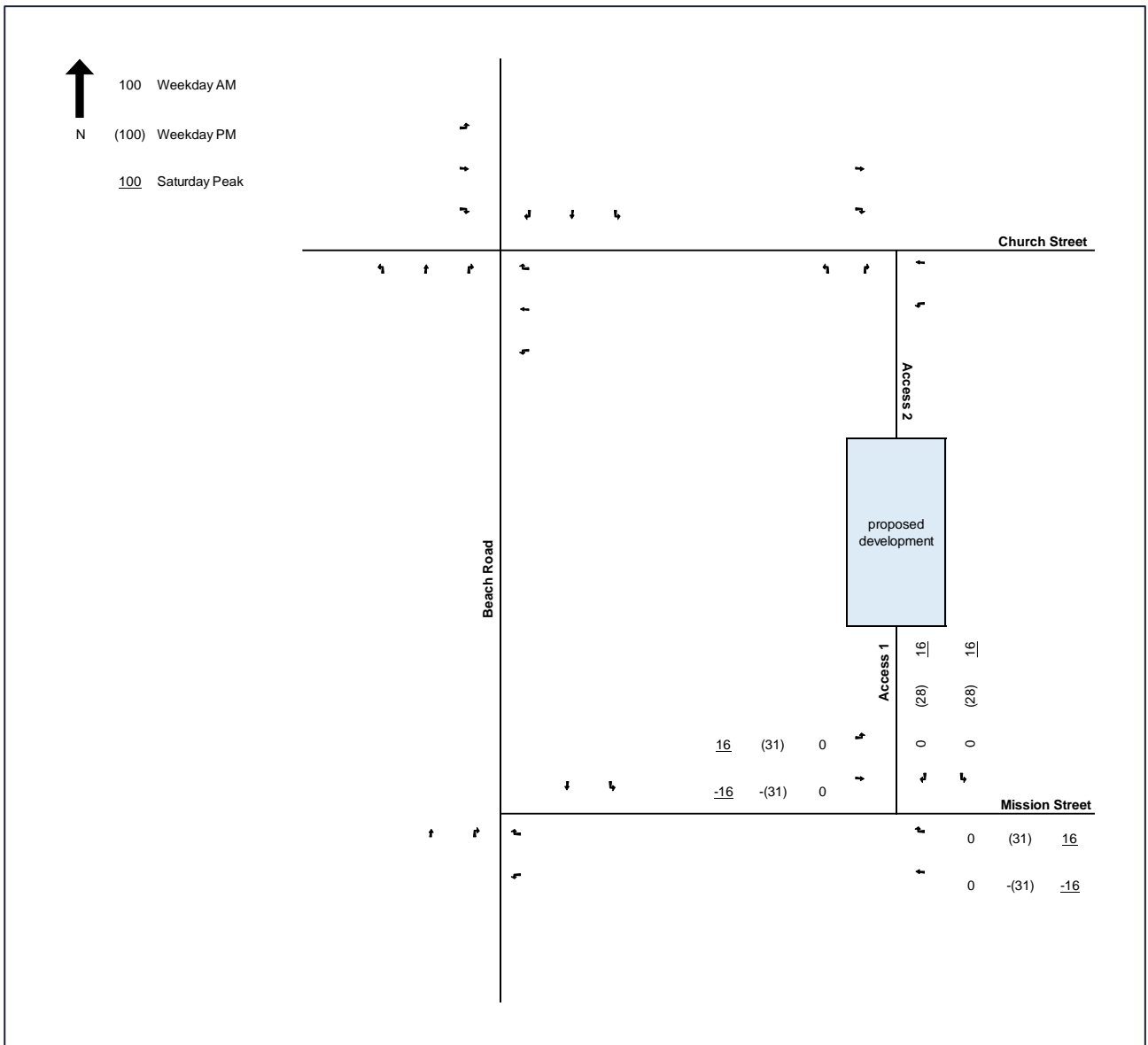


Figure 4-5: Traffic Assignment: Pass-by Trips

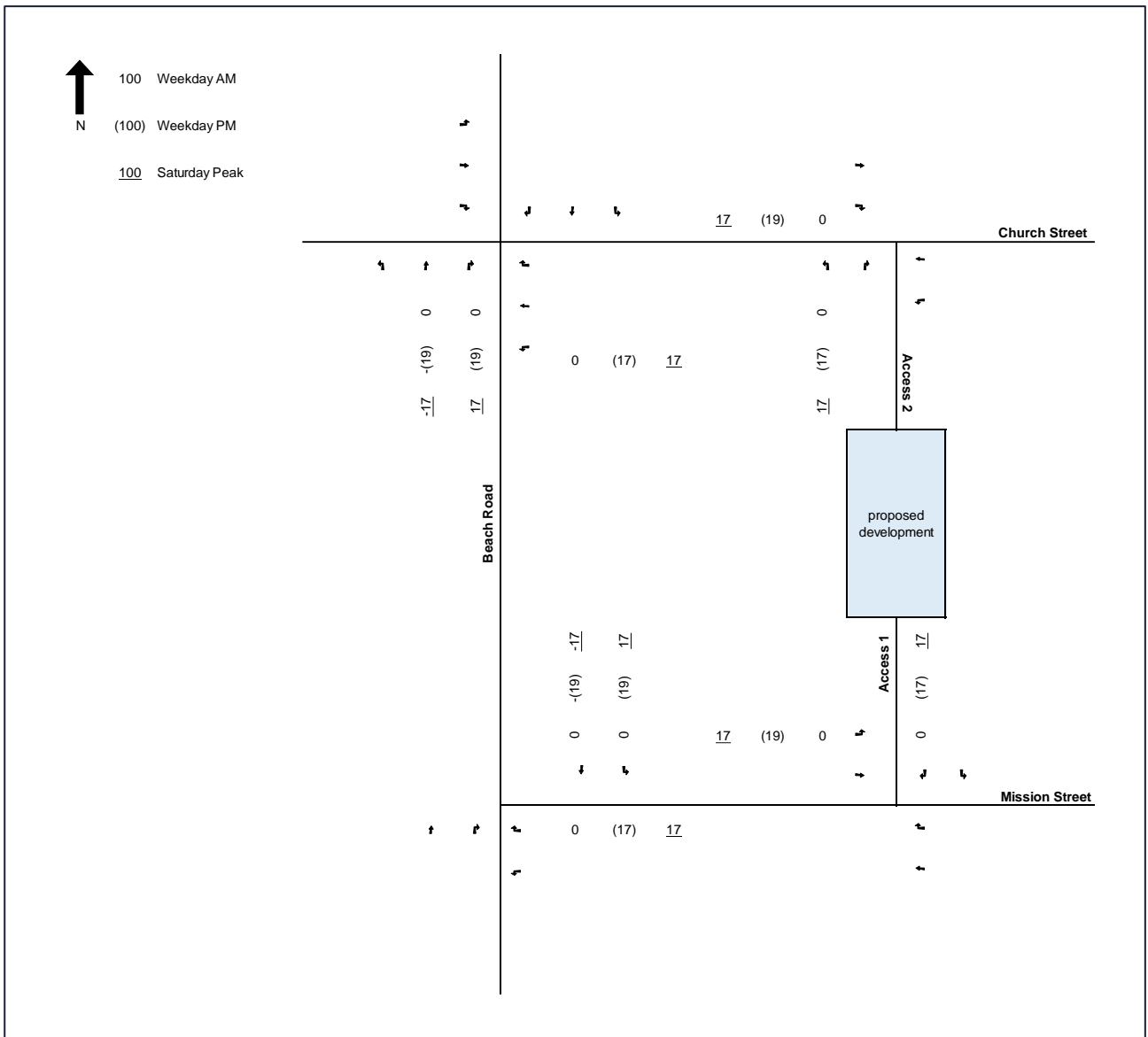


Figure 4-6: Traffic Assignment: Diverted Trips

4.4 Total Traffic Demand

Total traffic demand figures are provided for each forecast year forming part of the study, as follows:

- Figure 4-7 2024 Base Year Traffic Flows + Development Trips
- Figure 4-8 2029 Forecast Year Traffic Flows + Development Trips

