APPENDIX M

Traffic Impact Assessment

PART 2 OF 2

Appendices A to M

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

APPENDIX M

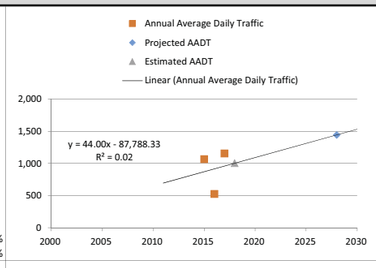
Traffic Impact Assessment

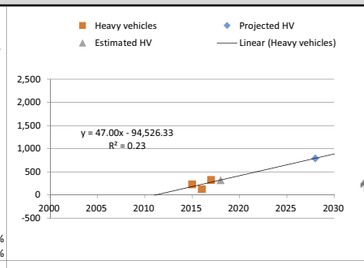
Appendix A Roads and Maritime Services Traffic Growth Rates

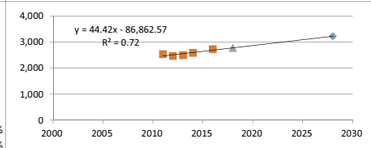
NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

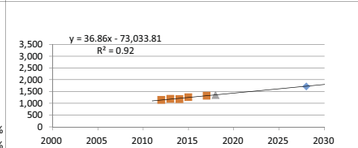
The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

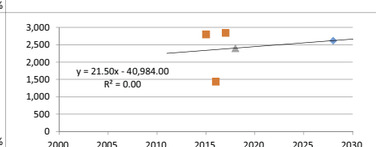
Location & Year				Annual Average Daily Traffic (AADT) growth rates								Heavy Vehicles (HV) percent projections												
Segment	Station	Lanes	Year	Annual Average Daily Traffic	Projected AADT	Linear Growth Rate per year and equation used for projections (y=a*x+b)			Equivalent Exponential Growth Rate per year		Final Growth Rate	Total (all lanes) by vehicle type			Projected HV	Linear Growth Rate per year and equation used for projections (y=a*x+b)			Equivalent Exponential Growth Rate per year		Final Growth Rate	Projected HV	Percent of HV	Final Percent of HV
				Historic AADT	Estimated AADT	%	a	b	%		%	Historic AADT	Light vehicles	Heavy vehicles	Estimated HV	%	a	b	%		%	Estimated HV	%	Average %
Gwydir Highway	6133		2011									-	-									-		
	Between		2012									-	-									-		
	Warialda		2013									-	-									-		22.64%
	Road and		2014									-	-									-		
	New		2015	1,067		4.12%						1,067	838	229		20.5%						229	21.46%	
	England		2016	525		8.38%						525	400	125		37.6%						125	23.81%	
	Highway		2017	1,155		3.81%						1,155	832	323		14.6%						323	27.97%	
			2018		1,004		44.0	-87,788.33				1,004			320		47.0	-94,526.33				320	31.85%	
			2028		1,444					3.70%		1,444			790					9.5%		790	54.70%	63.37%
			2038		1,884					3.20%		1,884			1,260					7.1%		1,951	103.56%	
Newell Highway	BGBSTC		2010	2,536		1.75%						2,465	1,318	1,147								-		
			2011	2,465		1.78%						2,499	1,314	1,185		3.1%						1,147	46.53%	
			2012	2,499		1.72%						2,584	1,409	1,175		3.1%						1,185	47.42%	
			2013	2,584								2,584	1,321	1,263		2.9%						1,175	45.47%	47.40%
			2014									-	-									1,263	48.88%	
			2015	2,724		1.60%						2,724	1,397	1,327								-		
			2018		2,777		44.4	-86,862.57				2,777			1,350		36.9	-73,033.81				1,327	48.72%	
			2028		3,221					1.49%		3,221			1,718					2.4%		1,350	48.60%	
			2038		3,665					1.40%		3,665			2,087					2.2%		1,718	53.34%	53.88%
Summerland Way	T0260		2011									-										2,188	59.68%	
			2012									-										-		
			2013									-										-		
			2014									-										-		16.92%
			2015	2,800		0.77%						2,800	2,341	459		6.0%						459	16.39%	
			2016	1,437		1.50%						1,437	1,203	234		11.8%						234	16.28%	
			2017	2,843		0.76%						2,843	2,329	514		5.4%						514	18.08%	
			2018		2,403		21.5	-40,984.00				2,403			457		27.5	-55,037.67				457	19.03%	
			2028		2,618					0.86%		2,618			732					4.8%		732	27.97%	29.47%
			2038		2,833					0.83%		2,833			1,007					4.0%		1,173	41.39%	
Average										2.02%														

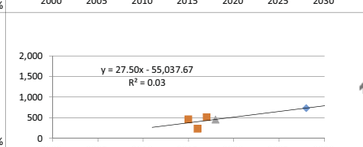












APPENDIX M

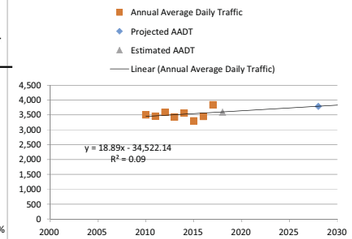
Traffic Impact Assessment

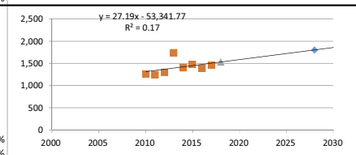
Appendix B Department of Transport and Main Roads Traffic Growth Rates

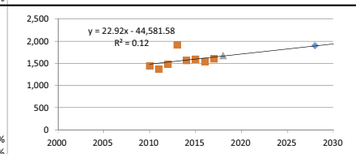
NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

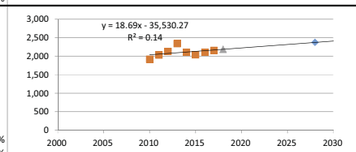
The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

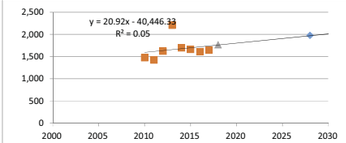
Location & Year				Annual Average Daily Traffic (AADT) growth rates								Heavy Vehicles (HV) percent projections											
Segment	Station	Lanes	Year	Annual Average Daily Traffic	Projected AADT	Linear Growth Rate per year and equation used for projections (y=a*x+b)			Equivalent Exponential Growth Rate per year		Final Growth Rate	Total (all lanes) by vehicle type			Projected HV	Linear Growth Rate per year and equation used for projections (y=a*x+b)			Equivalent Exponential Growth Rate per year		Final Growth Rate	Projected HV	Percent of HV	Final Percent of HV
				Historic AADT	Estimated AADT	%	a	b	%		%	Historic AADT	Light vehicles	Heavy vehicles	Estimated HV	%	a	b	%		%	Estimated HV	%	Average %
Cunningham Highway	50574		2010	3,506		0.54%						3,506	2,275	1,231		1.6%						1,231		
			2011	3,462		0.55%						3,462	1,953	1,509		1.3%						1,509		
			2012	3,588		0.53%						3,588	2,113	1,475		1.3%						1,475	41.10%	41.15%
			2013	3,432		0.55%						3,432	1,929	1,503		1.3%						1,503	43.80%	
			2014	3,562		0.53%						3,562	2,184	1,378		1.4%						1,378	38.70%	
			2015	3,303		0.57%						3,303	1,949	1,354		1.4%						1,354	41.00%	
			2016	3,454		0.55%						3,454	2,068	1,386		1.4%						1,386	40.13%	
			2017	3,842		0.49%						3,842	2,221	1,621		1.2%								
			2018		3,598		18.9	-34,522.14				3,598	2,143		1,455		19.4	-37,693.91				1,455	40.45%	
			2028		3,787					0.51%		3,787			1,649					1.3%		1,649	43.55%	43.67%
			2038		3,976					0.50%		3,976			1,843					1.2%		1,869	47.01%	
Cunningham Highway	50023		2010	1,259								1,259	790	469		5.2%						469		
			2011	1,245								1,245	657	588		4.2%						588		
			2012	1,293		2.10%						1,293	641	652		3.8%						652	50.40%	48.74%
			2013	1,739		1.56%						1,739	873	866		2.8%						866	49.80%	
			2014	1,398		1.94%						1,398	747	651		3.8%						651	46.60%	
			2015	1,475		1.84%						1,475	751	724		3.4%						724	49.10%	
			2016	1,385		1.96%						1,385	723	662		3.7%						662	47.80%	
			2017	1,456								1,456	747	709		3.5%								
			2018		1,528		27.2	-53,341.77				1,528			767		24.5	-48,674.30				767	50.19%	
			2028		1,800					1.65%		1,800			1,012					2.8%		1,012	56.22%	56.95%
			2038		2,071					1.53%		2,071			1,257					2.5%		1,335	64.45%	
Cunningham Highway	50773		2010	1,439		1.59%						1,439	950	489		4.2%						489		
			2011	1,369		1.67%						1,369	789	580		3.6%						580		
			2012	1,480		1.55%						1,480	783	697		3.0%						697	47.10%	
			2013	1,914		1.20%						1,914	991	923		2.3%						923	48.20%	45.14%
			2014	1,562		1.47%						1,562	840	722		2.9%						722	46.20%	
			2015	1,591		1.44%						1,591	947	644		3.2%						644	40.50%	
			2016	1,538		1.49%						1,538	866	672		3.1%						672	43.70%	
			2017	1,596								1,596	871	725		2.9%								
			2018		1,671		22.9	-44,581.58				1,671	898		773		20.8	-41,181.05				773	46.27%	
			2028		1,900					1.29%		1,900			981					2.4%		981	51.63%	52.12%
			2038		2,129					1.22%		2,129			1,189					2.2%		1,245	58.46%	
Cunningham Highway	51840		2010	1,915		0.98%						1,915	1,264	651		2.7%								
			2011	2,033		0.92%						2,033	1,330	703		2.5%						787	37.00%	
			2012	2,127		0.88%						2,127	1,340	787		2.3%						936	40.00%	36.76%
			2013	2,340		0.80%						2,340	1,404	936		1.9%						714	33.90%	
			2014	2,106		0.89%						2,106	1,392	714		2.5%						737	36.20%	
			2015	2,036		0.92%						2,036	1,299	737		2.4%						775	36.70%	
			2016	2,111		0.89%						2,111	1,336	775		2.3%								
			2017	2,156								2,156	1,289	867		2.1%								
			2018		2,186		18.7	-35,530.27				2,186	1,345		841		17.8	-35,038.83				841	38.48%	
			2028		2,373					0.82%		2,373			1,019					1.9%		1,019	42.94%	43.21%
			2038		2,560					0.79%		2,560			1,197					1.8%		1,234	48.22%	
Cunningham Highway	50005		2010	1,475		1.42%						1,475	882	593		1.8%						593		
			2011	1,425		1.47%						1,425	829	596		1.8%						596		
			2012	1,622		1.29%						1,622	925	697		1.6%						697	43.00%	
			2013	2,211		0.95%						2,211	1,309	902		1.2%						902	40.80%	39.82%
			2014	1,698		1.23%						1,698	1,095	603		1.8%						603	35.50%	
			2015	1,664		1.26%						1,664	1,048	616		1.8%						616	37.00%	
			2016	1,613		1.30%						1,613	923	690		1.6%						690	42.80%	
			2017	1,647								1,647	914	733		1.5%								
			2018		1,770		20.9	-40,446.33				1,770	1,038		732		10.8	-21,102.71				732	41.35%	
			2028		1,979					1.12%		1,979			840					1.4%		840	42.45%	42.62%
			2038		2,189					1.07%		2,189			948					1.3%		964	44.07%	
Leichardt Highway	55438		2010	3,073		-2.41%						3,073	1,936	1,137		-0.9%						1,137		
			2011	3,275		-2.26%						3,275	2,076	1,199		-0.8%						1,199		
			2012	3,328		-2.23%						3,328	2,263	1,065		-0.9%						1,065	32.00%	
			2013	3,015		-2.46%						3,015	2,147	868		-1.1%						868	28.80%	32.38%
			2014	3,170		-2.34%						3,170	2,140	1,030		-0.9%						1,030	32.50%	
			2015	3,118		-2.38%						3,118	2,148	970		-1.0%						970	31.10%	
			2016	2,715		-2.73%						2,715	1,697	1,018		-1.0%						1,018	37.50%	
			2017	2,651								2,651	1,485	1,166										
			2018		2,719		-74.15	152,353.74				2,719	1,711		1,008		-9.8	20,723.57				1,008	37.06%	
			2028		1,978					-3.13%		1,978			910					-1.0%		910	46.02%	49.85%
			2038		1,236					-3.87%		1,236			812					-1.1%		822	66.49%	
Cunningham Highway	55420		2010	2,180		-1.58%						2,180		507		5.0%						507		
			2011	1,903		-1.81%						1,903		547		4.6%								
			2012	2,400		-1.44%						2,400		610		4.2%								
			2013	2,486		-1.39%						2,486	1,755	731		3.5%						731	29.40%	29.79%
			2014	1,891		-1.82%						1,891	1,276	615		4.1%						615	32.50%	
			2015	1,791		-1.93%						1,791	1,377	414		6.1%						414	23.10%	
			2016	2,032		-1.70%						2,032	1,338	694		3.7%						694	34.17%	
			2017	2,020								2,020	1,213	807		3.1%								
			2018		1,909		-34.50	71,529.70				1,909	1,909		724		25.4	-50,492.94				724	37.93%	
			2028		1,564					-1.97%		1,564			978					3.1%		978	62.52%	69.60%
			2038		1,219					-2.22%		1,219			1,231					2.7%		1,320	108.35%	
Leichardt Highway	50019		2010	2,283		-0.48%						2,283	1,560	723		-2.4%						723		
			2011	2,151		-0.51%						2,151	1,314	837		-2.1%						837		
			2012	2,226		-0.49%						2,226	1,337	889		-2.0%						889	39.92%	
			2013	1,769		-0.62%						1,769	1,113	656		-2.7%						656	37.07%	37.45%
			2014	2,005		-0.54%						2,005	1,237	768		-2.3%						768	38.28%	
			2015	1,995		-0.55%						1,995	1,288	707		-2.5%						707	35.44%	
			2016	2,123		-0.51%						2,123	1,347	776		-2.2%						776	36.55%	
			2017	2,238		-0.49%						2,238	1,399	839		-2.1%								
			2018		1,963		-10.90	23,959.60				1,963			648		-17.4	35,781.00				648	32.98%	
			2028		1,854					-0.57%		1,854			474					-3.1%		474	25.53%	26.12%
			2038		1,745					-0.59%		1,745			299					-3.8%		346	19.84%	
Average											-0.03%													

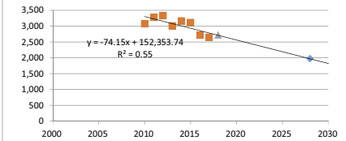


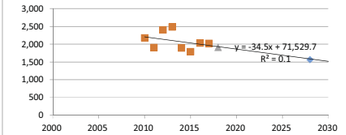


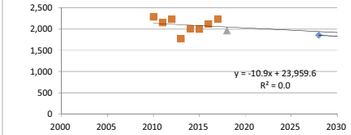


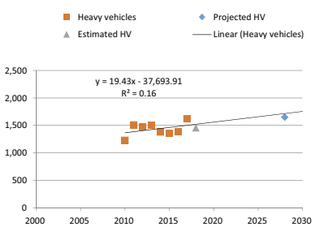


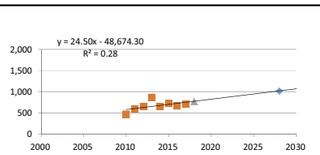


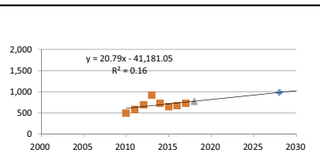


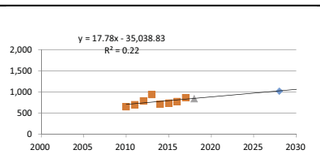


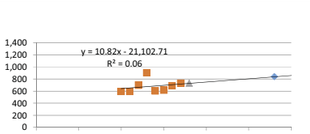


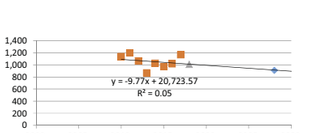


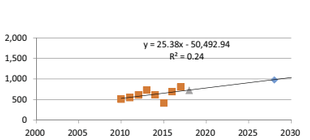


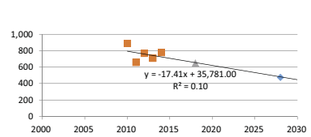












APPENDIX M

Traffic Impact Assessment

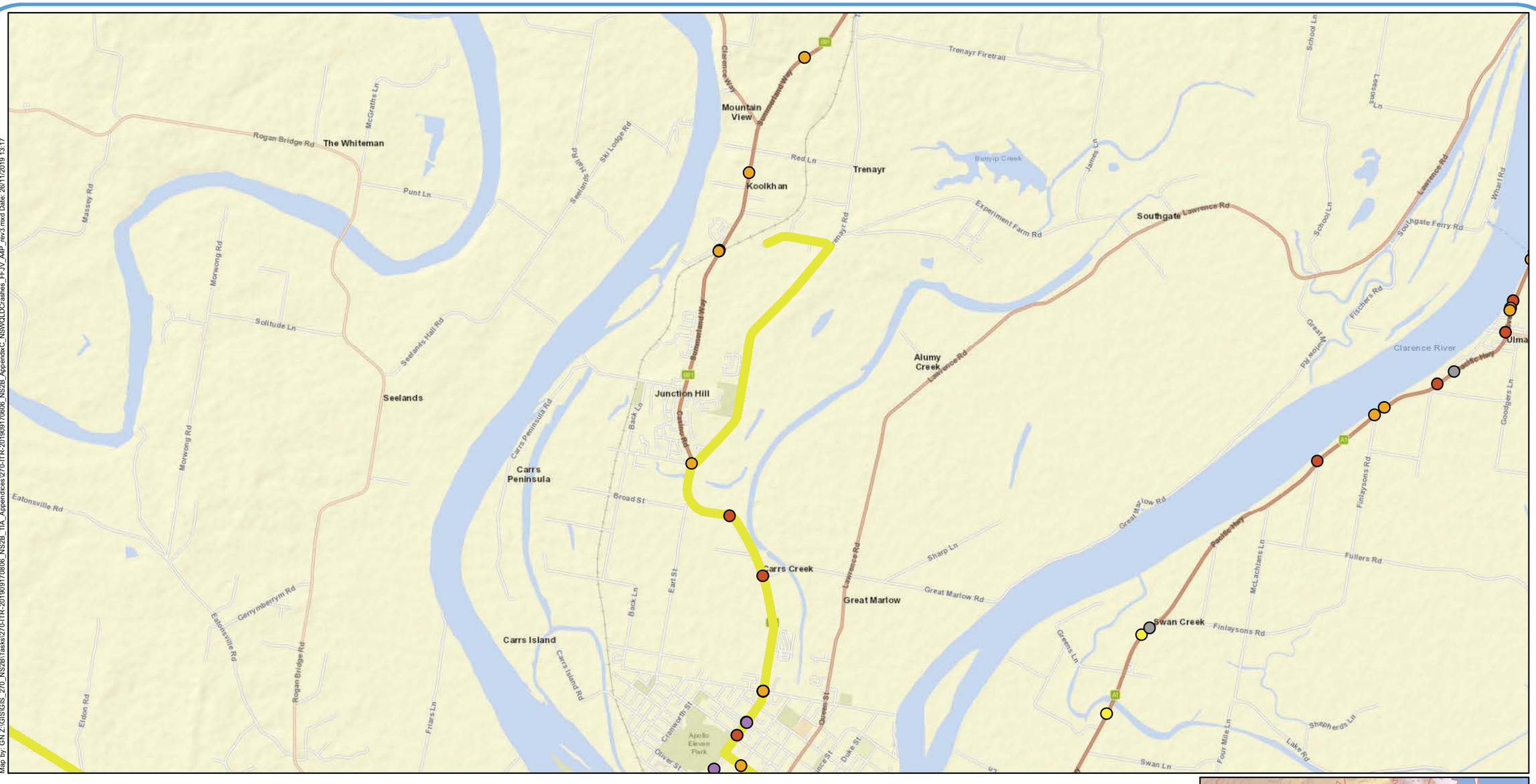
Appendix C Crashes Along Construction Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

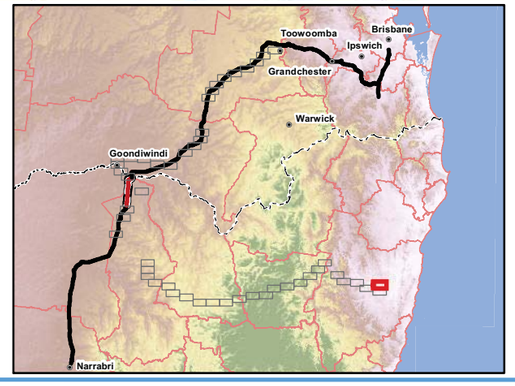
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Minor/Other Injury
- Moderate Injury
- Non-casualty (towaway)
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

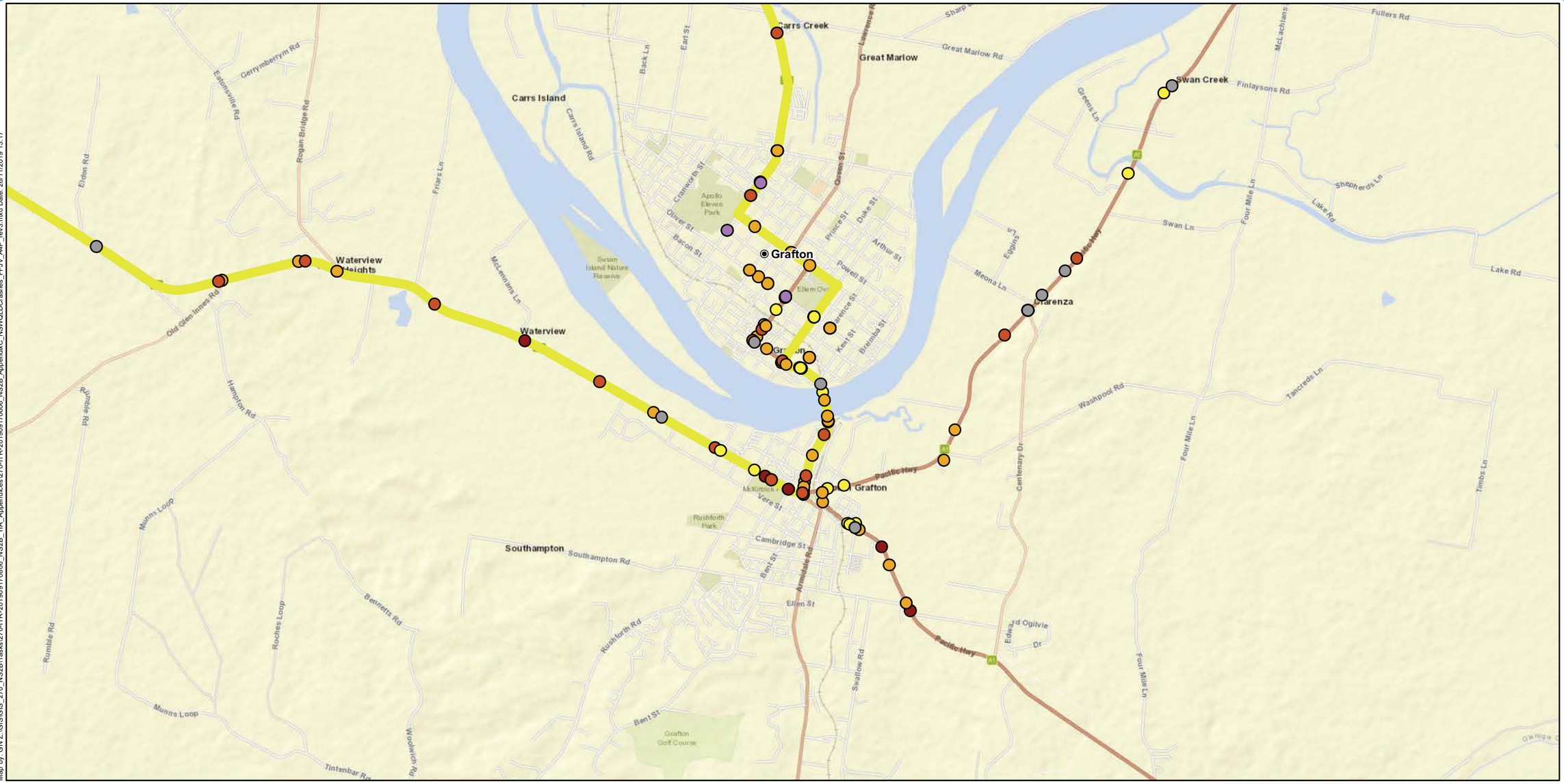
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C1: Crashes along construction routes

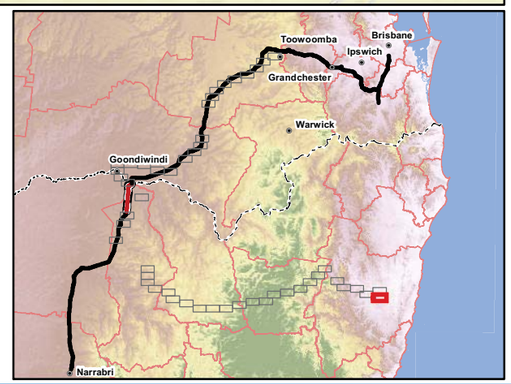
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Fatal
- Minor/Other Injury
- Moderate Injury
- Non-casualty (towaway)
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

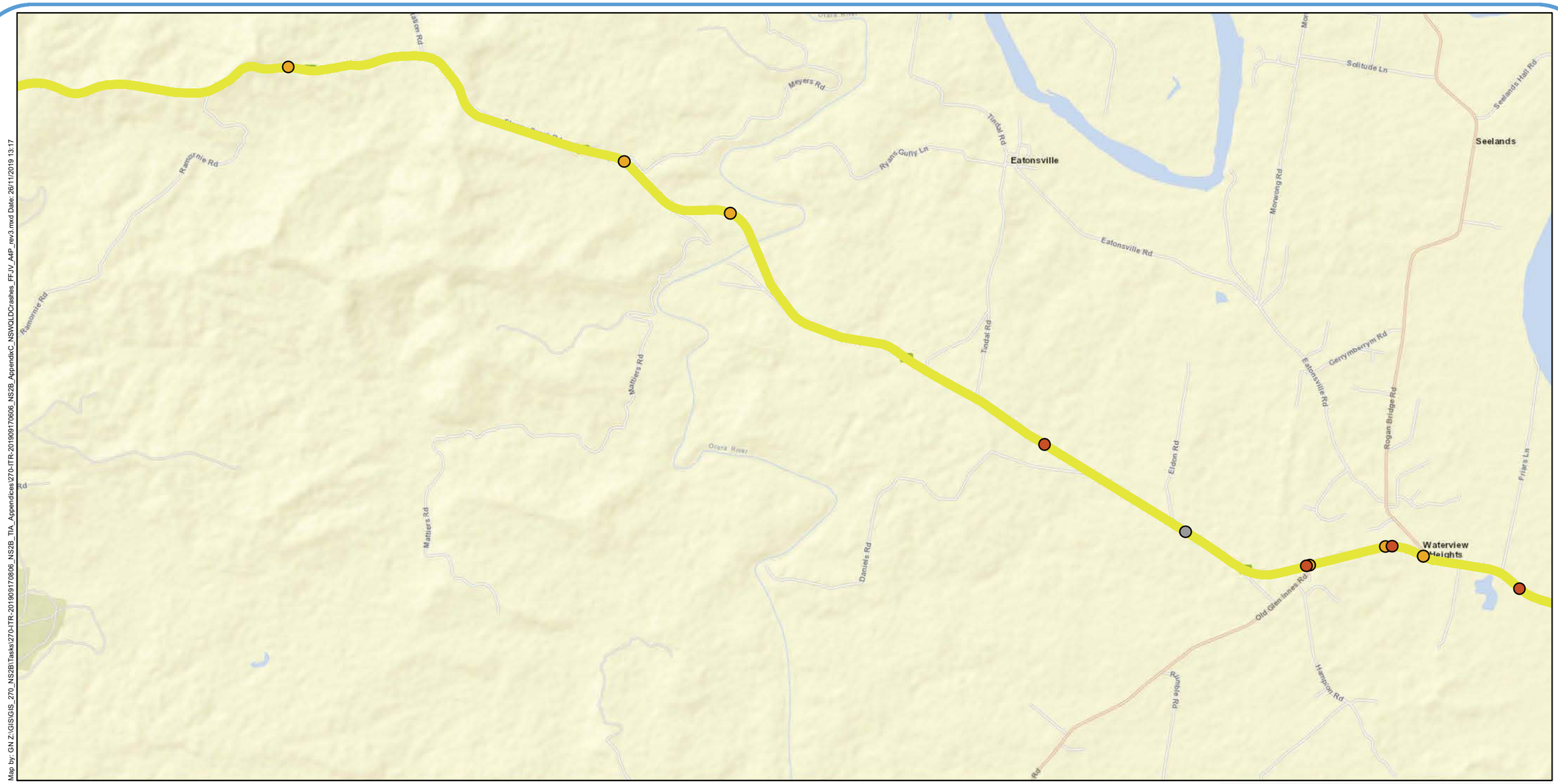
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C2: Crashes along construction routes

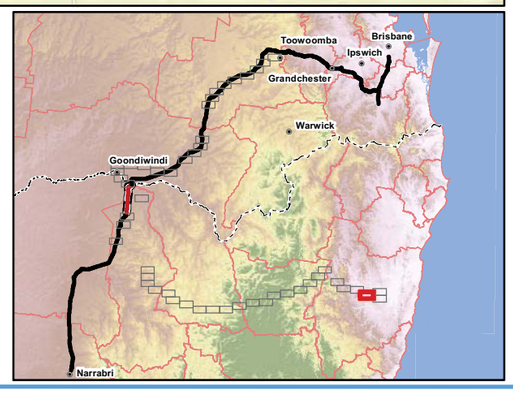
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

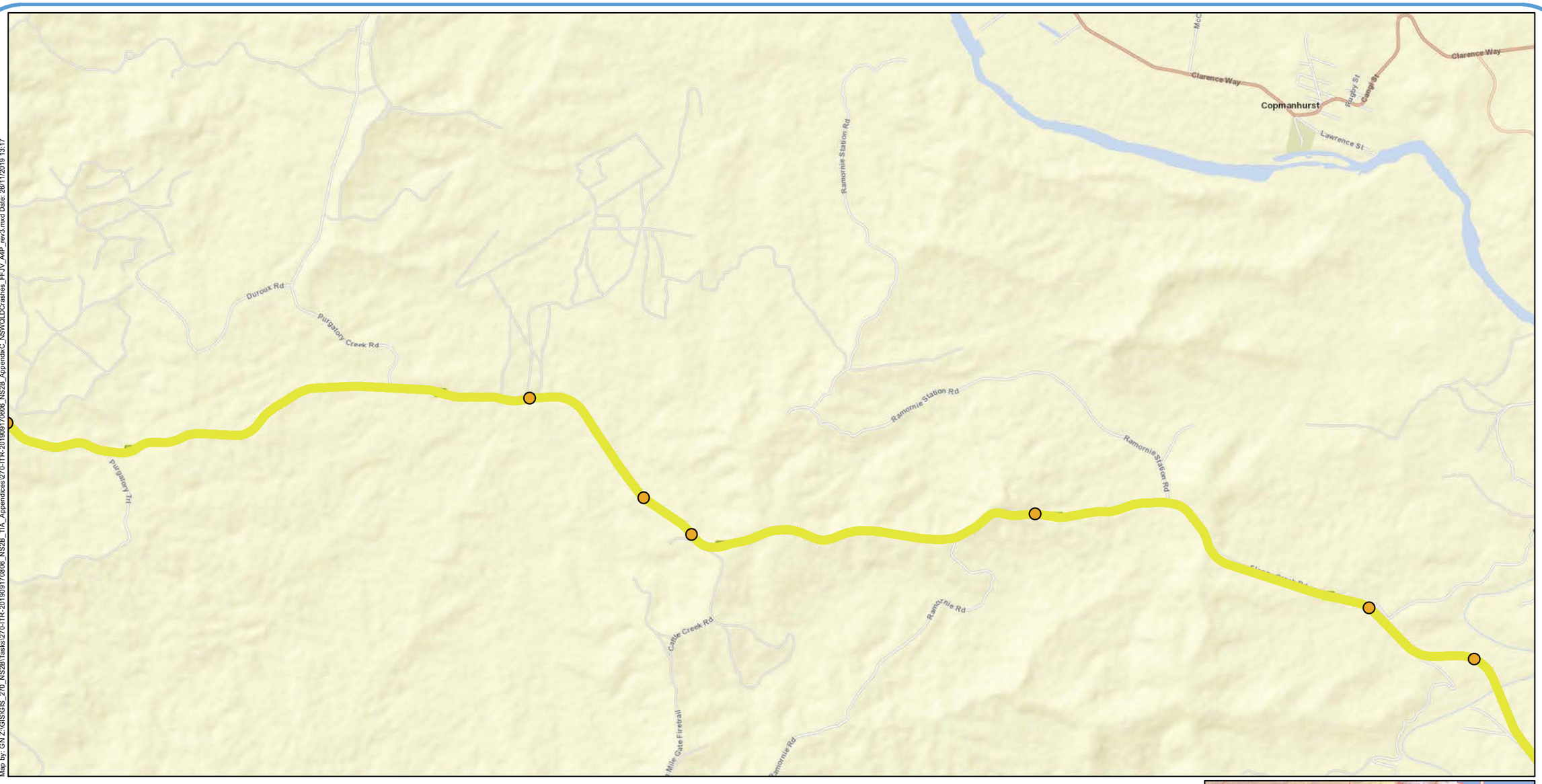
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C3: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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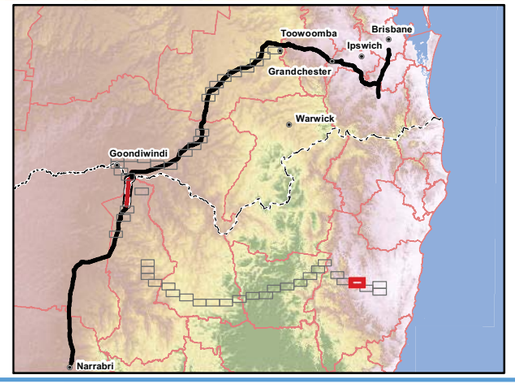
Legend

- Moderate Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3

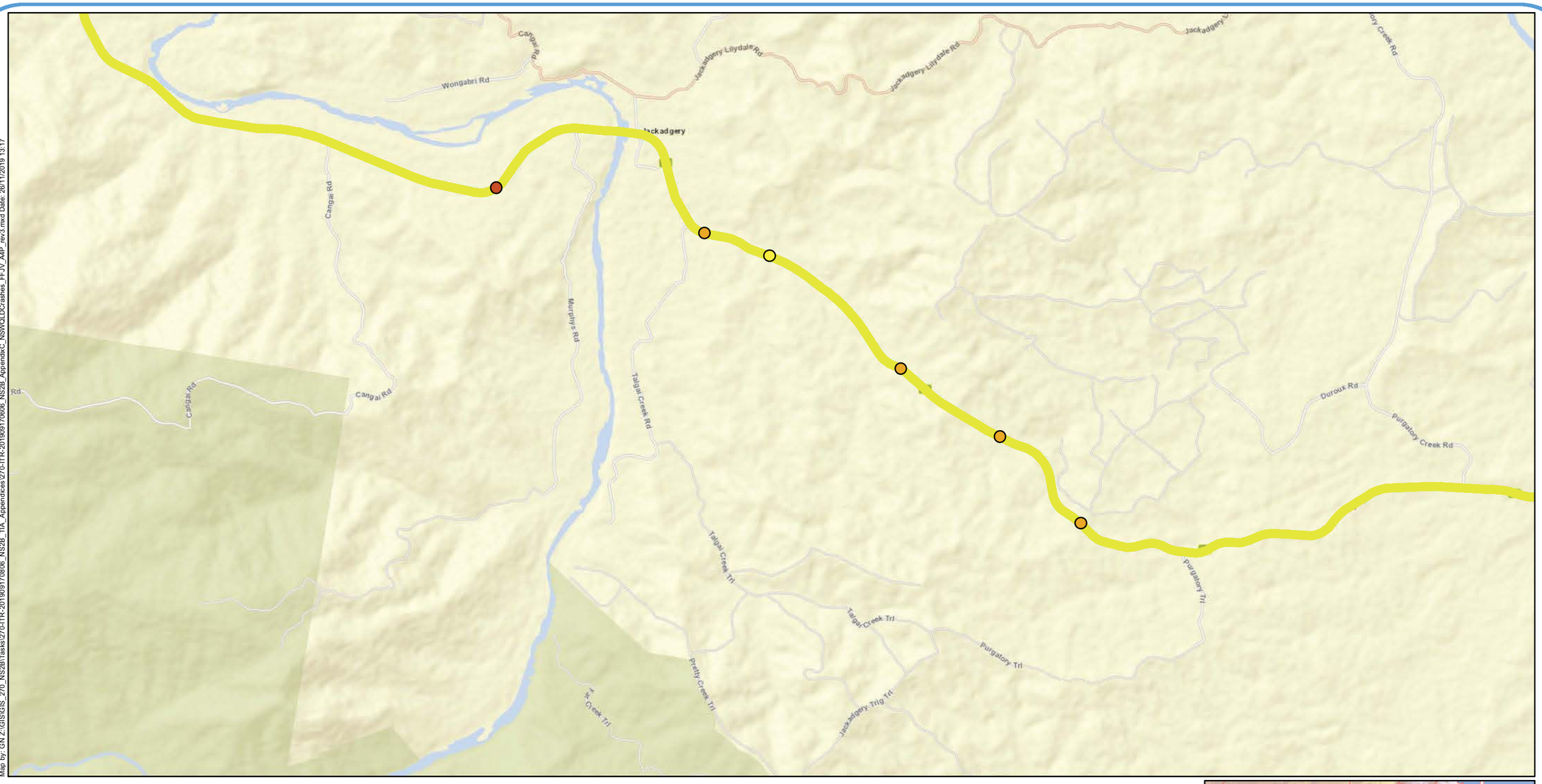
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C4: Crashes along construction routes

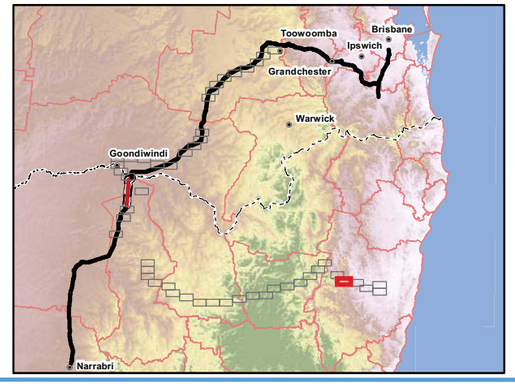
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

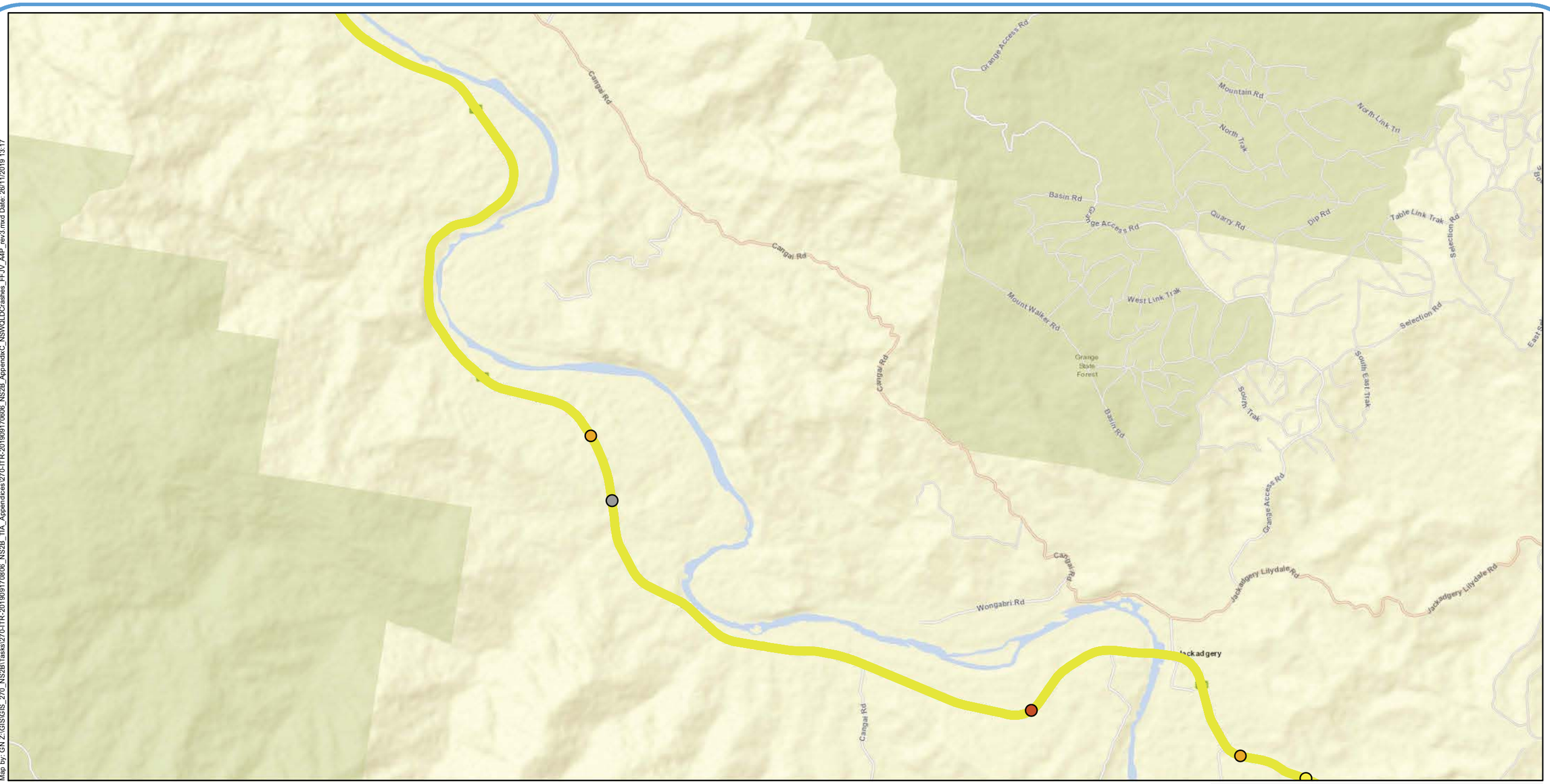
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C5: Crashes along construction routes

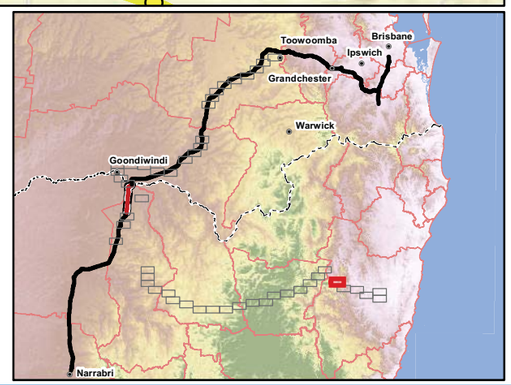
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917060606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3

