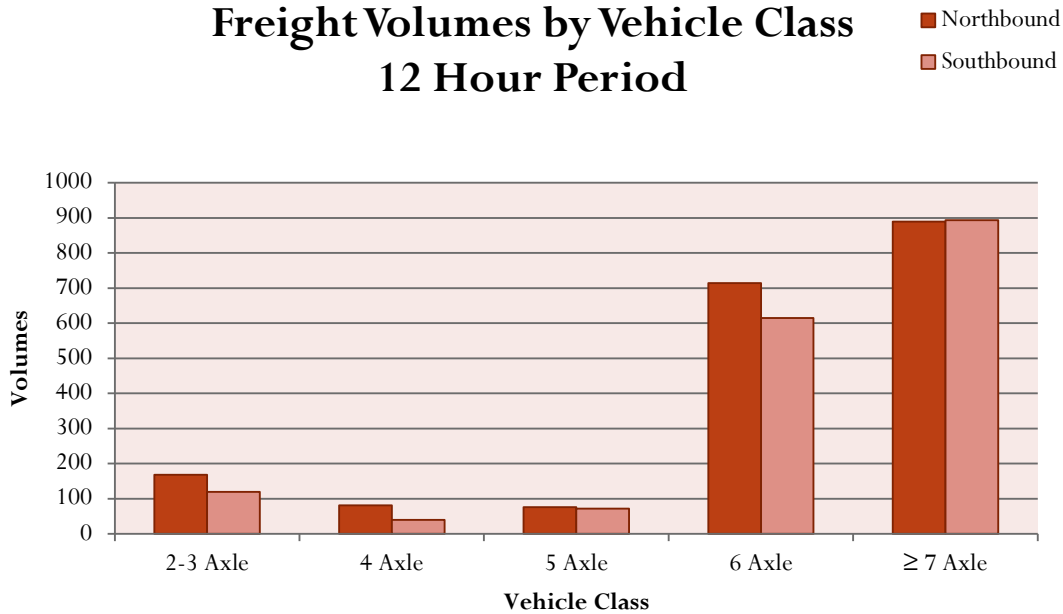


TRAFFIC HIGHLIGHTS OF SITE 2180			
1.1	Site Identifier	2180	
1.2	Site Name	Tugela Plaza 1	
1.3	Site Description	Between Winterton I/C and Keeversfontein I/C	
1.4	Road Description	Route : N003 Road : N003 Section : 06 Distance : 33.8km	
1.5	GPS Position	29 34 15.8E -28 28 19.6S	
1.6	Number of Lanes	4	
1.7	Station Type	Permanent Toll	
1.8	Requested Period	2022 01 01 - 2022 12 31	
1.9	Length of record requested (hours)	8760	
1.10	Actual First & Last Dates	2022 01 01 - 2022 01 31	
1.11	Actual available good data (hours)	744	
1.12	Percentage good data available for requested period	8.5	
		To Johannesburg	Total
2.1a	Total number of vehicles (counted)	234326	411131
2.1b	Total number of vehicles (projected for period)	2759000	4840736
2.2	Average daily traffic (ADT)	7559	13262
2.3	Average daily truck traffic (ADTT)	3059	6002
2.4	Percentage of trucks	40.5	45.3
2.5	Truck split % (short:medium:long)	5 : 11 : 84	5 : 12 : 83
2.6	Percentage of night traffic (20:00 - 06:00)	21.0	23.1
3.1	Speed limit (km/hr)		120
3.2	Average speed (km/hr)	90.4	89.8
3.3	Average speed - light vehicles (km/hr)	101.8	104.0
3.4	Average speed - heavy vehicles (km/hr)	73.7	72.8
3.5	Average night speed (km/hr)	80.8	80.9
3.6	15th centile speed (km/hr)	71.9	68.9
3.7	85th centile speed (km/hr)	111.0	113.0
3.8	Percentage vehicles in excess of speed limit	3.4	5.8
4.1	Percentage vehicles in flows over 600 vehicles/hr	28.3	54.9
4.2	Highest volume on the road (vehicles/hr)	2022 01 02 14:00:00	2162
4.3	Highest volume in the North-West (vehs/hr)	2022 01 02 15:00:00	1688
4.4	Highest volume in the South-East (vehs/hr)	2022 01 03 11:00:00	641
4.5	Highest volume in a lane (vehicles/hr)	2022 01 02 15:00:00	1033
4.6	15th highest volume on the road (vehicles/hr)	2022 01 08 14:00:00	1620
4.7	15th highest volume in the North-West direction (vehs/hr)	2022 01 09 16:00:00	1178
4.8	15th highest volume in the South-East direction (vehs/hr)	2022 01 28 17:00:00	477
4.9	30th highest volume on the road (vehicles/hr)	2022 01 05 14:00:00	1337
4.10	30th highest volume in the North-West direction (vehs/hr)	2022 01 08 11:00:00	945
4.11	30th highest volume in the South-East direction (vehs/hr)	2022 01 28 18:00:00	427
5.1	Percentage of vehicles less than 2s behind vehicle ahead		
6.1	Total number of heavy vehicles (projected for period)	1116629	2190589
6.2	Estimated average number of axles per truck	6.5	6.5
6.3	Estimated truck mass (Ton/truck)	37.3	37.3
6.4	Estimated average E80/truck	2.1	2.1
6.5	Estimated daily E80 on the road		12410
6.6	Estimated daily E80 in the North-West direction		6308
6.7	Estimated daily E80 in the South-East direction		6102
6.8	Estimated daily E80 in the worst North-West lane		5757
6.9	Estimated daily E80 in the worst South-East lane		5465
6.10	ASSUMPTION on Axles/Truck (Short:Medium:Long)		(2.0 : 5.0 : 7.0)
6.11	ASSUMPTION on Mass/Truck (Short:Medium:Long)		(10.9 : 31.5 : 39.8)
6.12	ASSUMPTION on E80s/Truck (Short:Medium:Long)		(0.6 : 2.5 : 2.1)