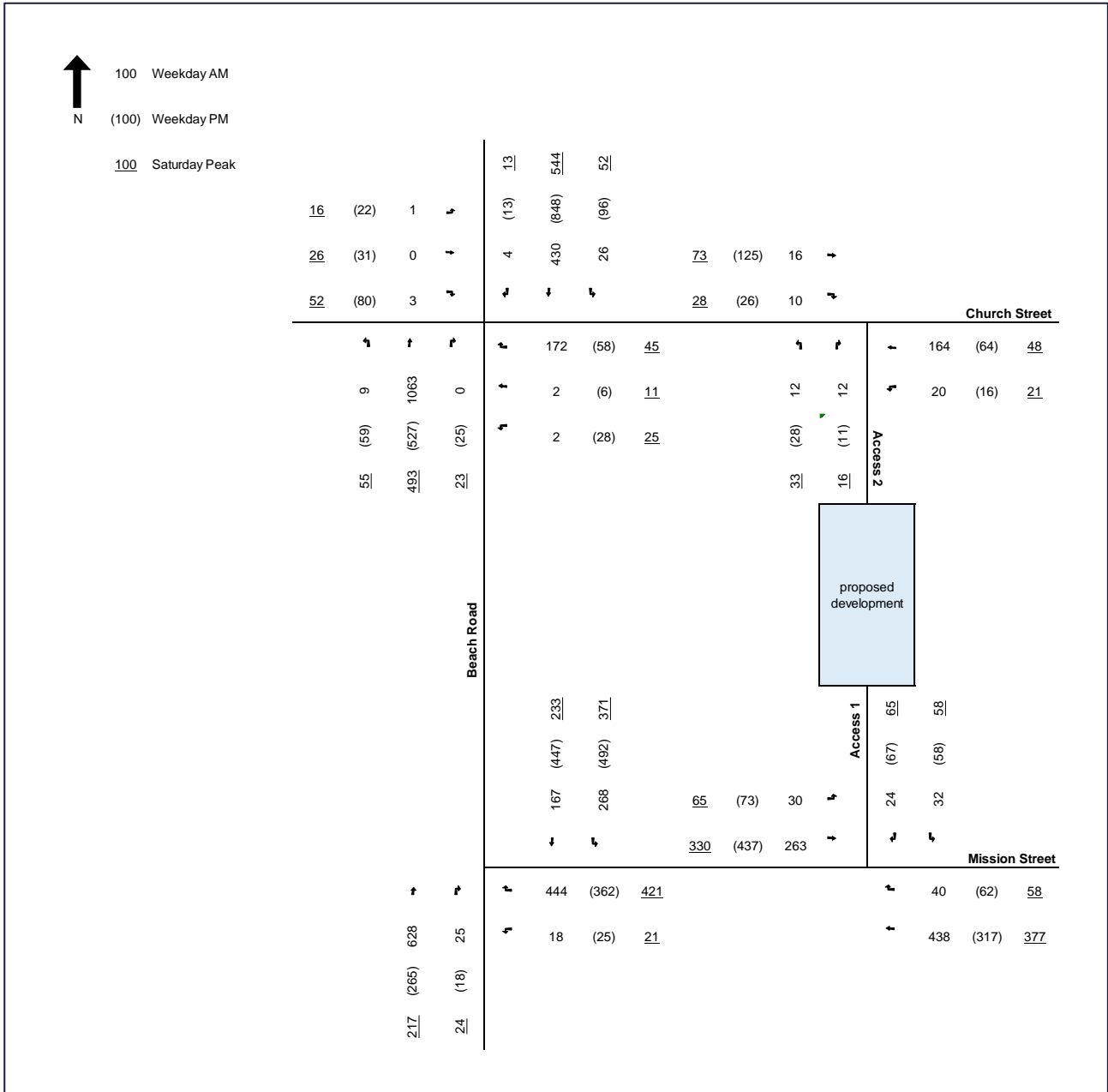


Figure 4-7: 2024 Base Year Traffic Flows + Development Trips

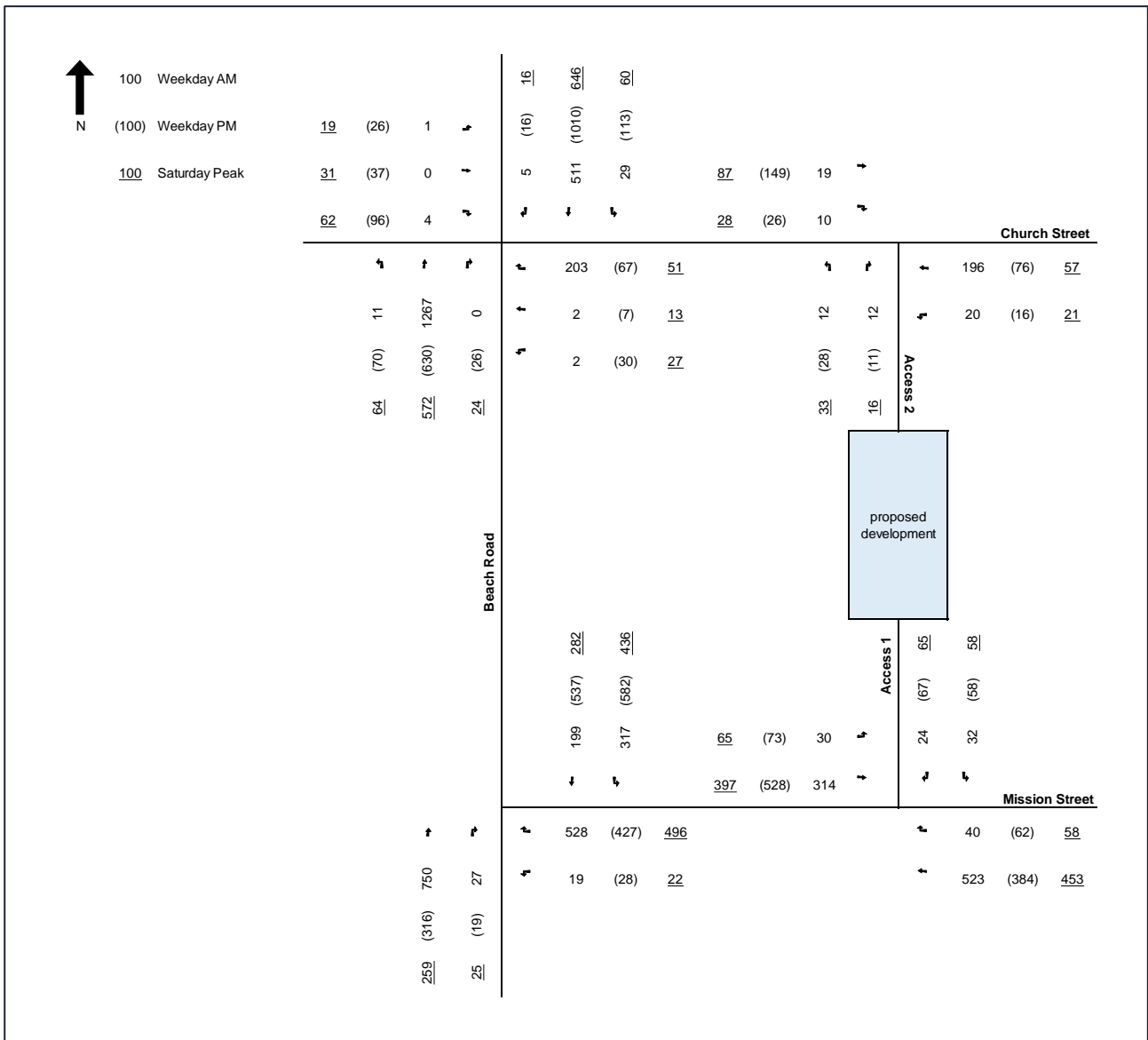


Figure 4-8: 2029 Forecast Year Traffic Flows + Development Trips

5. Traffic Analyses

Intersection capacity analyses were undertaken to determine the anticipated operational performance of the site access and surrounding road network, taking into consideration the anticipated development trips. The state-of-the-art traffic engineering software package, SIDRA Intersection 9.1 software, was used. The intersections analysed for the development are listed below:

- Beach Road and Mission Street
- Beach Road and Church Street
- Mission Street and Proposed Access 1
- Church Street and Proposed Access 2

The following scenarios were analysed as part of this project assignment:

- 2024 Base Year
- 2024 Base Year + Development Trips
- 2029 Forecast Year + Development Trips

The operational performance of an intersection is typically quantified in terms of Level of Service as defined by the SIDRA Intersection User Guide Ver. 8 (2018). These definitions relate average delays at intersections (for individual turning movements, for each approach and for the overall intersection) to a level of service ranging from A to F, as shown in Table 5-1.

Table 5-1: Intersection-Based Level of Service Criteria

Level of Service	Control Delay per Vehicle in Seconds (d)			LOS for V/C Ratio
	Signals	Roundabouts	Stop Signs and Yield Signs	V/C > 1
A	$d \leq 10$	$d \leq 10$	$d \leq 10$	F
B	$10 < d \leq 20$	$10 < d \leq 20$	$10 < d \leq 15$	F
C	$20 < d \leq 35$	$20 < d \leq 35$	$15 < d \leq 25$	F
D	$35 < d \leq 55$	$35 < d \leq 50$	$25 < d \leq 35$	F
E	$55 < d \leq 80$	$50 < d \leq 70$	$35 < d \leq 50$	F
F	$80 < d$	$70 < d$	$50 < d$	F

Detailed SIDRA outputs are contained in Appendix B.

5.1 Beach Road and Mission Street

The intersection of Beach Road and Mission Street takes the form of a signalised T-junction. The north approach has a shared left-and-through lane as well as an exclusive through lane; the east approach has shared left-and-right-turn lane; and the south approach has an exclusive through-lane plus a shared through-and-right-turn lane. Refer to Figure 5-1.

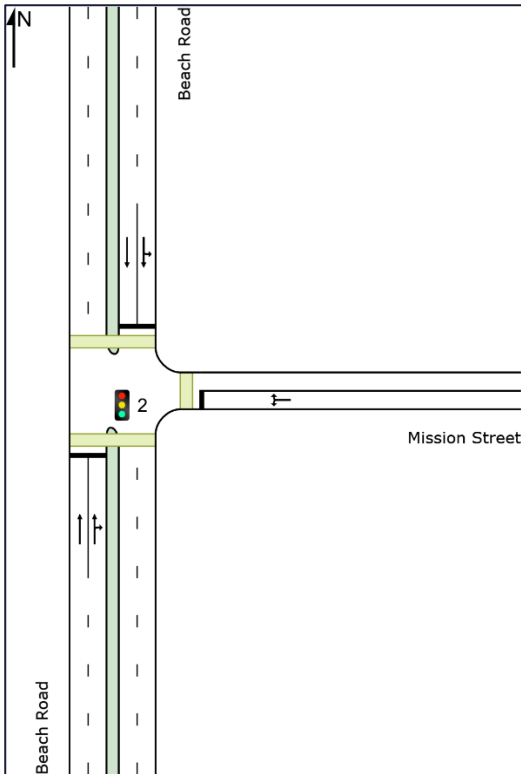


Figure 5-1: Existing Intersection Layout: Beach Road and Mission Street

2024 Background Year Traffic Flows

Taking into consideration the 2024 Base Year traffic flows, the intersection currently operates at an overall Level of Service B during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 17, 17 and 16 seconds respectively.

2024 Background Year + Development Traffic Flows

Taking into consideration the 2024 Background Traffic plus the anticipated development traffic flows, the intersection is anticipated to continue to operate at an overall Level of Service B during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 17, 18 and 18 seconds respectively.

2029 Forecast Year + Development Traffic Flows

Taking into consideration the 2029 Background Traffic plus the anticipated development traffic flows, the intersection is anticipated to operate at an overall Level of Service C during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 20, 21 and 21 seconds respectively.

It is concluded that the existing intersection configuration is able to accommodate the 2029 Forecast Year traffic flows plus the anticipated development trips at an acceptable Level of Service

5.2 Beach Road and Church Street

The existing intersection of Beach Road and Church Street takes the form of an unsignalised intersection with stop control along the east and west approaches. The north approach has a shared left-and-through lane plus a shared through-and-right-turn lane; the east approach has a single lane serving all movements; the south approach has a shared left-and-through lane plus a shared through-and-right-turn lane; and the west approach has a single lane serving all movements. Refer to Figure 5-2.

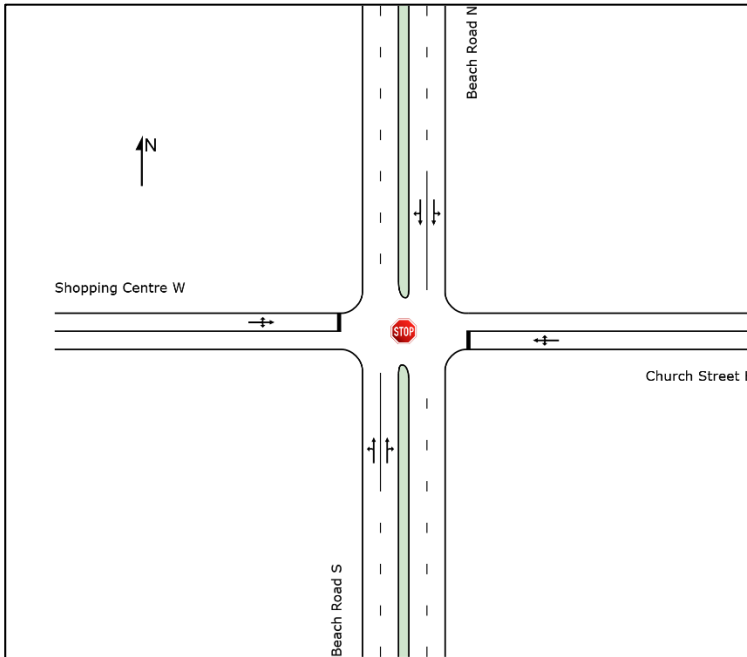


Figure 5-2: Existing Intersection Layout: Beach Road & Church Street

2024 Background Year Traffic Flows

Taking into consideration the 2024 Base Year traffic flows, the intersection currently operates at an overall Level of Service F, D and C during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 64, 34 and 17 seconds respectively.

It is however anticipated that the close proximity of the signalised intersection of Beach Road and Mission Street to the south of this intersection leads to the platooning of vehicles from the south, thereby allowing side road traffic along Church Street to join onto Beach Road. It is our submission that the existing intersection configuration is able to accommodate the 2024 Background Traffic at an acceptable Level of Service.

2024 Background Year + Development Trips

Taking into consideration the 2024 Background Traffic plus the anticipated development traffic flows, the intersection is anticipated to continue to operate at an overall Level of Service F, E and C during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 93, 37 and 18 seconds respectively.

2029 Forecast Year + Development Trips

Taking into consideration the 2029 Background Traffic plus the anticipated development traffic flows, the intersection is anticipated to continue to operate at an overall Level of Service F, F and C during the Weekday AM, Weekday PM and Saturday Peak Hours, with an average delay of approximately 645, 212 and 24 seconds respectively.

It is our submission that intersection upgrades might be required to accommodate the 2029 Background plus Development Traffic at an acceptable Level of Service. The type and extent of intersection upgrades will be based on intersection configurations along Beach Road at that point in time. If a signalised intersection is implemented along Beach Road to the north of this location, it would allow for platooning of vehicles from the north, therefore no upgrades would be required to this intersection. Should the current intersection configurations along Beach Road remain as-is, it might be deemed necessary to convert Church Street to a left-in, left-out intersection along the east and west approaches, following a road safety investigation at that point in time.

5.3 Mission Street and Proposed Site Access 1

The proposed Access 1 along Mission Street is planned as an unsignalised T-junction with stop control along the access road. All approaches will comprise of one lane per direction. Refer to Figure 5-3.