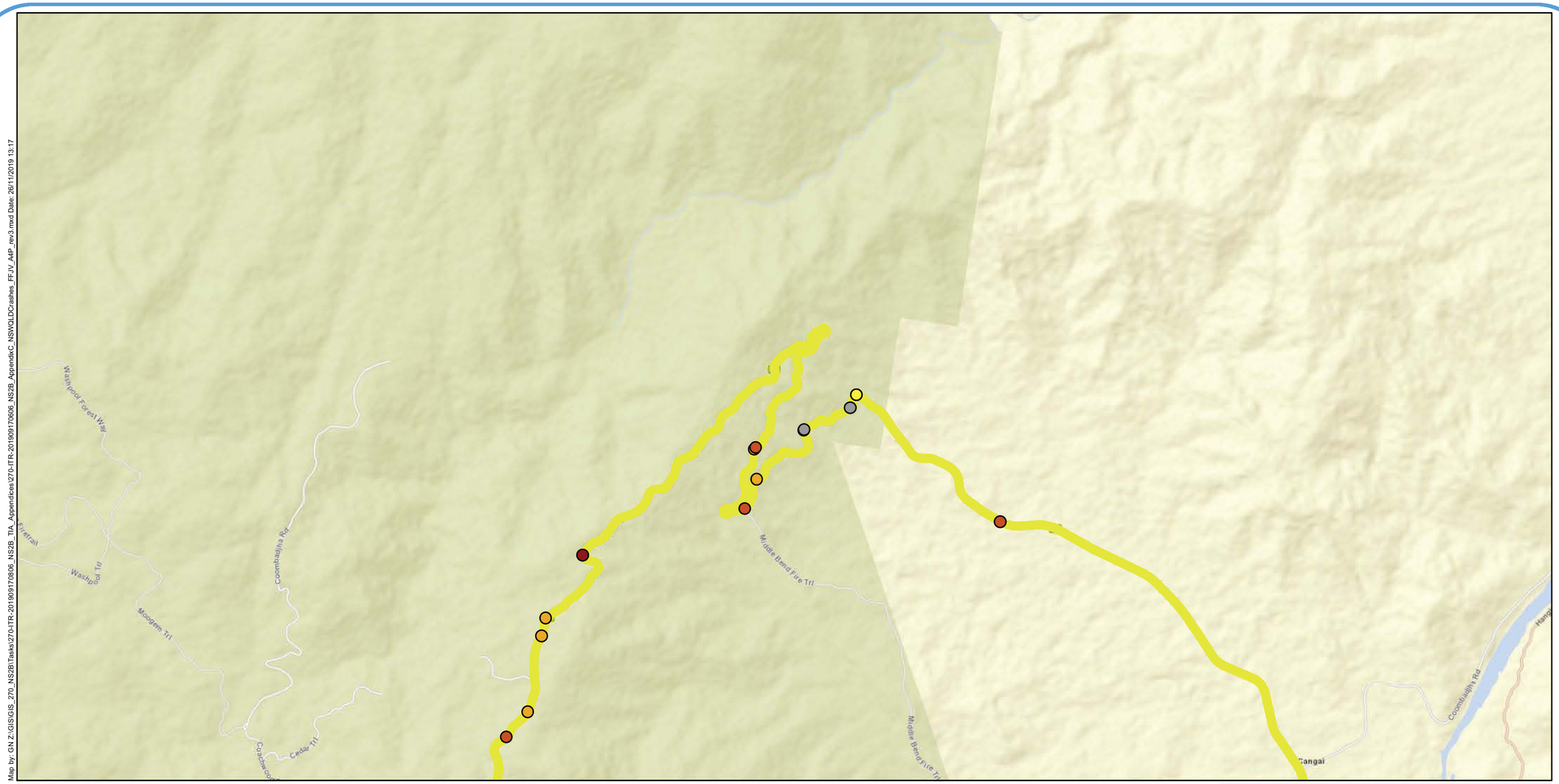
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C6: Crashes along construction routes

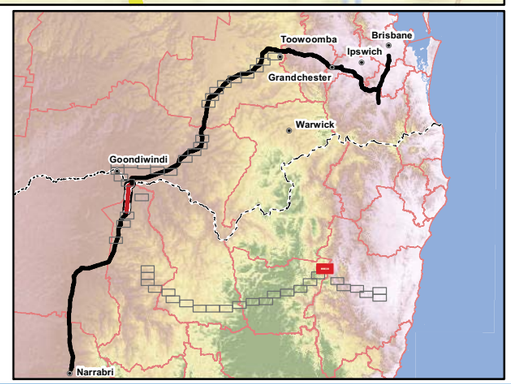
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Fatal
- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C7: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

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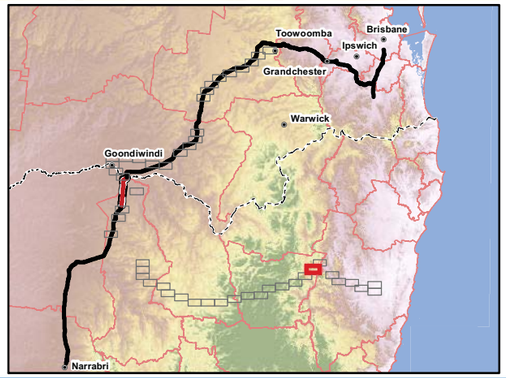
Legend

- Fatal
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

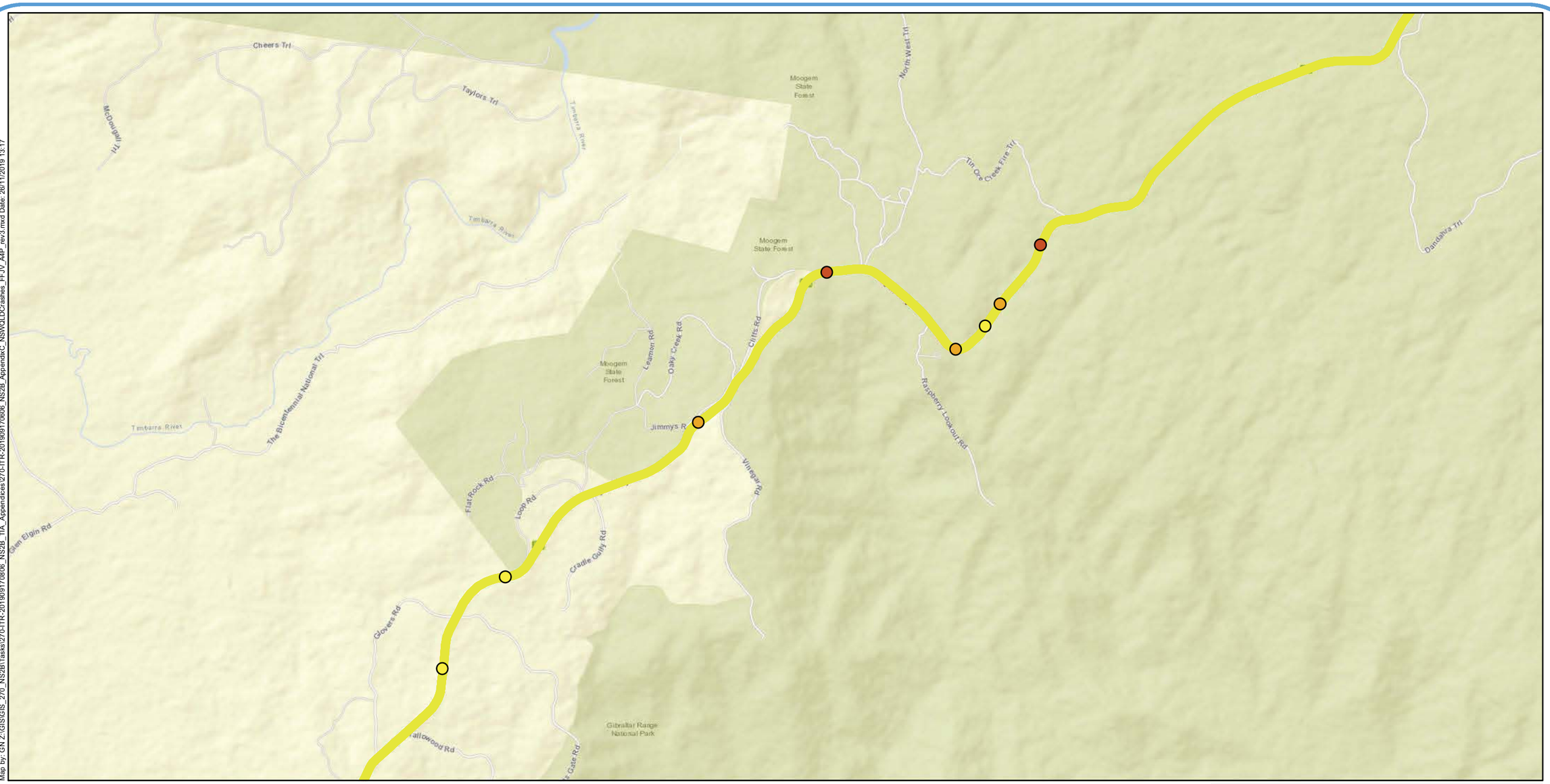
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C8: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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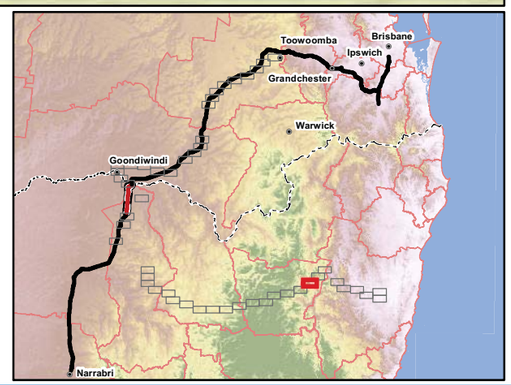
Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

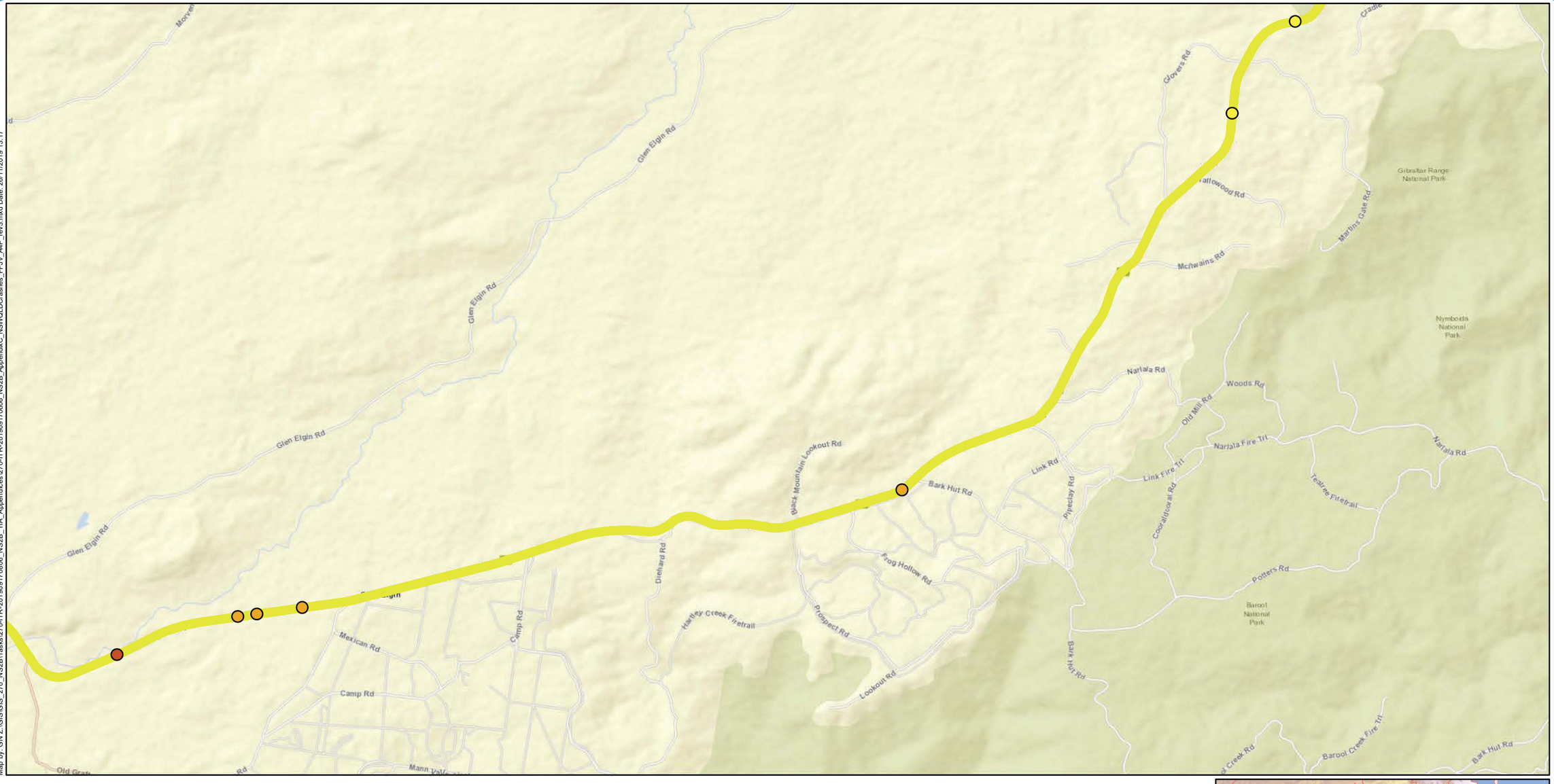
Issue date: 22/11/2019 Version: 3

Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C9: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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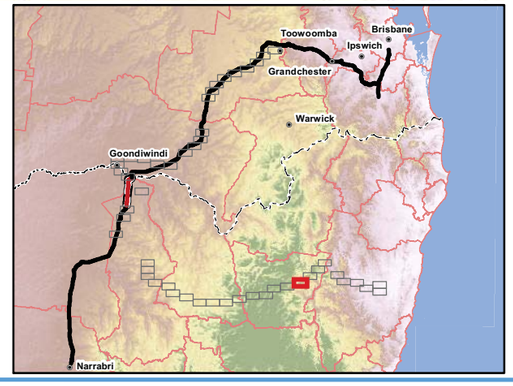
Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

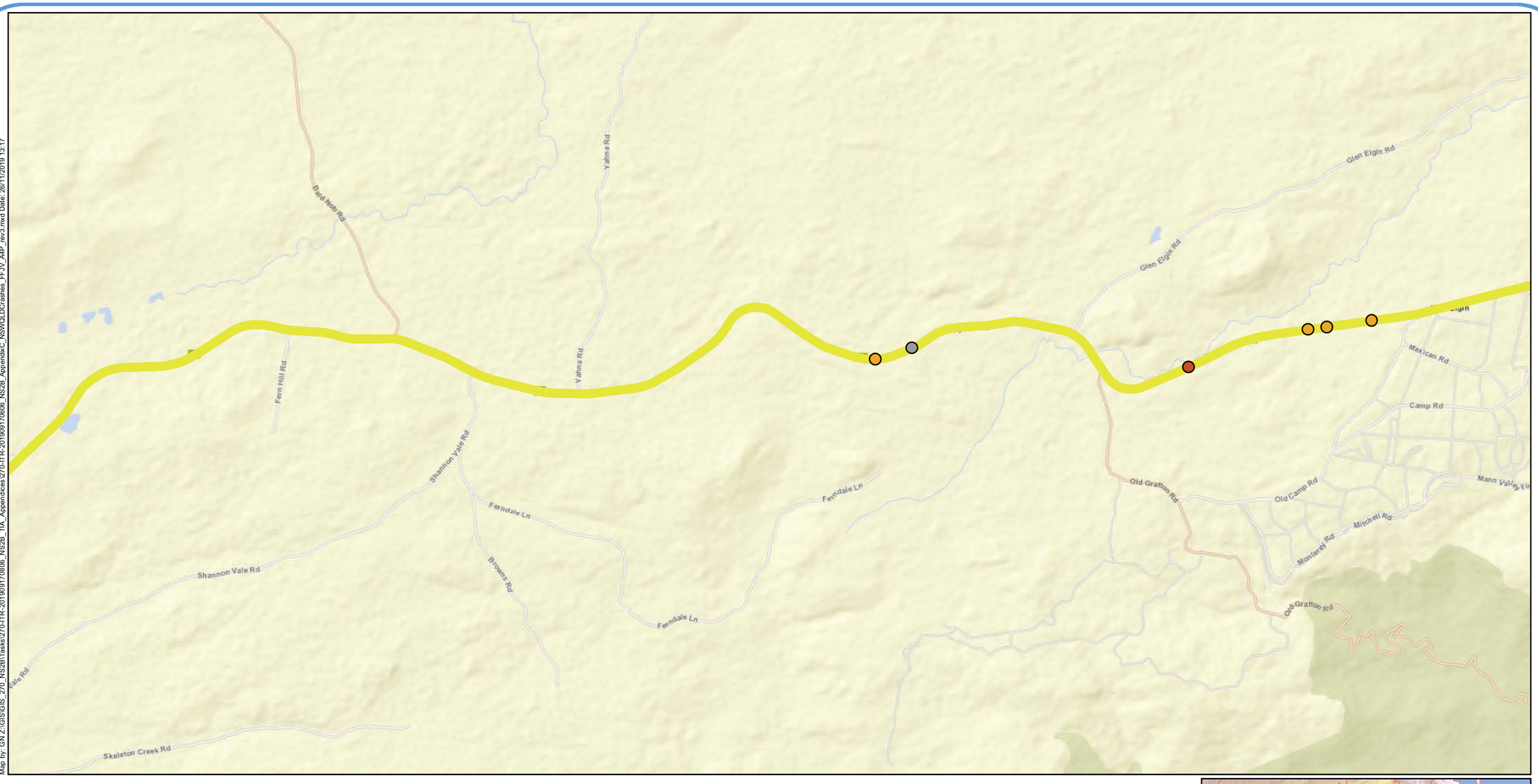
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C10: Crashes along construction routes

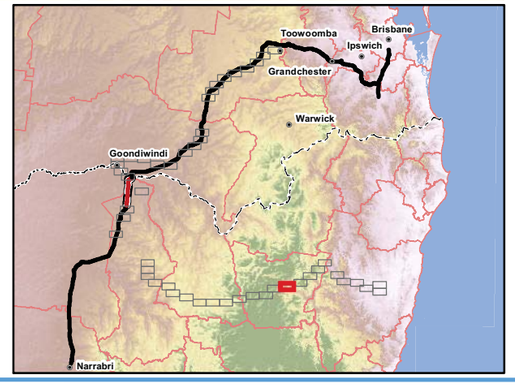
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

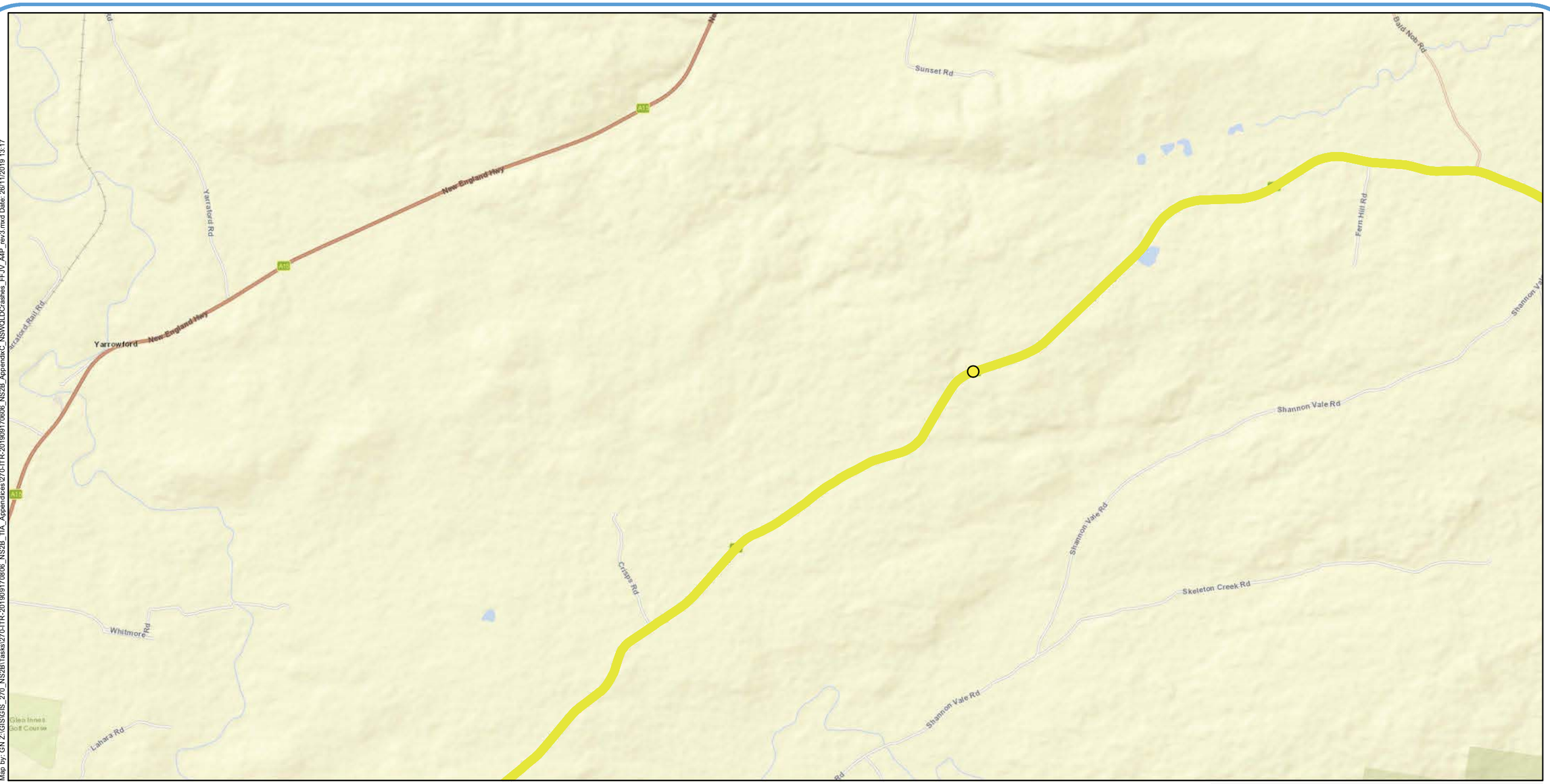
Issue date: 22/11/2019 Version: 3

Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C11: Crashes along construction routes

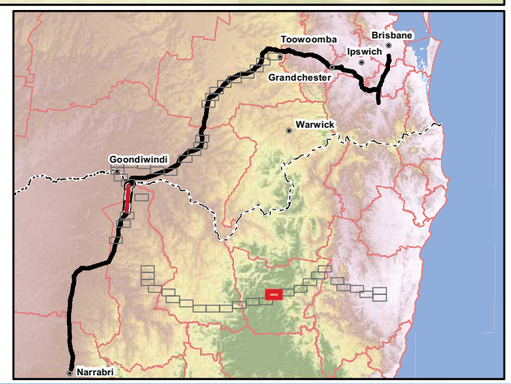
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Minor/Other Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

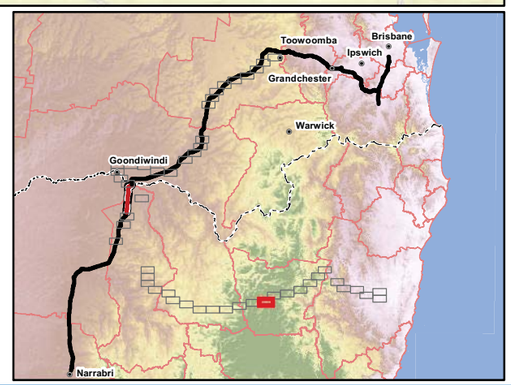
Appendix C12: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_AdP_rev3.mxd Date: 26/11/2019 13:17

Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3

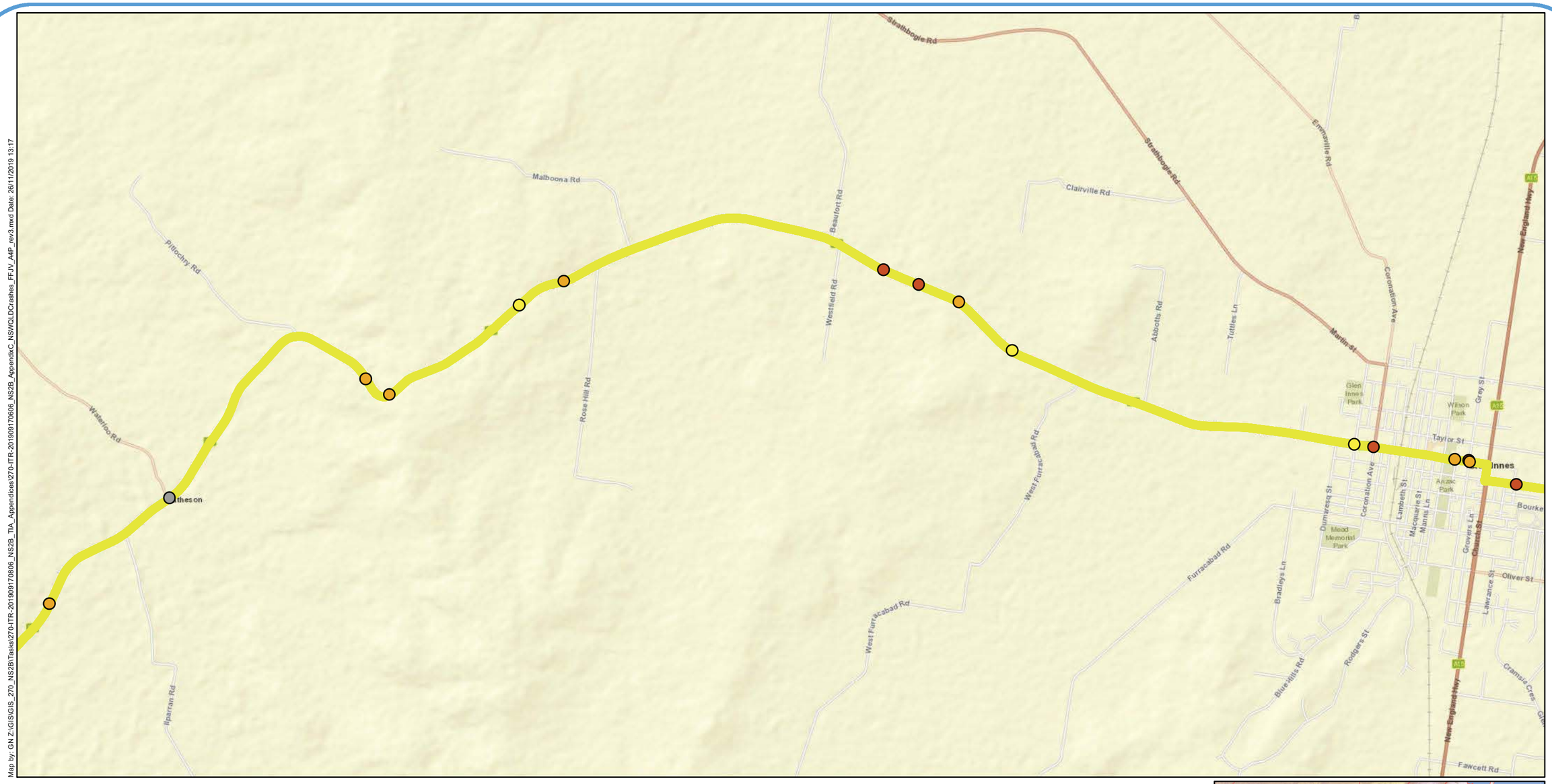
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C13: Crashes along construction routes

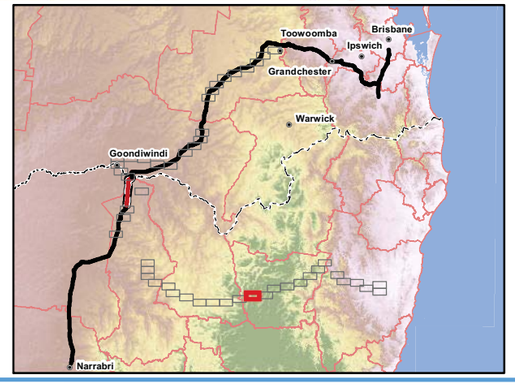
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

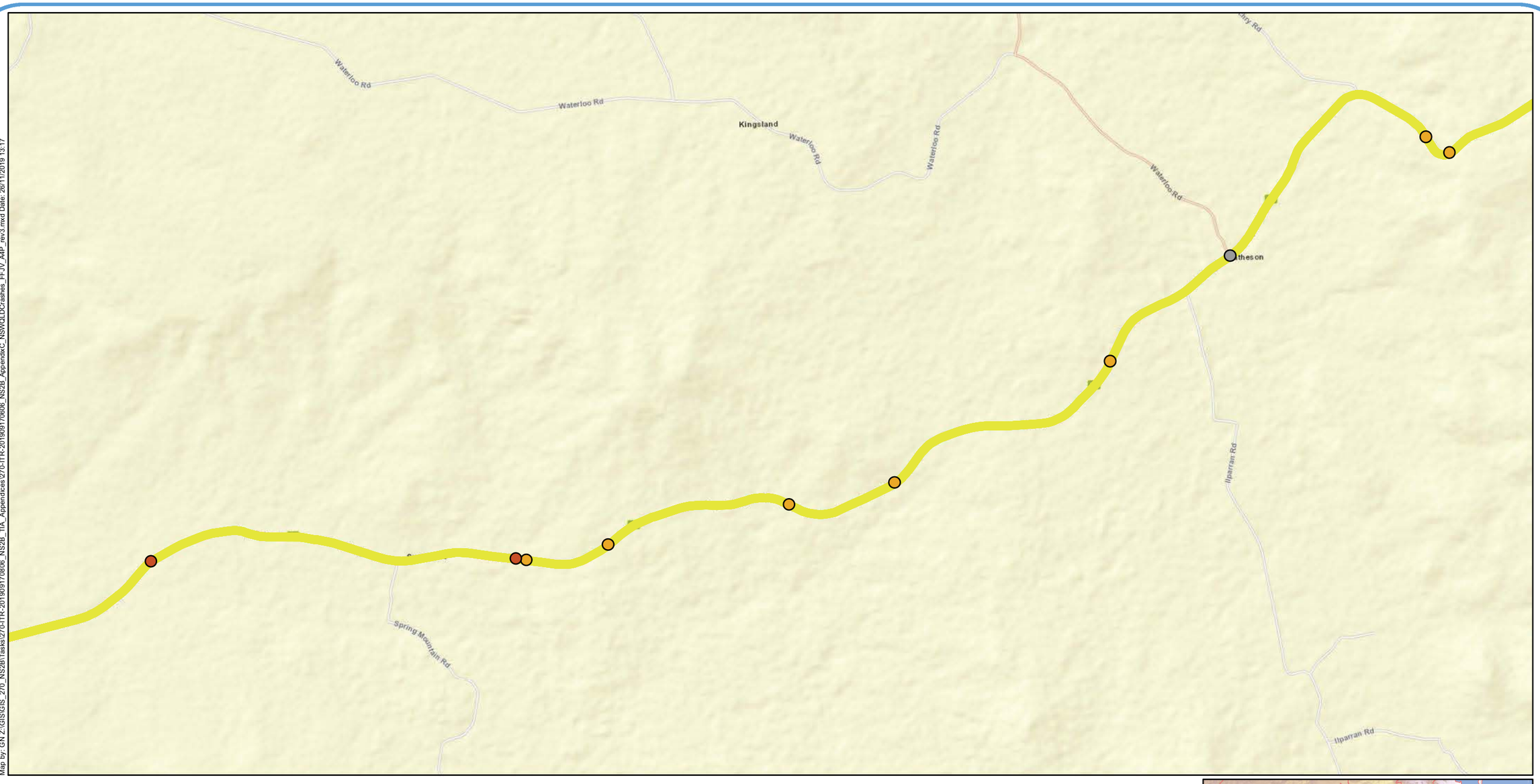
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C14: Crashes along construction routes

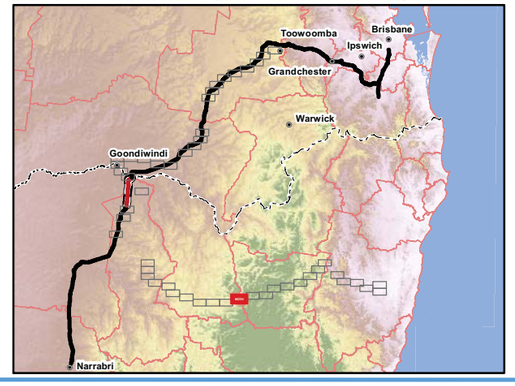
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

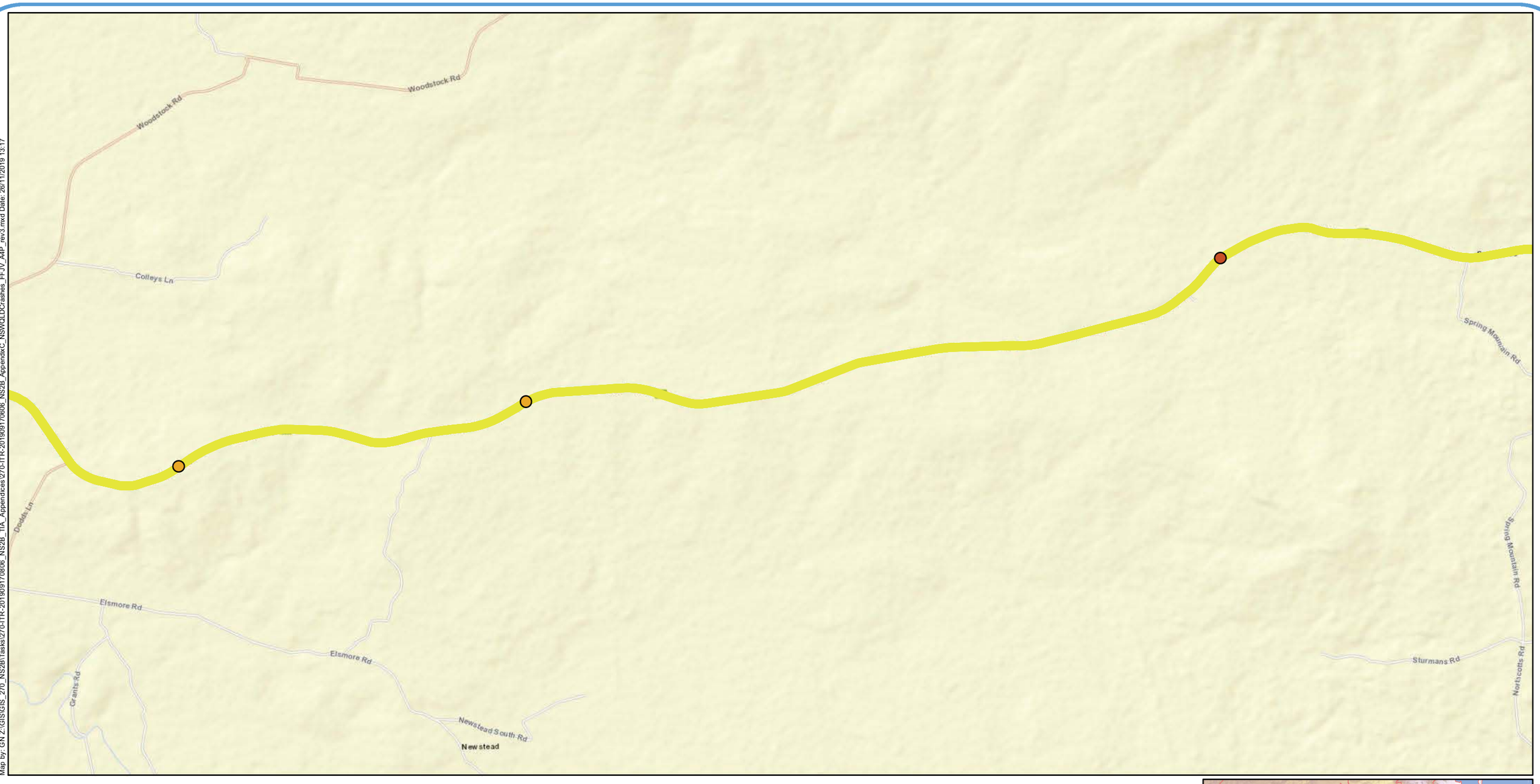
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C15: Crashes along construction routes

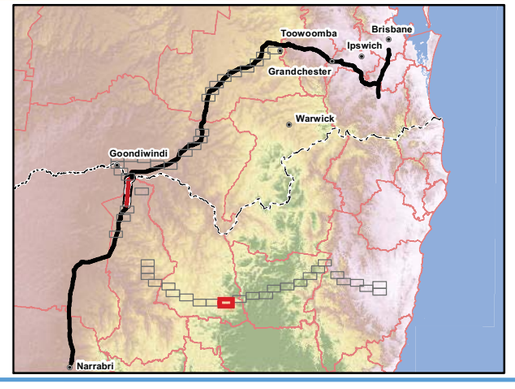
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

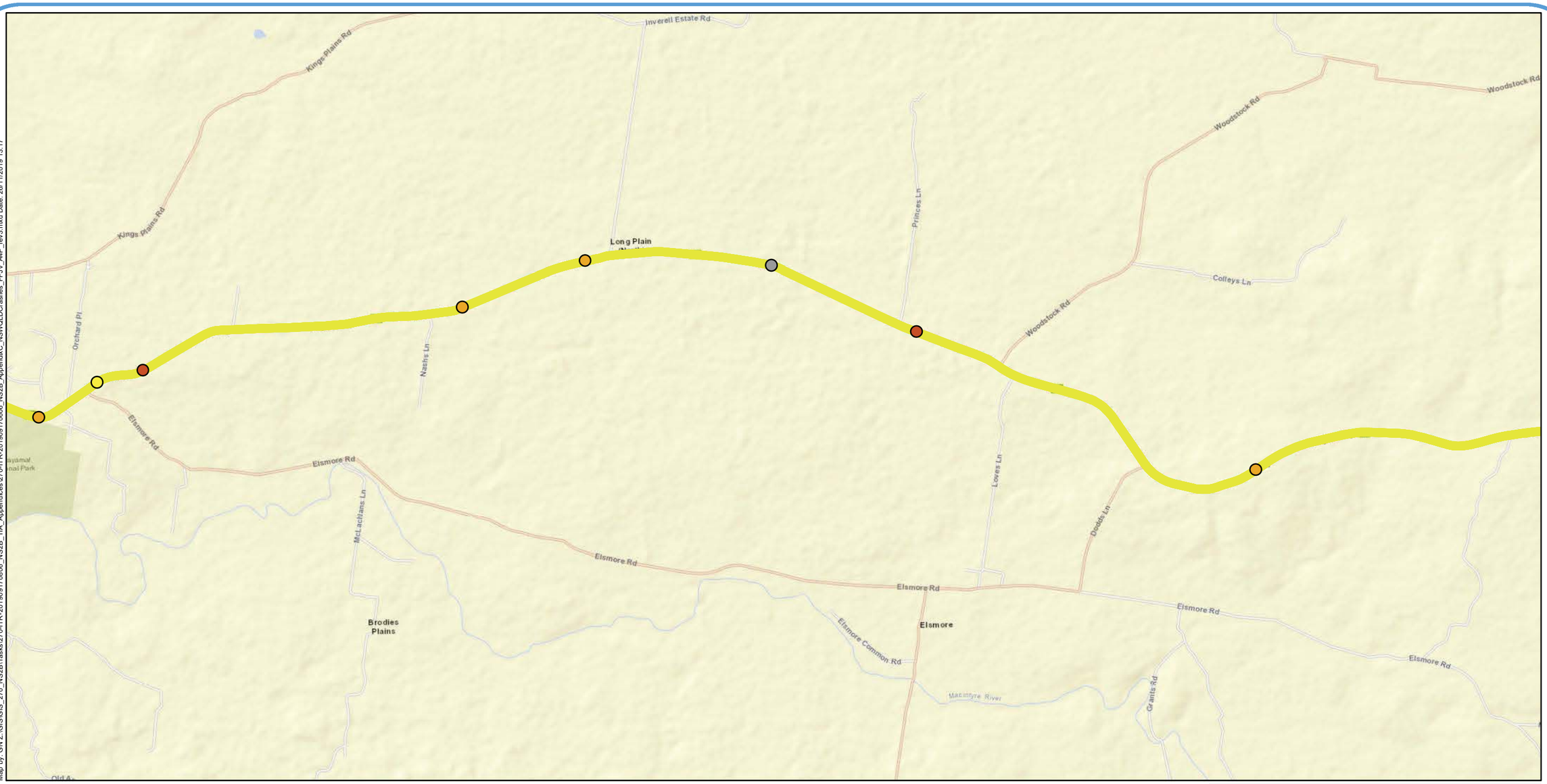
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C16: Crashes along construction routes

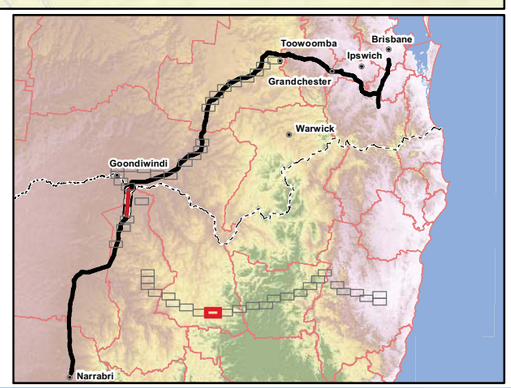
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