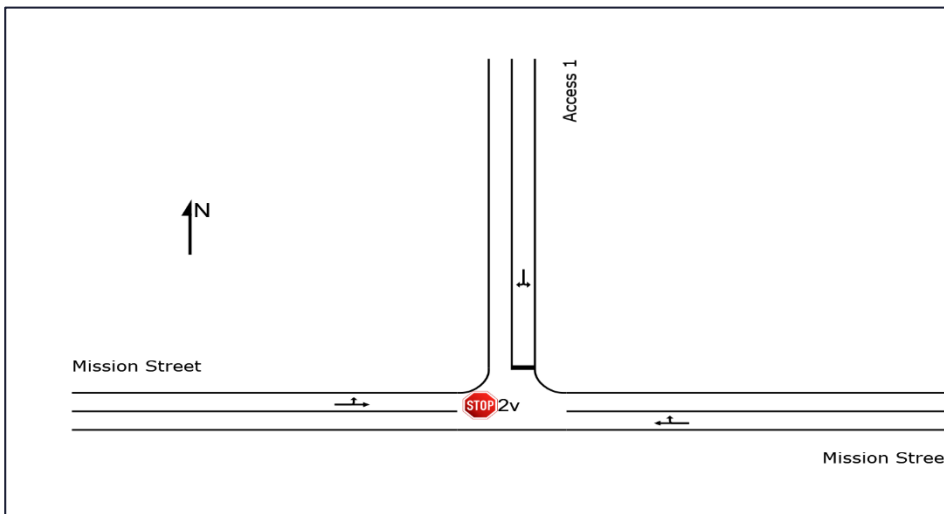


Figure 5-3: Proposed Site Access 1

2024 Base Year + Development Trips

Taking into consideration the 2024 Base Year traffic flows plus the anticipated development trips, the critical movements under stop control are anticipated to operate at a Level of Service A during the Weekday AM, Weekday PM, and Saturday Peak Hours, with an average delay of approximately 9, 10 and 9 seconds respectively.

2029 Forecast Year + Development Trips

Taking into consideration the 2029 Forecast Year traffic flows plus the anticipated development trips, the critical movements under stop control are anticipated to operate at a Level of Service A during the Weekday AM, Weekday PM, and Saturday Peak Hours, with an average delay of approximately 9, 10 and 10seconds respectively.

It is concluded that the proposed access configuration would be able to accommodate the 2029 Forecast Year traffic flows plus the anticipated development trips at an acceptable Level of Service.

5.4 Church Street and Proposed Site Access 2

The proposed Access 2 along Church Street is planned as an unsignalled T-junction with stop control along the access road. All approaches will comprise of one lane per direction. Refer to Figure 5-4.

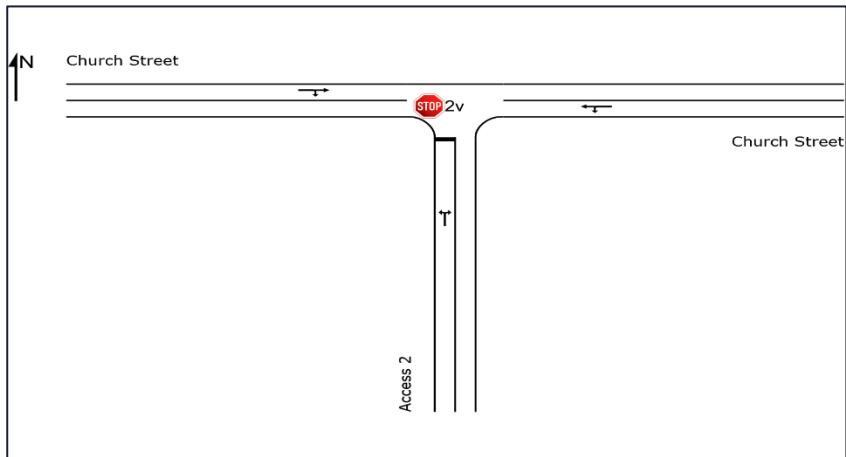


Figure 5-4: Proposed Site Access 2

2024 Base Year + Development Trips

Taking into consideration the 2024 Base Year traffic flows plus the anticipated development trips, the critical movements under stop control are anticipated to operate at a Level of Service A during the Weekday AM, Weekday PM, and Saturday Peak Hours, with an average delay of approximately 8 seconds.

2029 Forecast Year + Development Trips

Taking into consideration the 2029 Forecast Year traffic flows plus the anticipated development trips, the critical movements under stop control are anticipated to operate at a Level of Service A during the Weekday AM, Weekday PM, and Saturday Peak Hours, with an average delay of approximately 8 seconds.

It is concluded that the proposed access configuration would be able to accommodate the 2029 Forecast Year traffic flows plus the anticipated development trips at an acceptable Level of Service.

5.5 Analysis Summary

A summary of the analysis outputs is provided in Table 5-2.

Table 5-2: Analysis Summary

Intersection	2024 Base Year	2024 Base Year + Development Trips	2029 Forecast Year + Development Trips
Beach Road and Mission Street	B / B / B	B / B / B	C / C / C
Beach Road and Church Street	F / D / C	F / E / C	F / F / C
Mission Street and Proposed Access 1	-	A / A / A*	A / A / A*
Church Street and Proposed Access 2	-	A / A / A*	A / A / A*

* Worst performing priority-controlled approach

6. Site Impact Assessment

A site traffic impact assessment was undertaken to evaluate internal operations, parking and loading bay requirements as well as the access throat length. Where necessary, suitable mitigation measures are proposed.

6.1 Internal Operations

The internal layout of the planned development should be designed in such a way to promote ease of movement. A minimum 3.5-metre lane width and 12-metre bellmouth radius is recommended for use at all internal road junctions. The access and internal road layout should be such to allow for the swept path of fire trucks. Should the internal roads not be designed to cater for moving company vehicles, suitable provision should be made outside the development, in the direct vicinity of the access.

6.2 Parking

Parking provision is an important consideration of any development and would ultimately ensure that vehicular traffic is accommodated on-site in its entirety. Insufficient parking provision would have dire consequences on the operational performance of the site and surrounding public roads, as well as on road safety.

The George Integrated Zoning Scheme By-Law (2023) was used to ascertain the parking requirements applicable to the development. Taking into consideration the surrounding area, it is our submission that the subject site falls within a Normal Area.

The parking requirements associated with the commercial component of the planned development are provided in Table 6-1.

The commercial component of the planned development was taken to coincide with the land use type “Service Station” and “Neighbourhood Shop” from the George Integrated Zoning Scheme By-Law (2023). The parking requirements of the commercial component of the planned development are provided in Table 6-1.

Table 6-1: Parking Requirements: Commercial Land Use

Land Use	Quantity	Minimum Parking Ratio	Parking Requirement (bays)
Service Station	288 m ²	Minimum of 8 bays Plus 4 bays per 100 m ² GLA	20
Neighbourhood Shop (Retail)	377 m ²	4 bays per 100 m ² GLA	15
Neighbourhood Shop (Fast Food)	250 m ²	4 bays per 100 m ² GLA	10

45 Parking bays would need to be provided to serve the commercial component of the development, of which 1 parking bay would need to be accessible to the physically disabled. The Site Development Plan makes provision for 50 parking bays for the commercial component of the development, therefore sufficient provision is made to meet the requirements.

6.3 Loading

The George Integrated Zoning Scheme By-Law (2023) was used to ascertain the loading bay requirements to be adhered to. Taking into consideration the planned floor area of the shopping centre, three (3 No.) loading bays would be required to serve the development.

It is our submission that the one (1 No.) loading bays on the Site Development Plan would be sufficient for the requirements of the commercial component of the proposed development.

In addition, provision needs to be made for a fuel bowser, the location of which should not impact traffic movements onto the site.

6.4 Throat Length

Adequate throat length provision is essential in ensuring efficient operation of a development access and preventing possible spill-back onto the surrounding public road. The throat length requirements were derived from the Committee of Transport Officials South African Traffic Impact and Site Traffic Assessment Standards and Requirements Manual (COTO, TMH 16 Volume 2).

For a mixed-use development gaining access on a Class 4b road, a minimum ingress and egress throat length of 15 metres is required. The provided throat length of approximately 10 metres for Access 1 and 38 metres for Access 2 (measured from the public road edge to the edge of the nearest parking bay) therefore access 1 falls short of the minimum requirement.

It is recommended that to convert access 1 to comply to a 15-metre ingress and egress throat length, the first 2 adjacent parking bays would be converted to a curbed island. This conversion would extend the ingress and egress throat length to 15 metres.

7. Proposed Improvements

The following transport improvements are proposed as part of the planned development, to be implemented at the cost of the developer:

2024 Base Year:

- Access 1: High-volume driveway along Mission Street, approximately 45 metres upstream of Beach Road;
- Access 2: High-volume driveway along Church Street, approximately 82 metres downstream of Beach Road; and
- Pedestrian walkways along Church Street and Mission Street, linking to Beach Road.

2029 Design Year:

- Intersection upgrades might be required at the Beach Road and Mission Street intersection. The type and extent of intersection upgrades will be based on intersection configurations along Beach Road at that point in time. If a signalised intersection is implemented along Beach Road to the north of this location, it would allow for platooning of vehicles from the north, therefore no upgrades would be required to this intersection. Should the current intersection configurations along Beach Road remain as-is, it might be deemed necessary to convert Church Street to a left-in, left-out intersection along the east and west approaches, following a road safety investigation at that point in time.

8. Conclusions and Recommendations

SMEC South Africa (Pty) Ltd was appointed by NH Warrington to conduct a Traffic Impact Assessment for the proposed mixed-use development on erf 7379, Pacaltsdorp, Western Cape.

The subject site measures approximately 0.46 hectares in extent and will comprise of a filling station with a convenience store, line shops and a Drive Thru.

It is planned for the development to be served by two accesses, access 1 along Mission Street and access 2 along Church Street. Access 1 is ~ 45m to the east of the unsignalized full intersection with Beach Road and access 2 is ~ 82m along Church Street also to the east of the signalized full intersection with Beach Road. Refer to Figure 2-4.

The access spacing requirements were derived from the Western Cape Government (WCG) Access Management Guidelines (2020).

Access 1 is classified as an equivalent collector as it is anticipated to serve 60 – 500 vehicles per hour per direction, whereas access 2 is classified as a high-volume driveway as it is anticipated to serve 30 – 60 vehicles per hour per direction.

The minimum spacing requirement for a Class 4 Road within a suburban roadside development environment is as follows:

- 180 metres from a signalised full intersection to an unsignalized full intersection, Access 1, (equivalent collector driveway)
- 115 metres from the second last driveway, Access 2, to an unsignalized full intersection

It is noted that the site accesses spacing of Access 1 and Access 2 do not conform to the requirements of the WCG Access Management Guidelines, however these accesses were approved prior to the latest requirements being adopted.

It is anticipated that the proposed development would generate 181, 153 and 212 new vehicular trips during the Weekday AM, Weekday PM, and Saturday peak hours respectively.

The George Integrated Zoning Scheme By-Law (2023) was used to ascertain the parking requirements applicable to the development. Taking into consideration the surrounding area, it is our submission that the subject site falls within a Normal Area. The total parking requirement to serve the commercial components of the development is 45 parking bays, with 1 accessible to the physically disabled.

The Site Development Plan makes provision for 50 parking bays for the commercial component of the development, therefore sufficient provision is made to meet the requirements.

For a mixed-use development gaining access on a Class 4b road, a minimum ingress and egress throat length of 15 metres is required. The provided throat length of approximately 10 metres for Access 1 and 38 metres for Access 2 (measured from the public road edge to the edge of the nearest parking bay) therefore, access 1 falls short of the minimum requirement.

It is recommended that to convert access 1 to comply to a 15-metre ingress and egress throat length, the first 2 adjacent parking bays would be converted to a curbed island. This conversion would extend the ingress and egress throat length to 15 metres.

The following transport improvements are proposed as part of the planned development, to be implemented at the cost of the developer:

2024 Base Year:

- Access 1: High-volume driveway along Mission Street, approximately 45 metres upstream of Beach Road; and
- Access 2: High-volume driveway along Church Street, approximately 82 metres downstream of Beach Road; and

- Pedestrian walkways along Church Street and Mission Street, linking to Beach Road.

2029 Design Year:

- Intersection upgrades might be required at the Beach Road and Mission Street intersection. The type and extent of intersection upgrades will be based on intersection configurations along Beach Road at that point in time. If a signalised intersection is implemented along Beach Road to the north of this location, it would allow for platooning of vehicles from the north, therefore no upgrades would be required to this intersection. Should the current intersection configurations along Beach Road remain as-is, it might be deemed necessary to convert Church Street to a left-in, left-out intersection along the east and west approaches, following a road safety investigation at that point in time.

Appendix A Detailed Traffic Counts

Beach Road and Mission Street

LOCATION 1		PACALTSDORP										Date: 15/11/2024			
12 HOUR COUNT		CARS										Day: Friday			
AM PEAK		06:30		07:30						PM PEAK		16:15		17:15	
BEACH ROAD															
						1040		0		117		200		317	
						540		0		374		405		779	
				OUT		IN		OUT		IN		OUT		IN	
				0		0		10		6		409		0	
				0		0		11		5		0		0	
				0		0		12		4		3		0	
				IN		OUT		IN		OUT		IN		OUT	
				634		0		631		3		120		412	
				0		0		0		0		0		299	
				267		0		255		12		388			
MISSION STR															
Time	South			East			North			West			Hourly		
	1	2	3	4	5	6	7	8	9	10	11	12			
05:00															
05:15															
05:30															
05:45															
06:00														05:00	
06:15		58	1	0		81	33	20						05:15	
06:30		148	0	0		97	36	19						05:30	
06:45		233	1	0		120	38	24						05:45	
07:00		137	1	0		94	44	41						06:00	
07:15		113	1	3		98	82	33						06:15	
07:30		134	6	2		86	64	53						06:30	
07:45		107	5	0		92	62	49						06:45	
08:00		71	3	2		58	65	53						07:00	
08:15		68	3	2		83	50	40						07:15	
08:30		59	0	1		59	49	41						07:30	
08:45		63	0	2		47	53	44						07:45	
09:00		41	2	3		57	45	36						08:00	
09:15														08:15	
09:30														08:30	
09:45														08:45	
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14:45														13:45	
15:00														14:00	
15:15		41	5	3		70	70	85						14:15	
15:30		50	3	1		47	77	53						14:30	
15:45		61	3	7		60	79	92						14:45	
16:00		41	1	2		64	66	66						15:00	
16:15		65	4	2		76	81	87						15:15	
16:30		59	4	4		48	90	99						15:30	
16:45		76	2	4		66	128	98						15:45	
17:00		55	2	4		95	106	90						16:00	
17:15		69	2	6		74	145	125						16:15	
17:30		68	1	0		66	82	120						16:30	
17:45		66	1	4		79	117	112						16:45	
18:00		68	3	4		55	94	84						17:00	
18:15														17:15	
18:30														17:30	
18:45														17:45	
19:00														18:00	
19:15														18:15	
19:30														18:30	
19:45														18:45	
20:00														19:00	
Total		1951	54	56		1772	1756	1564						7153	
AM PEAK		0	631	3	3	0	409	200	117	0	0	0	0	1363	
PM PEAK		0	0	0	0	0	0	0	0	0	0	0	0	1345	

LOCATION	1 PACALTSDORP											Date: 16/11/2024		
12 HOUR COUNT	TOTAL VEHICLES											Day: Saturday		
AM PEAK	06:30 07:30								PM PEAK		16:15 17:15			
Time	South			East			North			West			Hourly	
05:00														
05:15														
05:30														
05:45													05:00	
06:00													05:15	
06:15													05:30	
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10:15													09:30	
10:30													09:45	
10:45													10:00	
11:00													10:15	
11:15		58	4			107	56	56					281	10:30
11:30		48	1	3		80	74	72					559	10:45
11:45		48	1	1		103	47	43					802	11:00
12:00		56	1	7		50	82	64					1062	11:15
12:15		68	5	1		78	88	77					1098	11:30
12:30		67	2	5		64	88	68					1114	11:45
12:45		46	2			85	79	79					1162	12:00
13:00		50	1	4		10	62	59					1088	11:15
13:15		67	5	4		159	89	43					1138	11:30
13:30		45		1		62	87	74					1113	11:45
13:45		56	2			92	78	69					1119	13:00
14:00		49	1			75	84	64					1206	13:15
14:15													839	13:30
14:30													570	13:45
14:45													273	14:00
15:00														14:15
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19:45														19:00
Total		658	25	26		965	914	768					3356	
AM PEAK														
PM PEAK														

LOCATION 1												Date: 16/11/2024			
12 HOUR COUNT		TOTAL VEHICLES										Day: Saturday			
AM PEAK		06:30	07:30									PM PEAK		16:15	17:15
BEACH RD															
CHURCH		0	0	0	0	0	0	0	0	0	0	0	0	0	CHURCH
<i>deepdesign</i>															
Time	South			East			North			West			Hourly		
	1	2	3	4	5	6	7	8	9	10	11	12			
05:00															
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10:45														09:45	
11:00														10:00	
11:15	16	147	2	2		13	10	102	2	2	6	8	310	10:15	
11:30	10	118			3	14	4	137	1	5	7	9	618	10:30	
11:45	15	135	1		4	8	11	78	3	2	1	12	888	10:45	
12:00	10	95	1	2	3	9	11	130	1	2	3	14	1169	11:00	
12:15	15	130	1			9	11	145	3	5	3	20	1201	11:15	
12:30	12	112	2	1		9	10	142	2	1	6	13	1203	11:30	
12:45	13	122	1	1		11	5	143	3		6	14	1252	11:45	
13:00	15	94	1	2	2	4	5	107	4	1	1	12	1219	12:00	
13:15	18	157	1	1		8	7	124	2	3	5	7	1210	12:15	
13:30	18	88	1	4	4	10	17	146	4	6	5	11	1214	12:30	
13:45	9	138	1	1	4	6	11	77	3	5	7	19	1176	12:45	
14:00	10	111	3	2	3	5	6	181	4	2	9	15	1279	13:00	
14:15													946	13:15	
14:30													632	13:30	
14:45													351	13:45	
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19:30														18:30	
19:45														18:45	
Total	161	1447	15	16	23	106	108	1512	32	34	59	154	3667	19:00	
AM PEAK															
PM PEAK															

Appendix B Detailed SIDRA Outputs

Beach Road and Mission Street

2024 Base Year

MOVEMENT SUMMARY

 Site: 2 [Beach& Mission - 2024 Base AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h	HV %	[Total veh/h	HV %				[Veh. veh	Dist] m				
South: Beach Road															
2	T1	All MCs	661	6.0	661	6.0	0.641	15.0	LOS B	6.4	46.8	0.93	0.81	0.99	48.0
3	R2	All MCs	11	6.0	11	6.0	* 0.641	24.8	LOS C	6.1	45.2	0.93	0.82	1.00	46.1
Approach			672	6.0	672	6.0	0.641	15.1	LOS B	6.4	46.8	0.93	0.81	0.99	48.0
East: Mission Street															
4	L2	All MCs	6	6.0	6	6.0	0.667	18.0	LOS B	8.1	59.7	0.89	0.85	0.94	44.7
6	R2	All MCs	455	6.0	455	6.0	* 0.667	18.0	LOS B	8.1	59.7	0.89	0.85	0.94	44.6
Approach			461	6.0	461	6.0	0.667	18.0	LOS B	8.1	59.7	0.89	0.85	0.94	44.6
North: Beach Road															
7	L2	All MCs	266	6.0	266	6.0	0.525	19.6	LOS B	4.7	34.3	0.90	0.80	0.90	43.8
8	T1	All MCs	176	6.0	176	6.0	0.329	13.1	LOS B	2.9	21.1	0.84	0.68	0.84	49.4
Approach			442	6.0	442	6.0	0.525	17.0	LOS B	4.7	34.3	0.87	0.75	0.87	45.9
All Vehicles			1575	6.0	1575	6.0	0.667	16.5	LOS B	8.1	59.7	0.90	0.81	0.95	46.4

MOVEMENT SUMMARY

Site: 2 [Beach& Mission - 2024 Base PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 50 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist] m				
South: Beach Road															
2	T1	All MCs	279	6.0	279	6.0	0.195	10.8	LOS B	2.4	18.0	0.69	0.56	0.69	50.7
3	R2	All MCs	6	6.0	6	6.0	0.195	25.2	LOS C	2.2	16.5	0.70	0.58	0.70	48.2
Approach			285	6.0	285	6.0	0.195	11.1	LOS B	2.4	18.0	0.69	0.56	0.69	50.6
East: Mission Street															
4	L2	All MCs	15	6.0	15	6.0	0.621	21.9	LOS C	7.9	58.3	0.90	0.83	0.91	42.7
6	R2	All MCs	352	6.0	352	6.0	* 0.621	21.8	LOS C	7.9	58.3	0.90	0.83	0.91	42.6
Approach			366	6.0	366	6.0	0.621	21.8	LOS C	7.9	58.3	0.90	0.83	0.91	42.6
North: Beach Road															
7	L2	All MCs	486	6.0	486	6.0	* 0.660	19.4	LOS B	10.1	74.3	0.87	0.84	0.89	43.9
8	T1	All MCs	489	6.0	489	6.0	0.630	13.3	LOS B	9.8	72.4	0.86	0.74	0.86	49.2
Approach			976	6.0	976	6.0	0.660	16.4	LOS B	10.1	74.3	0.86	0.79	0.87	46.4
All Vehicles			1627	6.0	1627	6.0	0.660	16.7	LOS B	10.1	74.3	0.84	0.76	0.85	46.1

MOVEMENT SUMMARY

Site: 2 [Beach& Mission - 2024 Base Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist]				
South: Beach Road															
2	T1	All MCs	228	6.0	228	6.0	0.216	11.6	LOS B	1.9	14.1	0.78	0.63	0.78	50.1
3	R2	All MCs	8	6.0	8	6.0	0.216	22.4	LOS C	1.7	12.5	0.78	0.63	0.78	47.9
Approach			237	6.0	237	6.0	0.216	12.0	LOS B	1.9	14.1	0.78	0.63	0.78	50.0
East: Mission Street															
4	L2	All MCs	5	6.0	5	6.0	0.641	18.3	LOS B	7.3	53.4	0.89	0.84	0.93	44.5
6	R2	All MCs	408	6.0	408	6.0	* 0.641	18.3	LOS B	7.3	53.4	0.89	0.84	0.93	44.4
Approach			414	6.0	414	6.0	0.641	18.3	LOS B	7.3	53.4	0.89	0.84	0.93	44.4
North: Beach Road															
7	L2	All MCs	356	6.0	356	6.0	* 0.643	19.9	LOS B	6.5	48.0	0.92	0.85	0.98	43.7
8	T1	All MCs	263	6.0	263	6.0	0.452	12.8	LOS B	4.4	32.1	0.86	0.71	0.86	49.5
Approach			619	6.0	619	6.0	0.643	16.9	LOS B	6.5	48.0	0.89	0.79	0.93	46.0
All Vehicles			1269	6.0	1269	6.0	0.643	16.4	LOS B	7.3	53.4	0.87	0.78	0.90	46.1

2024 Base Year + Development Trips

MOVEMENT SUMMARY

 Site: 2 [Beach& Mission - 2024 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist]				
South: Beach Road															
2	T1	All MCs	661	6.0	661	6.0	0.678	15.5	LOS B	6.9	51.0	0.94	0.85	1.05	47.6
3	R2	All MCs	26	6.0	26	6.0	* 0.678	26.3	LOS C	6.3	46.3	0.94	0.85	1.05	45.5
Approach			687	6.0	687	6.0	0.678	15.9	LOS B	6.9	51.0	0.94	0.85	1.05	47.5
East: Mission Street															
4	L2	All MCs	19	6.0	19	6.0	0.704	18.7	LOS B	8.9	65.7	0.90	0.87	1.00	44.3
6	R2	All MCs	467	6.0	467	6.0	* 0.704	18.7	LOS B	8.9	65.7	0.90	0.87	1.00	44.2
Approach			486	6.0	486	6.0	0.704	18.7	LOS B	8.9	65.7	0.90	0.87	1.00	44.2
North: Beach Road															
7	L2	All MCs	282	6.0	282	6.0	0.557	19.8	LOS B	5.0	36.7	0.90	0.81	0.90	43.7
8	T1	All MCs	176	6.0	176	6.0	0.329	13.1	LOS B	2.9	21.1	0.84	0.68	0.84	49.4
Approach			458	6.0	458	6.0	0.557	17.2	LOS B	5.0	36.7	0.88	0.76	0.88	45.7
All Vehicles			1632	6.0	1632	6.0	0.704	17.1	LOS B	8.9	65.7	0.91	0.83	0.98	46.0