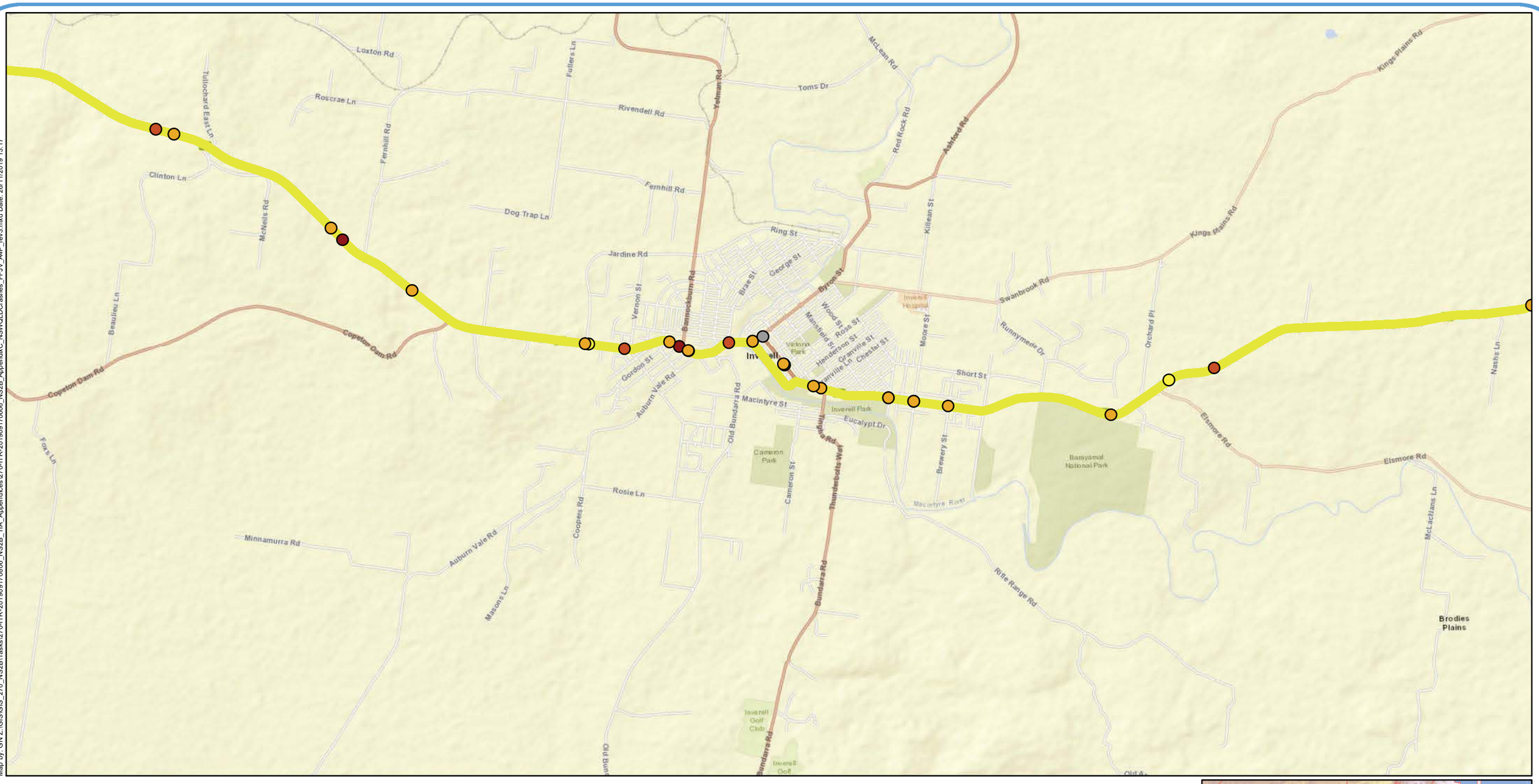
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C17: Crashes along construction routes

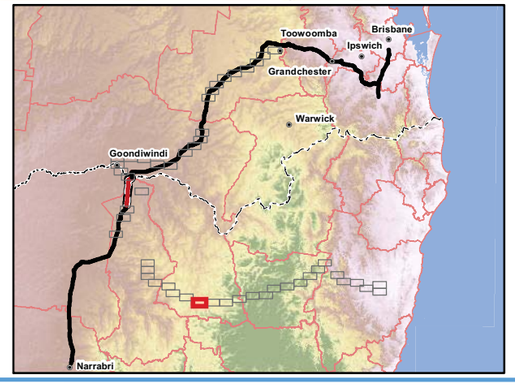
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Fatal
- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

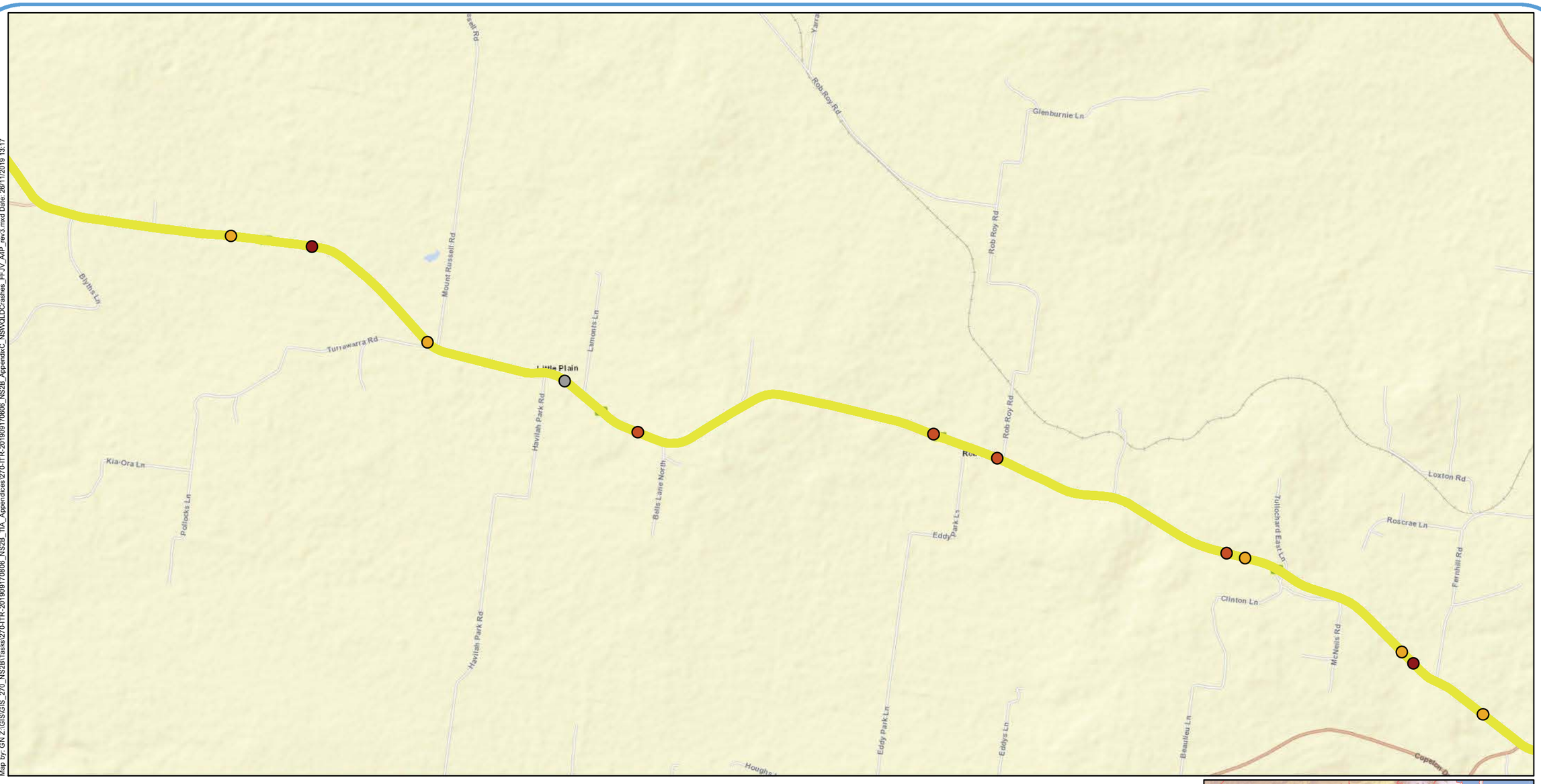
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C18: Crashes along construction routes

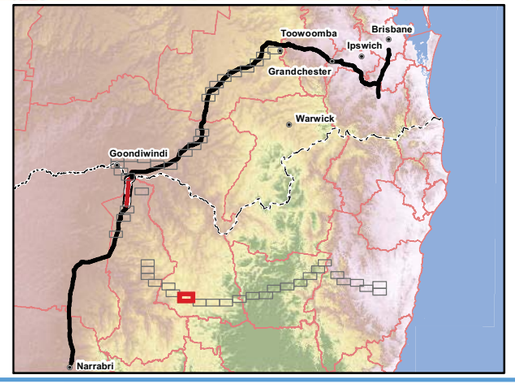
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 20190917080 6_NS2B_ TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Fatal
- Moderate Injury
- Serious Injury
- Uncategorised Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

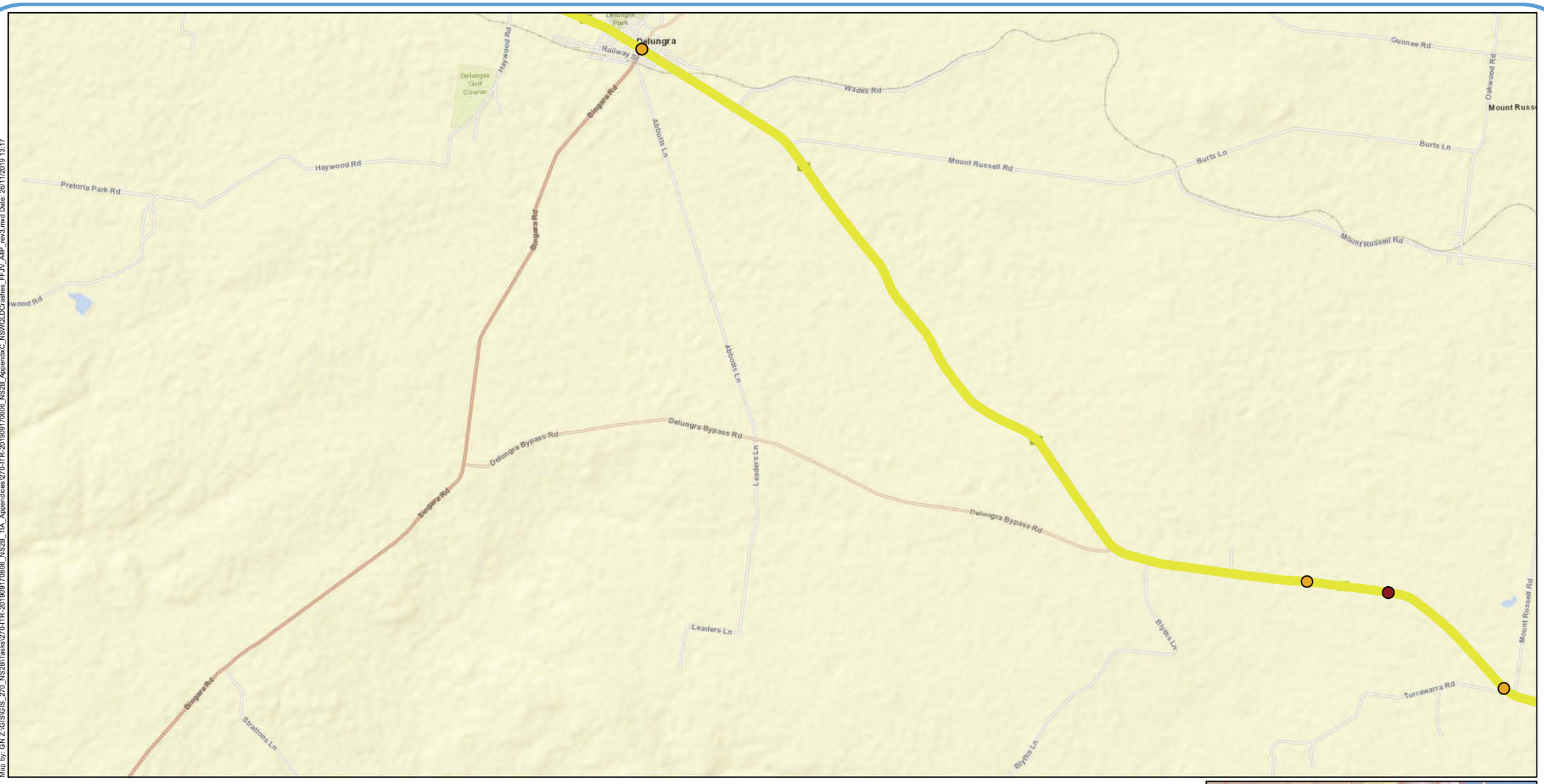
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C19: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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Legend

- Fatal
- Minor/Other Injury
- Moderate Injury
- Construction routes

A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

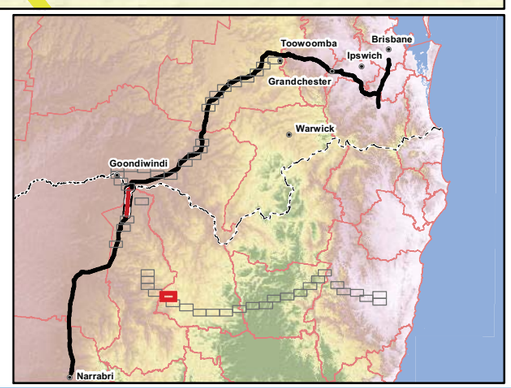
Appendix C20: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Minor/Other Injury
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

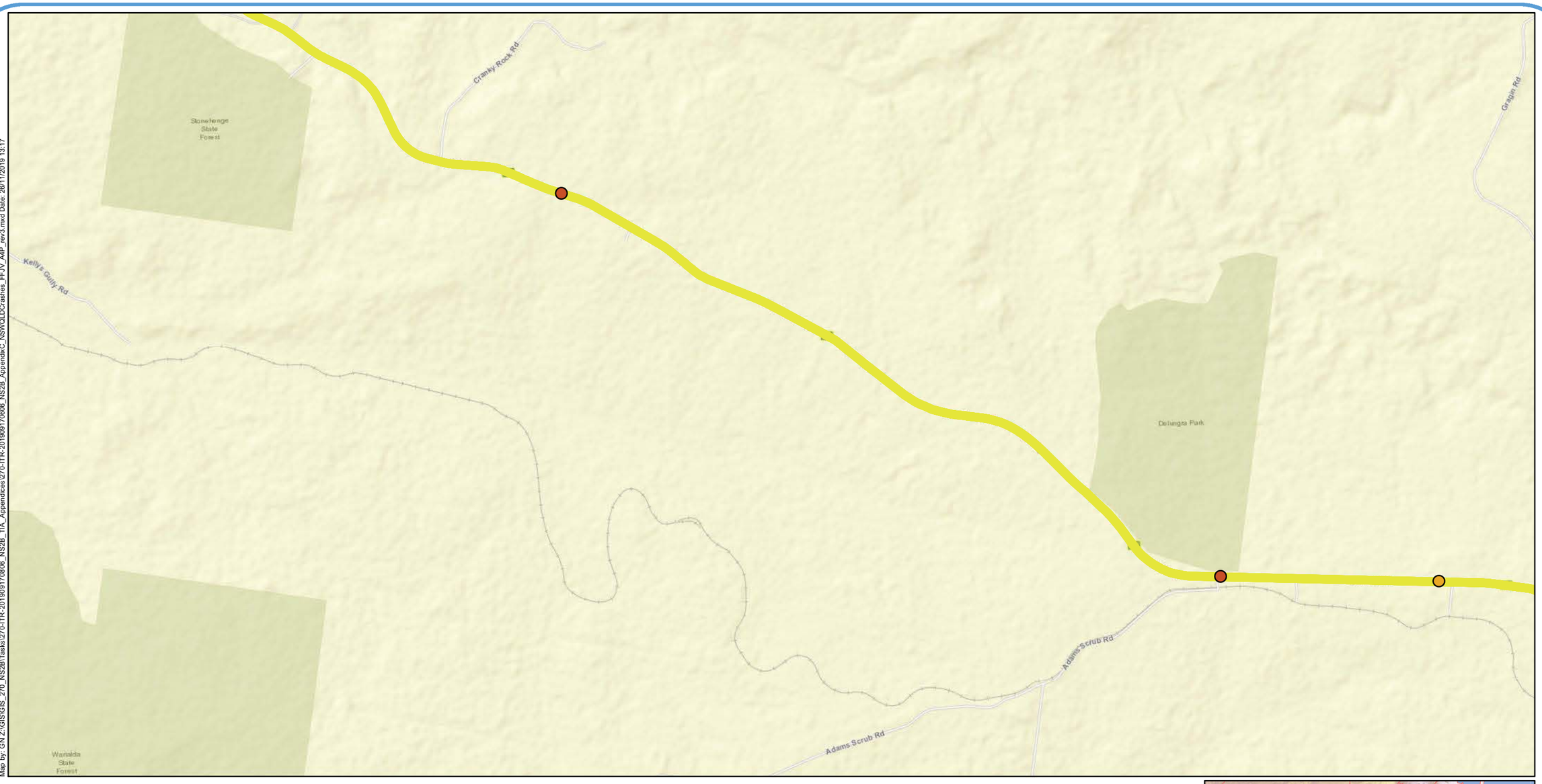
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C21: Crashes along construction routes

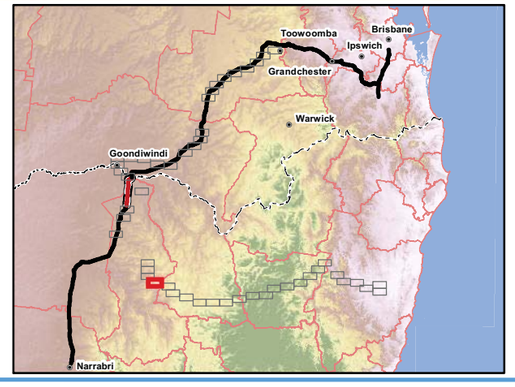
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

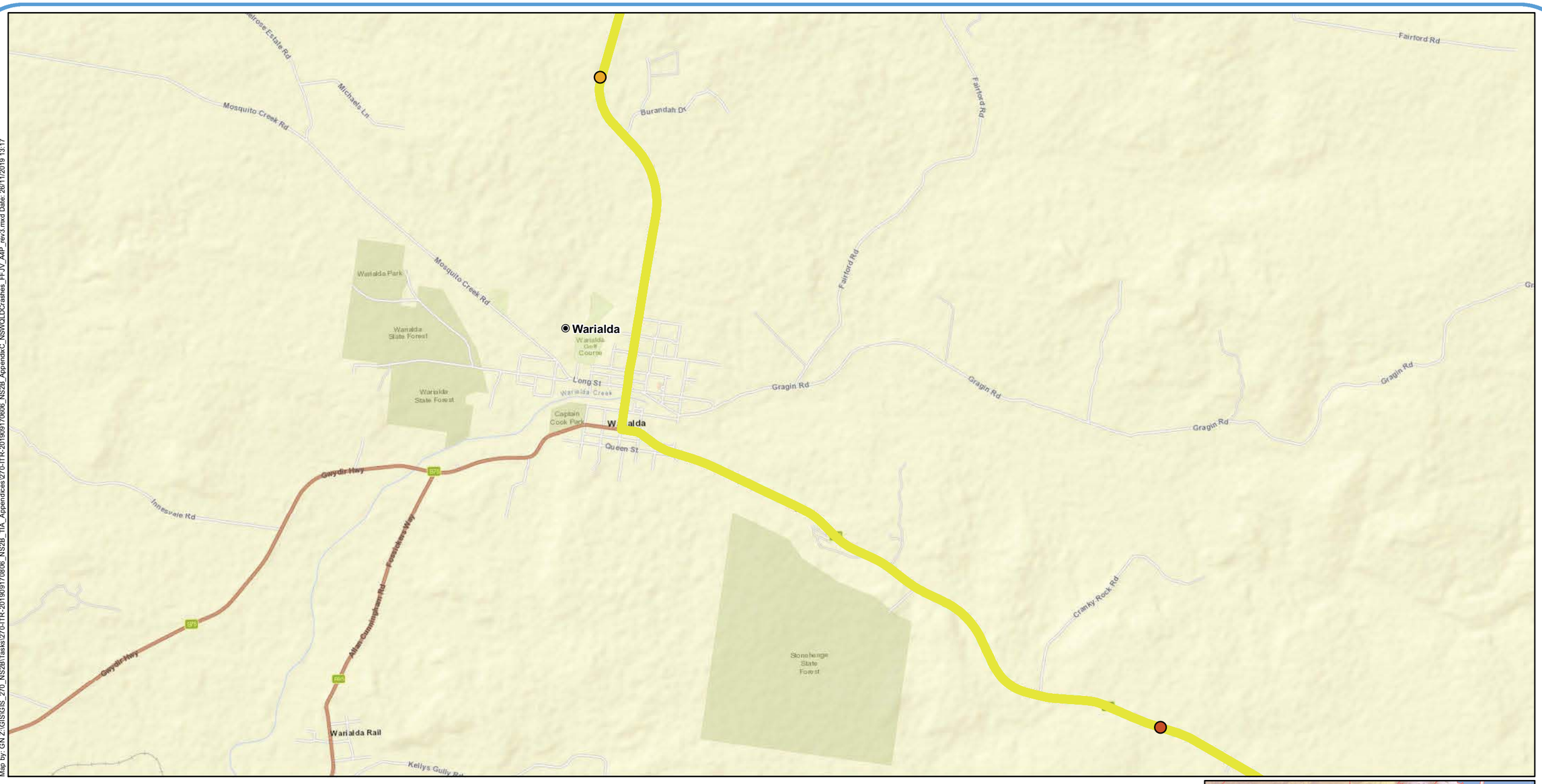
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C22: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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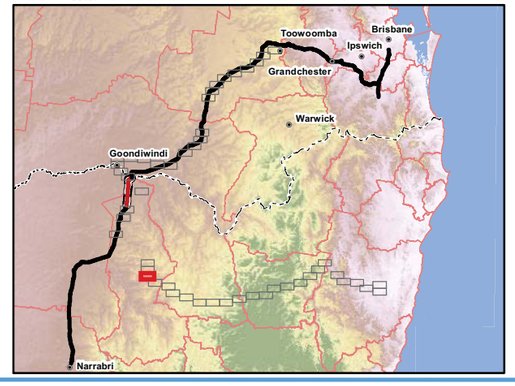
Legend

- Localities
- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

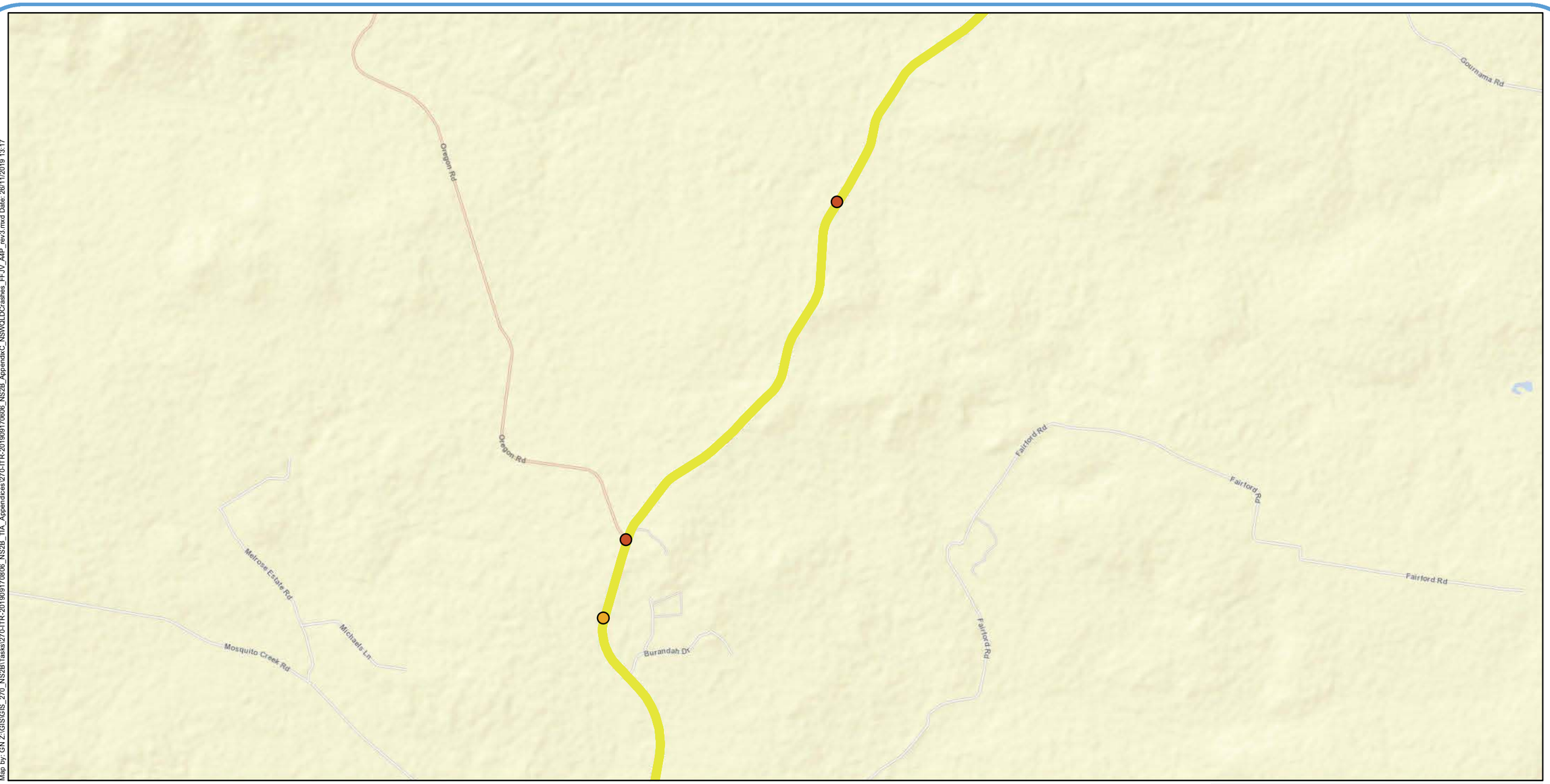
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C23: Crashes along construction routes

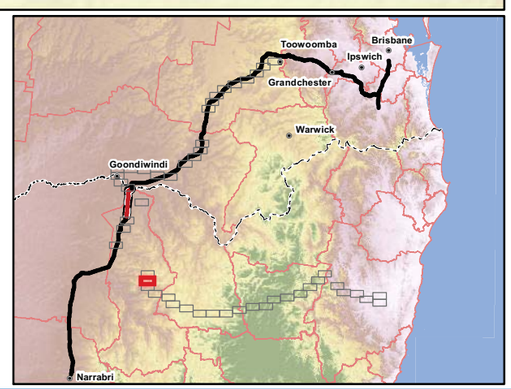
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

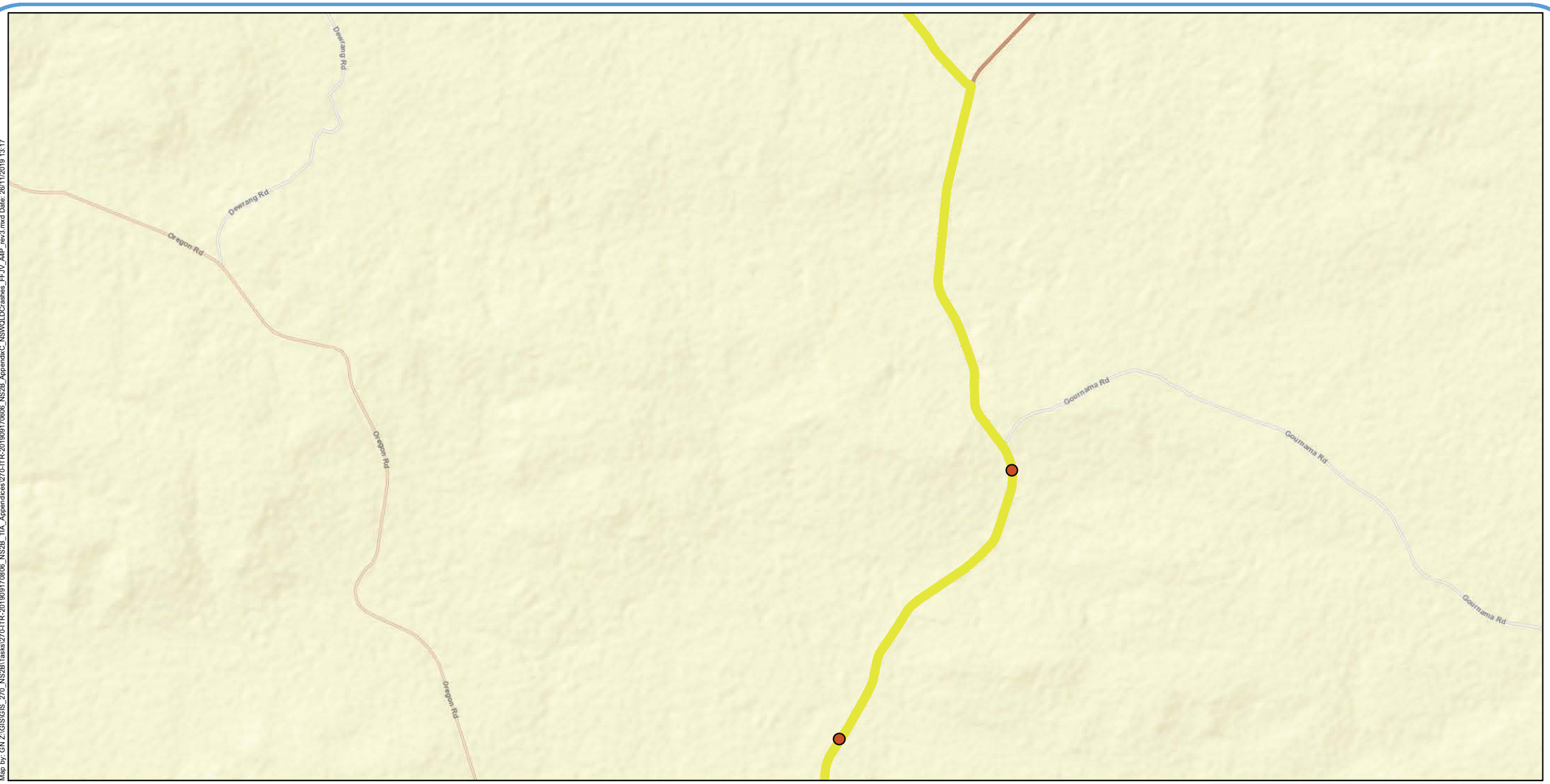
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C24: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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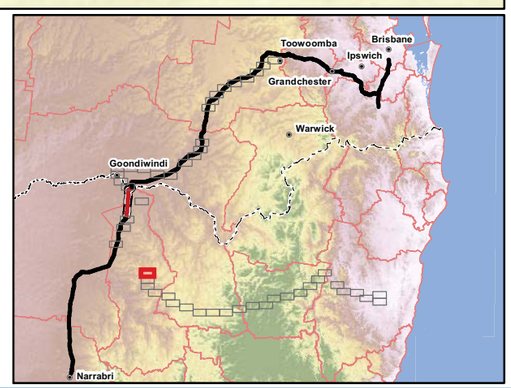
Legend

- Serious Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

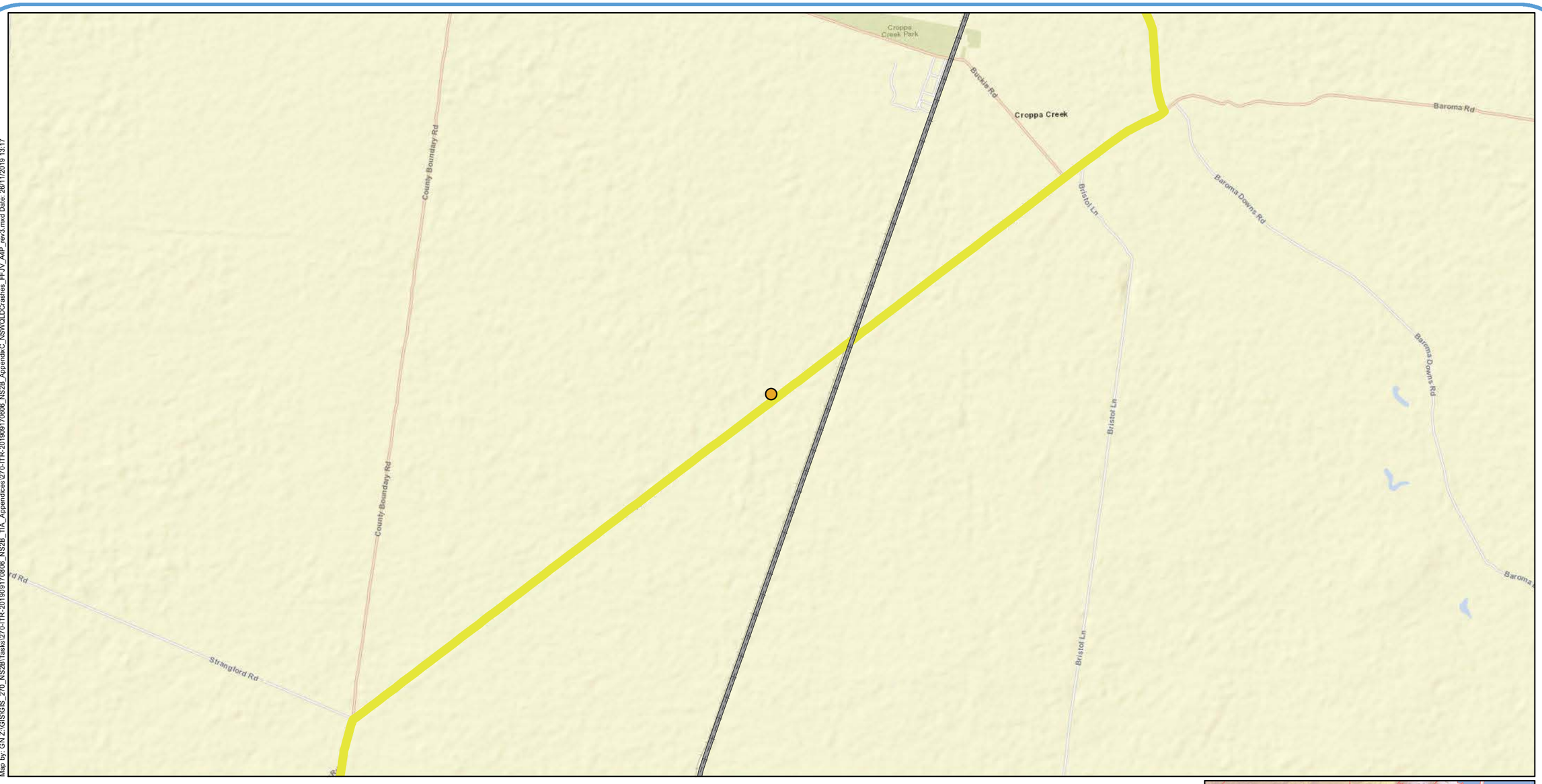
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C25: Crashes along construction routes

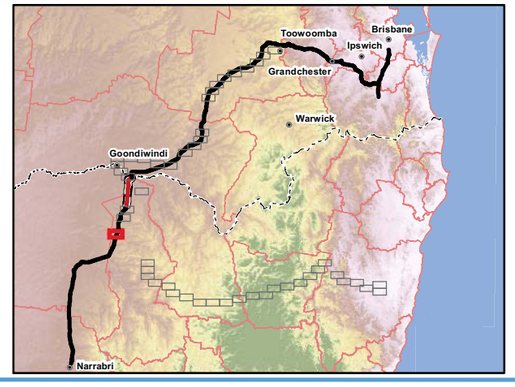
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Moderate Injury
- Adjoining alignments
- Existing rail (non-operational)
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

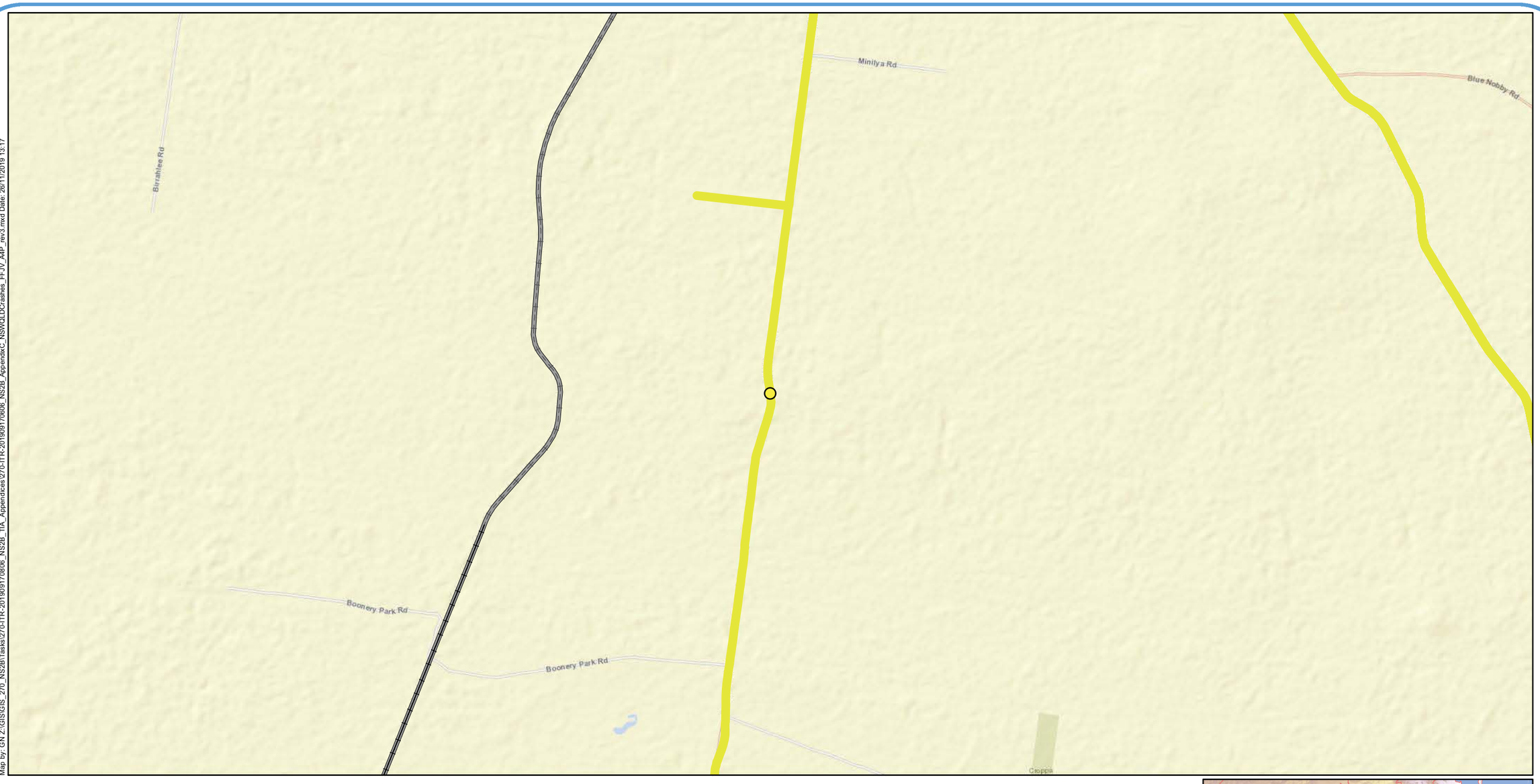
Issue date: 22/11/2019 Version: 3

Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C26: Crashes along construction routes

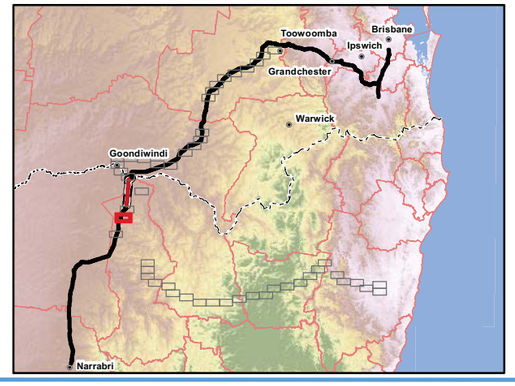
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_ TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Minor/Other Injury
- Adjoining alignments
- Existing rail (operational)
- Existing rail (non-operational)
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

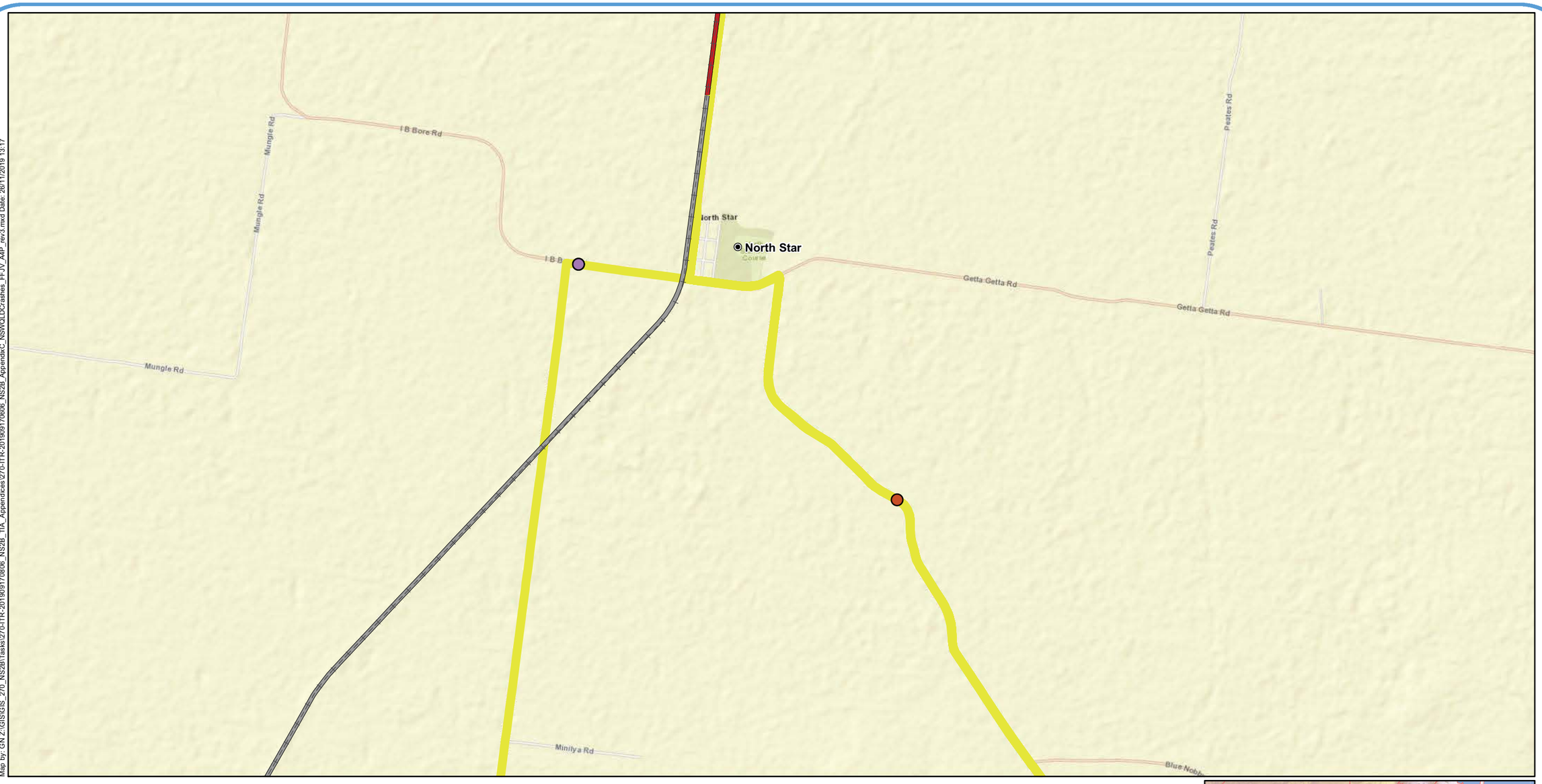
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C27: Crashes along construction routes

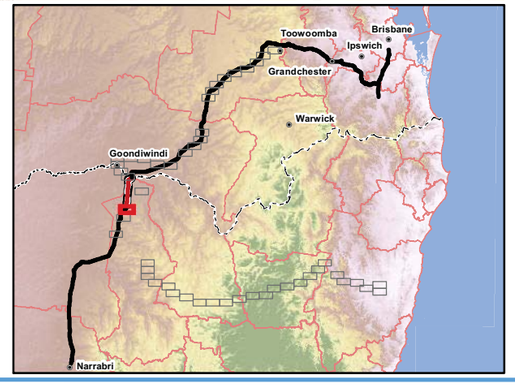
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Localities
- Non-casualty (towaway)
- Serious Injury
- North Star to NSW/QLD border alignment
- Adjoining alignments
- Existing rail (non-operational)
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