MOVEMENT SUMMARY

 Site: 2 [Beach& Mission - 2024 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 50 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist] m				
South: Beach Road															
2	T1	All MCs	279	6.0	279	6.0	0.230	11.4	LOS B	2.9	21.6	0.72	0.60	0.72	49.9
3	R2	All MCs	19	6.0	19	6.0	0.230	28.4	LOS C	2.2	16.3	0.77	0.64	0.77	46.3
Approach			298	6.0	298	6.0	0.230	12.4	LOS B	2.9	21.6	0.73	0.60	0.73	49.7
East: Mission Street															
4	L2	All MCs	26	6.0	26	6.0	0.691	23.2	LOS C	9.4	68.9	0.93	0.86	1.00	42.0
6	R2	All MCs	381	6.0	381	6.0	* 0.691	23.1	LOS C	9.4	68.9	0.93	0.86	1.00	42.0
Approach			407	6.0	407	6.0	0.691	23.1	LOS C	9.4	68.9	0.93	0.86	1.00	42.0
North: Beach Road															
7	L2	All MCs	518	6.0	518	6.0	* 0.702	20.4	LOS C	11.3	83.2	0.89	0.86	0.94	43.4
8	T1	All MCs	471	6.0	471	6.0	0.606	13.1	LOS B	9.3	68.7	0.84	0.73	0.84	49.3
Approach			988	6.0	988	6.0	0.702	17.0	LOS B	11.3	83.2	0.87	0.80	0.90	46.0
All Vehicles			1694	6.0	1694	6.0	0.702	17.6	LOS B	11.3	83.2	0.86	0.78	0.89	45.5

MOVEMENT SUMMARY

 **Site: 2 [Beach& Mission - 2024 Base+Dev Saturday (Site Folder: General)]**

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist] m				
South: Beach Road															
2	T1	All MCs	228	6.0	228	6.0	0.263	12.2	LOS B	2.4	17.4	0.82	0.66	0.82	49.2
3	R2	All MCs	25	6.0	25	6.0	0.263	25.6	LOS C	1.7	12.7	0.86	0.69	0.86	45.6
Approach			254	6.0	254	6.0	0.263	13.6	LOS B	2.4	17.4	0.82	0.66	0.82	48.8
East: Mission Street															
4	L2	All MCs	22	6.0	22	6.0	0.721	19.9	LOS B	8.9	65.3	0.93	0.89	1.05	43.7
6	R2	All MCs	443	6.0	443	6.0	* 0.721	19.9	LOS B	8.9	65.3	0.93	0.89	1.05	43.6
Approach			465	6.0	465	6.0	0.721	19.9	LOS B	8.9	65.3	0.93	0.89	1.05	43.6
North: Beach Road															
7	L2	All MCs	391	6.0	391	6.0	* 0.706	21.0	LOS C	7.6	55.8	0.94	0.88	1.07	43.1
8	T1	All MCs	245	6.0	245	6.0	0.421	12.7	LOS B	4.0	29.6	0.85	0.70	0.85	49.6
Approach			636	6.0	636	6.0	0.706	17.8	LOS B	7.6	55.8	0.91	0.81	0.98	45.4
All Vehicles			1355	6.0	1355	6.0	0.721	17.7	LOS B	8.9	65.3	0.90	0.81	0.97	45.3

2029 Forecast Year + Development Trips

MOVEMENT SUMMARY

Site: 2 [Beach& Mission - 2029 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist]				
South: Beach Road															
2	T1	All MCs	789	6.0	789	6.0	0.810	19.0	LOS B	9.5	69.8	0.99	0.99	1.28	45.4
3	R2	All MCs	28	6.0	28	6.0	* 0.810	31.4	LOS C	8.6	63.0	0.99	0.99	1.30	43.5
Approach			818	6.0	818	6.0	0.810	19.5	LOS B	9.5	69.8	0.99	0.99	1.28	45.3
East: Mission Street															
4	L2	All MCs	20	6.0	20	6.0	0.833	23.5	LOS C	12.8	94.2	0.97	0.98	1.25	41.8
6	R2	All MCs	556	6.0	556	6.0	* 0.833	23.5	LOS C	12.8	94.2	0.97	0.98	1.25	41.8
Approach			576	6.0	576	6.0	0.833	23.5	LOS C	12.8	94.2	0.97	0.98	1.25	41.8
North: Beach Road															
7	L2	All MCs	334	6.0	334	6.0	0.658	21.0	LOS C	6.3	46.5	0.94	0.86	1.02	43.1
8	T1	All MCs	209	6.0	209	6.0	0.392	13.3	LOS B	3.5	25.7	0.86	0.70	0.86	49.2
Approach			543	6.0	543	6.0	0.658	18.0	LOS B	6.3	46.5	0.91	0.80	0.96	45.3
All Vehicles			1937	6.0	1937	6.0	0.833	20.3	LOS C	12.8	94.2	0.96	0.93	1.18	44.2

MOVEMENT SUMMARY

Site: 2 [Beach & Mission - 2029 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 50 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist]				
South: Beach Road															
2	T1	All MCs	333	6.0	333	6.0	0.280	11.9	LOS B	3.7	26.9	0.75	0.62	0.75	49.4
3	R2	All MCs	20	6.0	20	6.0	0.280	34.5	LOS C	2.7	19.7	0.82	0.67	0.82	45.3
Approach			353	6.0	353	6.0	0.280	13.2	LOS B	3.7	26.9	0.76	0.62	0.76	49.1
East: Mission Street															
4	L2	All MCs	29	6.0	29	6.0	0.812	27.3	LOS C	12.7	93.2	0.98	0.94	1.19	40.1
6	R2	All MCs	449	6.0	449	6.0	* 0.812	27.3	LOS C	12.7	93.2	0.98	0.94	1.19	40.1
Approach			479	6.0	479	6.0	0.812	27.3	LOS C	12.7	93.2	0.98	0.94	1.19	40.1
North: Beach Road															
7	L2	All MCs	613	6.0	613	6.0	* 0.831	25.8	LOS C	16.2	119.4	0.96	0.96	1.17	40.8
8	T1	All MCs	565	6.0	565	6.0	0.728	15.4	LOS B	12.7	93.1	0.91	0.84	0.98	47.9
Approach			1178	6.0	1178	6.0	0.831	20.8	LOS C	16.2	119.4	0.93	0.90	1.08	43.9
All Vehicles			2009	6.0	2009	6.0	0.831	21.0	LOS C	16.2	119.4	0.91	0.86	1.05	43.7

MOVEMENT SUMMARY

Site: 2 [Beach& Mission - 2029 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Signals - EQUISAT (Fixed-Time/SCATS) Isolated Cycle Time = 40 seconds (Site Optimum Cycle Time - Minimum Delay)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total veh/h]	[HV %]	[Total veh/h]	[HV %]				[Veh.]	[Dist]				
South: Beach Road															
2	T1	All MCs	273	6.0	273	6.0	0.321	12.6	LOS B	3.0	21.7	0.84	0.68	0.84	48.9
3	R2	All MCs	26	6.0	26	6.0	0.321	29.0	LOS C	2.0	14.7	0.89	0.72	0.89	45.0
Approach			299	6.0	299	6.0	0.321	14.0	LOS B	3.0	21.7	0.85	0.68	0.85	48.5
East: Mission Street															
4	L2	All MCs	23	6.0	23	6.0	0.845	24.9	LOS C	12.5	91.9	0.98	0.99	1.31	41.2
6	R2	All MCs	522	6.0	522	6.0	* 0.845	24.9	LOS C	12.5	91.9	0.98	0.99	1.31	41.1
Approach			545	6.0	545	6.0	0.845	24.9	LOS C	12.5	91.9	0.98	0.99	1.31	41.1
North: Beach Road															
7	L2	All MCs	459	6.0	459	6.0	* 0.830	25.2	LOS C	10.4	76.2	0.99	0.99	1.31	41.1
8	T1	All MCs	297	6.0	297	6.0	0.509	13.1	LOS B	5.0	37.0	0.87	0.73	0.87	49.4
Approach			756	6.0	756	6.0	0.830	20.4	LOS C	10.4	76.2	0.95	0.88	1.14	44.0
All Vehicles			1600	6.0	1600	6.0	0.845	20.8	LOS C	12.5	91.9	0.94	0.88	1.14	43.7

Beach Road and Church Street

2024 Base Year

MOVEMENT SUMMARY

 Site: [Beach&Church - 2024 Base AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Beach Road S															
1	L2	All MCs	9	6.0	9	6.0	0.281	5.7	LOS A	0.0	0.0	0.00	0.01	0.00	57.0
2	T1	All MCs	1106	6.0	1106	6.0	0.281	0.0	LOS A	0.0	0.1	0.00	0.01	0.00	59.9
3	R2	All MCs	1	6.0	1	6.0	0.281	6.4	LOS A	0.0	0.1	0.00	0.00	0.00	57.2
Approach			1117	6.0	1117	6.0	0.281	0.1	NA	0.0	0.1	0.00	0.01	0.00	59.8
East: Church Street E															
4	L2	All MCs	2	6.0	2	6.0	0.903	41.7	LOS E	5.8	42.5	0.98	1.41	2.57	29.1
5	T1	All MCs	2	6.0	2	6.0	0.903	64.9	LOS F	5.8	42.5	0.98	1.41	2.57	29.1
6	R2	All MCs	168	6.0	168	6.0	0.903	64.2	LOS F	5.8	42.5	0.98	1.41	2.57	29.1
Approach			173	6.0	173	6.0	0.903	64.0	LOS F	5.8	42.5	0.98	1.41	2.57	29.1
North: Beach Road N															
7	L2	All MCs	17	6.0	17	6.0	0.120	5.6	LOS A	0.0	0.0	0.00	0.04	0.00	56.8
8	T1	All MCs	437	6.0	437	6.0	0.120	0.0	LOS A	0.2	1.3	0.03	0.06	0.03	59.3
9	R2	All MCs	4	6.0	4	6.0	0.120	50.9	LOS F	0.2	1.3	0.07	0.08	0.07	56.3
Approach			458	6.0	458	6.0	0.120	0.7	NA	0.2	1.3	0.03	0.06	0.03	59.2
West: Shopping Centre W															
10	L2	All MCs	1	6.0	1	6.0	0.024	11.1	LOS B	0.1	0.5	0.83	0.96	0.83	42.5
11	T1	All MCs	1	6.0	1	6.0	0.024	28.0	LOS D	0.1	0.5	0.83	0.96	0.83	42.5
12	R2	All MCs	3	6.0	3	6.0	0.024	27.2	LOS D	0.1	0.5	0.83	0.96	0.83	42.5
Approach			5	6.0	5	6.0	0.024	24.1	LOS C	0.1	0.5	0.83	0.96	0.83	42.5
All Vehicles			1753	6.0	1753	6.0	0.903	6.6	NA	5.8	42.5	0.11	0.16	0.27	54.0

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2024 Base PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Beach Road S															
1	L2	All MCs	62	6.0	62	6.0	0.164	5.6	LOS A	0.0	0.0	0.00	0.11	0.00	56.2
2	T1	All MCs	562	6.0	562	6.0	0.164	0.0	LOS A	0.2	1.4	0.03	0.09	0.03	59.1
3	R2	All MCs	6	6.0	6	6.0	0.164	36.4	LOS E	0.2	1.4	0.06	0.07	0.06	56.5
Approach			631	6.0	631	6.0	0.164	0.9	NA	0.2	1.4	0.03	0.09	0.03	58.8
East: Church Street E															
4	L2	All MCs	12	6.0	12	6.0	0.297	12.2	LOS B	1.0	7.7	0.86	1.04	1.01	40.9
5	T1	All MCs	6	6.0	6	6.0	0.297	31.1	LOS D	1.0	7.7	0.86	1.04	1.01	40.9
6	R2	All MCs	49	6.0	49	6.0	0.297	30.7	LOS D	1.0	7.7	0.86	1.04	1.01	40.9
Approach			67	6.0	67	6.0	0.297	27.5	LOS D	1.0	7.7	0.86	1.04	1.01	40.9
North: Beach Road N															
7	L2	All MCs	93	6.0	93	6.0	0.254	5.7	LOS A	0.0	0.0	0.00	0.11	0.00	56.2
8	T1	All MCs	880	6.0	880	6.0	0.254	0.0	LOS A	0.2	1.7	0.03	0.09	0.03	59.2
9	R2	All MCs	14	6.0	14	6.0	0.254	17.8	LOS C	0.2	1.7	0.06	0.07	0.06	56.8
Approach			986	6.0	986	6.0	0.254	0.8	NA	0.2	1.7	0.03	0.09	0.03	58.9
West: Shopping Centre W															
10	L2	All MCs	23	6.0	23	6.0	0.585	16.6	LOS C	2.8	20.3	0.89	1.17	1.47	38.3
11	T1	All MCs	33	6.0	33	6.0	0.585	39.5	LOS E	2.8	20.3	0.89	1.17	1.47	38.3
12	R2	All MCs	84	6.0	84	6.0	0.585	36.1	LOS E	2.8	20.3	0.89	1.17	1.47	38.3
Approach			140	6.0	140	6.0	0.585	33.6	LOS D	2.8	20.3	0.89	1.17	1.47	38.3
All Vehicles			1824	6.0	1824	6.0	0.585	4.4	NA	2.8	20.3	0.12	0.21	0.18	55.6

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2024 Base Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total veh/h	HV] %	[Total veh/h	HV] %				[Veh. veh	Dist] m				
South: Beach Road S															
1	L2	All MCs	58	6.0	58	6.0	0.150	5.6	LOS A	0.0	0.0	0.00	0.12	0.00	56.2
2	T1	All MCs	520	6.0	520	6.0	0.150	0.0	LOS A	0.1	0.7	0.02	0.08	0.02	59.3
3	R2	All MCs	6	6.0	6	6.0	0.150	16.2	LOS C	0.1	0.7	0.04	0.05	0.04	56.9
Approach			584	6.0	584	6.0	0.150	0.7	NA	0.1	0.7	0.02	0.08	0.02	58.9
East: Church Street E															
4	L2	All MCs	8	6.0	8	6.0	0.113	9.4	LOS A	0.4	3.0	0.70	0.97	0.70	46.7
5	T1	All MCs	12	6.0	12	6.0	0.113	18.0	LOS C	0.4	3.0	0.70	0.97	0.70	46.6
6	R2	All MCs	31	6.0	31	6.0	0.113	17.4	LOS C	0.4	3.0	0.70	0.97	0.70	46.7
Approach			51	6.0	51	6.0	0.113	16.2	LOS C	0.4	3.0	0.70	0.97	0.70	46.7
North: Beach Road N															
7	L2	All MCs	43	6.0	43	6.0	0.159	5.6	LOS A	0.0	0.0	0.00	0.08	0.00	56.5
8	T1	All MCs	556	6.0	556	6.0	0.159	0.0	LOS A	0.2	1.5	0.04	0.09	0.04	59.2
9	R2	All MCs	14	6.0	14	6.0	0.159	15.4	LOS C	0.2	1.5	0.08	0.09	0.08	56.6
Approach			613	6.0	613	6.0	0.159	0.8	NA	0.2	1.5	0.04	0.09	0.04	59.0
West: Shopping Centre W															
10	L2	All MCs	17	6.0	17	6.0	0.218	9.5	LOS A	0.9	6.3	0.73	0.97	0.76	46.4
11	T1	All MCs	27	6.0	27	6.0	0.218	18.7	LOS C	0.9	6.3	0.73	0.97	0.76	46.4
12	R2	All MCs	55	6.0	55	6.0	0.218	17.9	LOS C	0.9	6.3	0.73	0.97	0.76	46.4
Approach			99	6.0	99	6.0	0.218	16.7	LOS C	0.9	6.3	0.73	0.97	0.76	46.4
All Vehicles			1346	6.0	1346	6.0	0.218	2.5	NA	0.9	6.3	0.11	0.18	0.11	57.2

2024 Base Year + Development Trips

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2024 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Beach Road S															
1	L2	All MCs	9	6.0	9	6.0	0.284	5.7	LOS A	0.0	0.0	0.00	0.01	0.00	57.0
2	T1	All MCs	1119	6.0	1119	6.0	0.284	0.0	LOS A	0.0	0.1	0.00	0.01	0.00	59.9
3	R2	All MCs	1	6.0	1	6.0	0.284	6.5	LOS A	0.0	0.1	0.00	0.00	0.00	57.2
Approach			1129	6.0	1129	6.0	0.284	0.1	NA	0.0	0.1	0.00	0.01	0.00	59.8
East: Church Street E															
4	L2	All MCs	2	6.0	2	6.0	1.032	69.2	LOS F	9.2	67.7	1.00	1.66	3.57	23.6
5	T1	All MCs	2	6.0	2	6.0	1.032	94.1	LOS F	9.2	67.7	1.00	1.66	3.57	23.6
6	R2	All MCs	181	6.0	181	6.0	1.032	93.4	LOS F	9.2	67.7	1.00	1.66	3.57	23.6
Approach			185	6.0	185	6.0	1.032	93.2	LOS F	9.2	67.7	1.00	1.66	3.57	23.6
North: Beach Road N															
7	L2	All MCs	27	6.0	27	6.0	0.127	5.6	LOS A	0.0	0.0	0.00	0.06	0.00	56.6
8	T1	All MCs	453	6.0	453	6.0	0.127	0.0	LOS A	0.2	1.3	0.03	0.07	0.03	59.2
9	R2	All MCs	4	6.0	4	6.0	0.127	52.9	LOS F	0.2	1.3	0.06	0.07	0.06	56.4
Approach			484	6.0	484	6.0	0.127	0.8	NA	0.2	1.3	0.03	0.07	0.03	59.0
West: Shopping Centre W															
10	L2	All MCs	1	6.0	1	6.0	0.025	11.1	LOS B	0.1	0.6	0.83	0.97	0.83	42.0
11	T1	All MCs	1	6.0	1	6.0	0.025	29.4	LOS D	0.1	0.6	0.83	0.97	0.83	42.0
12	R2	All MCs	3	6.0	3	6.0	0.025	28.2	LOS D	0.1	0.6	0.83	0.97	0.83	42.1
Approach			5	6.0	5	6.0	0.025	25.1	LOS D	0.1	0.6	0.83	0.97	0.83	42.1
All Vehicles			1804	6.0	1804	6.0	1.032	9.9	NA	9.2	67.7	0.11	0.20	0.38	51.5

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2024 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		m					km/h
South: Beach Road S															
1	L2	All MCs	62	6.0	62	6.0	0.183	5.6	LOS A	0.0	0.0	0.00	0.10	0.00	56.3
2	T1	All MCs	555	6.0	555	6.0	0.183	0.0	LOS A	0.8	5.6	0.12	0.19	0.12	58.0
3	R2	All MCs	26	6.0	26	6.0	0.183	35.5	LOS E	0.8	5.6	0.25	0.30	0.25	54.4
Approach			643	6.0	643	6.0	0.183	2.0	NA	0.8	5.6	0.11	0.19	0.11	57.7
East: Church Street E															
4	L2	All MCs	29	6.0	29	6.0	0.394	13.5	LOS B	1.5	11.3	0.85	1.09	1.12	40.7
5	T1	All MCs	6	6.0	6	6.0	0.394	34.2	LOS D	1.5	11.3	0.85	1.09	1.12	40.7
6	R2	All MCs	61	6.0	61	6.0	0.394	34.2	LOS D	1.5	11.3	0.85	1.09	1.12	40.7
Approach			97	6.0	97	6.0	0.394	27.9	LOS D	1.5	11.3	0.85	1.09	1.12	40.7
North: Beach Road N															
7	L2	All MCs	101	6.0	101	6.0	0.259	5.7	LOS A	0.0	0.0	0.00	0.12	0.00	56.1
8	T1	All MCs	893	6.0	893	6.0	0.259	0.0	LOS A	0.2	1.7	0.03	0.09	0.03	59.2
9	R2	All MCs	14	6.0	14	6.0	0.259	17.8	LOS C	0.2	1.7	0.06	0.06	0.06	56.8
Approach			1007	6.0	1007	6.0	0.259	0.8	NA	0.2	1.7	0.03	0.09	0.03	58.8
West: Shopping Centre W															
10	L2	All MCs	23	6.0	23	6.0	0.628	18.5	LOS C	2.9	21.7	0.91	1.18	1.56	37.2
11	T1	All MCs	33	6.0	33	6.0	0.628	42.5	LOS E	2.9	21.7	0.91	1.18	1.56	37.2
12	R2	All MCs	84	6.0	84	6.0	0.628	39.3	LOS E	2.9	21.7	0.91	1.18	1.56	37.2
Approach			140	6.0	140	6.0	0.628	36.6	LOS E	2.9	21.7	0.91	1.18	1.56	37.2
All Vehicles			1887	6.0	1887	6.0	0.628	5.3	NA	2.9	21.7	0.16	0.26	0.23	54.8

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2024 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Beach Road S															
1	L2	All MCs	58	6.0	58	6.0	0.161	5.6	LOS A	0.0	0.0	0.00	0.11	0.00	56.2
2	T1	All MCs	519	6.0	519	6.0	0.161	0.0	LOS A	0.4	2.8	0.08	0.14	0.08	58.8
3	R2	All MCs	24	6.0	24	6.0	0.161	16.6	LOS C	0.4	2.8	0.16	0.18	0.16	56.0
Approach			601	6.0	601	6.0	0.161	1.2	NA	0.4	2.8	0.08	0.14	0.08	58.4
East: Church Street E															
4	L2	All MCs	26	6.0	26	6.0	0.180	9.5	LOS A	0.7	5.0	0.71	0.92	0.71	46.8
5	T1	All MCs	12	6.0	12	6.0	0.180	19.2	LOS C	0.7	5.0	0.71	0.92	0.71	46.8
6	R2	All MCs	47	6.0	47	6.0	0.180	18.6	LOS C	0.7	5.0	0.71	0.92	0.71	46.9
Approach			85	6.0	85	6.0	0.180	15.9	LOS C	0.7	5.0	0.71	0.92	0.71	46.8
North: Beach Road N															
7	L2	All MCs	55	6.0	55	6.0	0.166	5.6	LOS A	0.0	0.0	0.00	0.10	0.00	56.3
8	T1	All MCs	573	6.0	573	6.0	0.166	0.0	LOS A	0.2	1.5	0.04	0.09	0.04	59.2
9	R2	All MCs	14	6.0	14	6.0	0.166	15.5	LOS C	0.2	1.5	0.08	0.09	0.08	56.6
Approach			641	6.0	641	6.0	0.166	0.8	NA	0.2	1.5	0.04	0.10	0.04	58.9
West: Shopping Centre W															
10	L2	All MCs	17	6.0	17	6.0	0.234	9.8	LOS A	0.9	6.8	0.74	0.99	0.80	45.8
11	T1	All MCs	27	6.0	27	6.0	0.234	19.8	LOS C	0.9	6.8	0.74	0.99	0.80	45.8
12	R2	All MCs	55	6.0	55	6.0	0.234	19.0	LOS C	0.9	6.8	0.74	0.99	0.80	45.8
Approach			99	6.0	99	6.0	0.234	17.7	LOS C	0.9	6.8	0.74	0.99	0.80	45.8
All Vehicles			1426	6.0	1426	6.0	0.234	3.1	NA	0.9	6.8	0.14	0.23	0.15	56.7

2029 Forecast Year + Development Trips

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2029 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c			veh	m				
South: Beach Road S															
1	L2	All MCs	12	6.0	12	6.0	0.338	5.7	LOS A	0.0	0.0	0.00	0.01	0.00	56.9
2	T1	All MCs	1334	6.0	1334	6.0	0.338	0.1	LOS A	0.0	0.1	0.00	0.01	0.00	59.8
3	R2	All MCs	1	6.0	1	6.0	0.338	6.9	LOS A	0.0	0.1	0.00	0.00	0.00	57.2
Approach			1346	6.0	1346	6.0	0.338	0.1	NA	0.0	0.1	0.00	0.01	0.00	59.8
East: Church Street E															
4	L2	All MCs	2	6.0	2	6.0	2.304	603.1	LOS F	41.3	304.3	1.00	2.77	8.29	5.2
5	T1	All MCs	2	6.0	2	6.0	2.304	646.5	LOS F	41.3	304.3	1.00	2.77	8.29	5.2
6	R2	All MCs	214	6.0	214	6.0	2.304	645.4	LOS F	41.3	304.3	1.00	2.77	8.29	5.2
Approach			218	6.0	218	6.0	2.304	645.0	LOS F	41.3	304.3	1.00	2.77	8.29	5.2
North: Beach Road N															
7	L2	All MCs	31	6.0	31	6.0	0.154	5.6	LOS A	0.0	0.0	0.00	0.06	0.00	56.6
8	T1	All MCs	538	6.0	538	6.0	0.154	0.0	LOS A	0.4	2.9	0.05	0.08	0.05	58.8
9	R2	All MCs	5	6.0	5	6.0	0.154	99.9	LOS F	0.4	2.9	0.09	0.11	0.09	55.5
Approach			574	6.0	574	6.0	0.154	1.2	NA	0.4	2.9	0.04	0.08	0.04	58.6
West: Shopping Centre W															
10	L2	All MCs	1	6.0	1	6.0	0.057	12.2	LOS B	0.2	1.1	0.91	1.00	0.91	35.7
11	T1	All MCs	1	6.0	1	6.0	0.057	48.0	LOS E	0.2	1.1	0.91	1.00	0.91	35.7
12	R2	All MCs	4	6.0	4	6.0	0.057	46.0	LOS E	0.2	1.1	0.91	1.00	0.91	35.7
Approach			6	6.0	6	6.0	0.057	40.7	LOS E	0.2	1.1	0.91	1.00	0.91	35.7
All Vehicles			2144	6.0	2144	6.0	2.304	66.1	NA	41.3	304.3	0.12	0.31	0.86	28.7