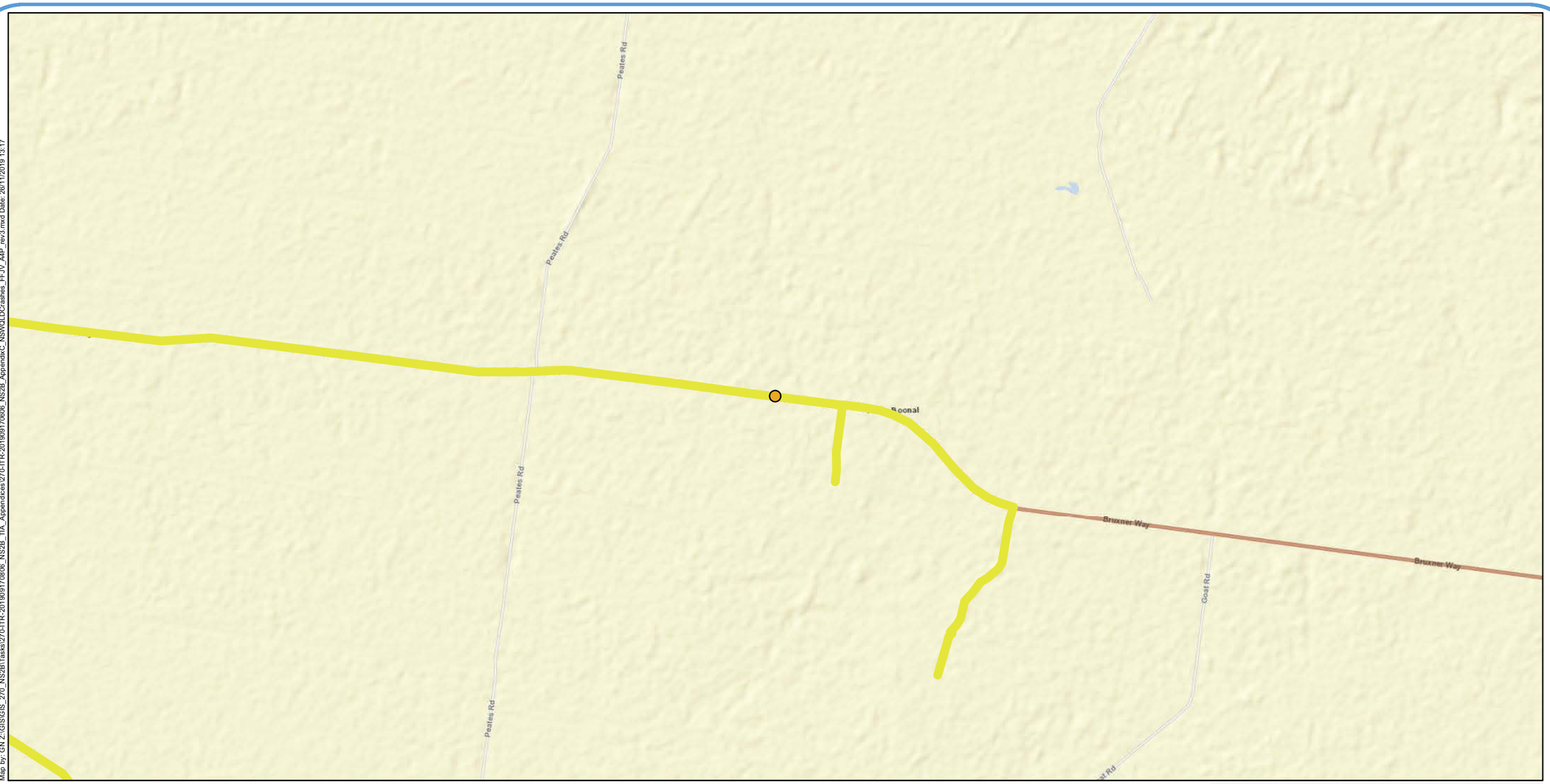
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C28: Crashes along construction routes

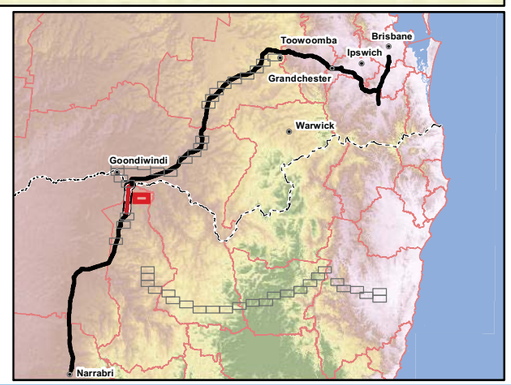
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_ TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Moderate Injury
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

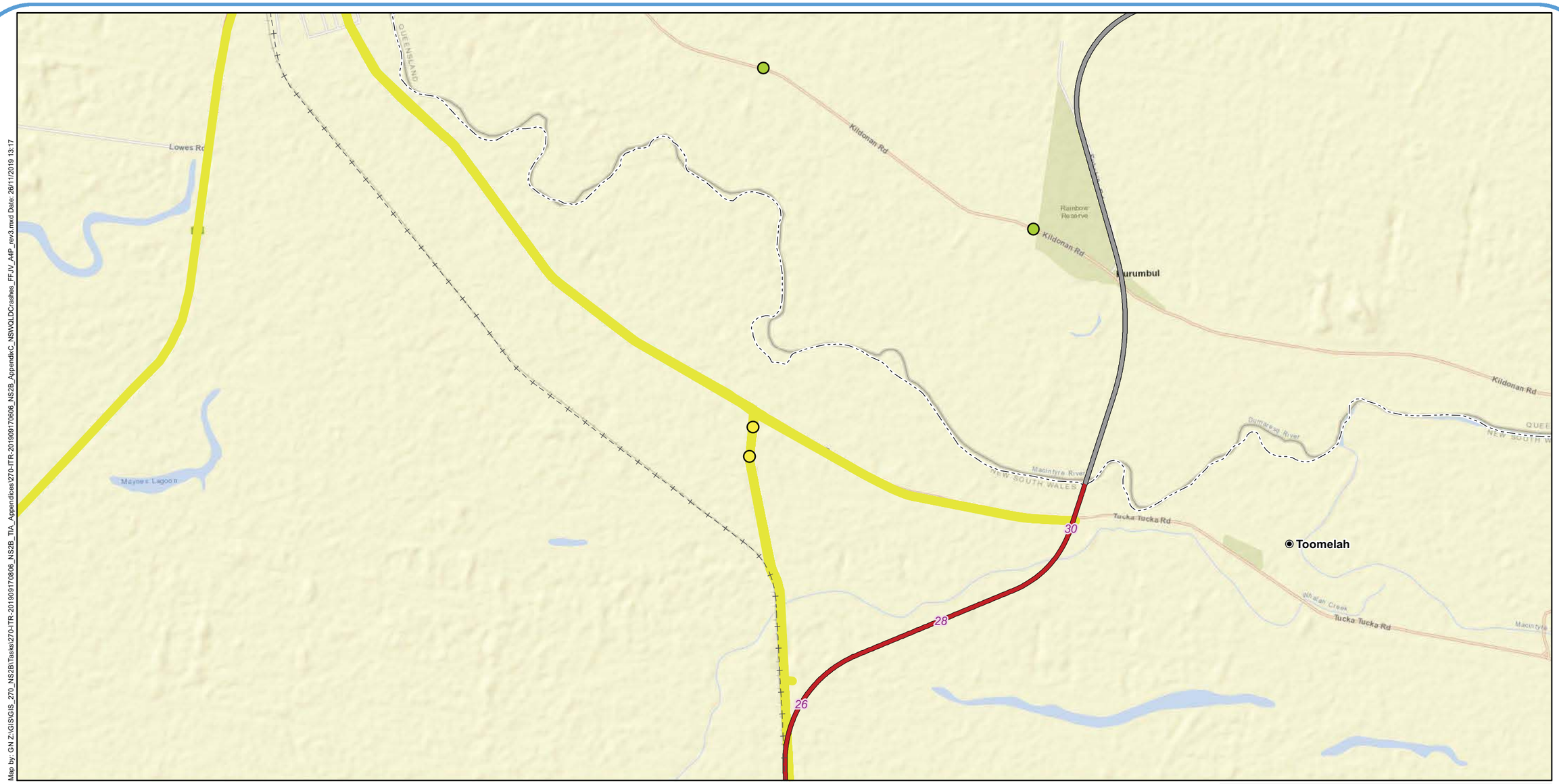
Issue date: 22/11/2019 Version: 3

Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C29: Crashes along construction routes

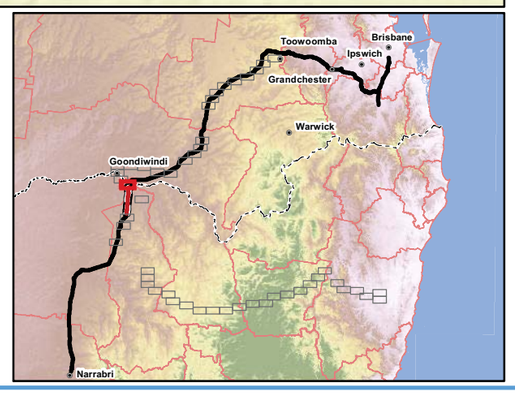
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Localities
- Minor/Other Injury
- Hospitalisation
- North Star to NSW/QLD border alignment
- Existing rail (non-operational)
- Construction routes
- NSW/QLD border



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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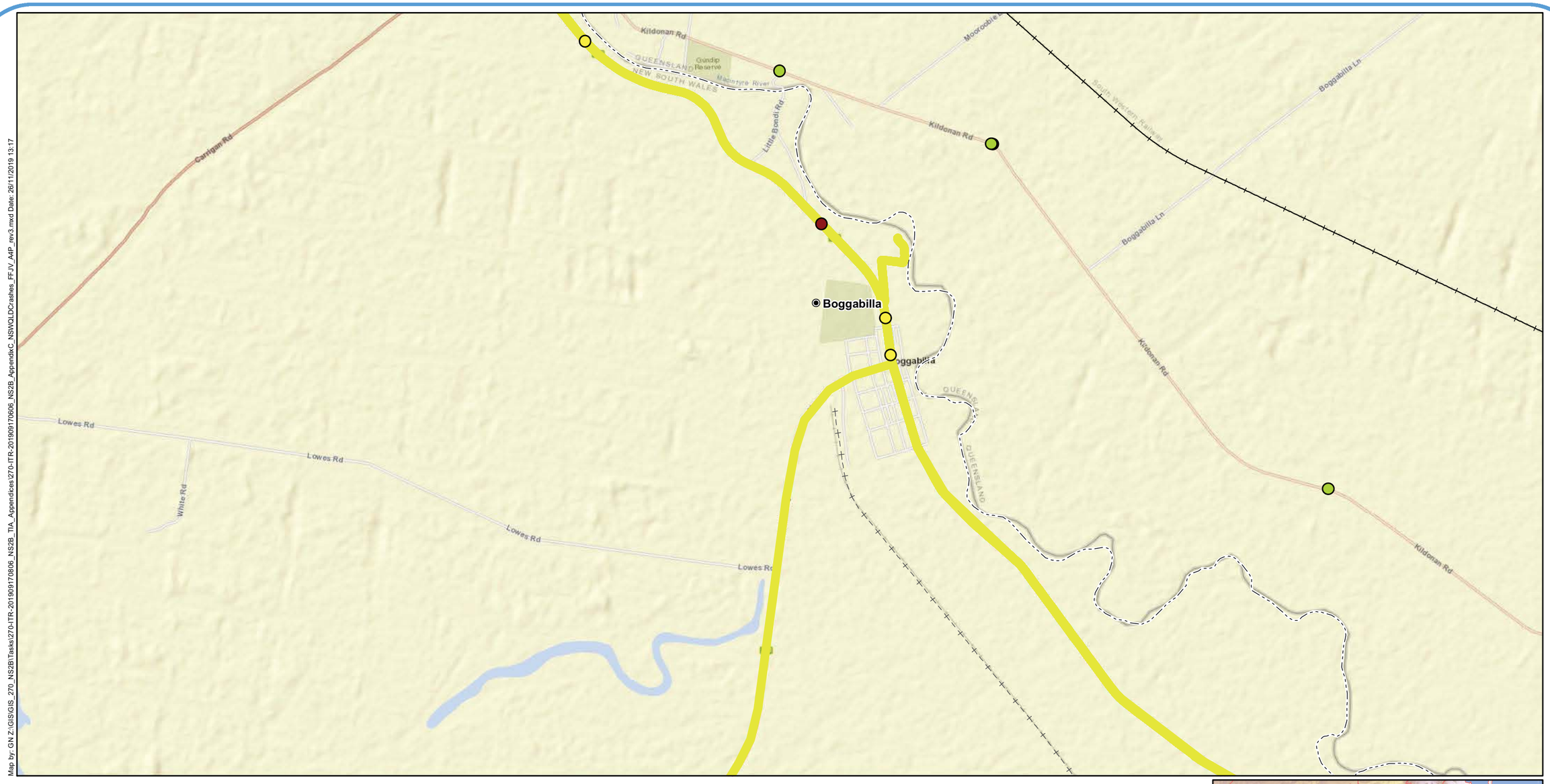
North Star to NSW/QLD border

Appendix C30: Crashes along construction routes

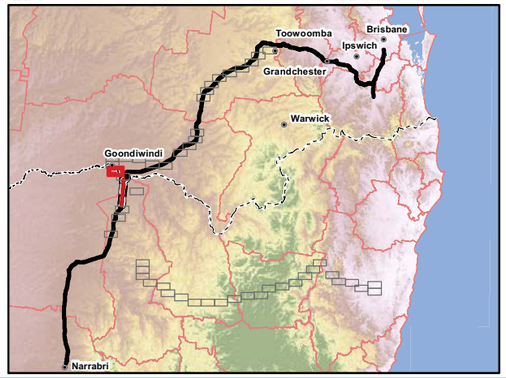
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Localities
- Fatal
- Minor/Other Injury
- Fatal
- Hospitalisation
- Existing rail
- Existing rail (non-operational)
- Construction routes
- NSW/QLD border



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

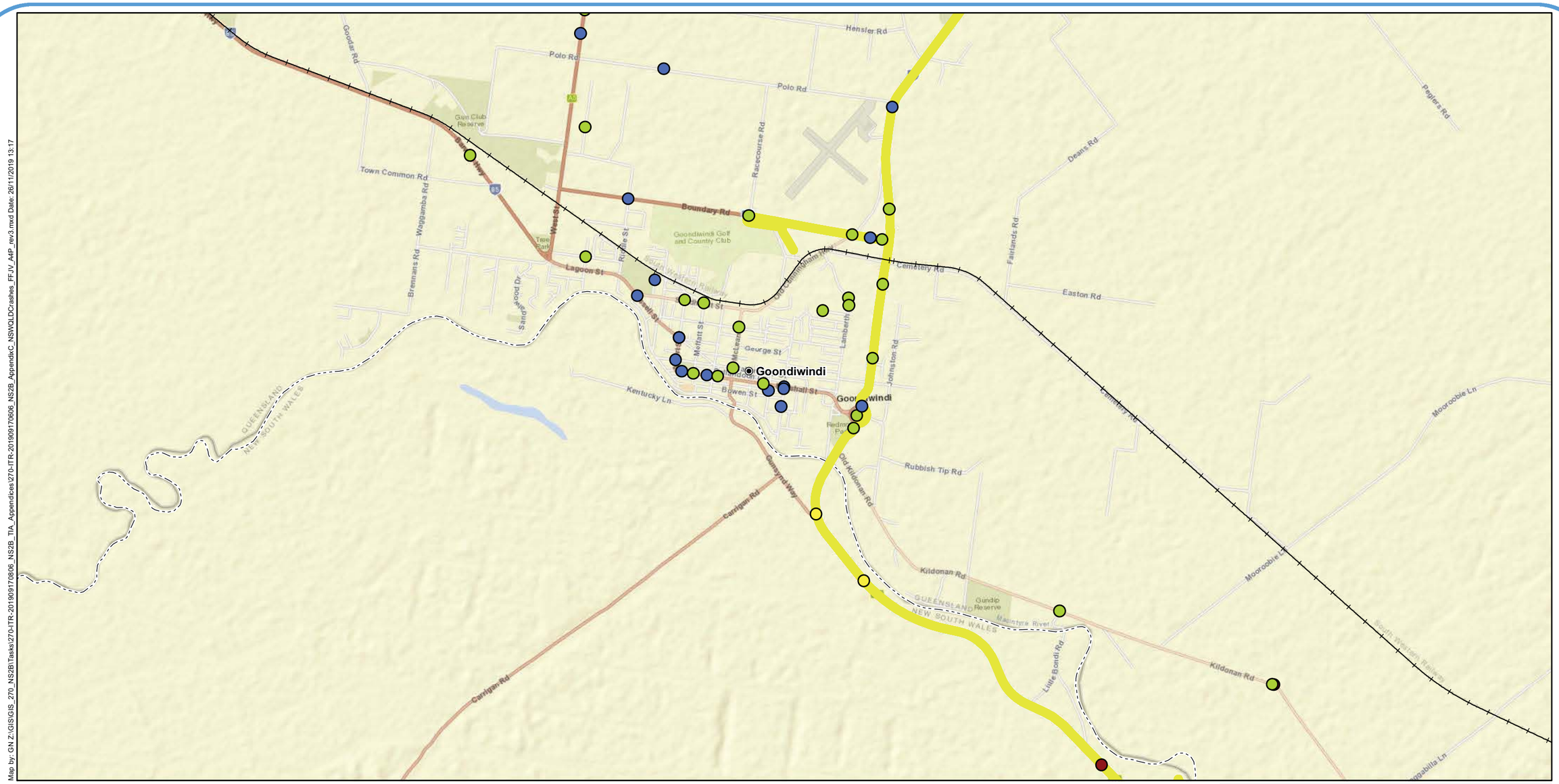
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C31: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



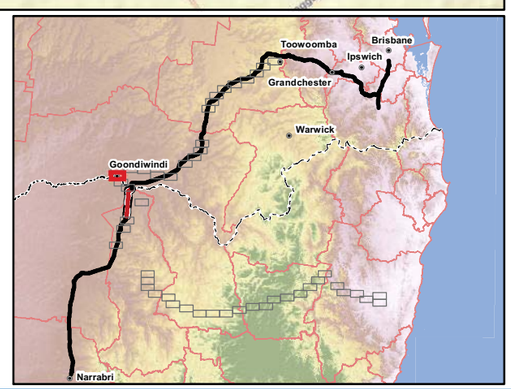
Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917060 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Localities
- Fatal
- Minor/Other Injury
- Fatal
- Hospitalisation
- Medical treatment
- Minor injury
- Existing rail
- Construction routes
- NSW/QLD border

A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km



Future Freight
Integrating Community, Environment and Engineering

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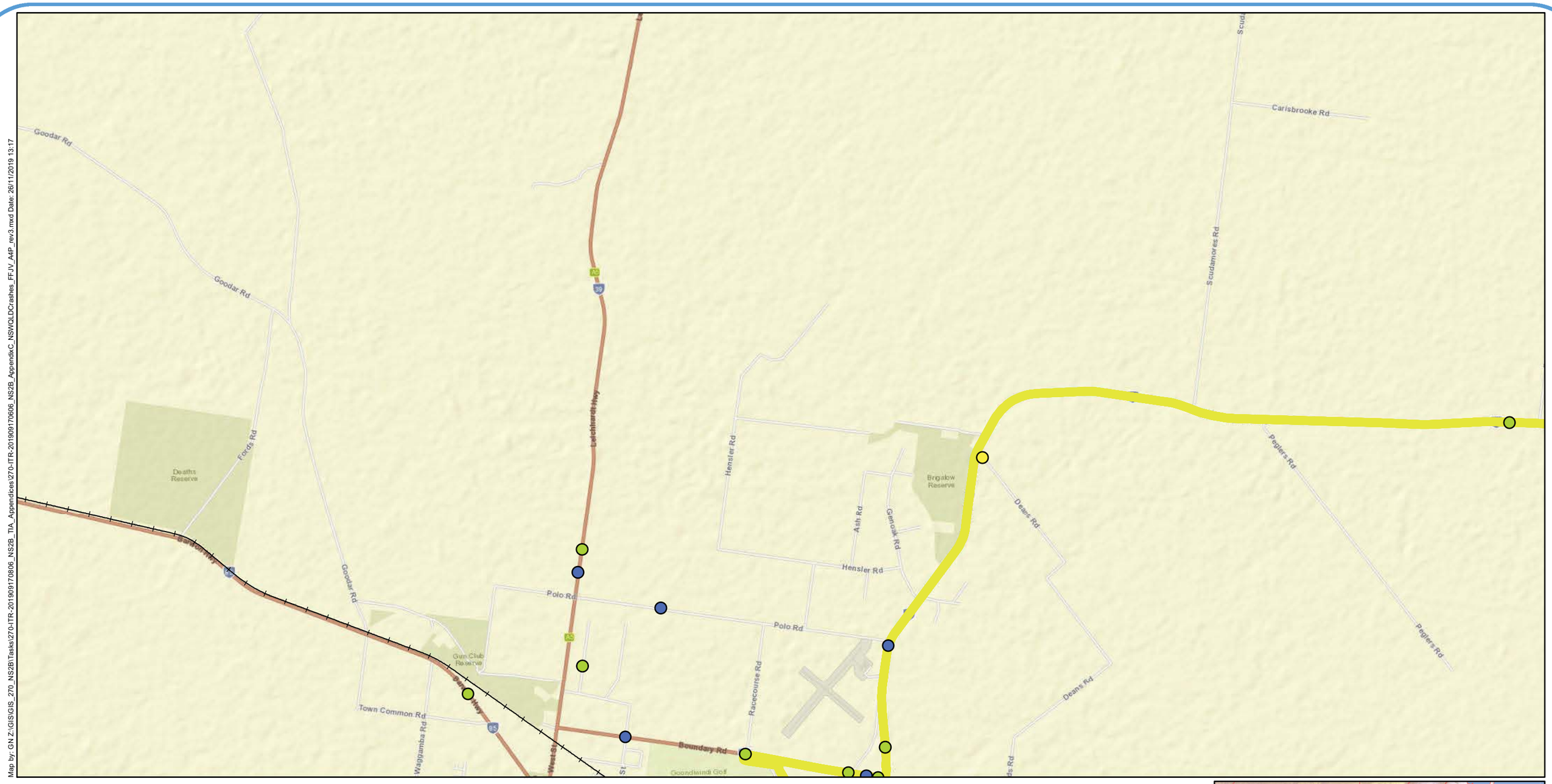
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

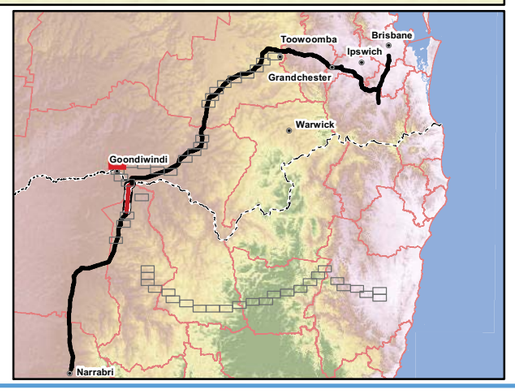
Appendix C32: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Legend

- Hospitalisation
- Medical treatment
- Minor injury
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
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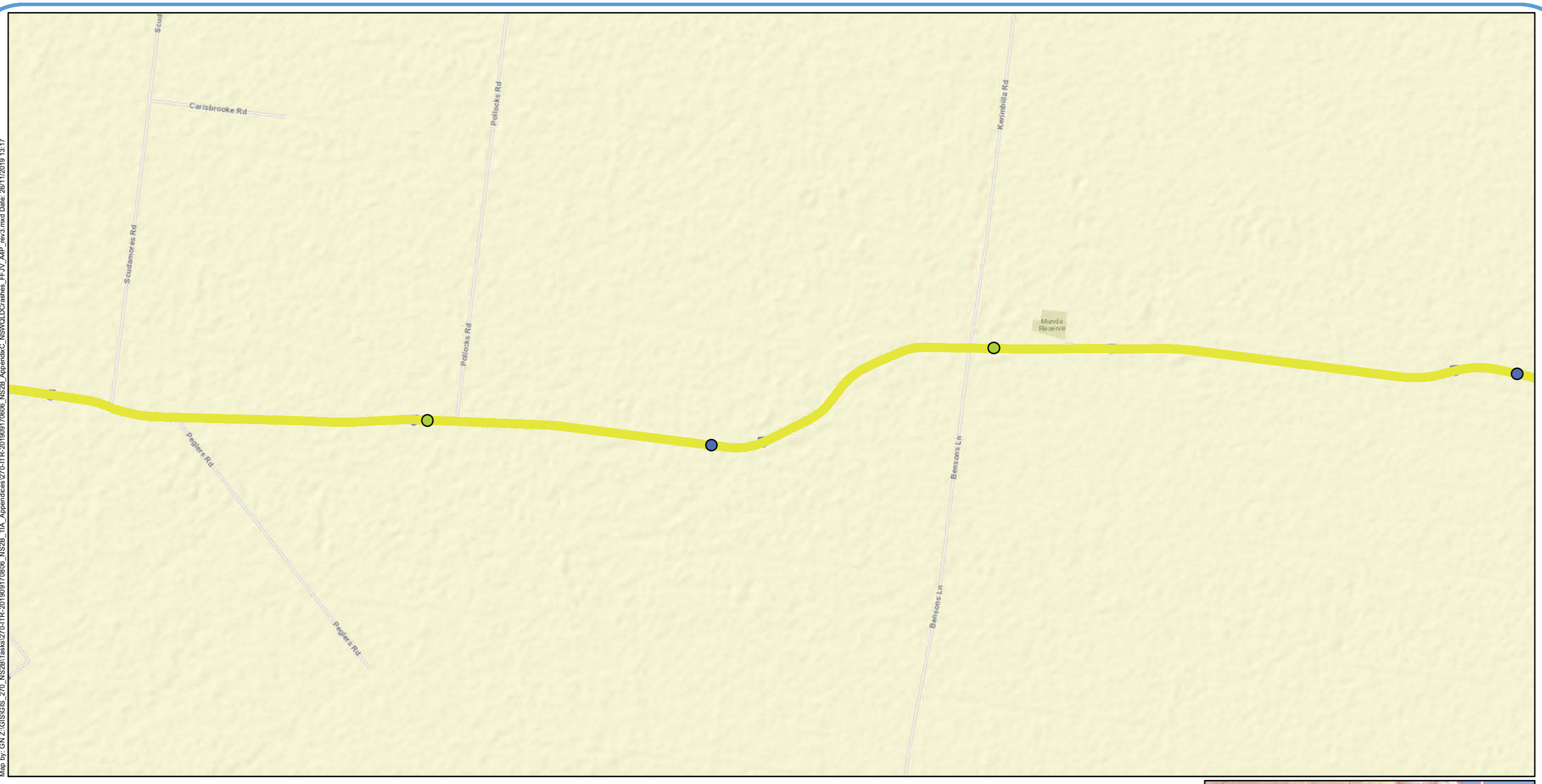
North Star to NSW/QLD border

Appendix C33: Crashes along construction routes

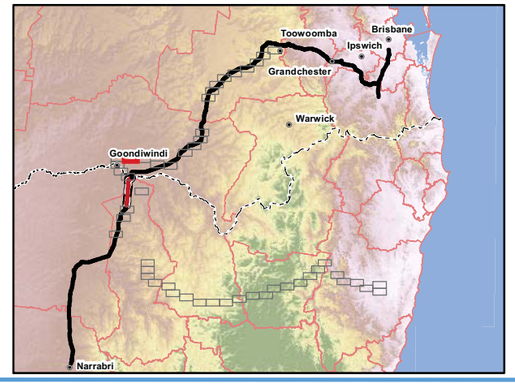
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Hospitalisation
- Medical treatment
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

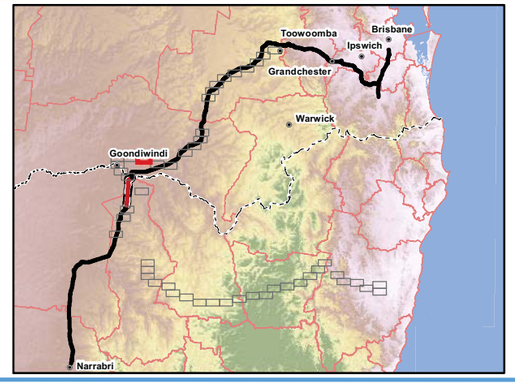
Appendix C34: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Fatal
- Hospitalisation
- Medical treatment
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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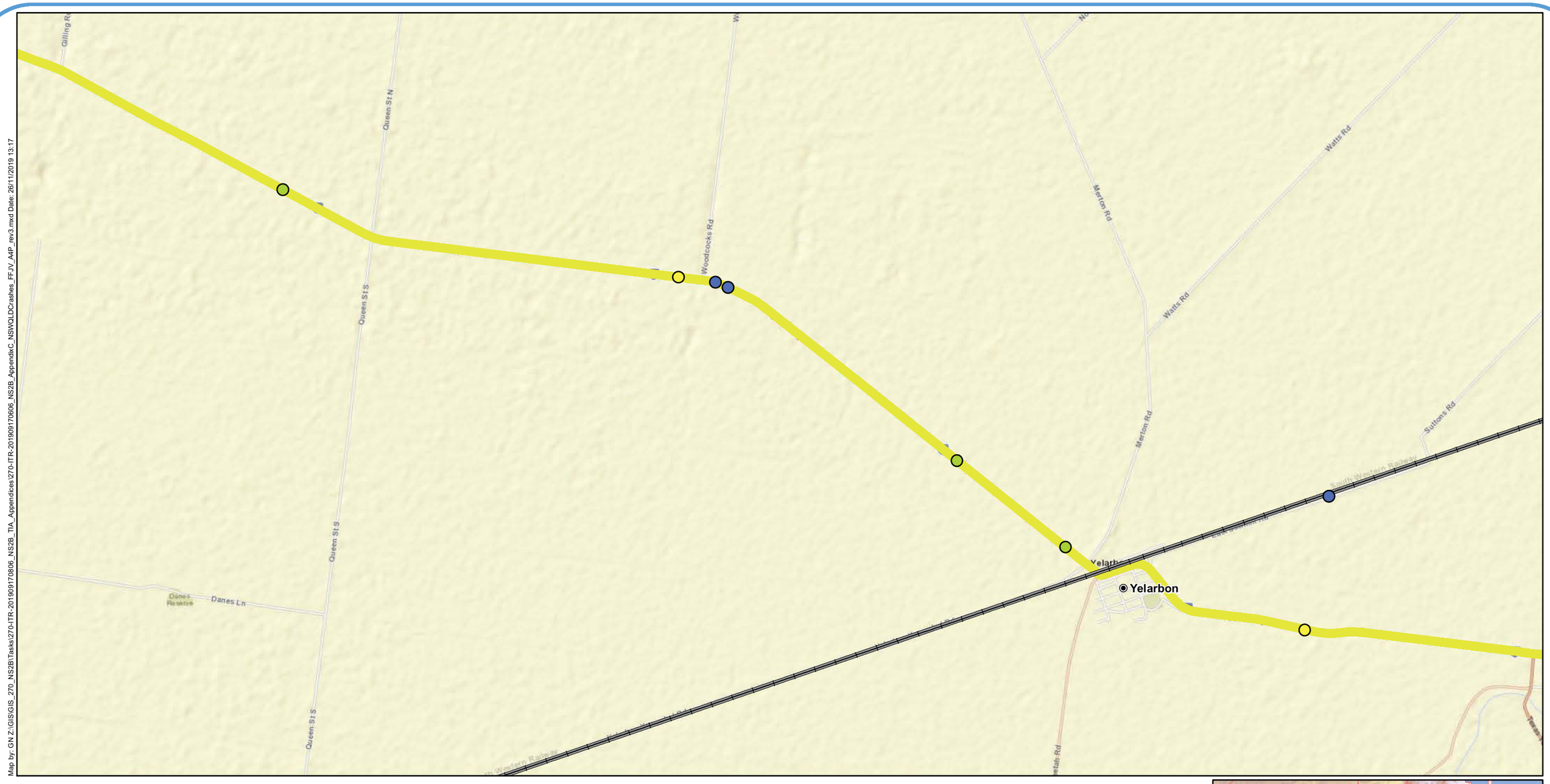
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C35: Crashes along construction routes

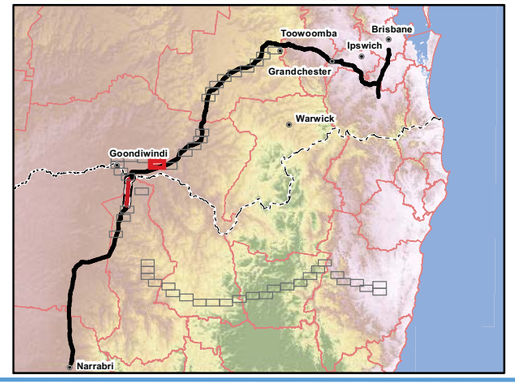
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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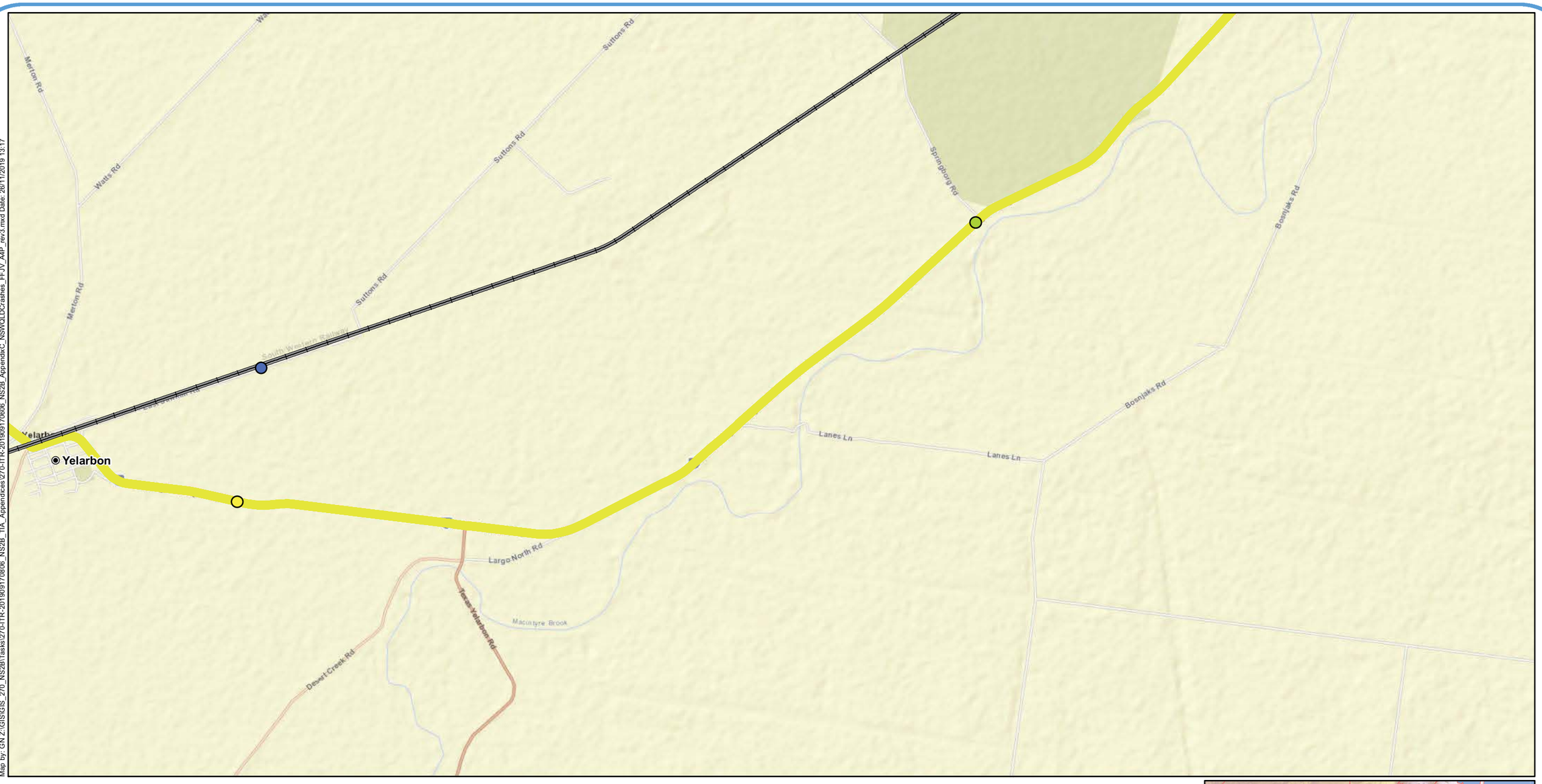
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C36: Crashes along construction routes

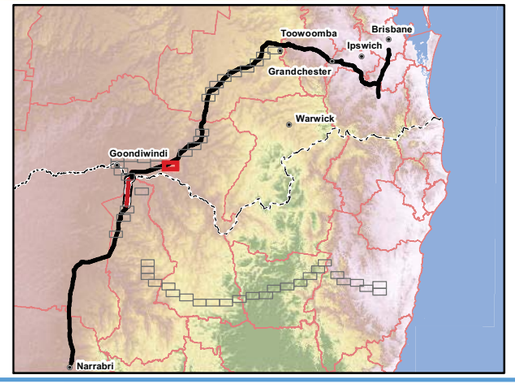
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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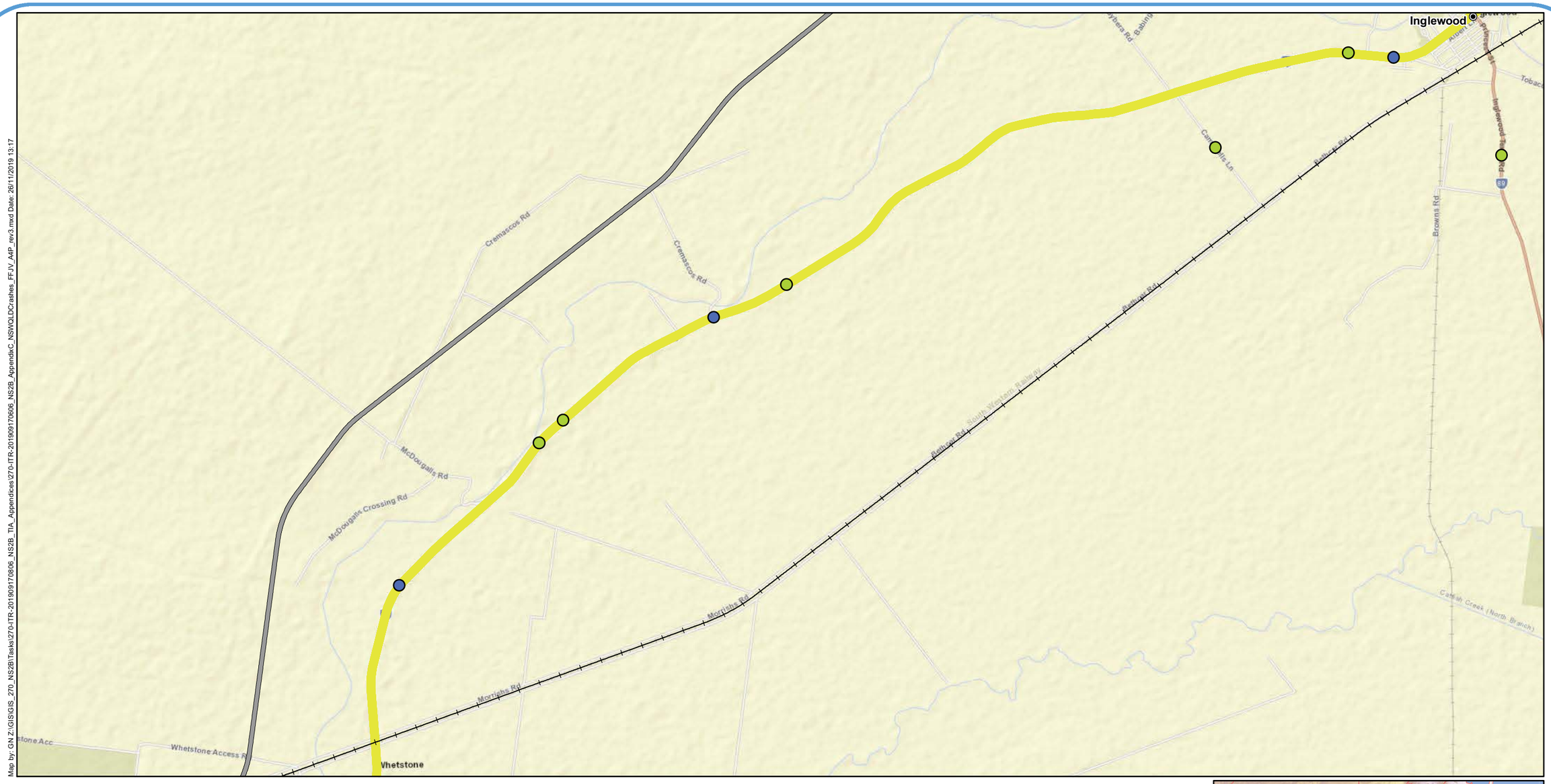
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C37: Crashes along construction routes

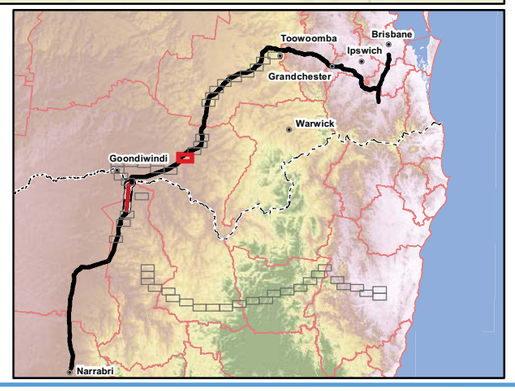
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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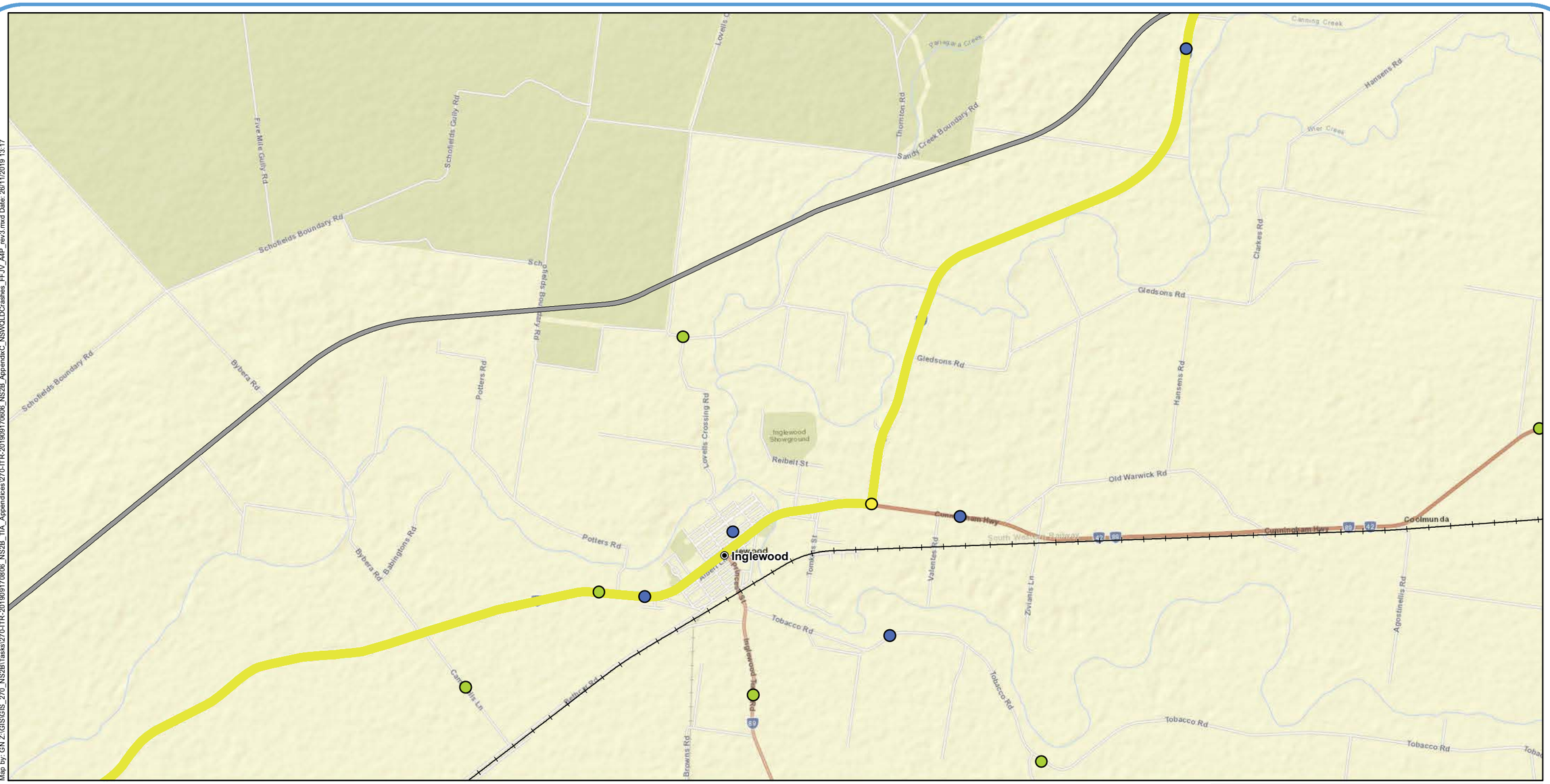
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C38: Crashes along construction routes

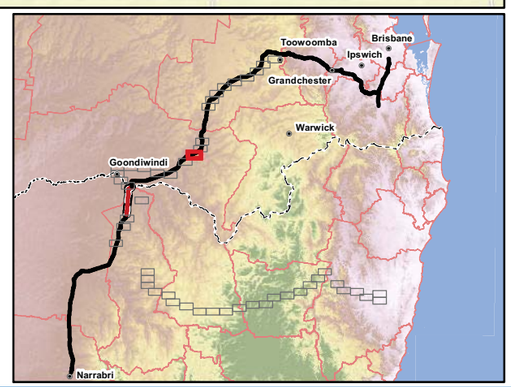
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

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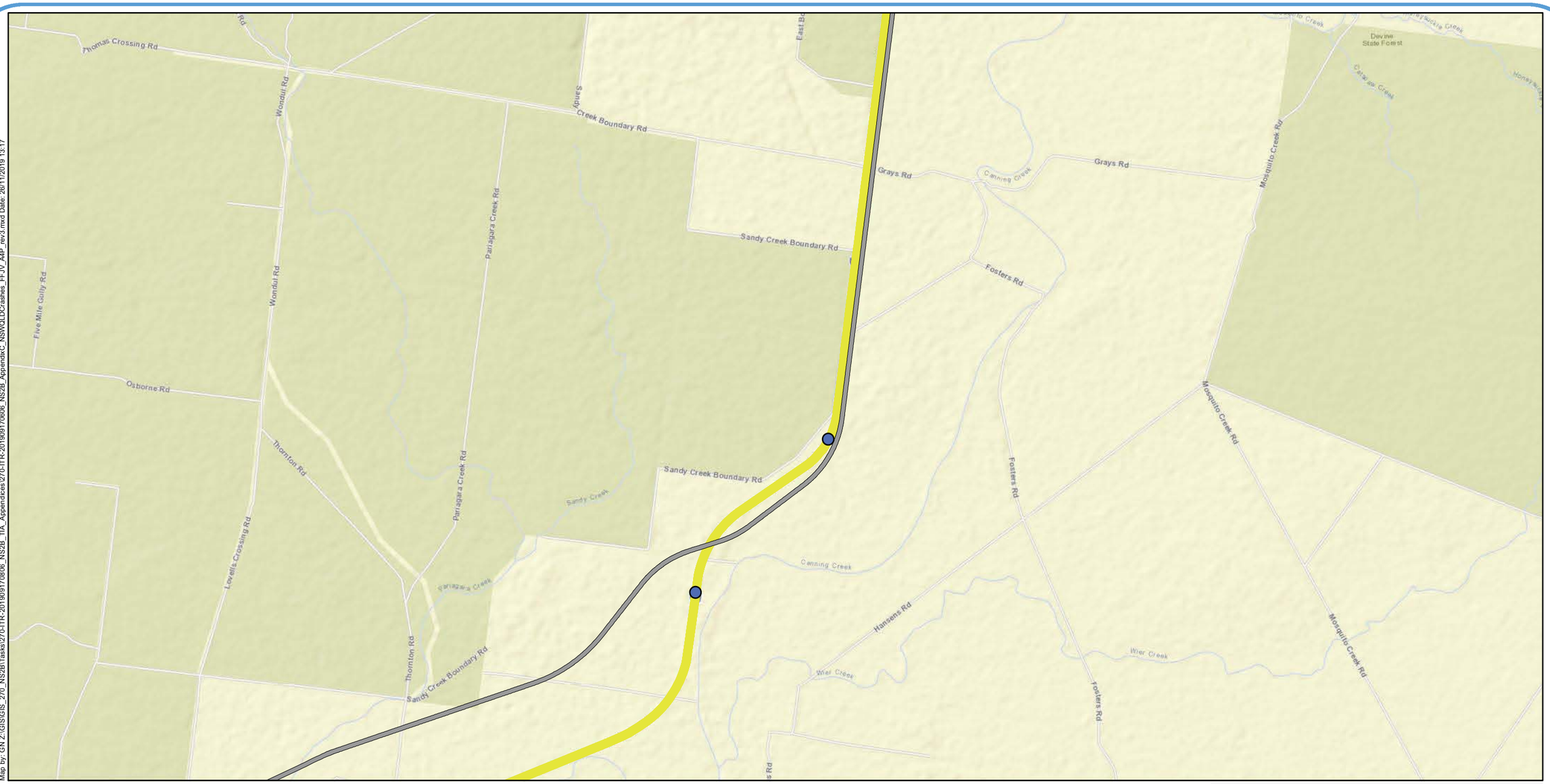
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

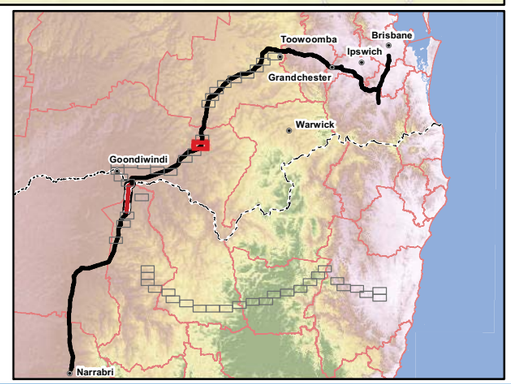
Appendix C39: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Legend

- Medical treatment
- Adjoining alignments
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

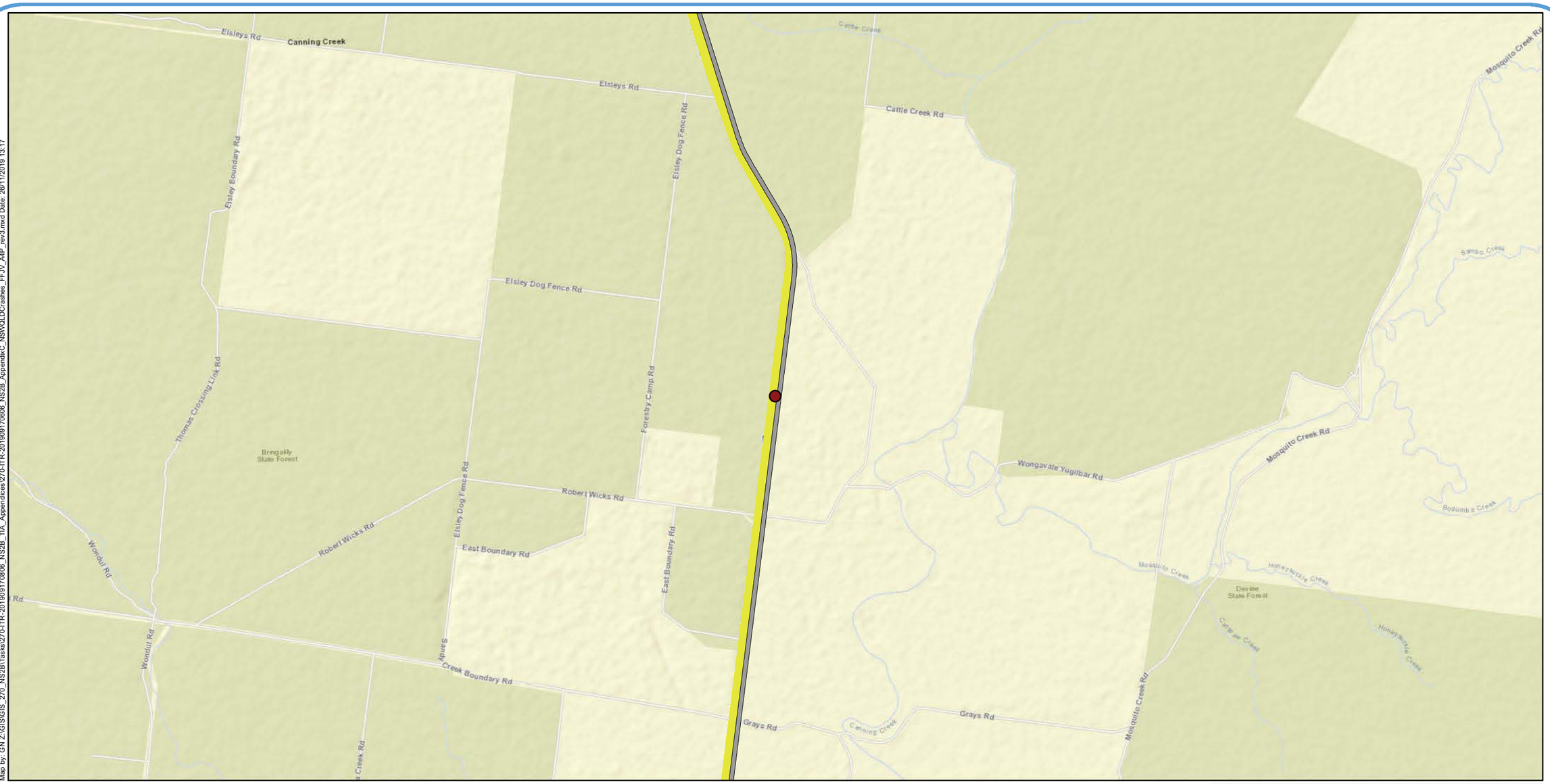
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C40: Crashes along construction routes

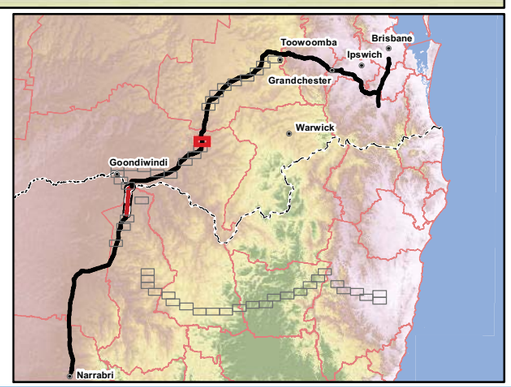
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Fatal
- Adjoining alignments
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

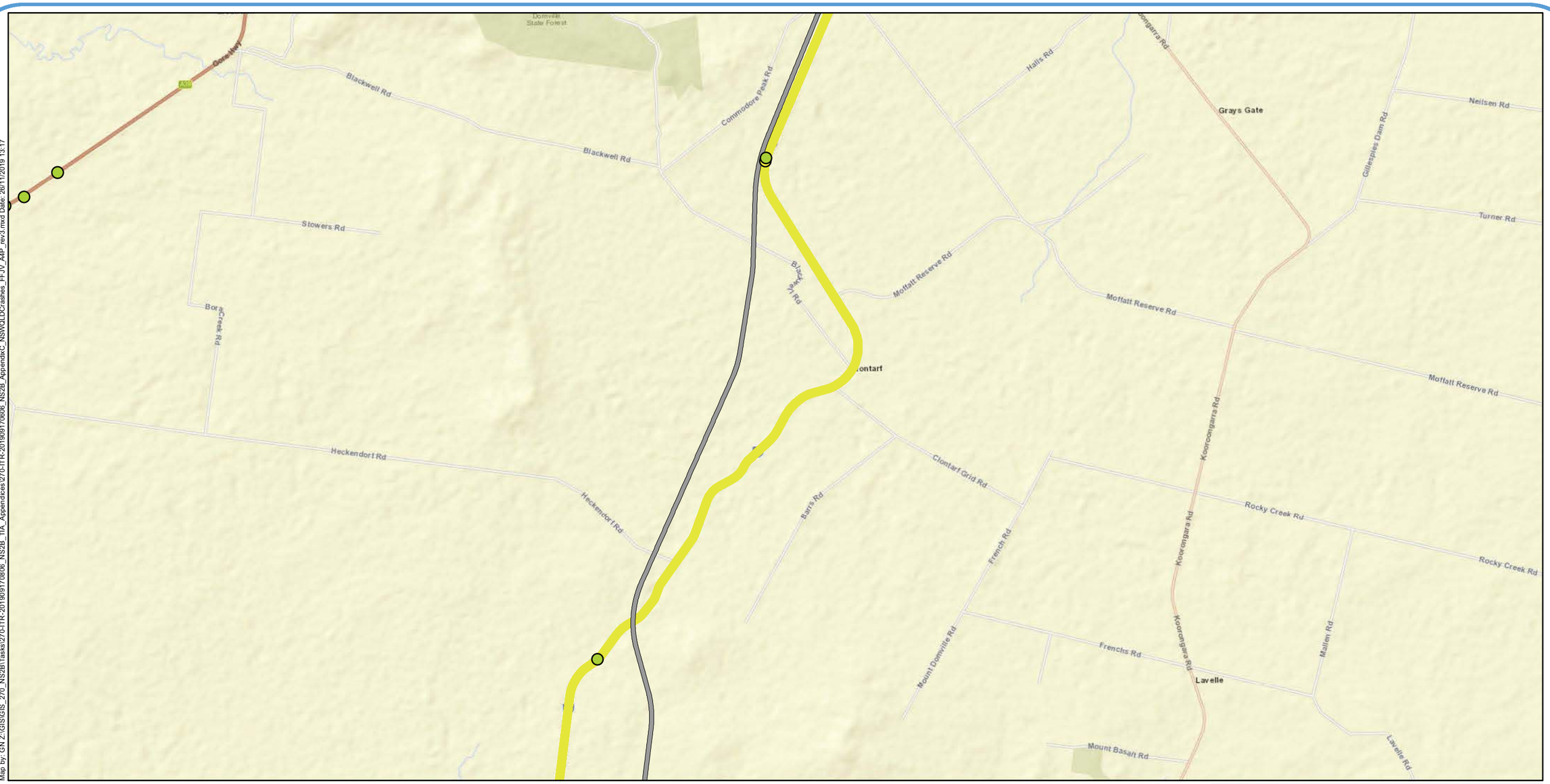
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C41: Crashes along construction routes

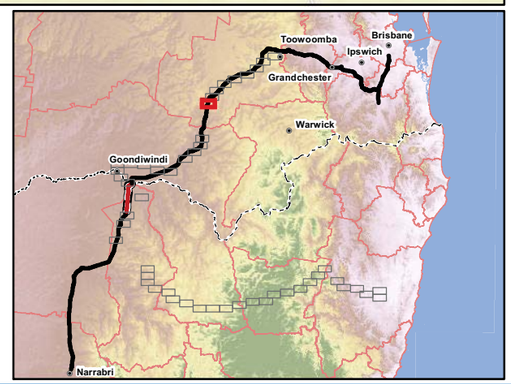
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917\0806_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17

Legend

- Hospitalisation
- Minor injury
- Adjoining alignments
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

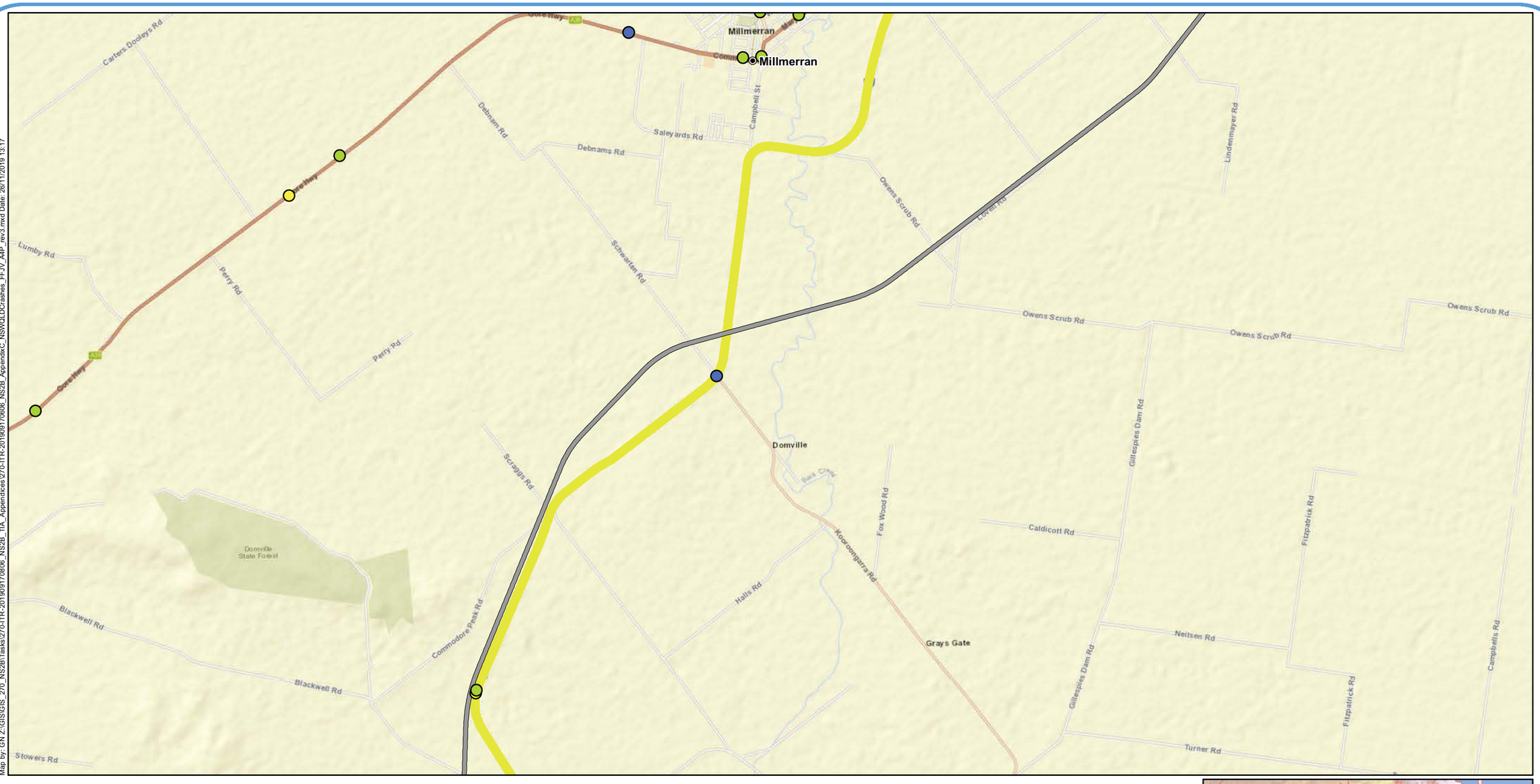
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C42: Crashes along construction routes

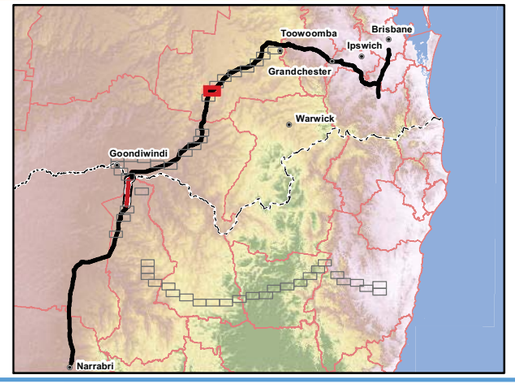
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

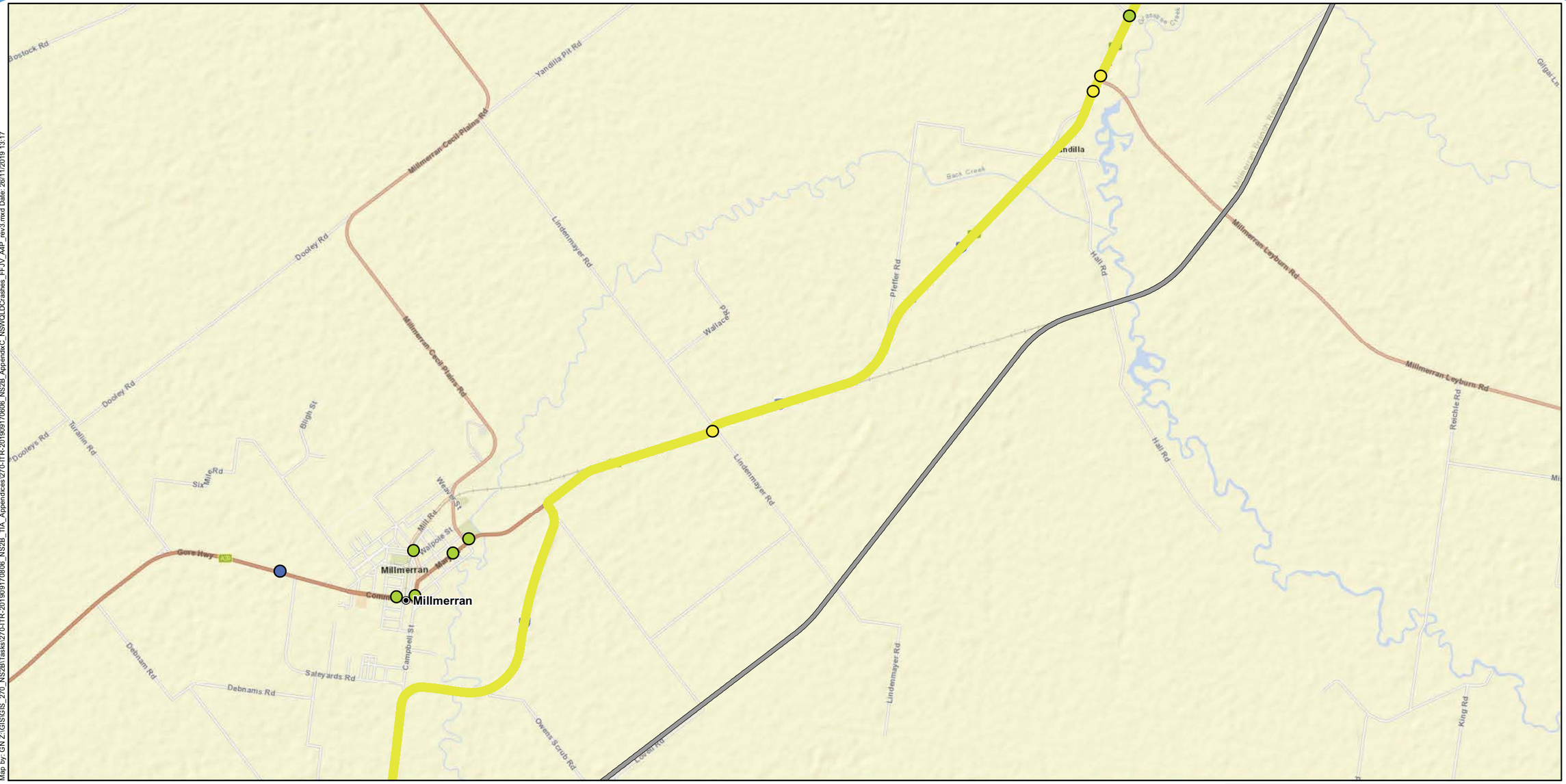
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C43: Crashes along construction routes

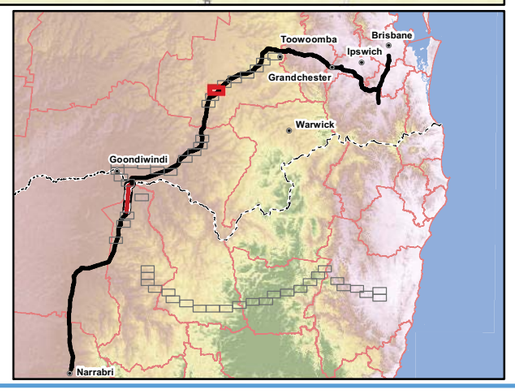
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2BITasks\270-ITR-20190917080606_NS2B_ITA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

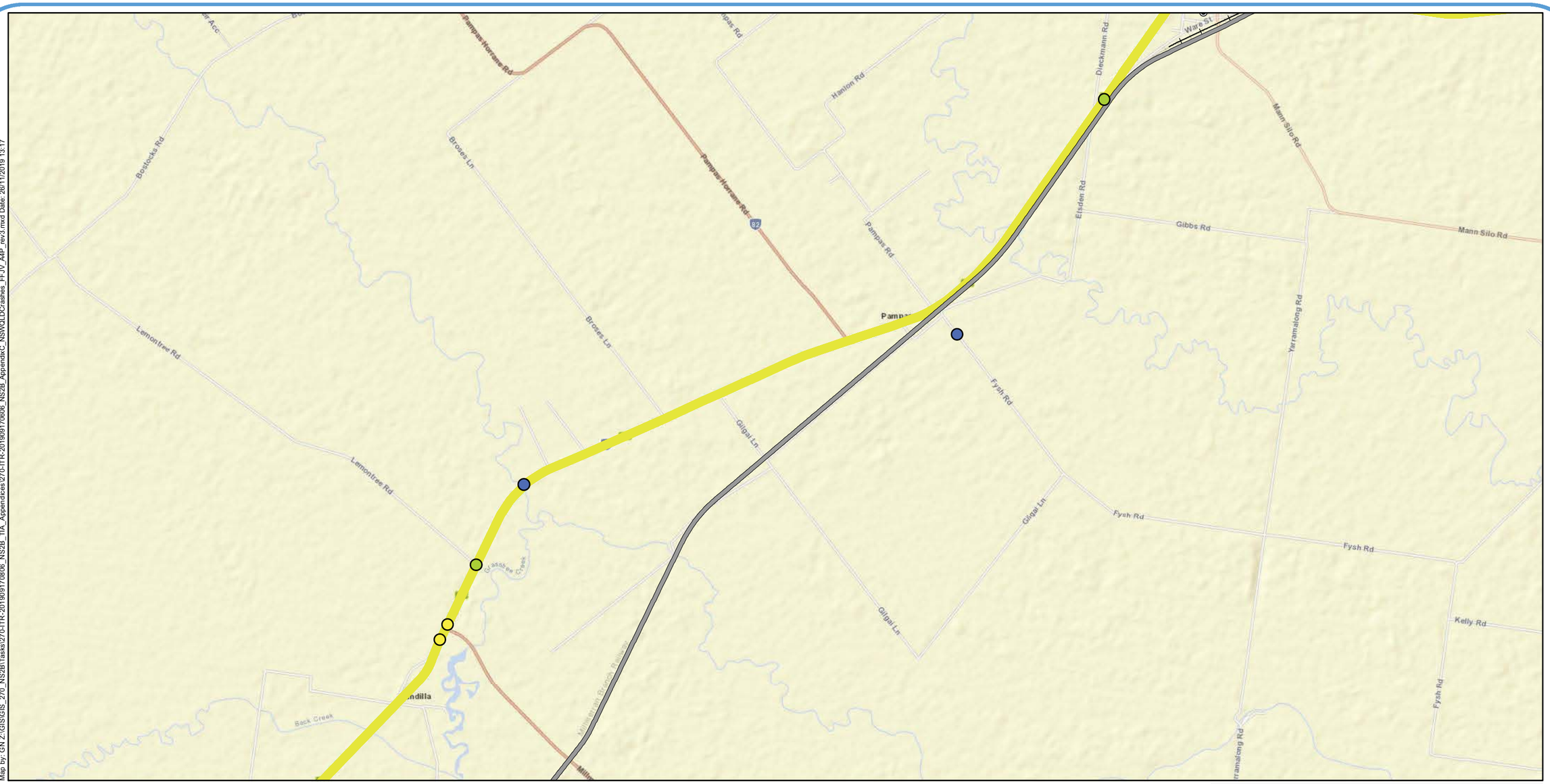
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C44: Crashes along construction routes

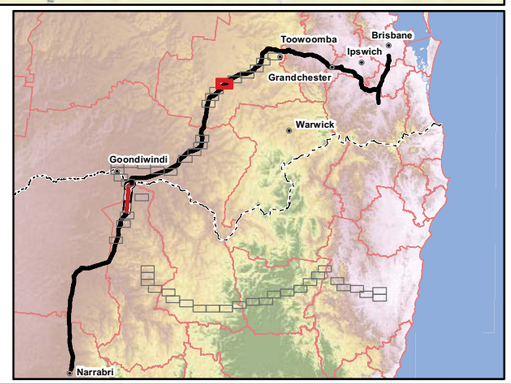
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
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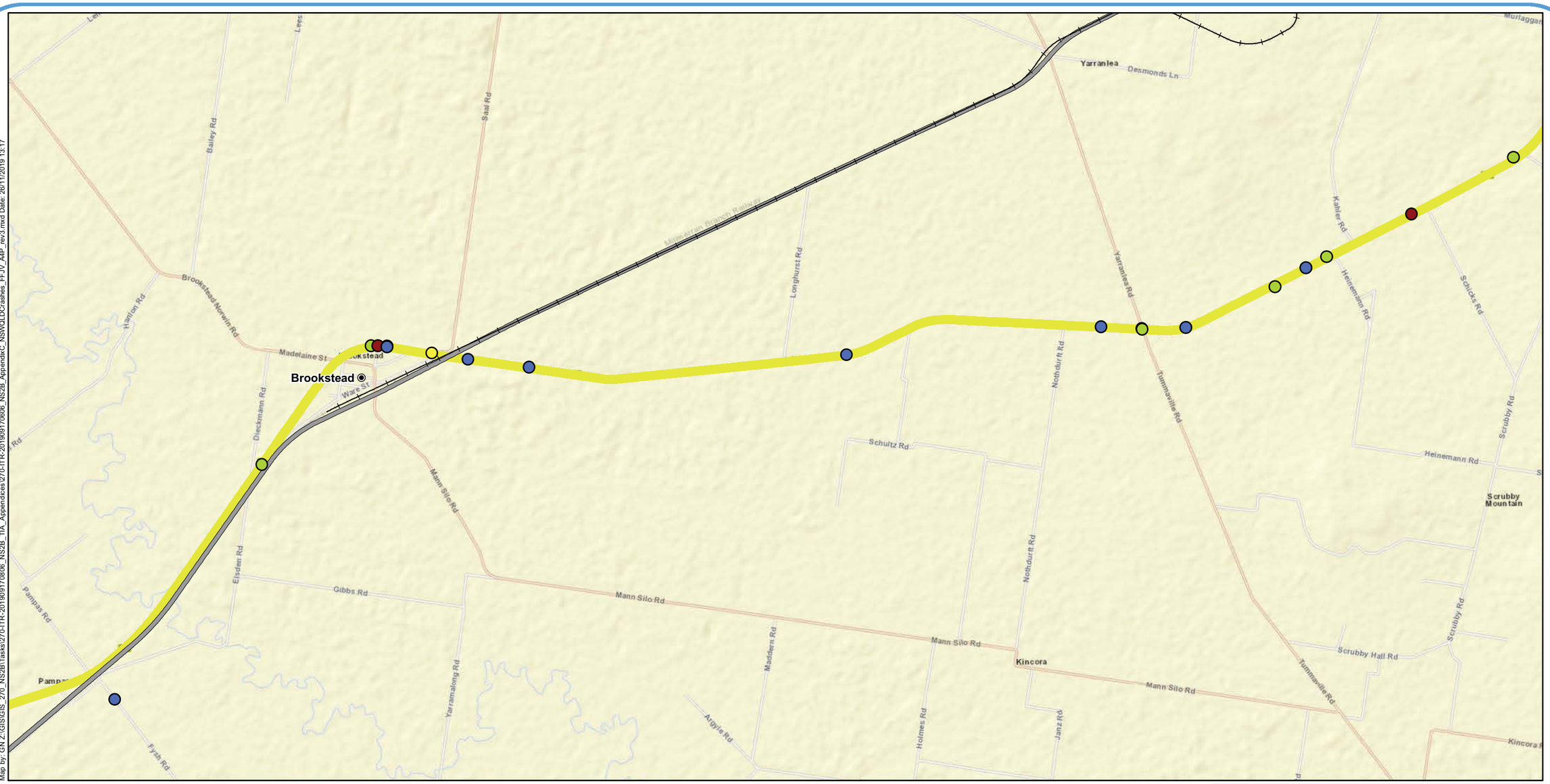
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C45: Crashes along construction routes

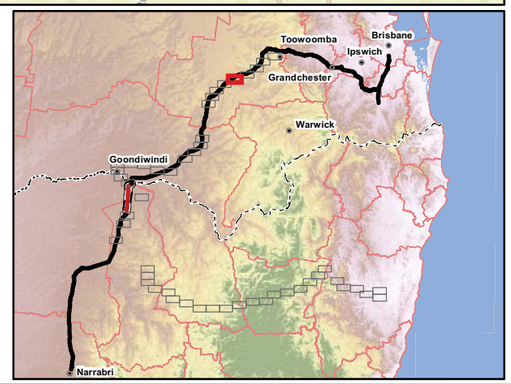
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Fatal
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

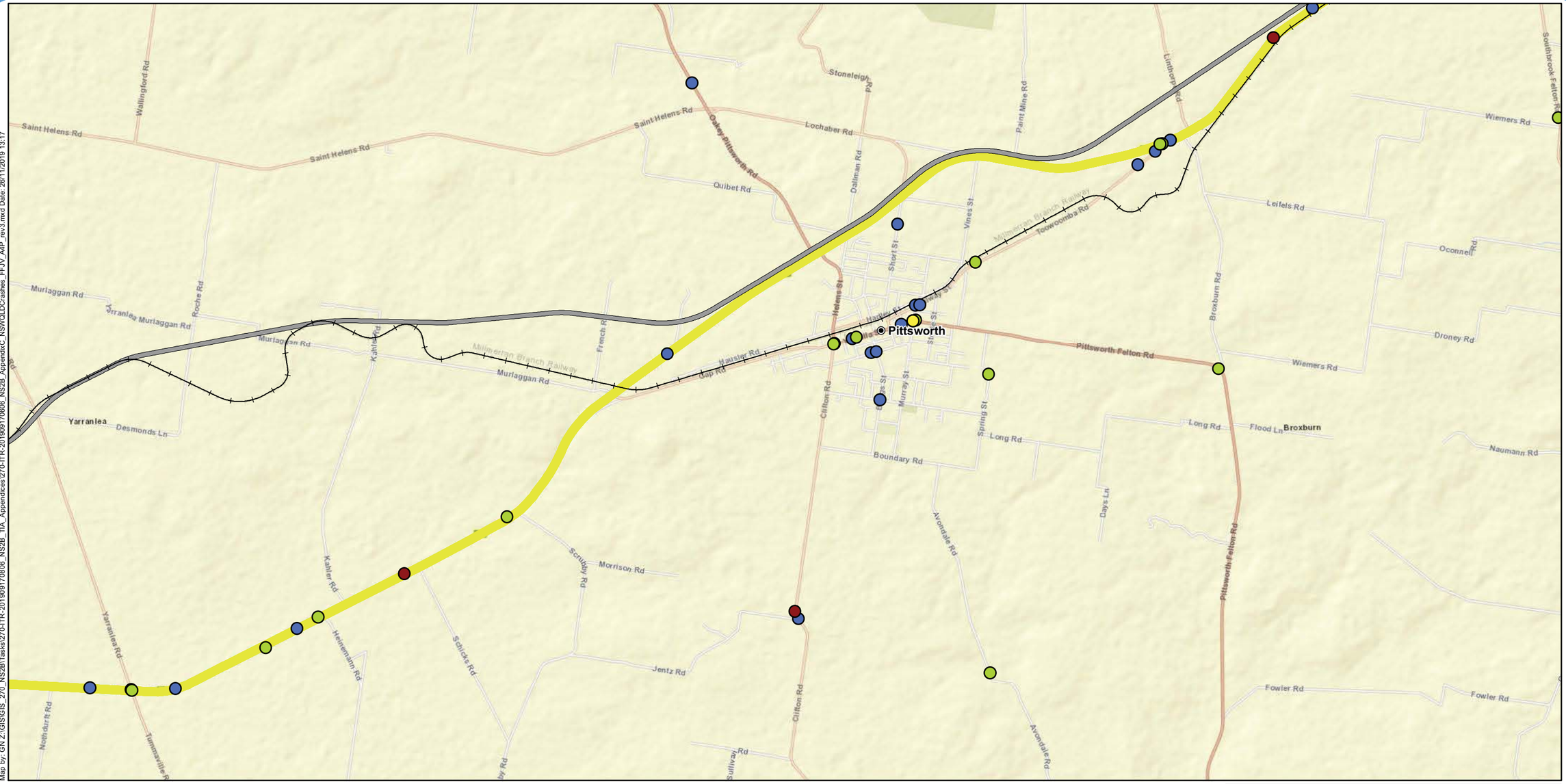
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C46: Crashes along construction routes

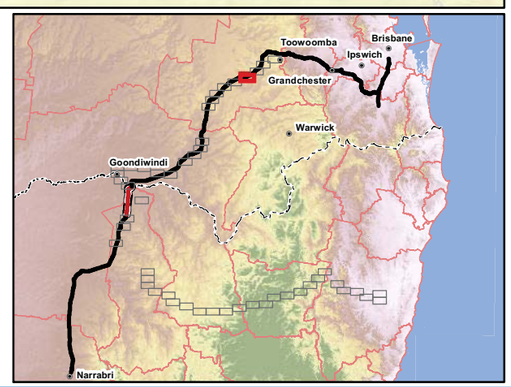
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917060606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Fatal
- Hospitalisation
- Medical treatment
- Minor injury
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

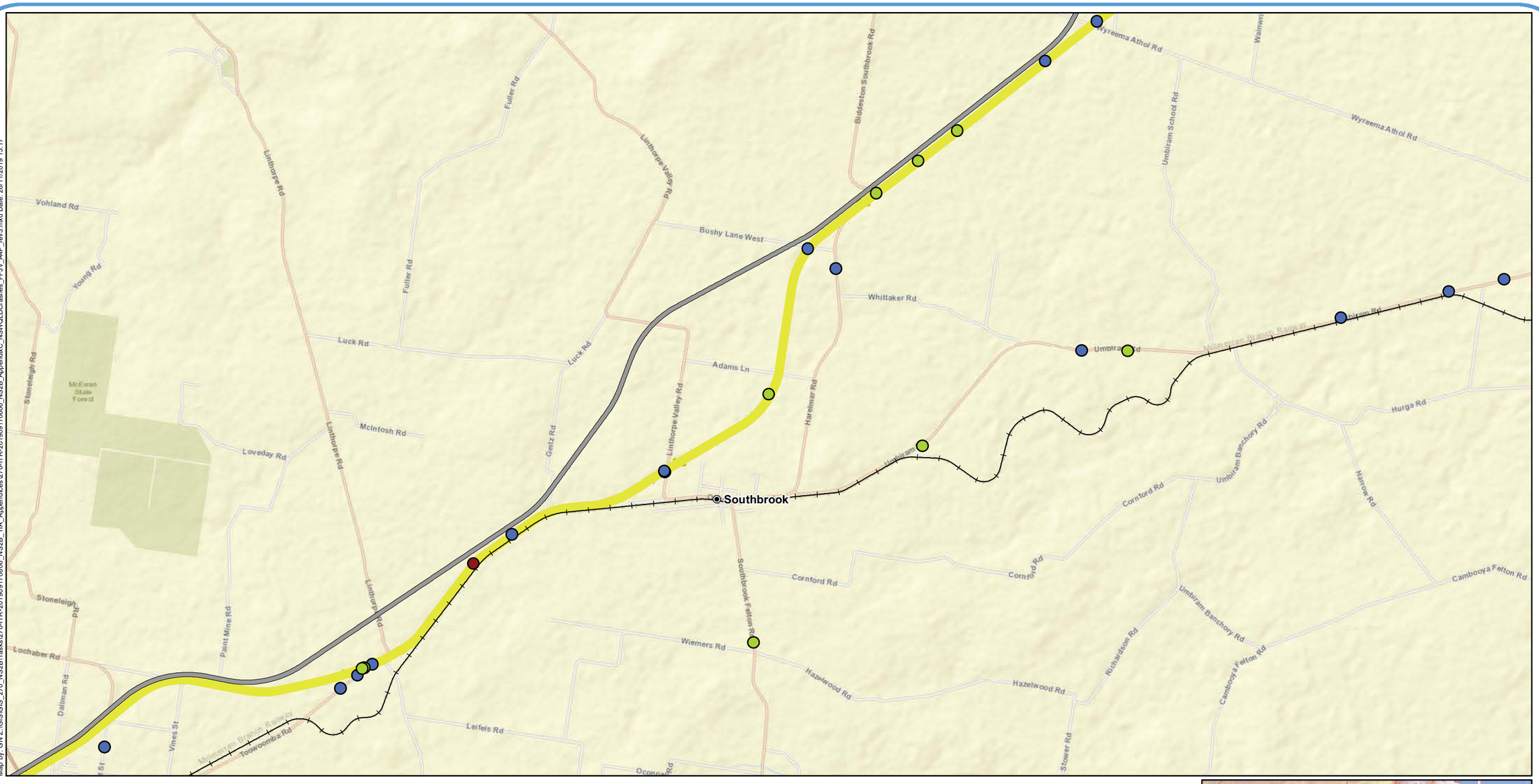
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C47: Crashes along construction routes

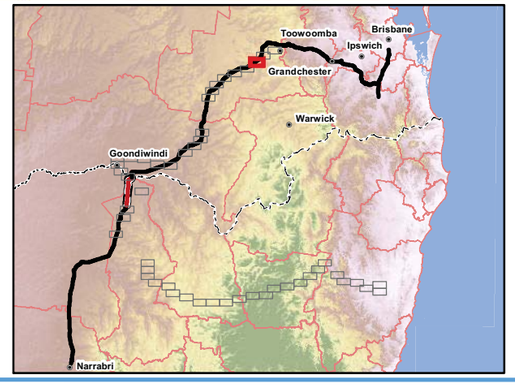
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Fatal
- Hospitalisation
- Medical treatment
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