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2029 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total veh/h	HV] %	[Total veh/h	HV] %				[Veh. veh	Dist] m				
South: Beach Road S															
1	L2	All MCs	74	6.0	74	6.0	0.227	5.7	LOS A	0.0	0.0	0.00	0.10	0.00	56.3
2	T1	All MCs	663	6.0	663	6.0	0.227	0.0	LOS A	1.2	8.9	0.13	0.20	0.13	57.4
3	R2	All MCs	27	6.0	27	6.0	0.227	57.6	LOS F	1.2	8.9	0.30	0.34	0.30	53.1
Approach			764	6.0	764	6.0	0.227	2.6	NA	1.2	8.9	0.13	0.20	0.13	57.1
East: Church Street E															
4	L2	All MCs	32	6.0	32	6.0	0.809	36.0	LOS E	3.6	26.9	0.97	1.28	1.98	29.1
5	T1	All MCs	7	6.0	7	6.0	0.809	74.9	LOS F	3.6	26.9	0.97	1.28	1.98	29.1
6	R2	All MCs	71	6.0	71	6.0	0.809	75.7	LOS F	3.6	26.9	0.97	1.28	1.98	29.1
Approach			109	6.0	109	6.0	0.809	64.2	LOS F	3.6	26.9	0.97	1.28	1.98	29.1
North: Beach Road N															
7	L2	All MCs	119	6.0	119	6.0	0.311	5.7	LOS A	0.0	0.0	0.00	0.11	0.00	56.1
8	T1	All MCs	1063	6.0	1063	6.0	0.311	0.0	LOS A	0.3	2.5	0.04	0.10	0.04	59.1
9	R2	All MCs	17	6.0	17	6.0	0.311	23.4	LOS C	0.3	2.5	0.07	0.08	0.07	56.6
Approach			1199	6.0	1199	6.0	0.311	0.9	NA	0.3	2.5	0.03	0.10	0.03	58.7
West: Shopping Centre W															
10	L2	All MCs	27	6.0	27	6.0	1.333	179.4	LOS F	17.1	126.0	1.00	2.20	5.45	13.4
11	T1	All MCs	39	6.0	39	6.0	1.333	223.5	LOS F	17.1	126.0	1.00	2.20	5.45	13.4
12	R2	All MCs	101	6.0	101	6.0	1.333	216.2	LOS F	17.1	126.0	1.00	2.20	5.45	13.4
Approach			167	6.0	167	6.0	1.333	211.9	LOS F	17.1	126.0	1.00	2.20	5.45	13.4
All Vehicles			2240	6.0	2240	6.0	1.333	20.4	NA	17.1	126.0	0.18	0.35	0.56	44.7

MOVEMENT SUMMARY

 Site: 1v [Beach&Church - 2029 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

New Site
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Beach Road S															
1	L2	All MCs	67	6.0	67	6.0	0.188	5.6	LOS A	0.0	0.0	0.00	0.11	0.00	56.2
2	T1	All MCs	602	6.0	602	6.0	0.188	0.0	LOS A	0.5	3.5	0.08	0.15	0.08	58.7
3	R2	All MCs	25	6.0	25	6.0	0.188	21.2	LOS C	0.5	3.5	0.17	0.19	0.17	55.8
Approach			695	6.0	695	6.0	0.188	1.3	NA	0.5	3.5	0.08	0.15	0.08	58.3
East: Church Street E															
4	L2	All MCs	28	6.0	28	6.0	0.276	10.8	LOS B	1.1	8.0	0.78	1.01	0.91	44.3
5	T1	All MCs	14	6.0	14	6.0	0.276	25.1	LOS D	1.1	8.0	0.78	1.01	0.91	44.3
6	R2	All MCs	54	6.0	54	6.0	0.276	24.5	LOS C	1.1	8.0	0.78	1.01	0.91	44.3
Approach			96	6.0	96	6.0	0.276	20.5	LOS C	1.1	8.0	0.78	1.01	0.91	44.3
North: Beach Road N															
7	L2	All MCs	63	6.0	63	6.0	0.199	5.7	LOS A	0.0	0.0	0.00	0.10	0.00	56.3
8	T1	All MCs	680	6.0	680	6.0	0.199	0.0	LOS A	0.3	2.2	0.05	0.10	0.05	59.1
9	R2	All MCs	17	6.0	17	6.0	0.199	18.9	LOS C	0.3	2.2	0.09	0.11	0.09	56.4
Approach			760	6.0	760	6.0	0.199	0.9	NA	0.3	2.2	0.05	0.10	0.05	58.8
West: Shopping Centre W															
10	L2	All MCs	20	6.0	20	6.0	0.381	12.1	LOS B	1.6	11.8	0.82	1.08	1.08	42.6
11	T1	All MCs	33	6.0	33	6.0	0.381	27.1	LOS D	1.6	11.8	0.82	1.08	1.08	42.6
12	R2	All MCs	65	6.0	65	6.0	0.381	26.0	LOS D	1.6	11.8	0.82	1.08	1.08	42.6
Approach			118	6.0	118	6.0	0.381	23.9	LOS C	1.6	11.8	0.82	1.08	1.08	42.6
All Vehicles			1668	6.0	1668	6.0	0.381	3.8	NA	1.6	11.8	0.16	0.24	0.18	56.0

Mission Street and Access 1

2024 Base Year + Development Trips

MOVEMENT SUMMARY

 Site: 2v [Mission&Access 1 - 2024 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total veh/h	HV] %	[Total veh/h	HV] %				[Veh. veh	Dist] m				
East: Mission Street															
5	T1	All MCs	461	6.0	461	6.0	0.263	0.0	LOS A	0.4	2.8	0.09	0.11	0.09	59.1
6	R2	All MCs	42	6.0	42	6.0	0.263	8.7	LOS A	0.4	2.8	0.09	0.11	0.09	56.1
Approach			503	6.0	503	6.0	0.263	0.7	NA	0.4	2.8	0.09	0.11	0.09	58.9
North: Access 1															
7	L2	All MCs	34	6.0	34	6.0	0.038	9.2	LOS A	0.2	1.2	0.40	0.85	0.40	50.9
9	R2	All MCs	25	6.0	25	6.0	0.038	8.8	LOS A	0.2	1.2	0.40	0.85	0.40	50.6
Approach			59	6.0	59	6.0	0.038	9.0	LOS A	0.2	1.2	0.40	0.85	0.40	50.7
West: Mission Street															
10	L2	All MCs	32	6.0	32	6.0	0.165	5.6	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
11	T1	All MCs	277	6.0	277	6.0	0.165	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
Approach			308	6.0	308	6.0	0.165	5.1	NA	0.0	0.0	0.00	0.57	0.00	53.0
All Vehicles			871	6.0	871	6.0	0.263	2.8	NA	0.4	2.8	0.08	0.32	0.08	56.1

MOVEMENT SUMMARY

 Site: 2v [Mission&Access 1 - 2024 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
East: Mission Street															
5	T1	All MCs	334	6.0	334	6.0	0.228	0.0	LOS A	0.7	5.2	0.24	0.28	0.24	58.1
6	R2	All MCs	65	6.0	65	6.0	0.228	12.0	LOS B	0.7	5.2	0.24	0.28	0.24	55.2
Approach			399	6.0	399	6.0	0.228	2.0	NA	0.7	5.2	0.24	0.28	0.24	57.6
North: Access 1															
7	L2	All MCs	61	6.0	61	6.0	0.097	10.1	LOS B	0.4	2.9	0.50	0.91	0.50	50.6
9	R2	All MCs	71	6.0	71	6.0	0.097	9.1	LOS A	0.4	2.9	0.50	0.91	0.50	50.3
Approach			132	6.0	132	6.0	0.097	9.5	LOS A	0.4	2.9	0.50	0.91	0.50	50.5
West: Mission Street															
10	L2	All MCs	77	6.0	77	6.0	0.288	5.7	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
11	T1	All MCs	460	6.0	460	6.0	0.288	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
Approach			537	6.0	537	6.0	0.288	5.1	NA	0.0	0.0	0.00	0.57	0.00	52.9
All Vehicles			1067	6.0	1067	6.0	0.288	4.5	NA	0.7	5.2	0.15	0.50	0.15	54.2

MOVEMENT SUMMARY

 Site: 2v [Mission&Access 1 - 2024 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
East: Mission Street															
5	T1	All MCs	397	6.0	397	6.0	0.248	0.0	LOS A	0.6	4.4	0.17	0.20	0.17	58.6
6	R2	All MCs	61	6.0	61	6.0	0.248	10.1	LOS B	0.6	4.4	0.17	0.20	0.17	55.6
Approach			458	6.0	458	6.0	0.248	1.3	NA	0.6	4.4	0.17	0.20	0.17	58.2
North: Access 1															
7	L2	All MCs	61	6.0	61	6.0	0.087	9.5	LOS A	0.4	2.7	0.45	0.88	0.45	50.8
9	R2	All MCs	68	6.0	68	6.0	0.087	8.9	LOS A	0.4	2.7	0.45	0.88	0.45	50.5
Approach			129	6.0	129	6.0	0.087	9.2	LOS A	0.4	2.7	0.45	0.88	0.45	50.6
West: Mission Street															
10	L2	All MCs	68	6.0	68	6.0	0.224	5.7	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
11	T1	All MCs	347	6.0	347	6.0	0.224	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
Approach			416	6.0	416	6.0	0.224	5.1	NA	0.0	0.0	0.00	0.57	0.00	52.9
All Vehicles			1003	6.0	1003	6.0	0.248	3.9	NA	0.6	4.4	0.14	0.44	0.14	54.9

2029 Forecast Year + Development Trips

MOVEMENT SUMMARY


 Site: 2v [Mission&Access 1 - 2029 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
East: Mission Street															
5	T1	All MCs	551	6.0	551	6.0	0.310	0.0	LOS A	0.4	3.0	0.09	0.11	0.09	59.2
6	R2	All MCs	42	6.0	42	6.0	0.310	9.7	LOS A	0.4	3.0	0.09	0.11	0.09	56.2
Approach			593	6.0	593	6.0	0.310	0.7	NA	0.4	3.0	0.09	0.11	0.09	59.0
North: Access 1															
7	L2	All MCs	34	6.0	34	6.0	0.041	9.4	LOS A	0.2	1.2	0.44	0.85	0.44	50.7
9	R2	All MCs	25	6.0	25	6.0	0.041	9.1	LOS A	0.2	1.2	0.44	0.85	0.44	50.5
Approach			59	6.0	59	6.0	0.041	9.3	LOS A	0.2	1.2	0.44	0.85	0.44	50.6
West: Mission Street															
10	L2	All MCs	32	6.0	32	6.0	0.194	5.7	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
11	T1	All MCs	331	6.0	331	6.0	0.194	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
Approach			362	6.0	362	6.0	0.194	5.1	NA	0.0	0.0	0.00	0.57	0.00	53.0
All Vehicles			1014	6.0	1014	6.0	0.310	2.7	NA	0.4	3.0	0.08	0.31	0.08	56.2

MOVEMENT SUMMARY

 Site: 2v [Mission&Access 1 - 2029 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
East: Mission Street															
5	T1	All MCs	404	6.0	404	6.0	0.273	0.0	LOS A	0.8	6.1	0.23	0.28	0.23	58.1
6	R2	All MCs	65	6.0	65	6.0	0.273	14.6	LOS B	0.8	6.1	0.23	0.28	0.23	55.1
Approach			469	6.0	469	6.0	0.273	2.0	NA	0.8	6.1	0.23	0.28	0.23	57.6
North: Access 1															
7	L2	All MCs	61	6.0	61	6.0	0.111	10.7	LOS B	0.4	3.2	0.55	0.94	0.55	50.3
9	R2	All MCs	71	6.0	71	6.0	0.111	9.5	LOS A	0.4	3.2	0.55	0.94	0.55	50.0
Approach			132	6.0	132	6.0	0.111	10.1	LOS B	0.4	3.2	0.55	0.94	0.55	50.2
West: Mission Street															
10	L2	All MCs	77	6.0	77	6.0	0.339	5.7	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
11	T1	All MCs	556	6.0	556	6.0	0.339	5.1	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
Approach			633	6.0	633	6.0	0.339	5.1	NA	0.0	0.0	0.00	0.57	0.00	52.9
All Vehicles			1234	6.0	1234	6.0	0.339	4.5	NA	0.8	6.1	0.15	0.50	0.15	54.3

MOVEMENT SUMMARY

 Site: 2v [Mission&Access 1 - 2029 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c			veh	m				
East: Mission Street															
5	T1	All MCs	477	6.0	477	6.0	0.293	0.0	LOS A	0.7	4.9	0.17	0.20	0.17	58.7
6	R2	All MCs	61	6.0	61	6.0	0.293	11.6	LOS B	0.7	4.9	0.17	0.20	0.17	55.7
Approach			538	6.0	538	6.0	0.293	1.3	NA	0.7	4.9	0.17	0.20	0.17	58.3
North: Access 1															
7	L2	All MCs	61	6.0	61	6.0	0.096	9.9	LOS A	0.4	2.9	0.50	0.90	0.50	50.6
9	R2	All MCs	68	6.0	68	6.0	0.096	9.3	LOS A	0.4	2.9	0.50	0.90	0.50	50.3
Approach			129	6.0	129	6.0	0.096	9.6	LOS A	0.4	2.9	0.50	0.90	0.50	50.4
West: Mission Street															
10	L2	All MCs	68	6.0	68	6.0	0.261	5.7	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
11	T1	All MCs	418	6.0	418	6.0	0.261	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	52.9
Approach			486	6.0	486	6.0	0.261	5.1	NA	0.0	0.0	0.00	0.57	0.00	52.9
All Vehicles			1154	6.0	1154	6.0	0.293	3.8	NA	0.7	4.9	0.13	0.43	0.13	55.0

Church Street and Access 2

2024 Base Year + Development Trips

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2024 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay sec	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed km/h
			[Total veh/h	HV] %	[Total veh/h	HV] %				[Veh. veh	Dist] m				
South: Access 2															
1	L2	All MCs	13	6.0	13	6.0	0.013	8.8	LOS A	0.1	0.4	0.25	0.86	0.25	51.0
3	R2	All MCs	13	6.0	13	6.0	0.013	7.9	LOS A	0.1	0.4	0.25	0.86	0.25	50.7
Approach			25	6.0	25	6.0	0.013	8.3	LOS A	0.1	0.4	0.25	0.86	0.25	50.9
East: Church Street															
4	L2	All MCs	21	6.0	21	6.0	0.099	5.6	LOS A	0.0	0.0	0.00	0.06	0.00	56.6
5	T1	All MCs	173	6.0	173	6.0	0.099	0.0	LOS A	0.0	0.0	0.00	0.06	0.00	59.4
Approach			194	6.0	194	6.0	0.099	0.6	NA	0.0	0.0	0.00	0.06	0.00	59.1
West: Church Street															
11	T1	All MCs	17	6.0	17	6.0	0.014	5.0	LOS A	0.0	0.0	0.00	0.58	0.00	52.9
12	R2	All MCs	11	6.0	11	6.0	0.014	5.5	LOS A	0.0	0.0	0.00	0.58	0.00	52.6
Approach			27	6.0	27	6.0	0.014	5.2	NA	0.0	0.0	0.00	0.58	0.00	52.8
All Vehicles			246	6.0	246	6.0	0.099	1.9	NA	0.1	0.4	0.03	0.20	0.03	57.4

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2024 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Access 2															
1	L2	All MCs	29	6.0	29	6.0	0.020	8.4	LOS A	0.1	0.7	0.18	0.89	0.18	50.9
3	R2	All MCs	12	6.0	12	6.0	0.020	7.9	LOS A	0.1	0.7	0.18	0.89	0.18	50.7
Approach			41	6.0	41	6.0	0.020	8.3	LOS A	0.1	0.7	0.18	0.89	0.18	50.9
East: Church Street															
4	L2	All MCs	17	6.0	17	6.0	0.043	5.6	LOS A	0.0	0.0	0.00	0.12	0.00	56.2
5	T1	All MCs	67	6.0	67	6.0	0.043	0.0	LOS A	0.0	0.0	0.00	0.12	0.00	58.9
Approach			84	6.0	84	6.0	0.043	1.1	NA	0.0	0.0	0.00	0.12	0.00	58.3
West: Church Street															
11	T1	All MCs	132	6.0	132	6.0	0.081	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
12	R2	All MCs	27	6.0	27	6.0	0.081	5.5	LOS A	0.0	0.0	0.00	0.57	0.00	52.7
Approach			159	6.0	159	6.0	0.081	5.1	NA	0.0	0.0	0.00	0.57	0.00	52.9
All Vehicles			284	6.0	284	6.0	0.081	4.4	NA	0.1	0.7	0.03	0.48	0.03	54.1

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2024 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Access 2															
1	L2	All MCs	35	6.0	35	6.0	0.025	8.4	LOS A	0.1	0.9	0.15	0.90	0.15	51.0
3	R2	All MCs	17	6.0	17	6.0	0.025	7.9	LOS A	0.1	0.9	0.15	0.90	0.15	50.7
Approach			52	6.0	52	6.0	0.025	8.2	LOS A	0.1	0.9	0.15	0.90	0.15	50.9
East: Church Street															
4	L2	All MCs	22	6.0	22	6.0	0.037	5.6	LOS A	0.0	0.0	0.00	0.18	0.00	55.7
5	T1	All MCs	51	6.0	51	6.0	0.037	0.0	LOS A	0.0	0.0	0.00	0.18	0.00	58.4
Approach			73	6.0	73	6.0	0.037	1.7	NA	0.0	0.0	0.00	0.18	0.00	57.5
West: Church Street															
11	T1	All MCs	77	6.0	77	6.0	0.055	5.0	LOS A	0.0	0.0	0.00	0.58	0.00	53.0
12	R2	All MCs	29	6.0	29	6.0	0.055	5.5	LOS A	0.0	0.0	0.00	0.58	0.00	52.7
Approach			106	6.0	106	6.0	0.055	5.1	NA	0.0	0.0	0.00	0.58	0.00	52.9
All Vehicles			231	6.0	231	6.0	0.055	4.7	NA	0.1	0.9	0.03	0.53	0.03	53.8

2029 Forecast Year + Development Trips

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2029 Base+Dev AM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec							km/h
South: Access 2															
1	L2	All MCs	13	6.0	13	6.0	0.013	8.9	LOS A	0.1	0.4	0.28	0.85	0.28	51.0
3	R2	All MCs	13	6.0	13	6.0	0.013	7.9	LOS A	0.1	0.4	0.28	0.85	0.28	50.7
Approach			25	6.0	25	6.0	0.013	8.4	LOS A	0.1	0.4	0.28	0.85	0.28	50.9
East: Church Street															
4	L2	All MCs	21	6.0	21	6.0	0.116	5.6	LOS A	0.0	0.0	0.00	0.06	0.00	56.7
5	T1	All MCs	206	6.0	206	6.0	0.116	0.0	LOS A	0.0	0.0	0.00	0.06	0.00	59.4
Approach			227	6.0	227	6.0	0.116	0.5	NA	0.0	0.0	0.00	0.06	0.00	59.2
West: Church Street															
11	T1	All MCs	20	6.0	20	6.0	0.016	5.0	LOS A	0.0	0.0	0.00	0.58	0.00	52.9
12	R2	All MCs	11	6.0	11	6.0	0.016	5.5	LOS A	0.0	0.0	0.00	0.58	0.00	52.7
Approach			31	6.0	31	6.0	0.016	5.2	NA	0.0	0.0	0.00	0.58	0.00	52.8
All Vehicles			283	6.0	283	6.0	0.116	1.7	NA	0.1	0.4	0.02	0.18	0.02	57.6

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2029 Base+Dev PM (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street

Site Category: (None)

Stop (Two-Way)

Vehicle Movement Performance

Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que Stop	Eff. Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Access 2															
1	L2	All MCs	29	6.0	29	6.0	0.021	8.5	LOS A	0.1	0.7	0.19	0.88	0.19	50.9
3	R2	All MCs	12	6.0	12	6.0	0.021	8.0	LOS A	0.1	0.7	0.19	0.88	0.19	50.7
Approach			41	6.0	41	6.0	0.021	8.3	LOS A	0.1	0.7	0.19	0.88	0.19	50.9
East: Church Street															
4	L2	All MCs	17	6.0	17	6.0	0.050	5.6	LOS A	0.0	0.0	0.00	0.10	0.00	56.3
5	T1	All MCs	80	6.0	80	6.0	0.050	0.0	LOS A	0.0	0.0	0.00	0.10	0.00	59.0
Approach			97	6.0	97	6.0	0.050	1.0	NA	0.0	0.0	0.00	0.10	0.00	58.6
West: Church Street															
11	T1	All MCs	157	6.0	157	6.0	0.094	5.0	LOS A	0.0	0.0	0.00	0.57	0.00	53.0
12	R2	All MCs	27	6.0	27	6.0	0.094	5.5	LOS A	0.0	0.0	0.00	0.57	0.00	52.7
Approach			184	6.0	184	6.0	0.094	5.1	NA	0.0	0.0	0.00	0.57	0.00	53.0
All Vehicles			322	6.0	322	6.0	0.094	4.3	NA	0.1	0.7	0.02	0.47	0.02	54.2

MOVEMENT SUMMARY

 Site: 2v [Church&Access 2 - 2029 Base+Dev Saturday (Site Folder: General)]

Output produced by SIDRA INTERSECTION Version: 9.1.3.210

Beach Road / Mission Street
 Site Category: (None)
 Stop (Two-Way)

Vehicle Movement Performance															
Mov ID	Turn	Mov Class	Demand Flows		Arrival Flows		Deg. Satn	Aver. Delay	Level of Service	95% Back Of Queue		Prop. Que	Eff. Stop Rate	Aver. No. of Cycles	Aver. Speed
			[Total	HV]	[Total	HV]				[Veh.	Dist]				
			veh/h	%	veh/h	%	v/c	sec		veh	m				km/h
South: Access 2															
1	L2	All MCs	35	6.0	35	6.0	0.025	8.4	LOS A	0.1	0.9	0.16	0.89	0.16	51.0
3	R2	All MCs	17	6.0	17	6.0	0.025	7.9	LOS A	0.1	0.9	0.16	0.89	0.16	50.7
Approach			52	6.0	52	6.0	0.025	8.3	LOS A	0.1	0.9	0.16	0.89	0.16	50.9
East: Church Street															
4	L2	All MCs	22	6.0	22	6.0	0.042	5.6	LOS A	0.0	0.0	0.00	0.16	0.00	55.9
5	T1	All MCs	60	6.0	60	6.0	0.042	0.0	LOS A	0.0	0.0	0.00	0.16	0.00	58.5
Approach			82	6.0	82	6.0	0.042	1.5	NA	0.0	0.0	0.00	0.16	0.00	57.8
West: Church Street															
11	T1	All MCs	92	6.0	92	6.0	0.062	5.0	LOS A	0.0	0.0	0.00	0.58	0.00	53.0
12	R2	All MCs	29	6.0	29	6.0	0.062	5.5	LOS A	0.0	0.0	0.00	0.58	0.00	52.7
Approach			121	6.0	121	6.0	0.062	5.1	NA	0.0	0.0	0.00	0.58	0.00	52.9
All Vehicles			255	6.0	255	6.0	0.062	4.6	NA	0.1	0.9	0.03	0.51	0.03	53.9



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