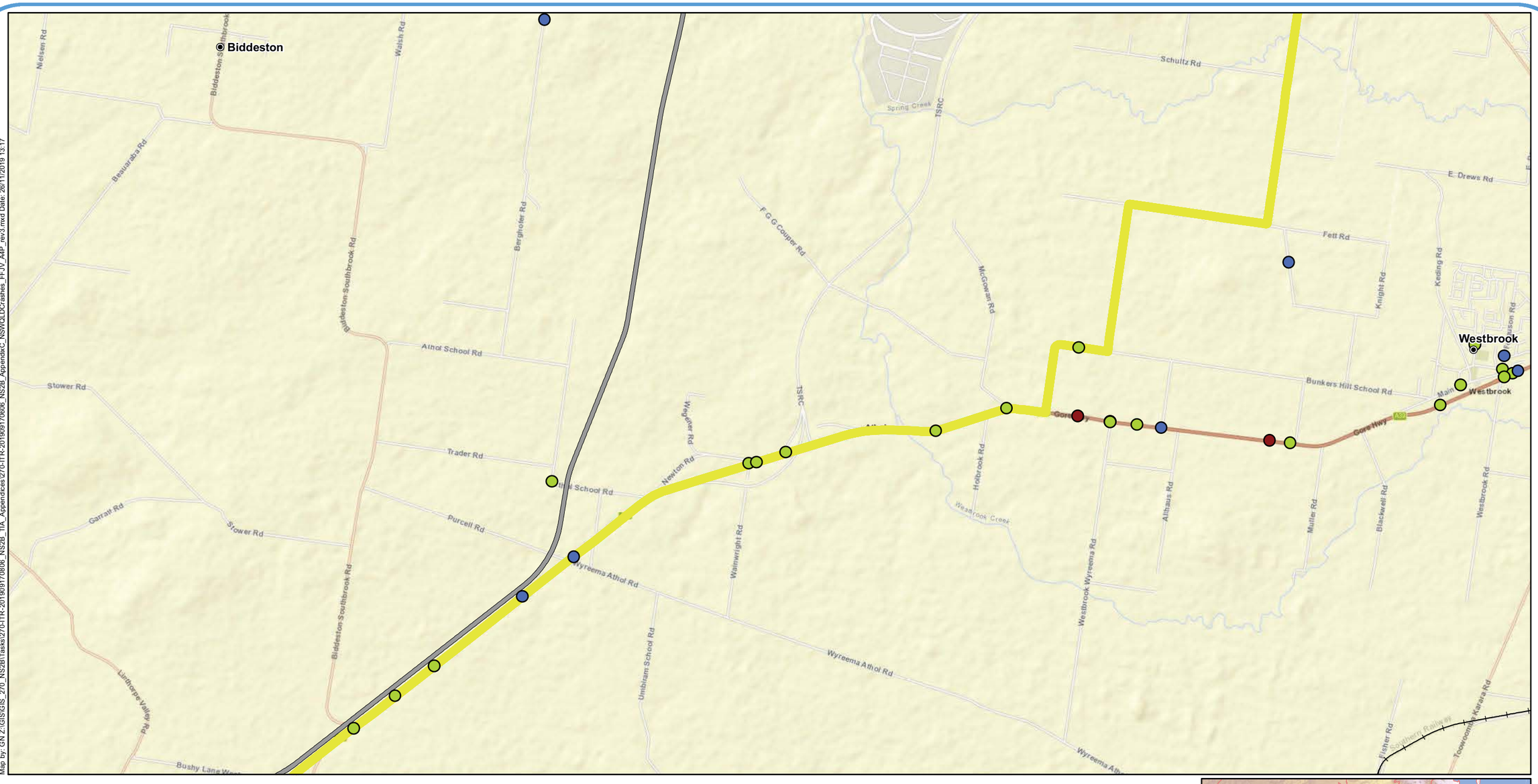
Issue date: 22/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C48: Crashes along construction routes

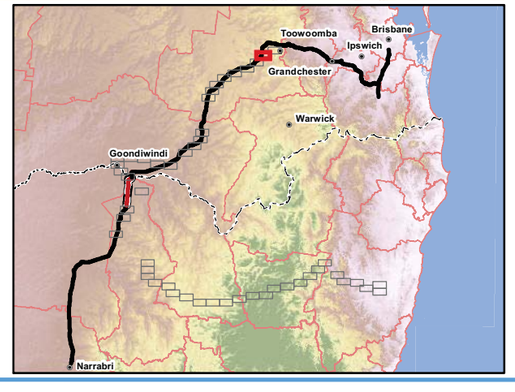
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_TIA_Appendices\270-ITR-20190917080606_NS2B_AppendixC_NSWQLDCrashes_FFJV_A4P_rev3.mxd Date: 26/11/2019 13:17



Legend

- Localities
- Fatal
- Hospitalisation
- Medical treatment
- Adjoining alignments
- Existing rail
- Construction routes



A3 scale: 1:50,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

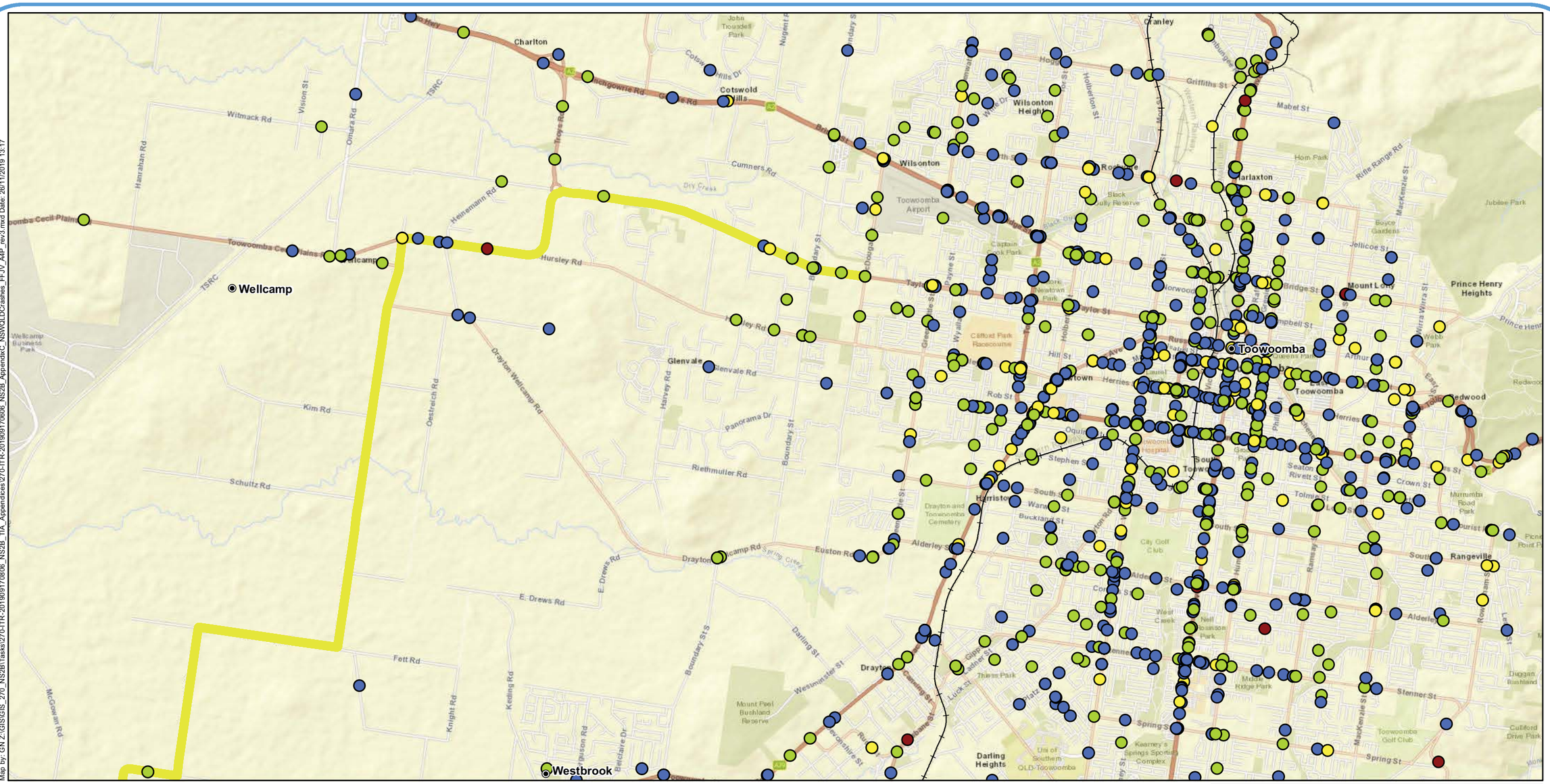
Issue date: 22/11/2019 Version: 3

Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix C49: Crashes along construction routes

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



APPENDIX

M

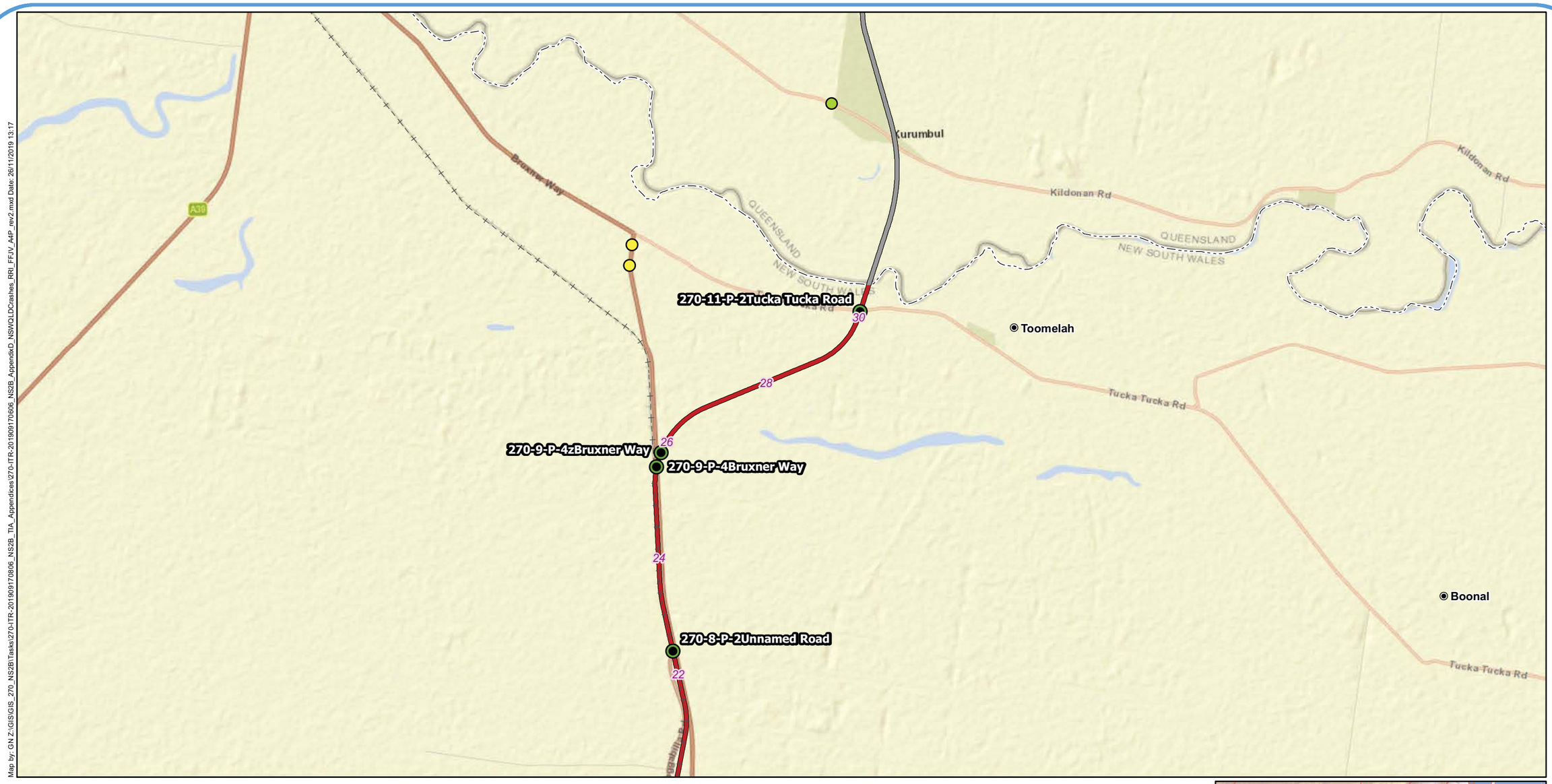
Traffic Impact Assessment

Appendix D Existing Road–Rail Interface Crashes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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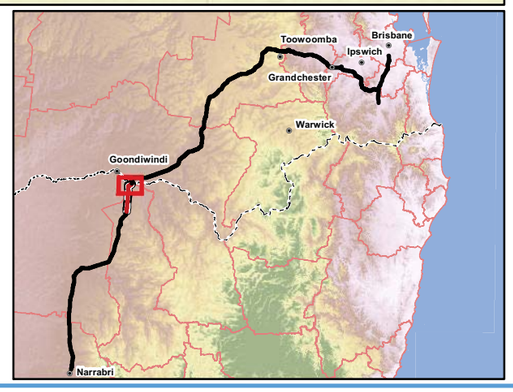
Legend

5	Chainage (km)		Existing rail (non-operational)
	Localities		North Star to NSW/QLD border alignment
	Minor/Other Injury		Adjoining alignments
	Hospitalisation		NSW/QLD border
	Road rail interface		



A3 scale: 1:70,000

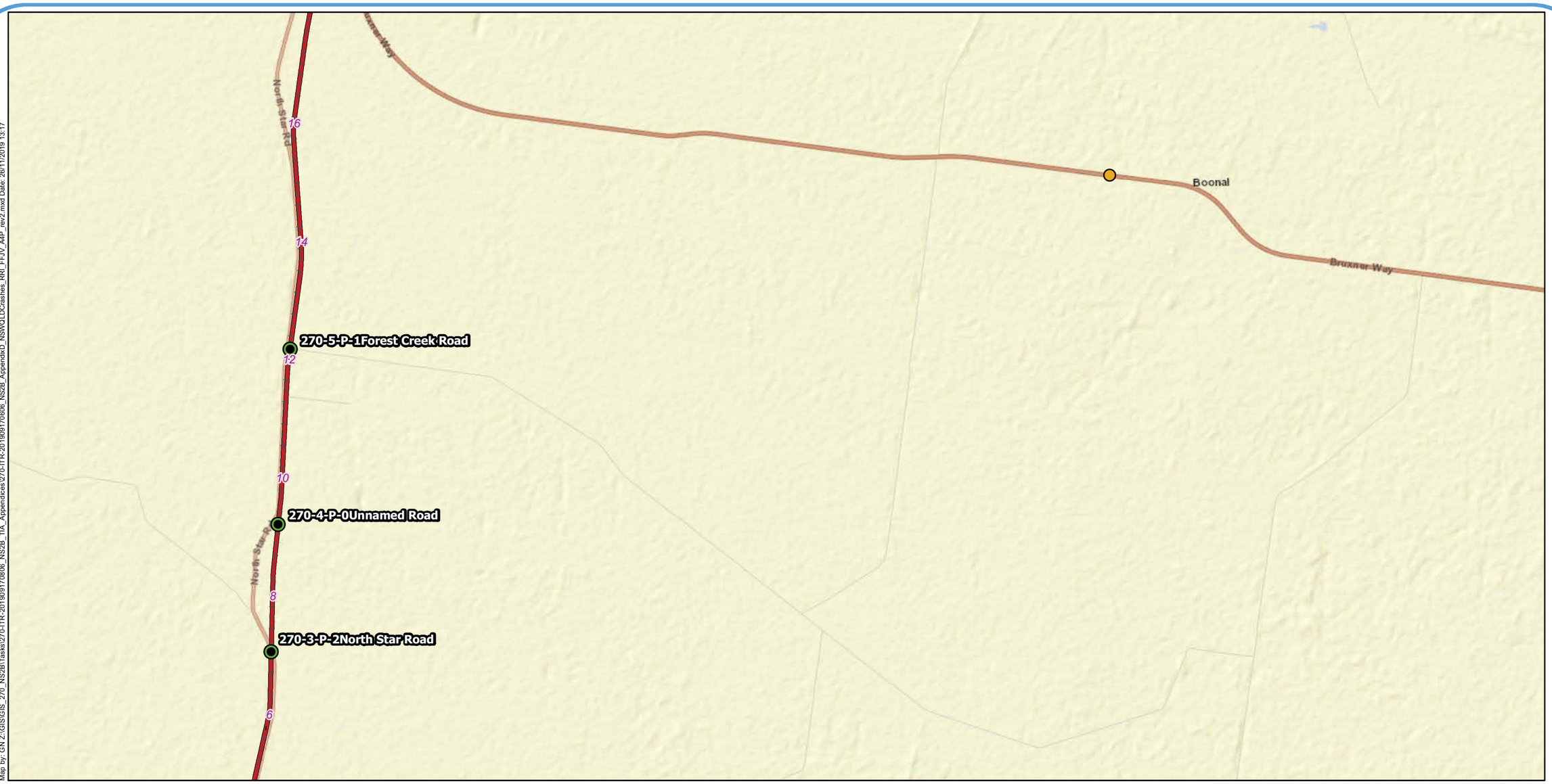
0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix D1: Existing road rail interface crashes rail alignment

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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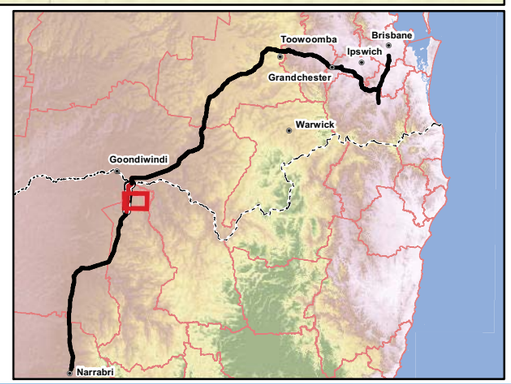
Legend

5	Chainage (km)		Existing rail (operational)
	Moderate Injury		Existing rail (non-operational)
	Road rail interface		North Star to NSW/QLD border alignment



A3 scale: 1:70,000

0 0.5 1 1.5 2 2.5km

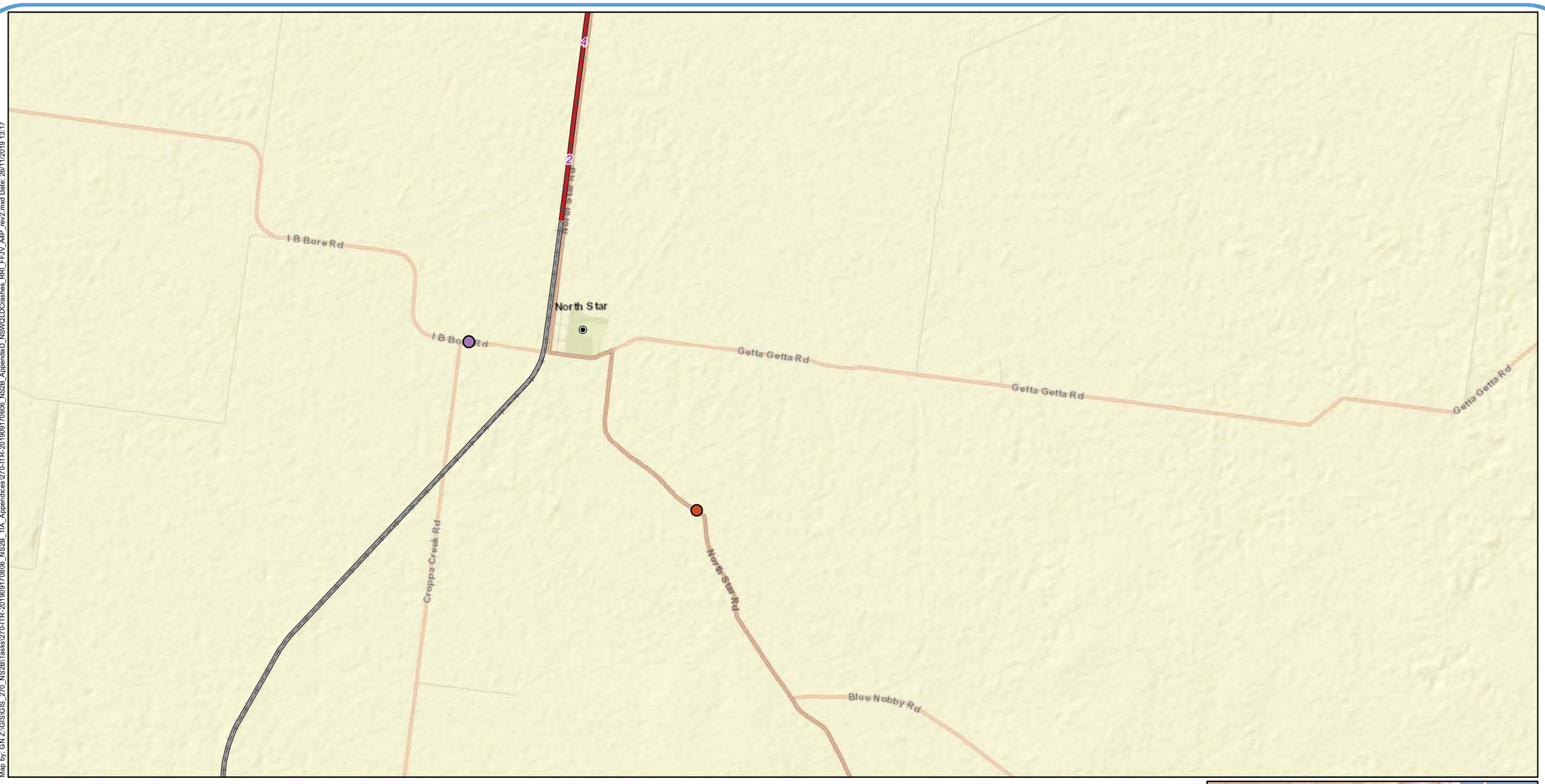
Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix D2: Existing road rail interface crashes rail alignment

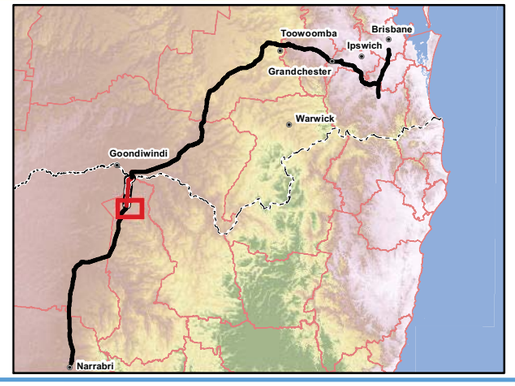
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080606_NS2B_AppendixD_NSWQLDCrashes_RRI_FFJV_A4P_rev2.mxd Date: 26/11/2019 13:17



Legend

- 5 Chainage (km)
- Localities
- Non-casualty (towaway)
- Serious Injury
- Existing rail (non-operational)
- North Star to NSW/QLD border alignment
- Adjoining alignments



A3 scale: 1:70,000

0 0.5 1 1.5 2 2.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 22/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix D3: Existing road rail interface crashes rail alignment

APPENDIX M

Traffic Impact Assessment

Appendix E Borrow Pit and Quarry Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

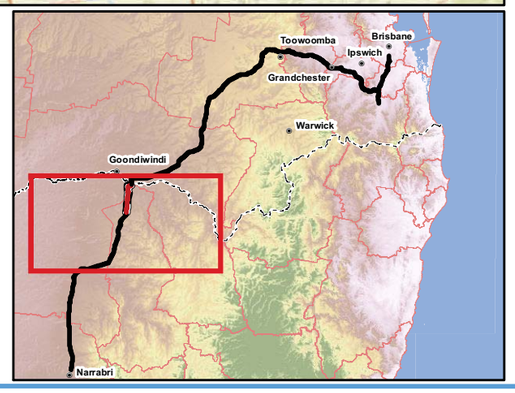
Map by: NCW Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917060 6_NS2B_TIA_Appendices\270-ITR-20190917060 6_NS2B_AppendixE_BorrowPits_and_Quarry_ConstructionTraffic Routes_FFJV_rev6.mxd Date: 5/02/2020 11:00

Kurumbul
Glenarbon
Beebo
Limevale
Boomi
Site 13
Site 8
Site 9
Site 26
Site 7b
Site 7
Site 11
Site 5
Site 25
Site 4
Boonal
Smithlea
Texas
Yetman
Tulloona
Site 1
Tikitere Quarry
1000 Acres Borrow Pit
Atholwood
Garah
Yallaroi
Limestone
Wallangra
Crooble
Coolatai
Ashford
Ashley
Johnstone Quarry Moree

Legend

Points

- Suppliers
- Existing rail (operational)
- Existing rail (non-operational)
- North Star to NSW/QLD border alignment
- Adjoining alignments
- Borrow pit traffic route
- Quarry construction traffic route
- QLD/NSW border



A3 scale: 1:500,000

0 5 10 15 20 25 km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 05/02/2020 Version: 6
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix E: Borrow pit and quarry construction traffic routes

APPENDIX M

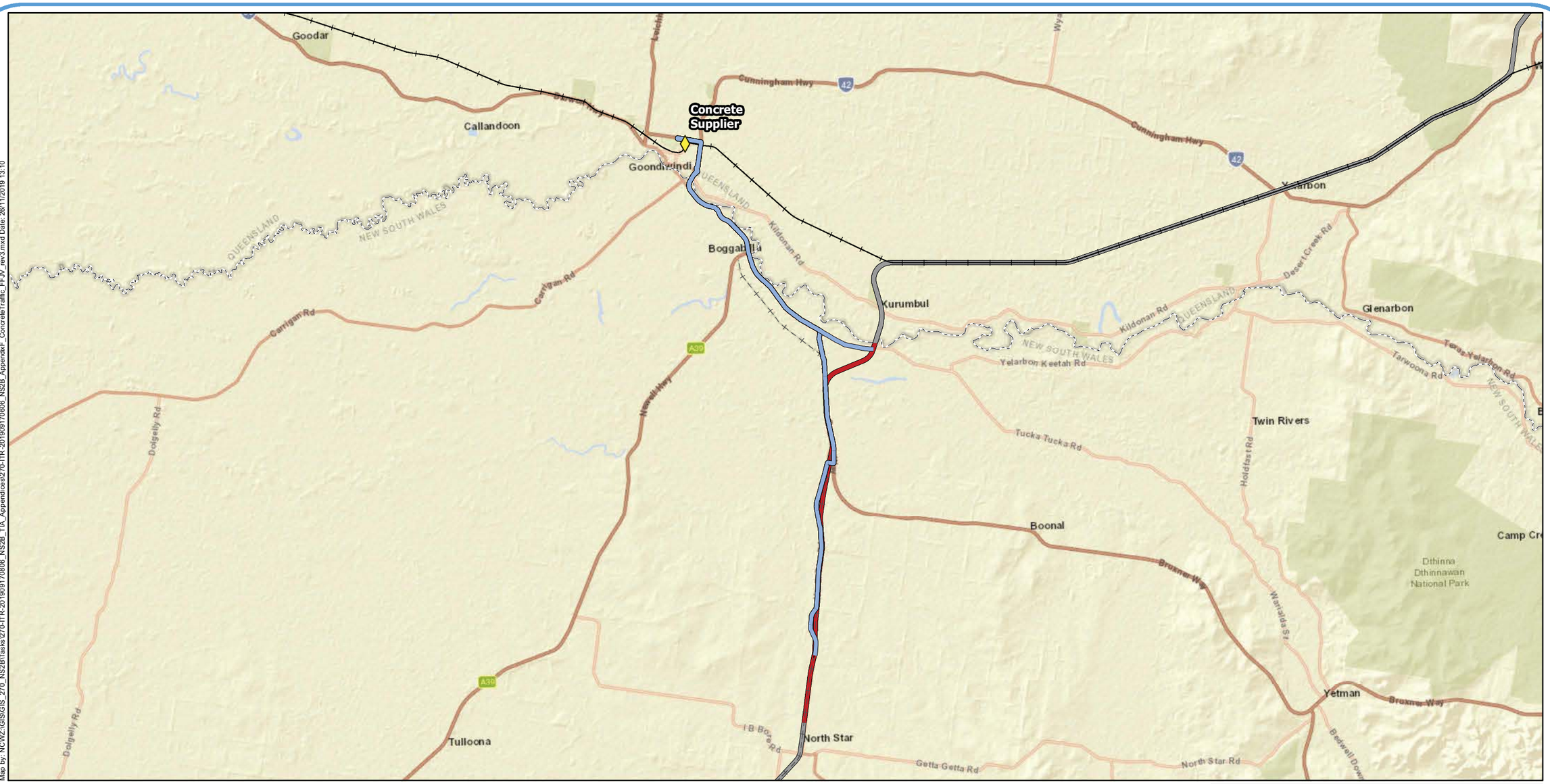
Traffic Impact Assessment

Appendix F Concrete Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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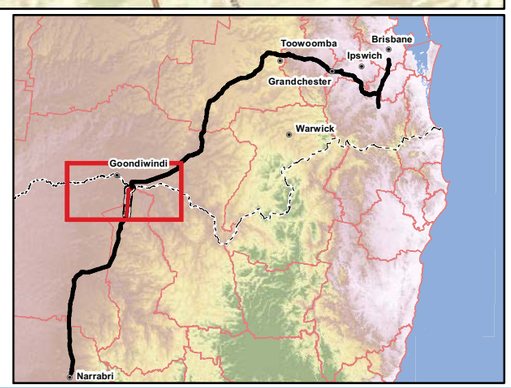
Legend

- Suppliers
- Existing rail (operational)
- Existing rail (non-operational)
- Adjoining alignments
- North Star to NSW/QLD border alignment
- Concrete construction traffic route
- QLD/NSW border



A3 scale: 1:300,000

0 2 4 6 8 10 km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 26/11/2019 Version: 3
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix F: Concrete construction traffic routes

APPENDIX M

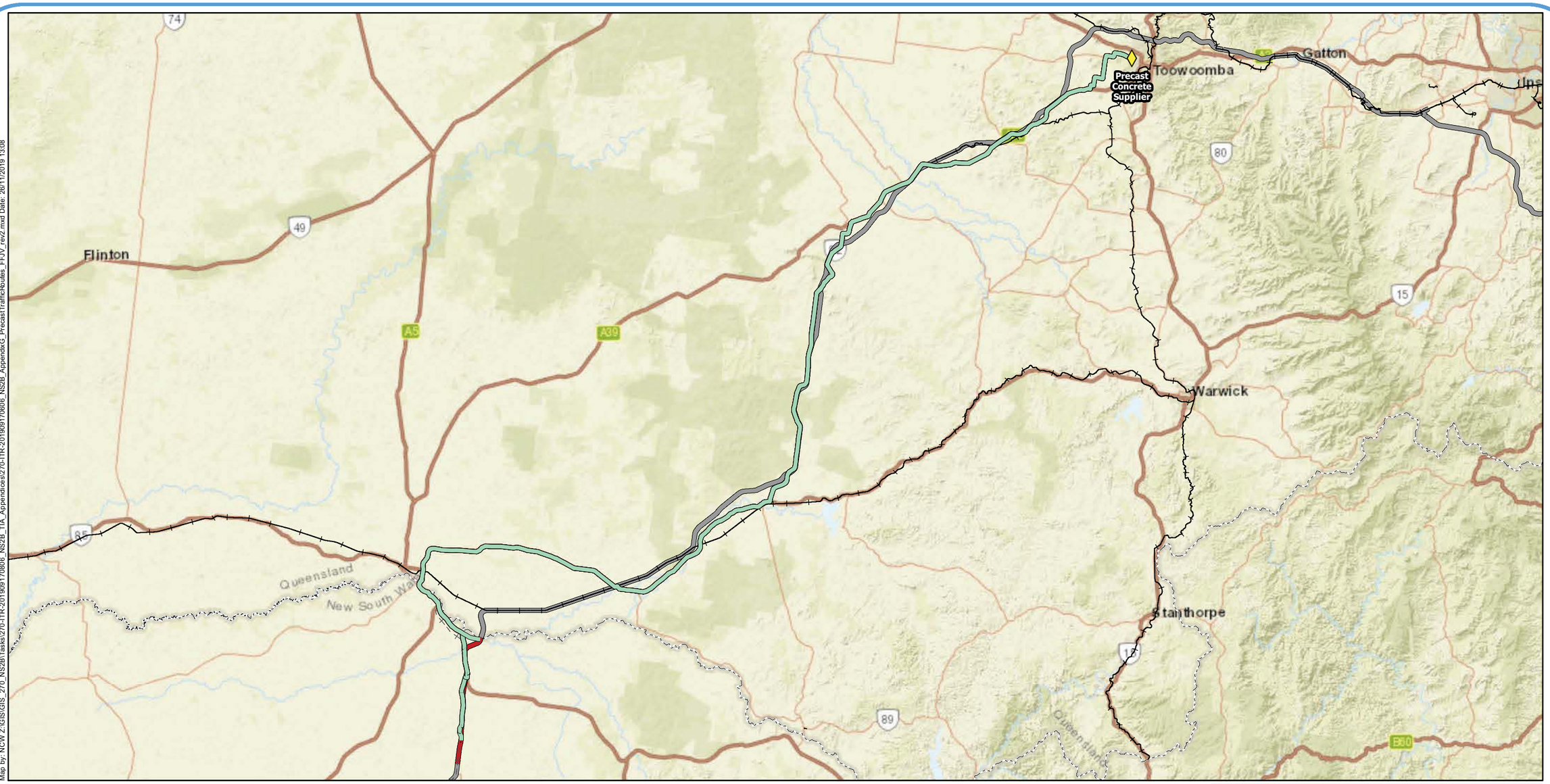
Traffic Impact Assessment

Appendix G Precast Concrete Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

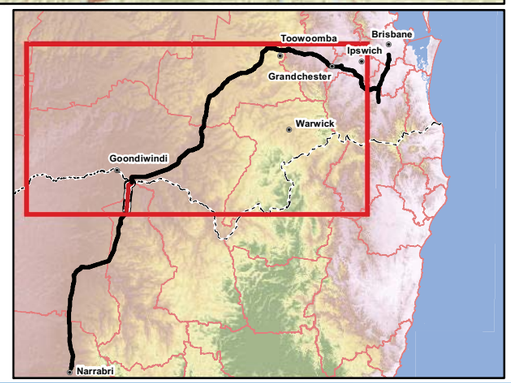
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: NCW Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixG_PrecastTraffic Routes_FFJV_rev2.mxd Date: 26/11/2019 13:08

Legend

- Suppliers
- Precast concrete construction traffic route
- Existing rail (operational)
- Existing rail (non-operational)
- North Star to NSW/QLD border alignment
- Adjoining alignments
- QLD/NSW border



A3 scale: 1:900,000

0 7 14 21 28 35km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 26/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix G: Precast concrete construction traffic routes

APPENDIX M

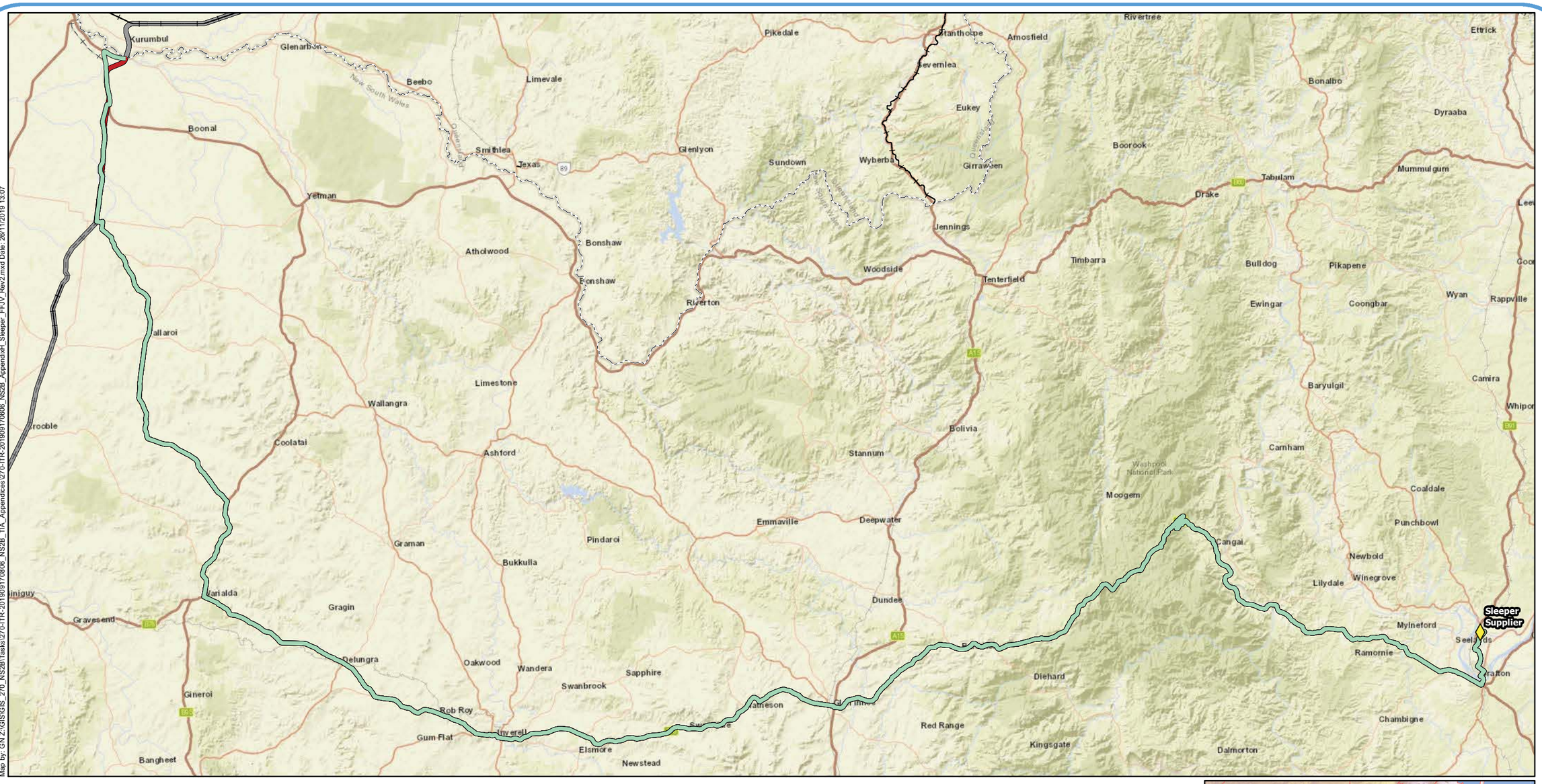
Traffic Impact Assessment

Appendix H Sleeper Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

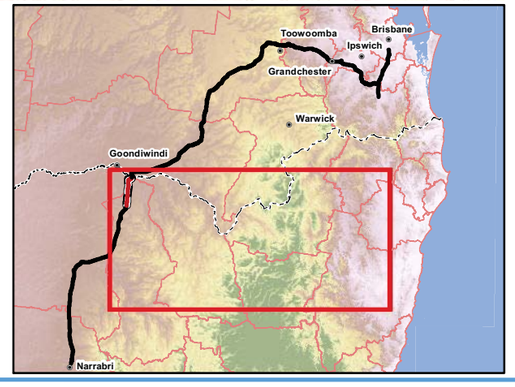
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Map by: GN Z:\GIS\GIS_270_NS2B\Tasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixH_Sleeper_FrJV_Rev2.mxd Date: 26/11/2019 13:07

Legend

- Suppliers
- Existing rail (operational)
- Existing rail (non-operational)
- North Star to NSW/QLD border alignment
- Adjoining alignments
- Sleeper construction traffic route
- QLD/NSW border



A3 scale: 1:740,000

0 5 10 15 20 25km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 26/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix H: Sleeper construction traffic routes

APPENDIX M

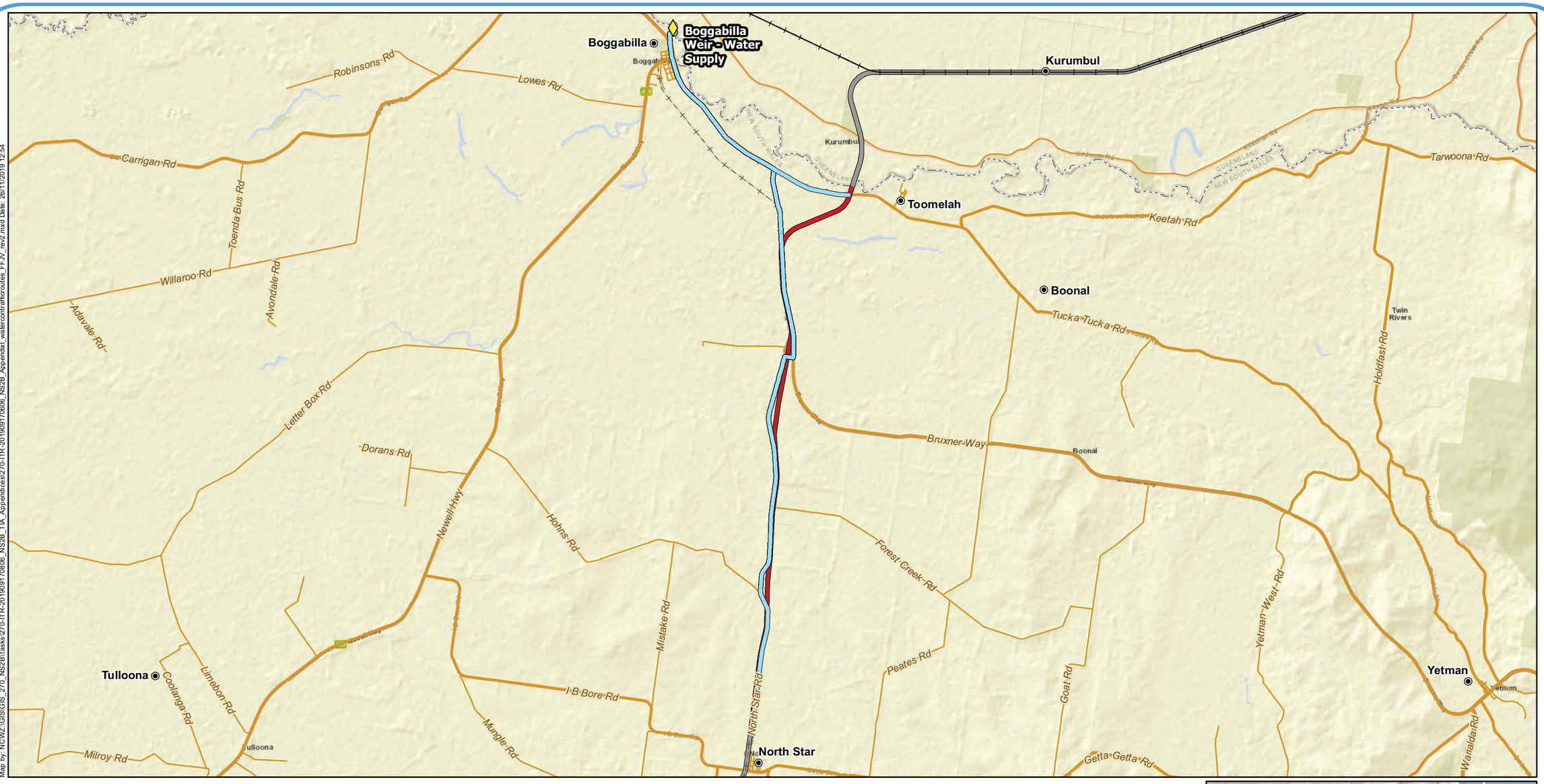
Traffic Impact Assessment

Appendix I Water Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

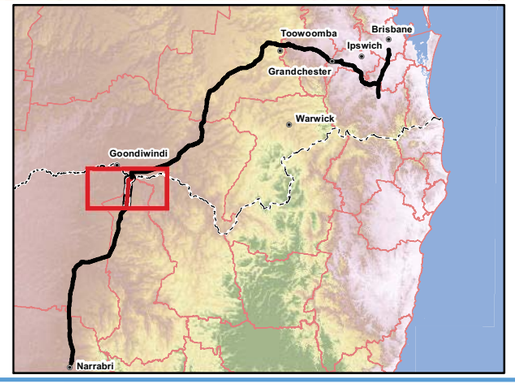
The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



Legend

- Suppliers
- Localities
- Water construction traffic route
- Existing rail (operational)
- Existing rail (non-operational)
- North Star to NSW/QLD border alignment
- Adjoining alignments
- Major roads
- Minor roads
- QLD/NSW border



A3 scale: 1:210,000

0 1.5 3 4.5 6 7.5 km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 26/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix I: Water construction traffic routes

APPENDIX M

Traffic Impact Assessment

Appendix J Workforce Construction Traffic Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

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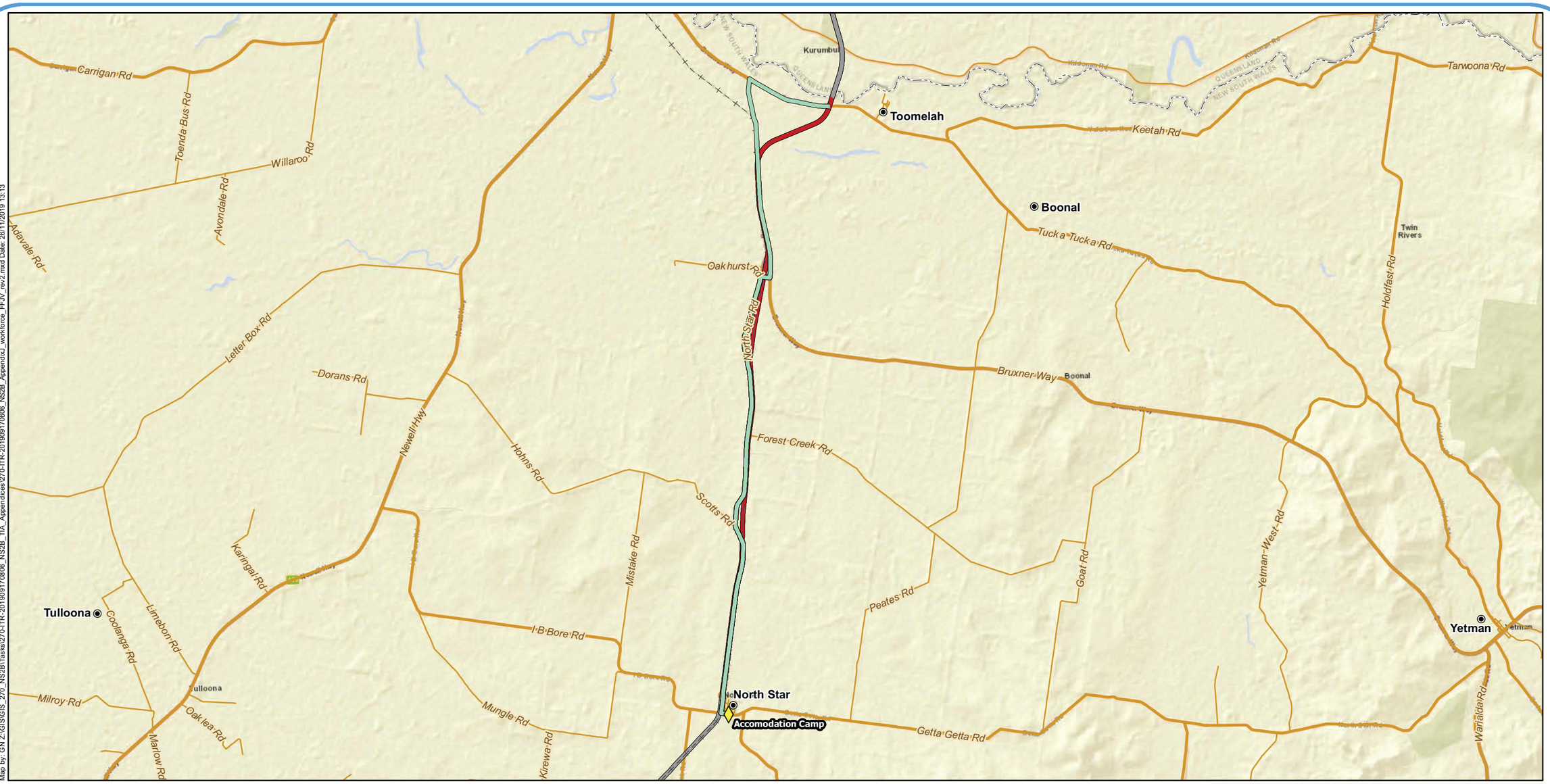
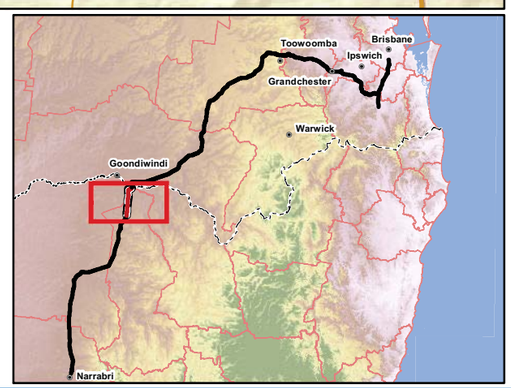


Legend

- Suppliers
- Localities
- Existing rail (operational)
- Existing rail (non-operational)
- Workforce construction traffic route
- North Star to NSW/QLD border alignment
- Adjoining alignments
- Major roads
- Minor roads
- QLD/NSW border



A3 scale: 1:200,000

0 1.5 3 4.5 6 7.5km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 26/11/2019 Version: 2
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix J: Workforce construction traffic routes

APPENDIX

M

Traffic Impact Assessment

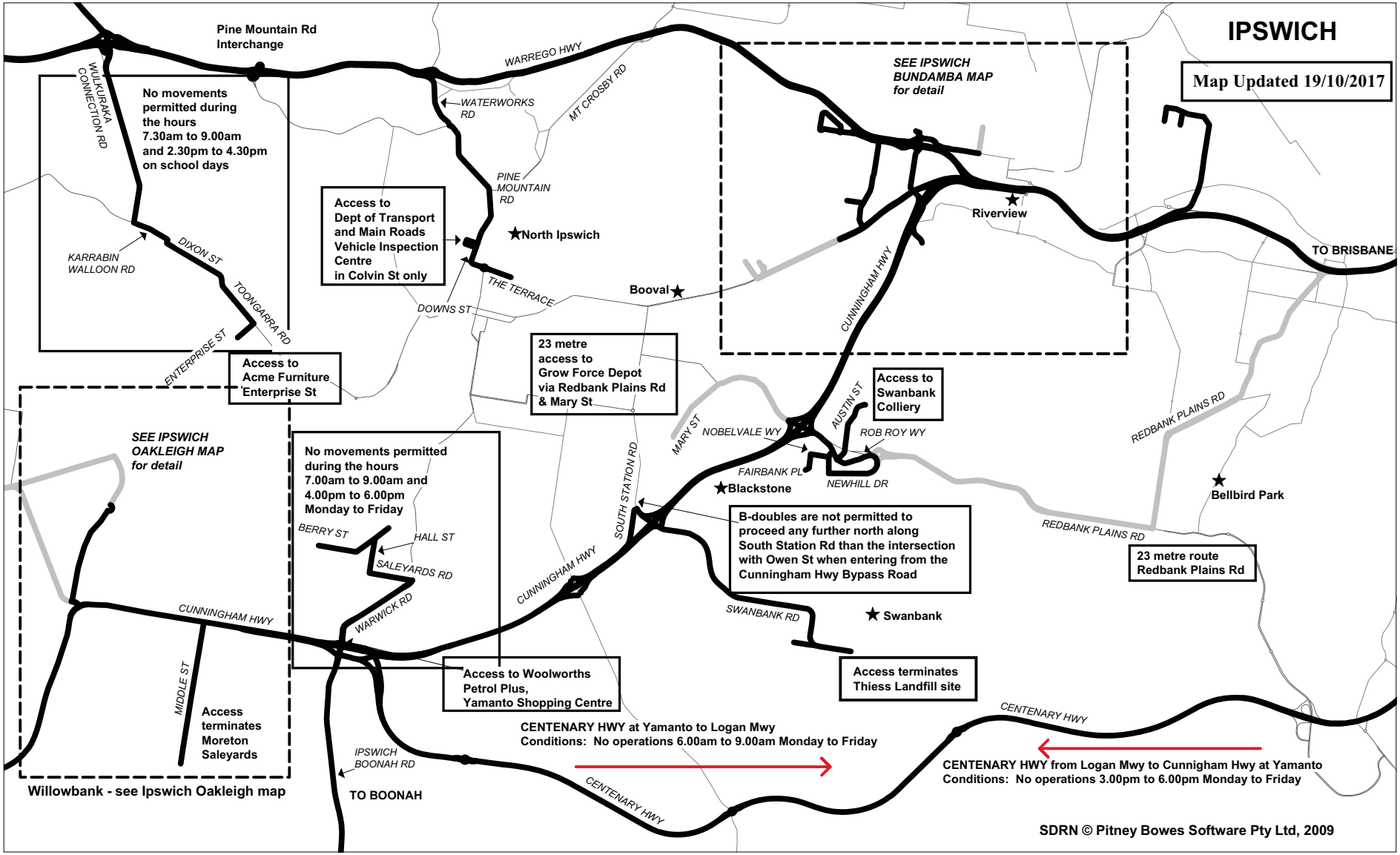
Appendix K Multi-Combination Heavy Vehicle Routes

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

MULTI-COMBINATION ROUTES IN QUEENSLAND

Queensland Government



B-DOUBLES
- 23 metre routes
- 23 & 25 metre routes

ROAD TRAINS
- Type 1 routes
- Type 1 & 2 routes

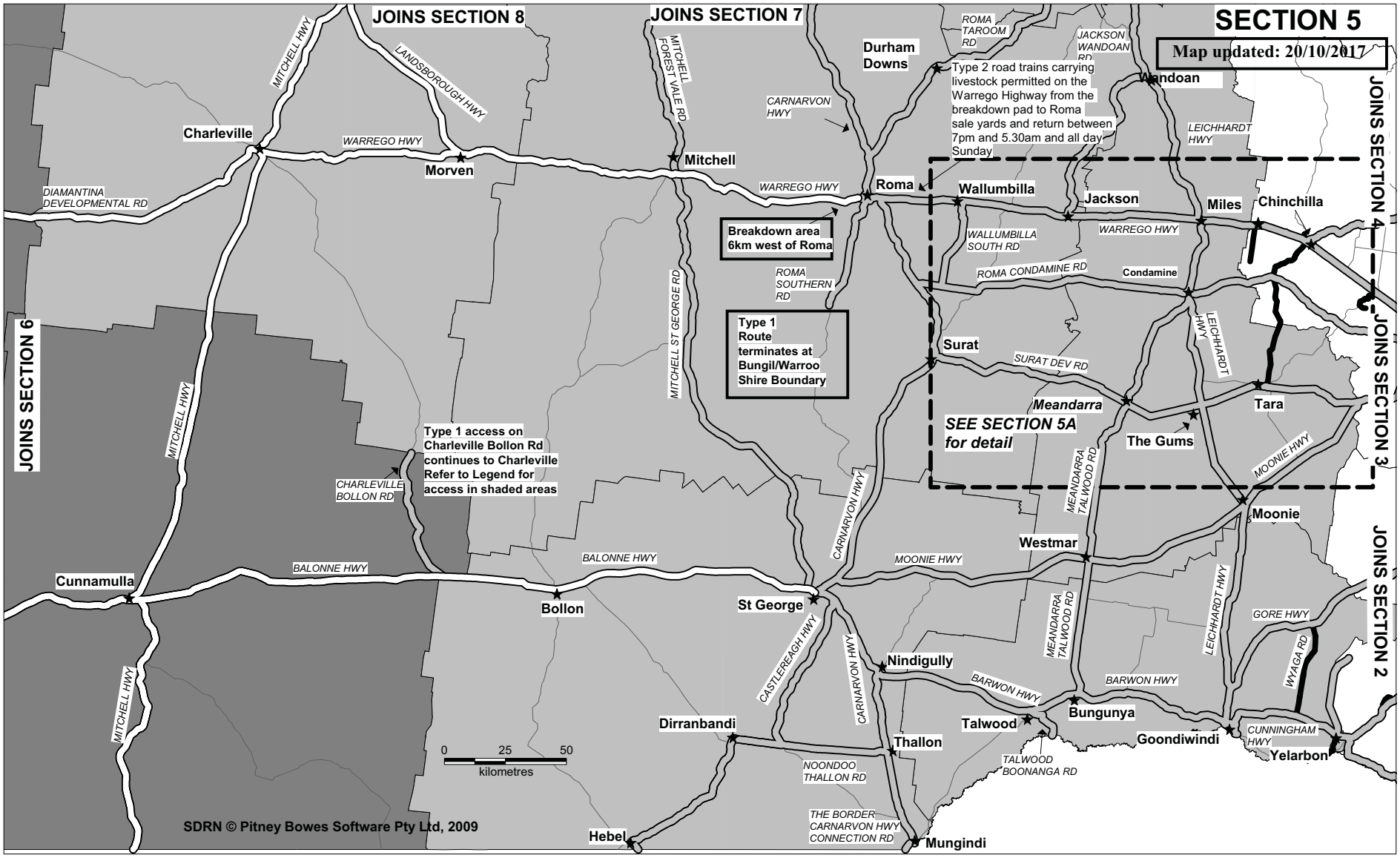
NO ROAD TRAINS or B-DOUBLES

REFER TO LEGEND FOR DETAILS OF OPERATIONS IN THE SHADED AREAS

Note: 23 & 25 metre B-doubles can access Type 1 & 2 road train routes

MULTI-COMBINATION ROUTES IN QUEENSLAND

Queensland Government



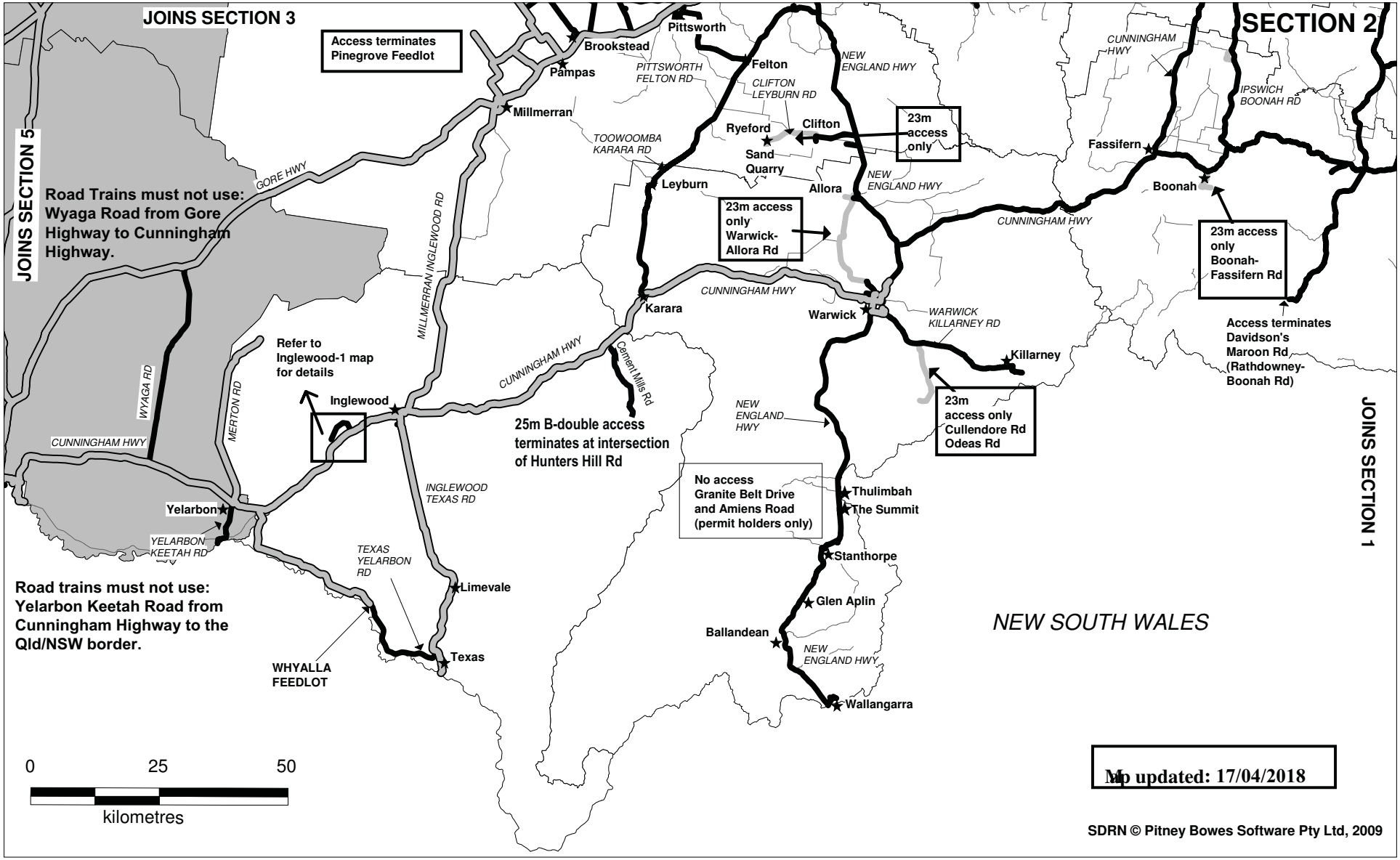
B-DOUBLES	ROAD TRAINS	NO ROAD TRAINS or B-DOUBLES
23 metre routes	Type 1 routes	
23 & 25 metre routes	Type 1 & 2 routes	

REFER TO LEGEND FOR DETAILS OF OPERATIONS IN THE SHADED AREAS

Note: 23 & 25 metre B-doubles can access Type 1 & 2 road train routes

MULTI-COMBINATION ROUTES IN QUEENSLAND

Queensland Government



B-DOUBLES
- 23 metre routes
- 23 & 25 metre routes

ROAD TRAINS
- Type 1 routes
- Type 1 & 2 routes

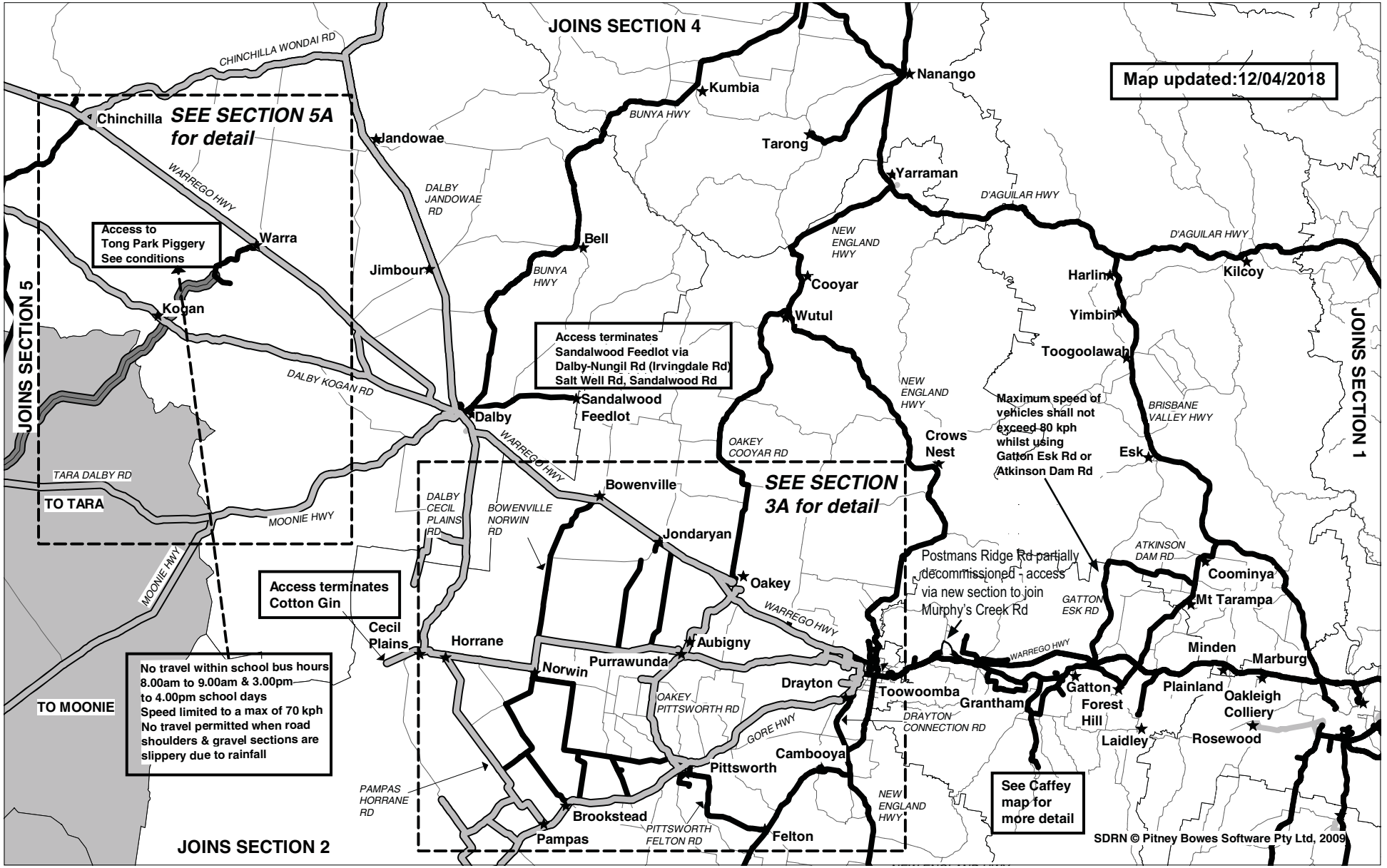
NO ROAD TRAINS or B-DOUBLES

REFER TO LEGEND FOR DETAILS OF OPERATIONS IN THE SHADED AREAS

Note: 23 & 25 metre B-doubles can access Type 1 & 2 road train routes

MULTI-COMBINATION ROUTES IN QUEENSLAND

Queensland Government



B-DOUBLES
- 23 metre routes
- 23 & 25 metre routes

ROAD TRAINS
- Type 1 routes
- Type 1 & 2 routes

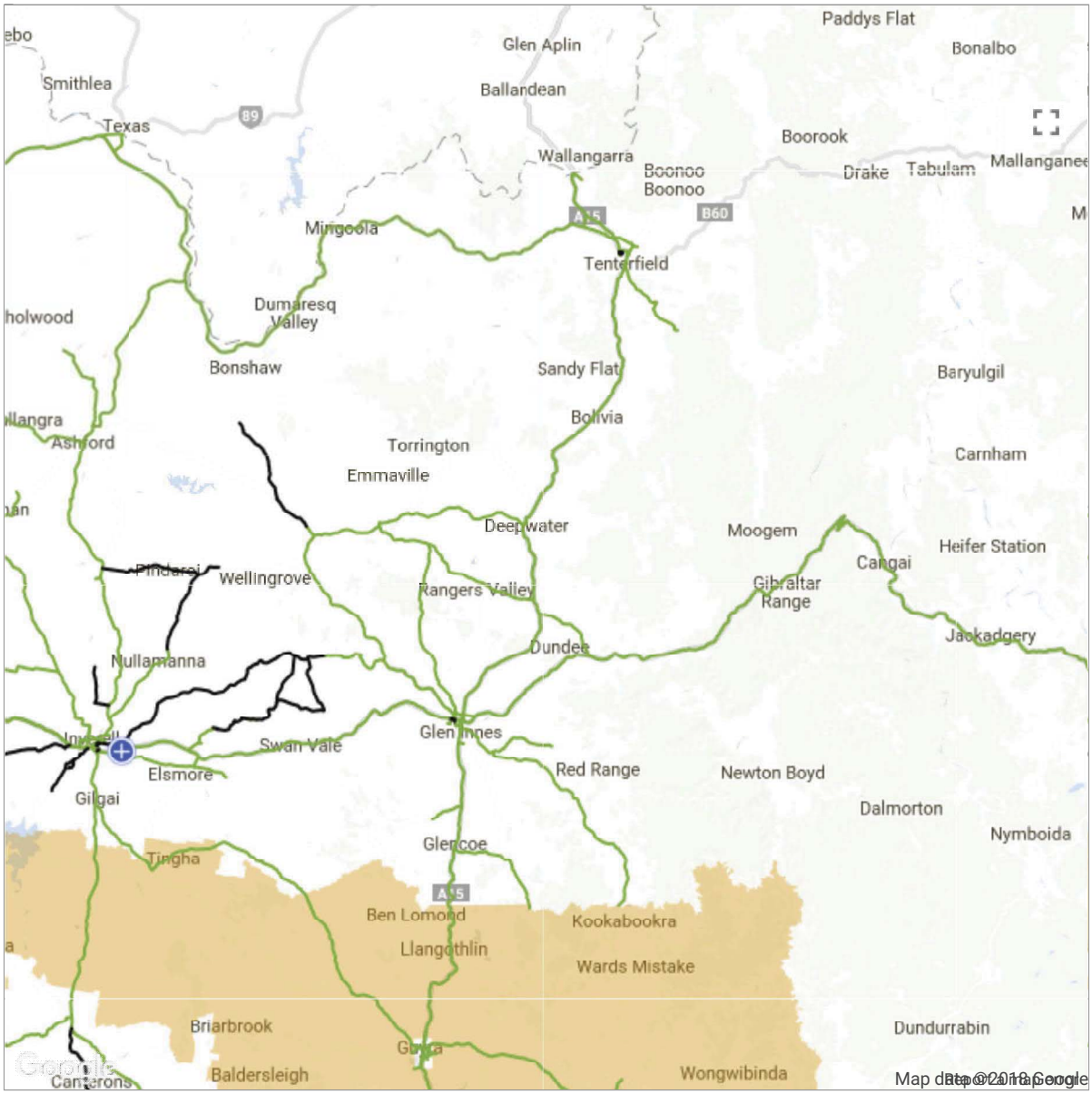
NO ROAD TRAINS or B-DOUBLES

REFER TO LEGEND FOR DETAILS OF OPERATIONS IN THE SHADED AREAS

Note: 23 & 25 metre B-doubles can access Type 1 & 2 road train routes

NSW Combined Higher Mass Limits (HML) and Restricted Access Vehicle (RAV) Map

Map last updated: 03/05/2018



Legend

GML and CML networks

- 25/26m B-double Routes
- Approved Routes With Travel Conditions
- Exception Routes (not approved)
- Approved Areas
- Approved Areas with Travel Conditions
- Restricted Structures - Bridges
- Restricted Structures with Conditional Access - Bridges
- Restricted Structures - Intersections
- Restricted Structures - Intersections with Conditional Access
- Low Clearance Bridge (< 4.3m) - Through Traffic on Bridge
- Low Clearance Bridge (< 4.3m) - Through Traffic under Bridge

Network Disclaimer

The networks are available for short combinations (up to 19 metres long) and B-doubles that comply with the requirements contained in the Heavy Vehicle National Law (HVNL); the National Class 2 Heavy Vehicle B-double Authorisation (Notice) and the adjoining NSW Schedule and for Higher Mass Limits (HML) the New South Wales Higher Mass Limits Declaration 2015. These networks are based on a maximum vehicle width of 2.5 metres and are subject to sign-posted restrictions.

Provide feedback

Contact Roads and Maritime Services | Phone: 131 782

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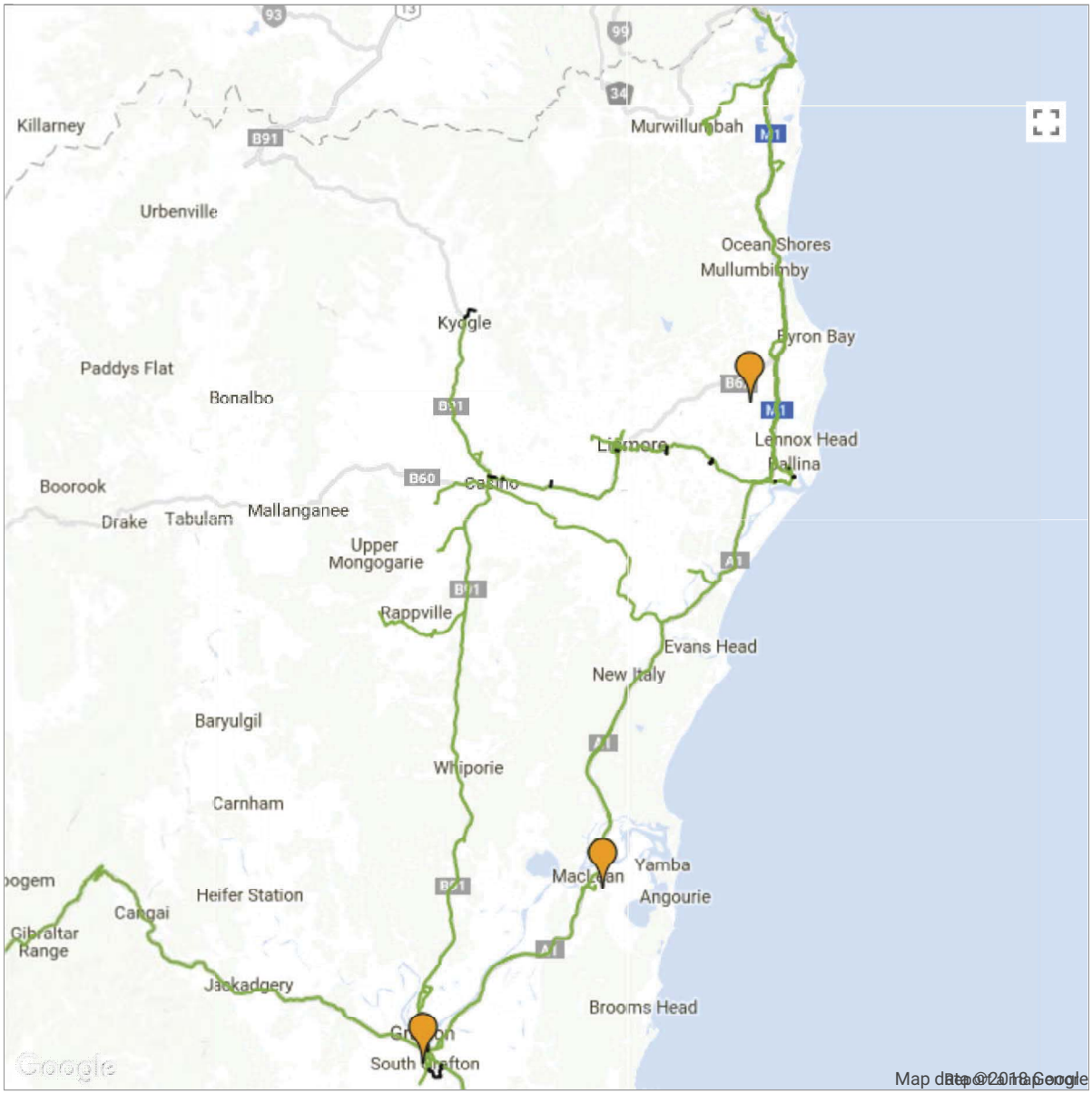
NSW Combined Higher Mass Limits (HML) and Restricted Access Vehicle (RAV) Map

Map last updated: 03/05/2018



Legend

GML and CML networks

- 25/26m B-double Routes
- Approved Routes With Travel Conditions
- Exception Routes (not approved)
- Approved Areas
- Approved Areas with Travel Conditions
- Restricted Structures - Bridges
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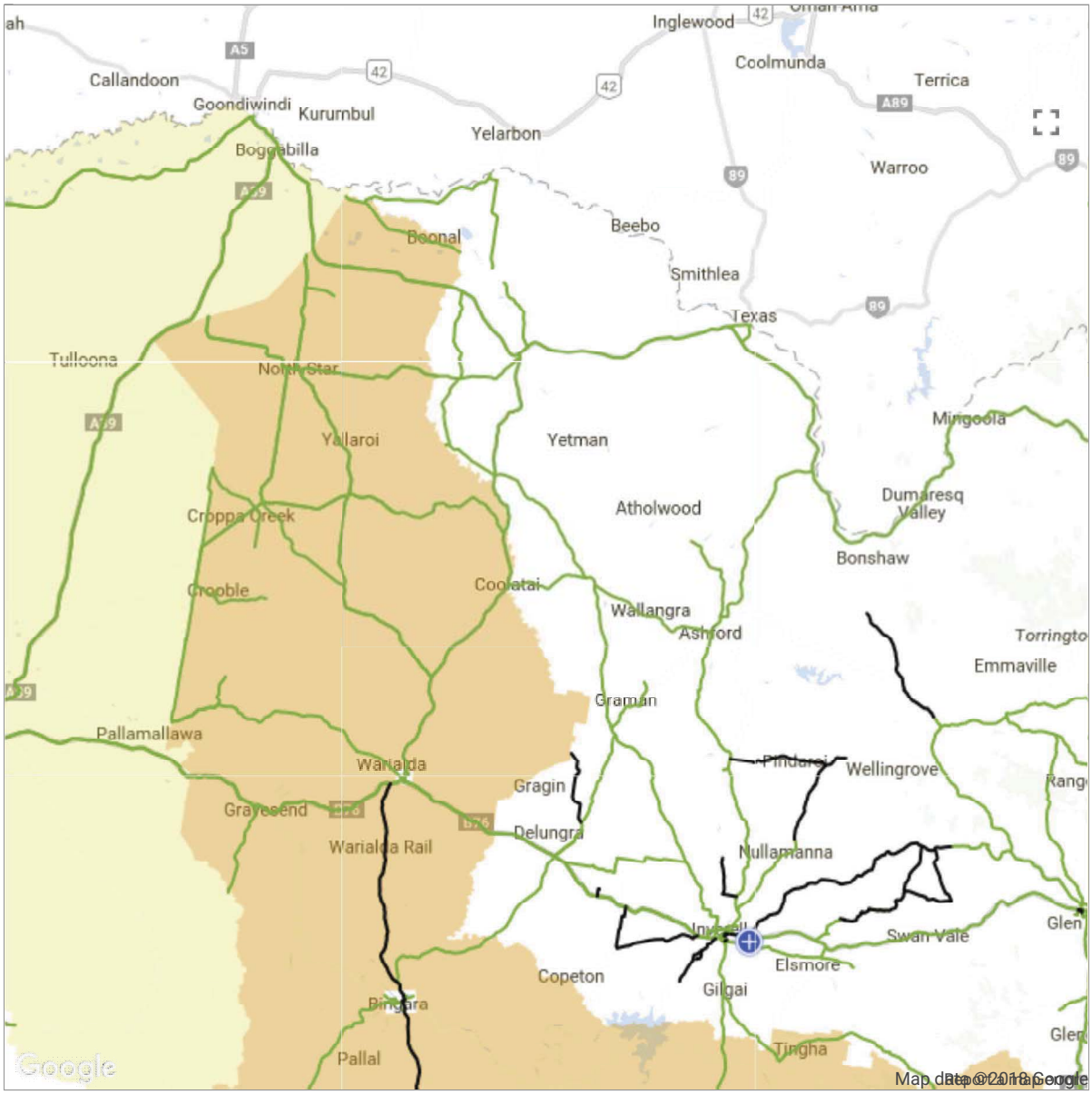
NSW Combined Higher Mass Limits (HML) and Restricted Access Vehicle (RAV) Map

Transport Roads & Maritime Services

Map last updated: 03/05/2018



Legend

GML and CML networks

- 25/26m B-double Routes
- Approved Routes With Travel Conditions
- Exception Routes (not approved)
- Approved Areas
- Approved Areas with Travel Conditions
- Restricted Structures - Bridges
- Restricted Structures with Conditional Access - Bridges
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Network Disclaimer

The networks are available for short combinations (up to 19 metres long) and B-doubles that comply with the requirements contained in the Heavy Vehicle National Law (HVNL); the National Class 2 Heavy Vehicle B-double Authorisation (Notice) and the adjoining NSW Schedule and for Higher Mass Limits (HML) the New South Wales Higher Mass Limits Declaration 2015. These networks are based on a maximum vehicle width of 2.5 metres and are subject to sign-posted restrictions.

Provide feedback

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APPENDIX

M

Traffic Impact Assessment

Appendix L Detailed Link Analysis

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

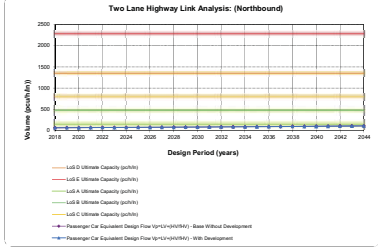
The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Section	**Between Boodle Street and Hunt Street**
Route	**Boodle Street**
Link Locality:	

Boodle Street - Between Boodle Street and Hunt Street — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05	0.05

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

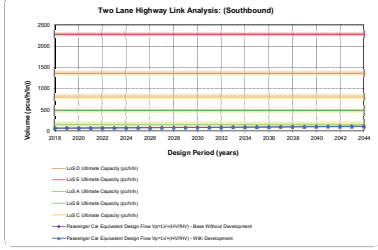
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.96	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
Development Traffic (veh/h)			0	1	2	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	65	66	67	70	73	72	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05	0.05

Section	**Between Boodle Street and Hunt Street**
Route	**Boodle Street**
Link Locality:	

Boodle Street - Between Boodle Street and Hunt Street — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.96	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

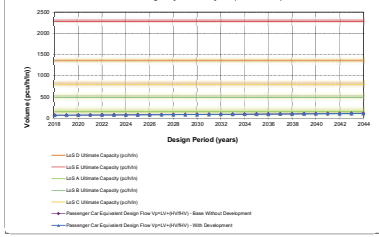
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
Development Traffic (veh/h)			0	1	2	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	65	66	67	70	73	72	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Section	**Between Leichardt Hwy and Boodle Street**
Route	**Hunt Street**
Link Locality:	

Hunt Street - Between Leichardt Hwy and Boodle Street — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	12	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

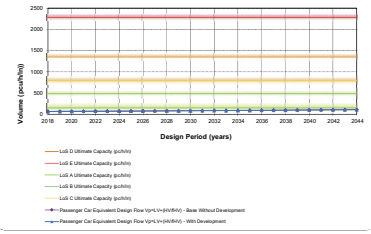
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
Development Traffic (veh/h)			0	1	2	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	65	66	67	70	73	72	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Section	**Between Leichardt Hwy and Boodle Street**
Route	**Hunt Street**
Link Locality:	

Hunt Street - Between Leichardt Hwy and Boodle Street — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	12	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Two Lane Highway Link Analysis: (Southbound)



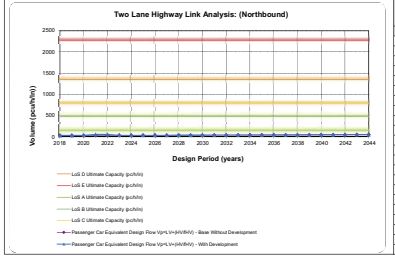
Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	51	52	53	54	55	56	57	59	60	61	62	63	65	66	67	69	70	71	73	74	76	77	79	80	82	84	85
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	9	9	9	10	10	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	14	15	15
Total vehicles (veh/h)	60	61	62	64	65	66	68	69	70	72	73	75	76	78	79	81	82	84	86	87	89	91	93	95	97	98	100
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Average Annual Daily Traffic (AADT)	400	408	416	424	433	442	450	459	469	478	488	497	507	517	528	538	549	560	571	583	594	606	618	631	643	656	669
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	65	66	67	68	70	71	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
Development Traffic (veh/h)			0	1	2	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	65	66	67	70	73	72	73	74	76	77	79	80	82	83	85	87	89	90	92	94	96	98	100	102	104	106	108
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.03	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.04	0.05	0.05	0.05

Section	Between North Star Road and Borrow Pit Site 11 Access Road
Route	Bruxner Way
Link Locality:	

Bruxner Way - Between North Star Road and Borrow Pit Site 11 Access Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	231	236	240	245	250	255	260	265	271	276	282	287	293	299	305	311	317	323	330	337	343	350	357	364	372	379	387
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02



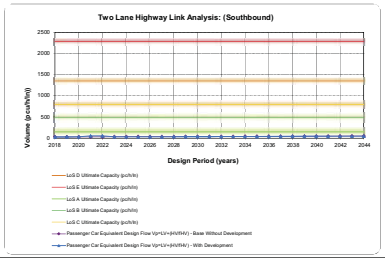
Bruxner Way - Between North Star Road and Borrow Pit Site 11 Access Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Average Annual Daily Traffic (AADT)	231	236	240	245	250	255	260	265	271	276	282	287	293	299	305	311	317	323	330	337	343	350	357	364	372	379	387
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
Development Traffic (veh/h)			0	14	14	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	28	29	29	51	51	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	Between North Star Road and Borrow Pit Site 11 Access Road
Route	Bruxner Way
Link Locality:	

Bruxner Way - Between North Star Road and Borrow Pit Site 11 Access Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	43	44	45	46	47	48	49	50	
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02



Bruxner Way - Between North Star Road and Borrow Pit Site 11 Access Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic**

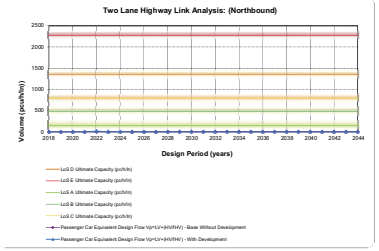
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
Development Traffic (veh/h)			0	14	14	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	30	30	31	52	53	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section: Full extent
Route: Bush Access Road
Link Locality:

Bush Access Road - Full extent — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

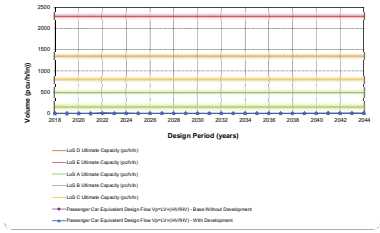
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	2	2	2	2	20	6	9	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section: Full extent
Route: Bush Access Road
Link Locality:

Bush Access Road - Full extent — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

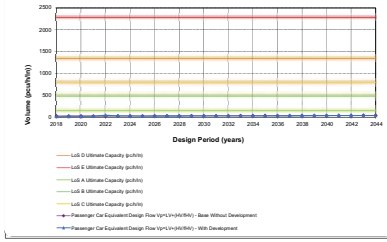
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	2	2	2	2	20	6	9	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section	Between Croppa Moree Road and Gil Gil Creek Road
Route	County Boundary Road
Link Locality:	

County Boundary Road - Between Croppa Moree Road and Gil Gil Creek Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

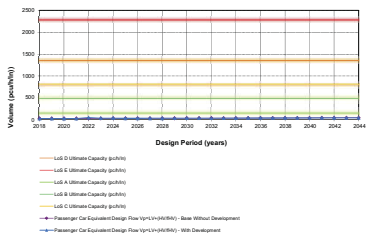
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	26	44	30	34	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	Between Croppa Moree Road and Gil Gil Creek Road
Route	County Boundary Road
Link Locality:	

County Boundary Road - Between Croppa Moree Road and Gil Gil Creek Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

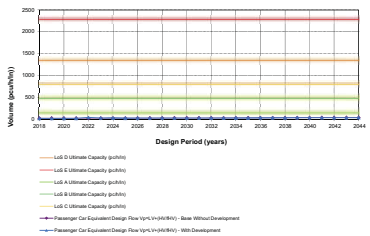
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	27	45	31	35	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between I B Bore Road and Croppa Moree Road**
Route	**Croppa Creek Road**
Link Locality:	

Croppa Creek Road - Between I B Bore Road and Croppa Moree Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

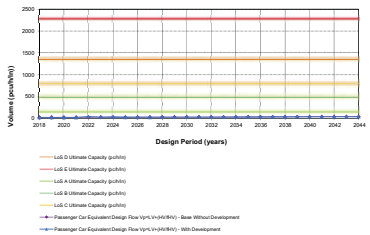
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	24	25	25	26	44	30	34	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between I B Bore Road and Croppa Moree Road**
Route	**Croppa Creek Road**
Link Locality:	

Croppa Creek Road - Between I B Bore Road and Croppa Moree Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	25	25	26	27	45	31	35	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

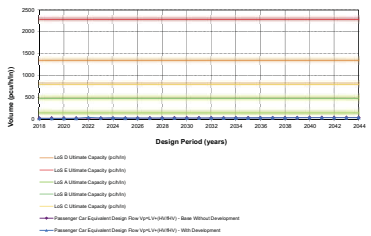
Not Done Yet

Section: Between Croppa Creek Road and County Boundary Road
Route: Croppa Moree Road
Link Locality:

Croppa Moree Road - Between Croppa Creek Road and County Boundary Road — Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

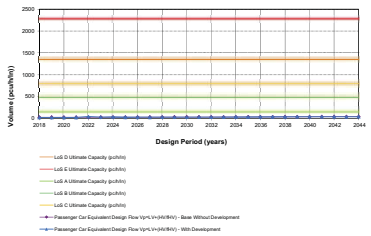
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)	1	1	0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	24	25	25	26	44	30	34	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section: Between Croppa Creek Road and County Boundary Road
Route: Croppa Moree Road
Link Locality:

Croppa Moree Road - Between Croppa Creek Road and County Boundary Road — Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	22	22	23	23	24	24	25	25	26	26	27	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

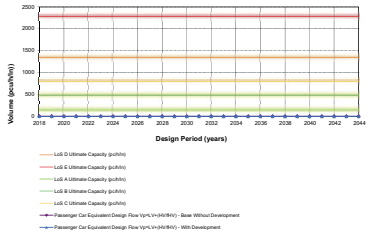
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240	240
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)	1	1	0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	25	25	26	27	45	31	35	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Btwn North Star Road and Forest Creek Road Borrow Pit**
Route	**Forest Creek Road**
Link Locality:	

Forest Creek Road - Btwn North Star Road and Forest Creek Road Borrow Pit — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

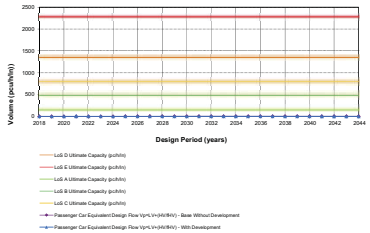
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Development Traffic (veh/h)			0	3	3	0	0	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	2	2	2	6	6	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section	**Btwn North Star Road and Forest Creek Road Borrow Pit**
Route	**Forest Creek Road**
Link Locality:	

Forest Creek Road - Btwn North Star Road and Forest Creek Road Borrow Pit — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

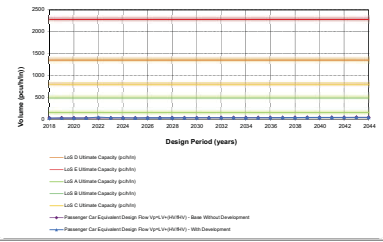
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
Development Traffic (veh/h)			0	3	3	0	0	0																			
Passenger Car Equivalent Design Flow Vp=L/V=(HV/fHV) - With Development	2	2	2	6	7	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section	**Between County Boundary Road and Johnston Borrow Pit Access**
Route	**Gil Gil Creek Road**
Link Locality:	

Gil Gil Creek Road - Between County Boundary Road and Johnston Borrow Pit Acces Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

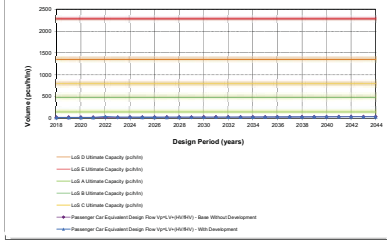
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	26	44	30	34	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between County Boundary Road and Johnston Borrow Pit Access**
Route	**Gil Gil Creek Road**
Link Locality:	

Gil Gil Creek Road - Between County Boundary Road and Johnston Borrow Pit Acces Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

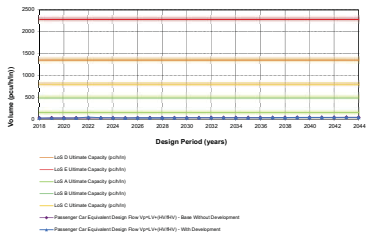
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	8	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	27	45	31	35	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	Between Edwards Street and Croppa Creek Road
Route	I B Bore Road
Link Locality:	

I B Bore Road - Between Edwards Street and Croppa Creek Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

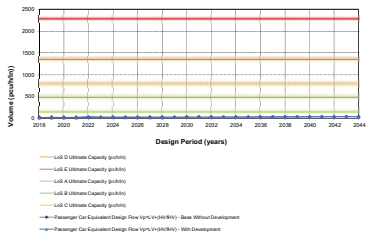
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	26	44	30	34	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	Between Edwards Street and Croppa Creek Road
Route	I B Bore Road
Link Locality:	

I B Bore Road - Between Edwards Street and Croppa Creek Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



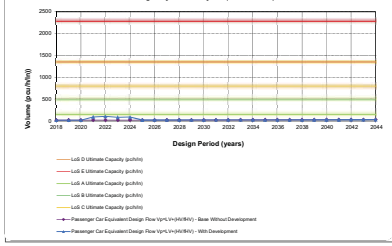
Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	0	12	2	5	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	27	45	31	35	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between MPSC Council Boundary and Edwards Street**
Route	**North Star Road**
Link Locality:	

North Star Road - Between MPSC Council Boundary and Edwards Street — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	20	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	25	25	26	27	
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	25	25	26	27	
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01



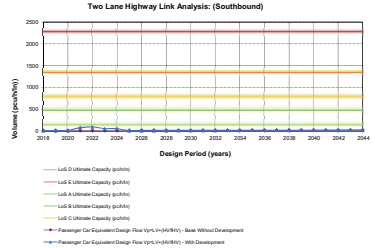
Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	25	25	26	27	
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
Development Traffic (veh/h)			0	47	59	44	46	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	18	18	18	89	107	85	89	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.04	0.05	0.04	0.04	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	**Between MPSC Council Boundary and Edwards Street**
Route	**North Star Road**
Link Locality:	

North Star Road - Between MPSC Council Boundary and Edwards Street — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	6	6	6	6	6	6	6	6	6	6	6	6	6	7	
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

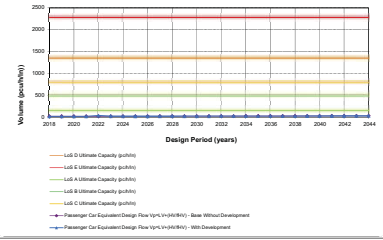
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	6	6	6	6	6	6	6	6	6	6	6	6	6	7	
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Development Traffic (veh/h)			0	47	59	44	46	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	17	17	17	88	106	62	65	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.04	0.05	0.03	0.03	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	**Between Getta Getta Rd and Warialda Road**
Route	**North Star Road**
Link Locality:	

North Star Road - Between Getta Getta Rd and Warialda Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

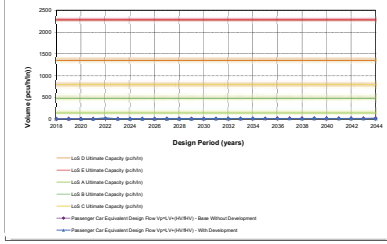
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
Development Traffic (veh/h)			0	0	12	1	1	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	18	18	18	19	37	21	22	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	**Between Getta Getta Rd and Warialda Road**
Route	**North Star Road**
Link Locality:	

North Star Road - Between Getta Getta Rd and Warialda Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	16	16	16	17	17	17	18	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

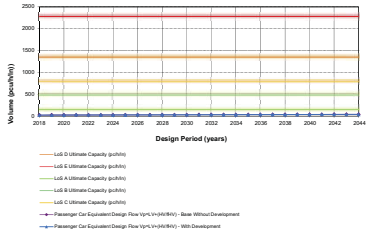
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	16	16	16	17	17	17	18	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Development Traffic (veh/h)			0	0	12	1	1	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	17	17	17	18	36	20	20	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	**Between North Star Road and Hohns Road**
Route	**Scotts Road**
Link Locality:	

Scotts Road - Between North Star Road and Hohns Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

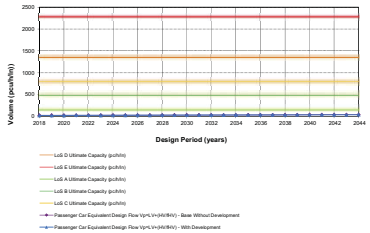
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	4	4	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	31	32	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between North Star Road and Hohns Road**
Route	**Scotts Road**
Link Locality:	

Scotts Road - Between North Star Road and Hohns Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

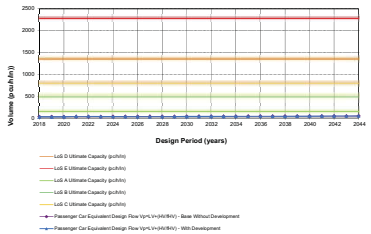
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	10	10	
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	4	4	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	32	33	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Newell Highway and Tucka Tucka Road**
Route	**Bruxner Way**
Link Locality:	

Bruxner Way - Between Newell Highway and Tucka Tucka Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	231	236	240	245	250	255	260	265	271	276	282	287	293	299	305	311	317	323	330	337	343	350	357	364	372	379	387
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

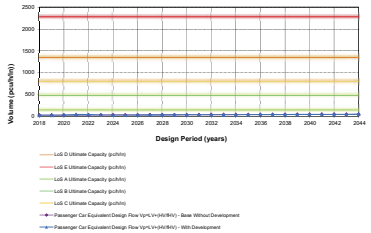
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Average Annual Daily Traffic (AADT)	231	236	240	245	250	255	260	265	271	276	282	287	293	299	305	311	317	323	330	337	343	350	357	364	372	379	387
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
Development Traffic (veh/h)			0	8	8	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	28	29	29	41	42	32	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Newell Highway and Tucka Tucka Road**
Route	**Bruxner Way**
Link Locality:	

Bruxner Way - Between Newell Highway and Tucka Tucka Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

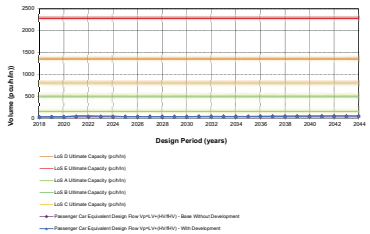
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
Development Traffic (veh/h)			0	8	8	1	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	30	30	31	43	44	34	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Tucka Tucka Road and North Star Road**
Route	**Bruxner Way**
Link Locality:	

Bruxner Way - Between Tucka Tucka Road and North Star Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	33	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

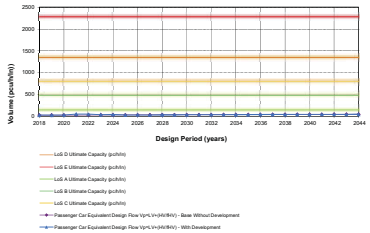
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	6	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9
Total vehicles (veh/h)	25	26	26	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42	43
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20
Average Annual Daily Traffic (AADT)	231	236	240	245	250	255	260	265	271	276	282	287	293	299	305	311	317	323	330	337	343	350	357	364	372	379	387
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - Base Without Development	28	29	29	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
Development Traffic (veh/h)			0	13	13	8	9	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - With Development	28	29	29	49	50	43	45	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Tucka Tucka Road and North Star Road**
Route	**Bruxner Way**
Link Locality:	

Bruxner Way - Between Tucka Tucka Road and North Star Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

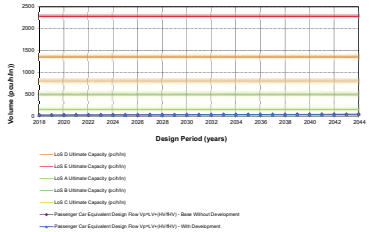
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Light Vehicle Volume (veh/h)	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	33	34
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484	484
LoS C Ultimate Capacity (pc/h/ln)	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792	792
LoS D Ultimate Capacity (pc/h/ln)	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342	1342
LoS E Ultimate Capacity (pc/h/ln)	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288	2288
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10	10	10	10
Total vehicles (veh/h)	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	37	37	38	39	40	40	41	42	43	44	45
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	242	247	252	257	262	267	273	278	284	289	295	301	307	313	319	326	332	339	346	353	360	367	374	382	389	397	405
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - Base Without Development	30	30	31	32	32	33	33	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
Development Traffic (veh/h)			0	13	13	8	9	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/HV) - With Development	30	30	31	51	52	41	42	34	35	36	36	37	38	38	39	40	41	42	42	43	44	45	46	47	48	49	50
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section Between Hohns Road and Borrow Pit Site 5
Route Hohns Road
Link Locality:

Hohns Road - Between Hohns Road and Borrow Pit Site 5 — Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

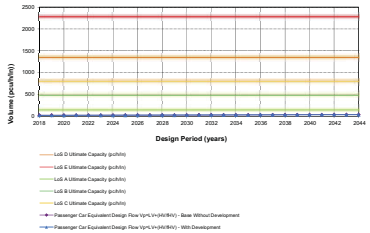
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
Development Traffic (veh/h)			0	4	4	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	31	32	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section Between Hohns Road and Borrow Pit Site 5
Route Hohns Road
Link Locality:

Hohns Road - Between Hohns Road and Borrow Pit Site 5 — Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

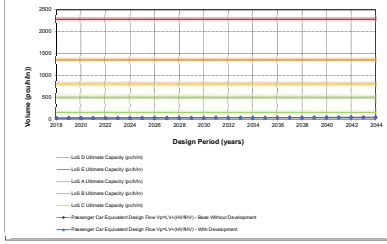
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	4	4	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	32	33	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section Between Newell Highway and Borrow Pit Site 13 Access Road
Route Letter Box Road
Link Locality:

Letter Box Road - Between Newell Highway and Borrow Pit Site 13 Access Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	32	33	34	34	35	36	36	37	38	39	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

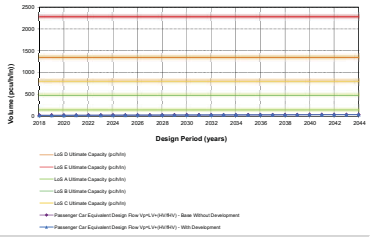
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7	7	7	7	7	7	7	7	8	8	8	8	8
Total vehicles (veh/h)	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30	30	31	31	32	33	33	34	35	35	36
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	24	25	25	26	26	27	27	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	38	39	40	40
Development Traffic (veh/h)			0	2	2	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	24	25	25	29	29	27	27	27	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	38	39	40
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section Between Newell Highway and Borrow Pit Site 13 Access Road
Route Letter Box Road
Link Locality:

Letter Box Road - Between Newell Highway and Borrow Pit Site 13 Access Road — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	6	6	6	6	6	6	7	7	7	7	7	7	7	8	8	8	8	8	8	9	9	9	9	9	9	10	10
Total vehicles (veh/h)	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31	32	33	33	34	35	35	36	37
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	25	25	26	27	27	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
Development Traffic (veh/h)			0	2	2	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	25	25	26	29	30	28	28	29	29	30	30	31	32	32	33	34	34	35	36	36	37	38	39	39	40	41	42
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section Full Extent
Route River Road
Link Locality:

River Road - Full Extent — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84	0.84
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	13	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Northbound)

Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

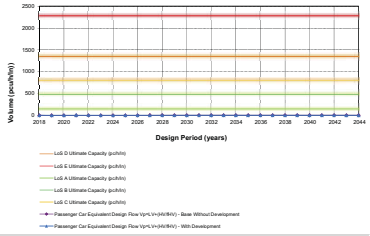
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38	0.38
Average Annual Daily Traffic (AADT)	10	10	10	11	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3
Development Traffic (veh/h)			0	5	5	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	2	2	2	9	9	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section Full Extent
Route River Road
Link Locality:

River Road - Full Extent — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83	0.83
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Design Hour Volume (ADT x 30th Highest Factor)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Light Vehicle Volume (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150	150
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795	795
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280	2280
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Total vehicles (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41	0.41
Average Annual Daily Traffic (AADT)	12	12	12	13	13	13	14	14	14	14	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15	0.15
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
Development Traffic (veh/h)			0	5	5	0	0	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	2	2	2	9	9	2	2	2	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	4	4
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

Section	**Between Bruxner Way to Gwydir Shire Council Boundary**
Route	**Tucka Tucka Road**
Link Locality:	

Tucka Tucka Road - Between Bruxner Way to Gwydir Shire Council Boundary — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
Total vehicles (veh/h)	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96	0.96
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	150	153	156	159	162	166	169	172	176	179	183	187	190	194	198	202	206	210	214	219	223	227	232	237	241	246	251
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Two Lane Highway Link Analysis: (Northbound)

Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

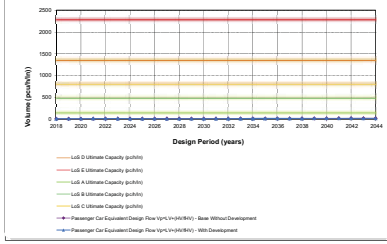
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	1	1	1	1	1	1	1	1	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
Total vehicles (veh/h)	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage (Pt)	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09	0.09
Average Annual Daily Traffic (AADT)	150	153	156	159	162	166	169	172	176	179	183	187	190	194	198	202	206	210	214	219	223	227	232	237	241	246	251
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26
Development Traffic (veh/h)			0	4	4	3	2	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	16	16	16	22	23	21	21	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	**Between Bruxner Way to Gwydir Shire Council Boundary**
Route	**Tucka Tucka Road**
Link Locality:	

Tucka Tucka Road - Between Bruxner Way to Gwydir Shire Council Boundary — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
Total vehicles (veh/h)	14	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94	0.94
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	14	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

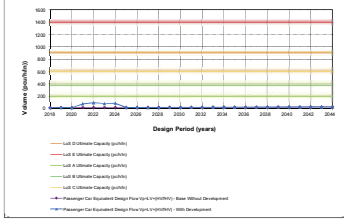
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Light Vehicle Volume (veh/h)	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250	250
LoS B Ultimate Capacity (pc/h/ln)	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480	480
LoS C Ultimate Capacity (pc/h/ln)	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790	790
LoS D Ultimate Capacity (pc/h/ln)	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350	1350
LoS E Ultimate Capacity (pc/h/ln)	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290	2290
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	3	3	3	3	3	3	3	3	3
Total vehicles (veh/h)	14	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12	0.12
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26
Development Traffic (veh/h)			0	4	4	3	2	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	15	16	16	22	22	19	19	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01

Section	Between North Star Road and I B Bore Road
Route	Edwards Street
Link Locality:	

Edwards Street - Between North Star Road and I B Bore Road — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

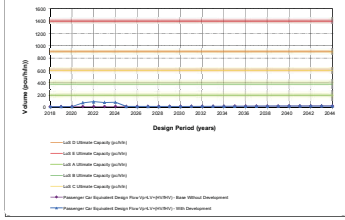
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
Development Traffic (veh/h)	0	0	0	60	52	44	46	0																			
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - With Development	18	18	18	79	97	85	89	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.06	0.07	0.06	0.06	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	Between North Star Road and I B Bore Road
Route	Edwards Street
Link Locality:	

Edwards Street - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	2	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Development Traffic (veh/h)	0	0	0	60	52	44	46	0																			
Passenger Car Equivalent Design Flow Vp=L*(HV/fHV) - With Development	17	17	17	78	96	84	88	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.06	0.07	0.06	0.06	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

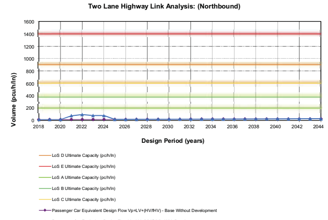
Section	Between Edwards St and Getta Getta Rd
Route	North Star Road
Link Locality:	

North Star Road - Between Edwards St and Getta Getta Rd

Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Design Hour Volume (ADT x 30th Highest Factor)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18	19	19	19	20	20	20
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6
Total vehicles (veh/h)	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24	25	25	26	27
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23	0.23
Average Annual Daily Traffic (AADT)	144	147	150	153	156	159	162	165	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11	0.11
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	18	18	18	19	19	19	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
Development Traffic (veh/h)			0	40	52	41	41	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	18	18	18	79	97	81	82	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	30
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.06	0.07	0.06	0.06	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

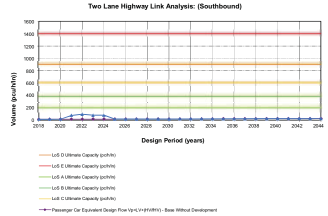
Section	Between Edwards St and Getta Getta Rd
Route	North Star Road
Link Locality:	

North Star Road - Between Edwards St and Getta Getta Rd

Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Heavy vehicle factor fHV=1/(1+Pt*(Et-1))	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88	0.88
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Design Hour Volume (ADT x 30th Highest Factor)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

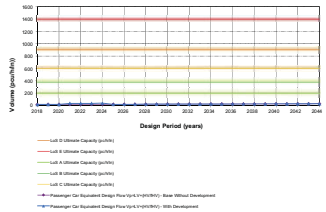
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	11	11	11	11	12	12	12	12	13	13	13	13	14	14	14	15	15	15	15	16	16	16	17	17	17	18	18
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
LoS A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
LoS B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
LoS C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
LoS D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
LoS E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	7
Total vehicles (veh/h)	15	15	15	16	16	16	17	17	17	18	18	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27	0.27
Average Annual Daily Traffic (AADT)	147	150	153	156	159	162	166	169	172	176	179	183	186	190	194	198	202	206	210	214	218	223	227	232	236	241	246
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10	0.10
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - Base Without Development	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
Development Traffic (veh/h)			0	40	52	41	41	0																			
Passenger Car Equivalent Design Flow Vp=LV+(HV/fHV) - With Development	17	17	17	78	96	80	81	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.06	0.07	0.06	0.06	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Bruxner Way and Gwydir Shine Council boundary**
Route	**North Star Road**
Link Locality:	

North Star Road - Between Bruxner Way and Gwydir Shire Council boundary — **Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
Lnk A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
Lnk B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
Lnk C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
Lnk D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
Lnk E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	3	3	3	3	3	3	3	3	3	3	3	3	4	4	4	4	4	4	4	4	4	4	4	4	4	5	5
Total vehicles (veh/h)	17	18	18	18	19	19	20	20	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16
Heavy vehicle factor fhv=1/(1+Pt*(Et-1))	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93	0.93
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	134	137	139	142	145	148	151	154	157	160	163	167	170	173	177	180	184	188	191	195	199	203	207	211	216	220	224
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
Design Hour Volume (ADT x 30th Highest Factor)	17	18	18	18	19	19	20	20	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - Base Without Development	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.01	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Northbound)



Northbound - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

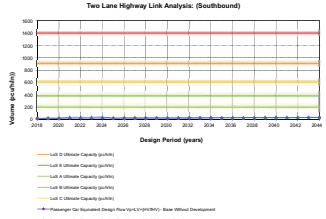
Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	15	15	15	16	16	16	16	17	17	17	18	18	19	19	19	20	20	20	21	21	22	22	23	23	24	24	24
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
Lnk A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
Lnk B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
Lnk C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
Lnk D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
Lnk E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	3	3	3	3	3	3	3	3	3	3	3	3	4	4	4	4	4	4	4	4	4	4	4	4	4	5	5
Total vehicles (veh/h)	17	18	18	18	19	19	20	20	20	21	21	22	22	23	23	23	24	24	25	25	26	26	27	27	28	29	29
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16	0.16
Average Annual Daily Traffic (AADT)	134	137	139	142	145	148	151	154	157	160	163	167	170	173	177	180	184	188	191	195	199	203	207	211	216	220	224
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - Base Without Development	19	19	20	20	20	21	21	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31
Development Traffic (veh/h)			0	11	11	11	12	0																			
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - With Development	19	19	20	37	37	37	40	22	22	22	23	23	24	24	25	25	26	26	27	27	28	29	29	30	30	31	31
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.01	0.03	0.03	0.03	0.03	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Section	**Between Bruxner Way and Gwydir Shine Council boundary**
Route	**North Star Road**
Link Locality:	

North Star Road - Between Bruxner Way and Gwydir Shire Council boundary — **Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions Without Development Traffic**

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	14	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
Lnk A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
Lnk B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
Lnk C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
Lnk D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
Lnk E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	6
Total vehicles (veh/h)	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	28	28	29	29	30	30	31
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21
Heavy vehicle factor fhv=1/(1+Pt*(Et-1))	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91	0.91
Driver population (fp)	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Average Annual Daily Traffic (AADT)	141	144	147	150	153	156	159	162	165	169	172	175	179	182	186	190	194	197	201	205	210	214	218	222	227	231	236
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
Design Hour Volume (ADT x 30th Highest Factor)	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	28	28	29	29	30	31	31
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - Base Without Development	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

Two Lane Highway Link Analysis: (Southbound)



Southbound Direction - Two Lane Highway level Terrain Link Analysis: Base Conditions With Development Traffic

Year of Analysis	2018	2019	2020	2021	2022	2023	2024	2025	2026	2027	2028	2029	2030	2031	2032	2033	2034	2035	2036	2037	2038	2039	2040	2041	2042	2043	2044
Ultimate Link Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Light Vehicle Volume (veh/h)	14	15	15	15	16	16	16	17	17	17	18	18	18	19	19	20	20	20	21	21	22	22	22	23	23	24	24
Terrain Type (L = Level, R = Rolling, M = Mountainous)	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L	L
Lnk A Ultimate Capacity (pc/h/ln)	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200	200
Lnk B Ultimate Capacity (pc/h/ln)	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380	380
Lnk C Ultimate Capacity (pc/h/ln)	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600	600
Lnk D Ultimate Capacity (pc/h/ln)	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900	900
Lnk E Ultimate Capacity (pc/h/ln)	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400	1400
Number of lanes	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
Number of trucks (veh/h)	4	4	4	4	4	4	4	4	4	5	5	5	5	5	5	5	5	5	6	6	6	6	6	6	6	6	6
Total vehicles (veh/h)	18	19	19	19	20	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	28	28	29	29	30	30	31
Passenger car equivalent (Et)	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5	1.5
Percentage Trucks (Pt)	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21	0.21
Average Annual Daily Traffic (AADT)	141	144	147	150	153	156	159	162	165	169	172	175	179	182	186	190	194	197	201	205	210	214	218	222	227	231	236
Peak Hour Factor	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95	0.95
K-value (30th Highest / AADT)	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13	0.13
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - Base Without Development	20	21	21	21	22	22	23	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
Development Traffic (veh/h)			0	11	11	11	12	0																			
Passenger Car Equivalent Design Flow Vp=L*V=(HV/RH) - With Development	20	21	21	38	39	39	41	23	24	24	25	25	26	26	27	27	28	28	29	29	30	31	31	32	33	33	34
LoS Result	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A	A
Volume to Capacity Ratio (V/C)	0.01	0.01	0.02	0.03	0.03	0.03	0.03	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02	0.02

APPENDIX M

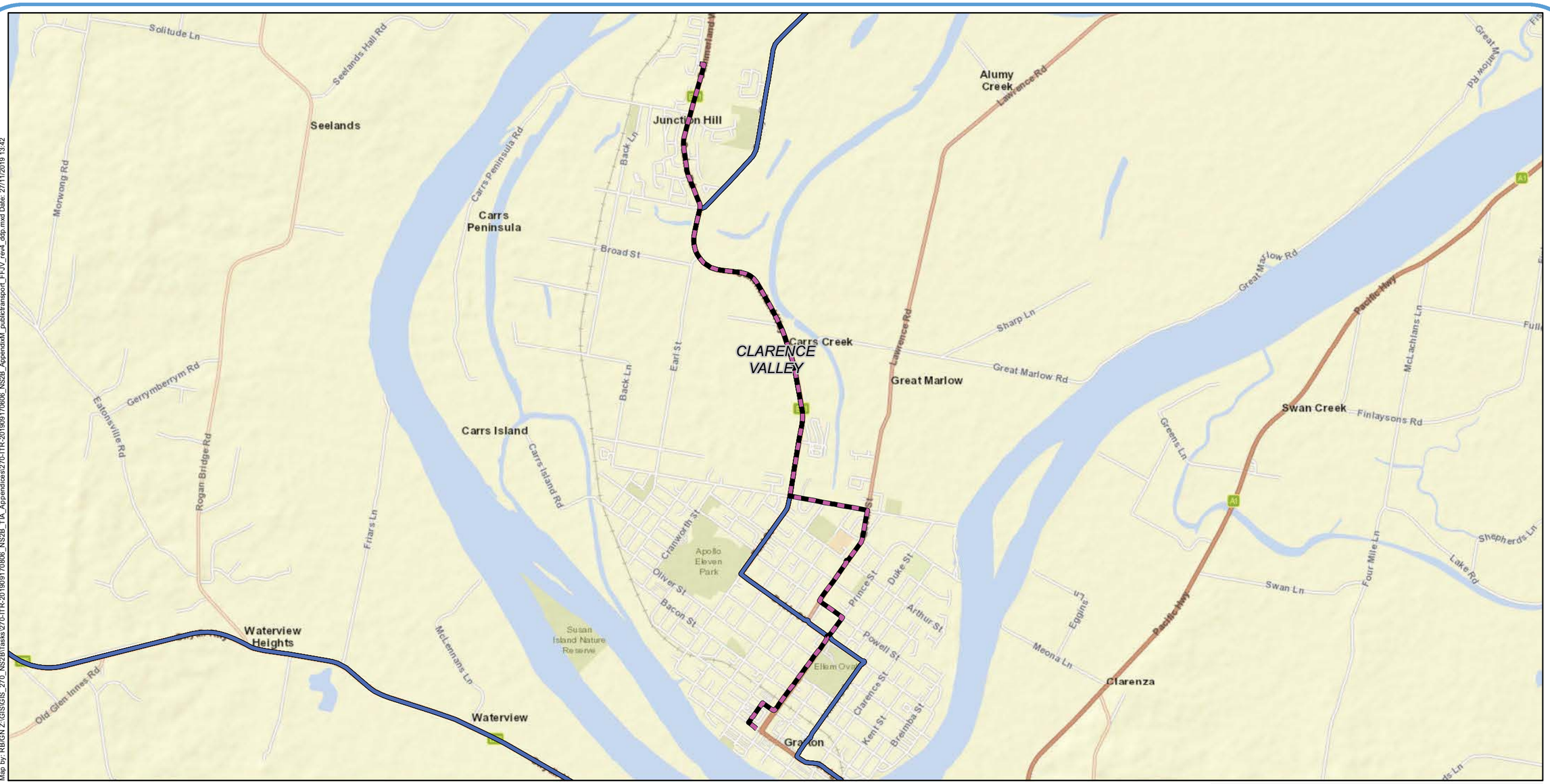
Traffic Impact Assessment

Appendix M Public Transport and Principal Cycle Network Plan Maps

NORTH STAR TO NSW/QUEENSLAND BORDER ENVIRONMENTAL IMPACT STATEMENT

The Australian Government is delivering Inland Rail through the Australian Rail Track Corporation (ARTC), in partnership with the private sector.

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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Legend

- Route 377
- Overall construction routes
- Local Government Areas

A3 scale: 1:40,000

0 0.4 0.8 1.2 1.6 2km

Future Freight
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Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

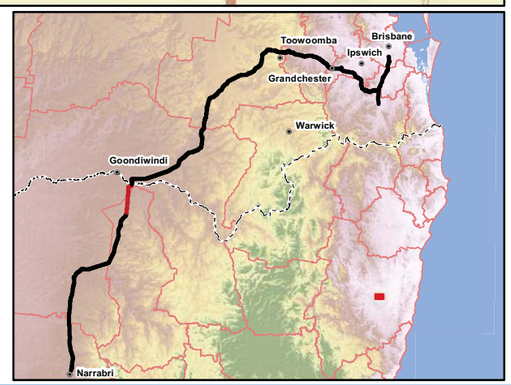
Appendix M: Route 377 - Conflicting with Summerland Way

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: RB/GN Z:\GIS\GIS_270_NS2BITasks\270-ITR-20190917080606_NS2B_AppendixM_publictransport_FFJV_rev4_ddp.mxd Date: 27/11/2019 13:42

Legend

- Route 375C
- Overall construction routes
- Local Government Areas



A3 scale: 1:20,000

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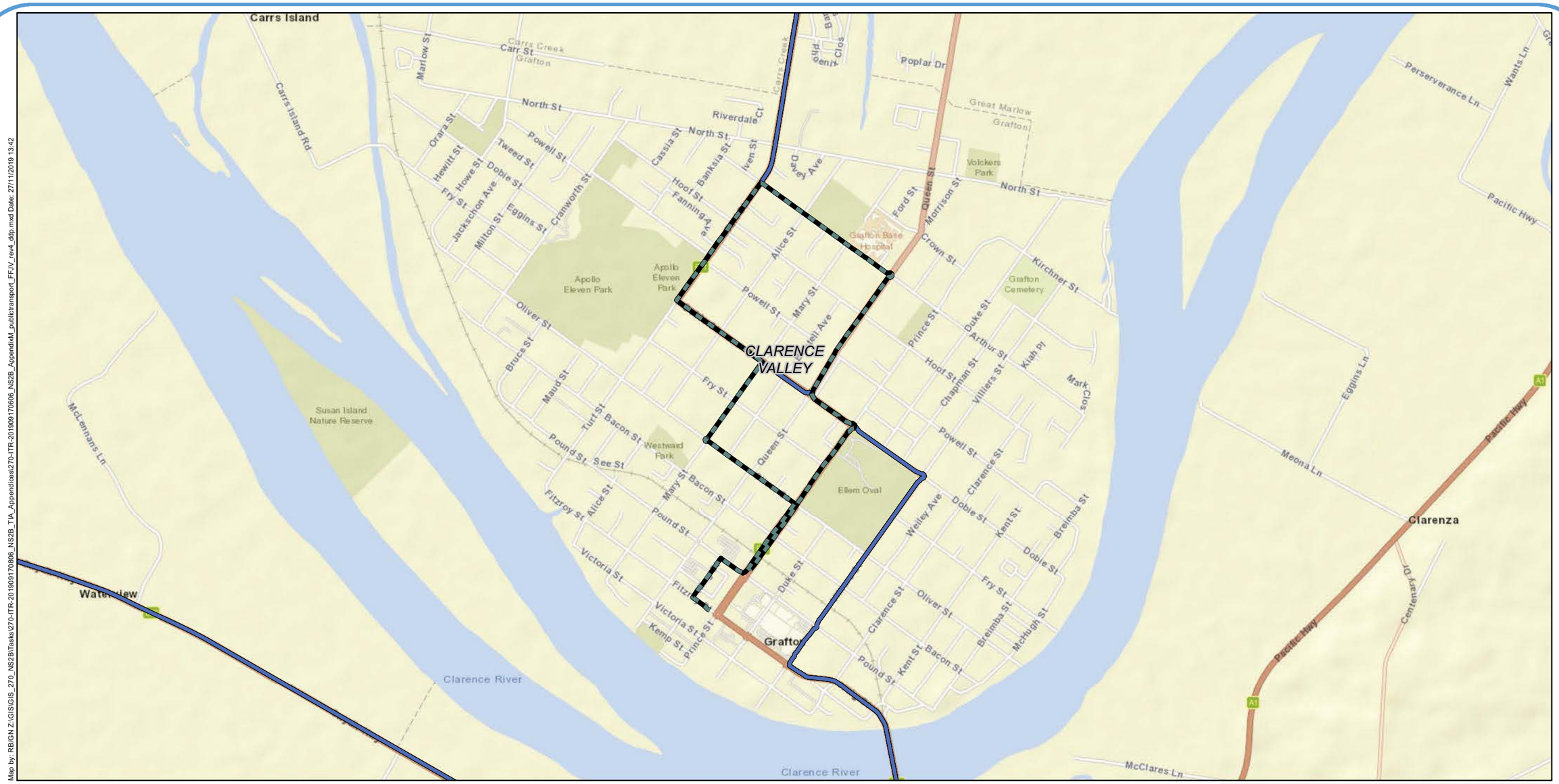
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border

Appendix M: Route 375C - Conflicting with Turf Street

Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community



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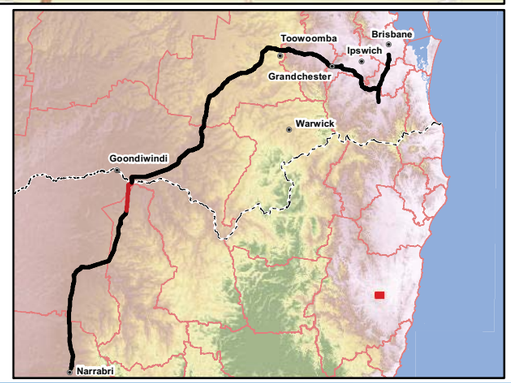
Legend

- Route 376
- Overall construction routes
- Local Government Areas



A3 scale: 1:20,000

0 0.2 0.4 0.6 0.8 1km

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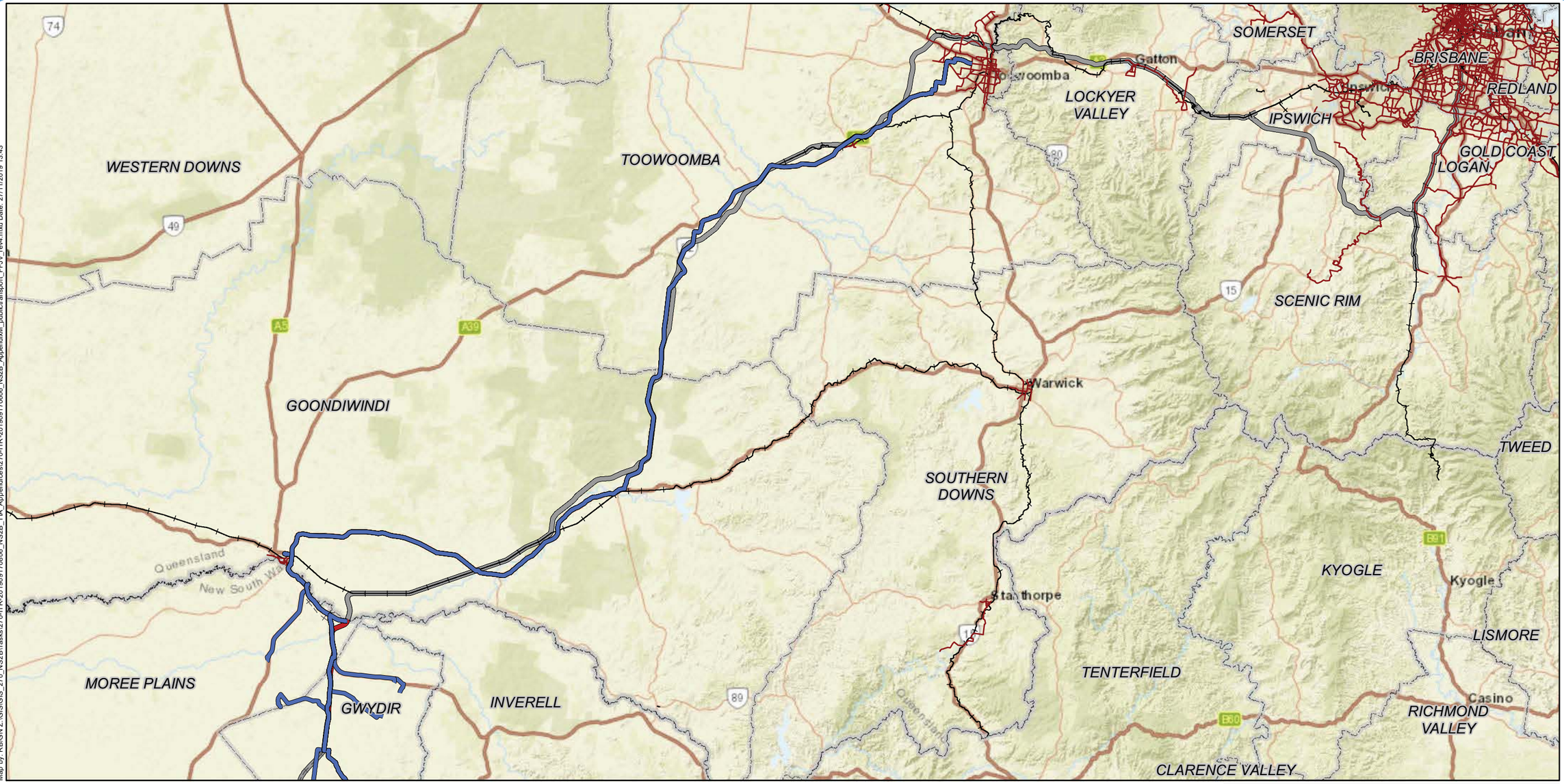
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix M: Route 376

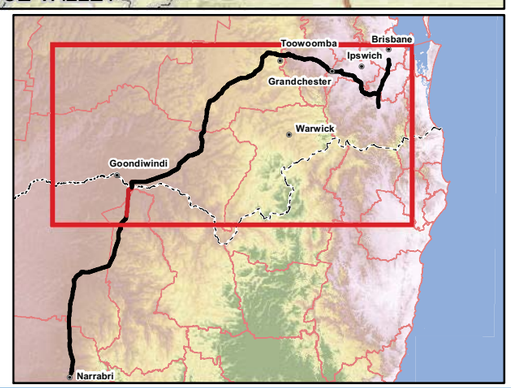
Service Layer Credits: Sources: Esri, HERE, Garmin, USGS, Intermap, INCREMENT P, NRCan, Esri Japan, METI, Esri China (Hong Kong), Esri Korea, Esri (Thailand), NGCC, (c) OpenStreetMap contributors, and the GIS User Community

Map by: RB/GN Z:\GIS\GIS_270_NS2BTasks\270-ITR-20190917080 6_NS2B_TIA_Appendices\270-ITR-20190917080 6_NS2B_AppendixM_publictransport_FFJV_rev4.mxd Date: 27/11/2019 13:43



Legend

- Overall construction routes
- Principal_Cycle_Network
- Existing rail (operational)
- Existing rail (non-operational)
- Adjoining alignments
- North Star to NSW/QLD border alignment
- Local Government Areas



A3 scale: 1:950,000

0 10 20 30 40 50 km

Future Freight
Integrating Community, Environment and Engineering

Issue date: 27/11/2019 Version: 4
Coordinate System: GDA 1994 MGA Zone 56

North Star to NSW/QLD border
Appendix M: Proposed cycling network