Tugela (Johannesburg to Ladysmith)

Date: 08-06-2023

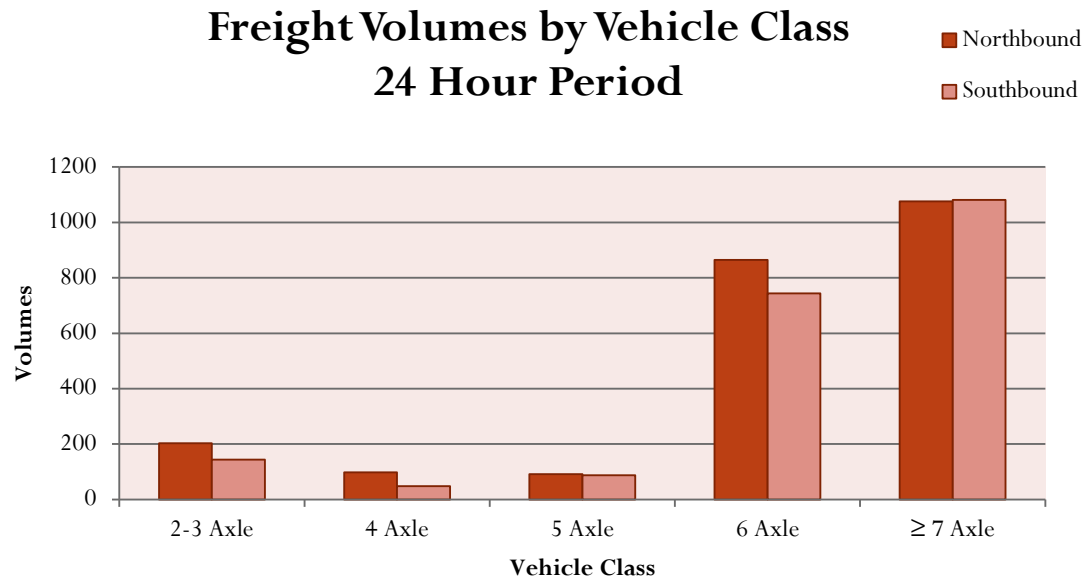
Freight Volumes by Vehicle Class 12 Hour Period



Tugela (Johannesburg to Ladysmith)

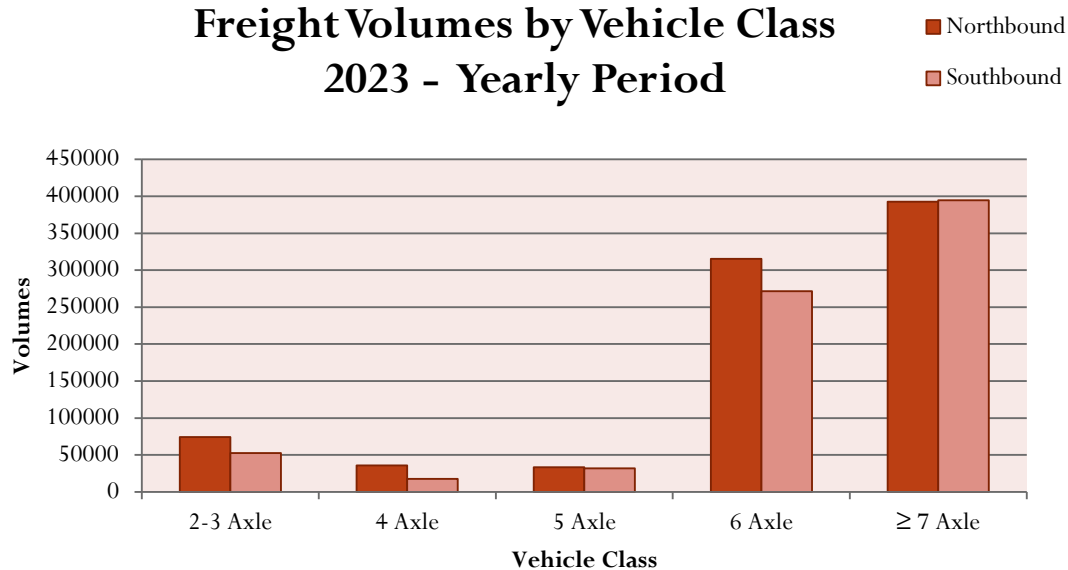
Date: 08-06-2023

Freight Volumes by Vehicle Class 24 Hour Period



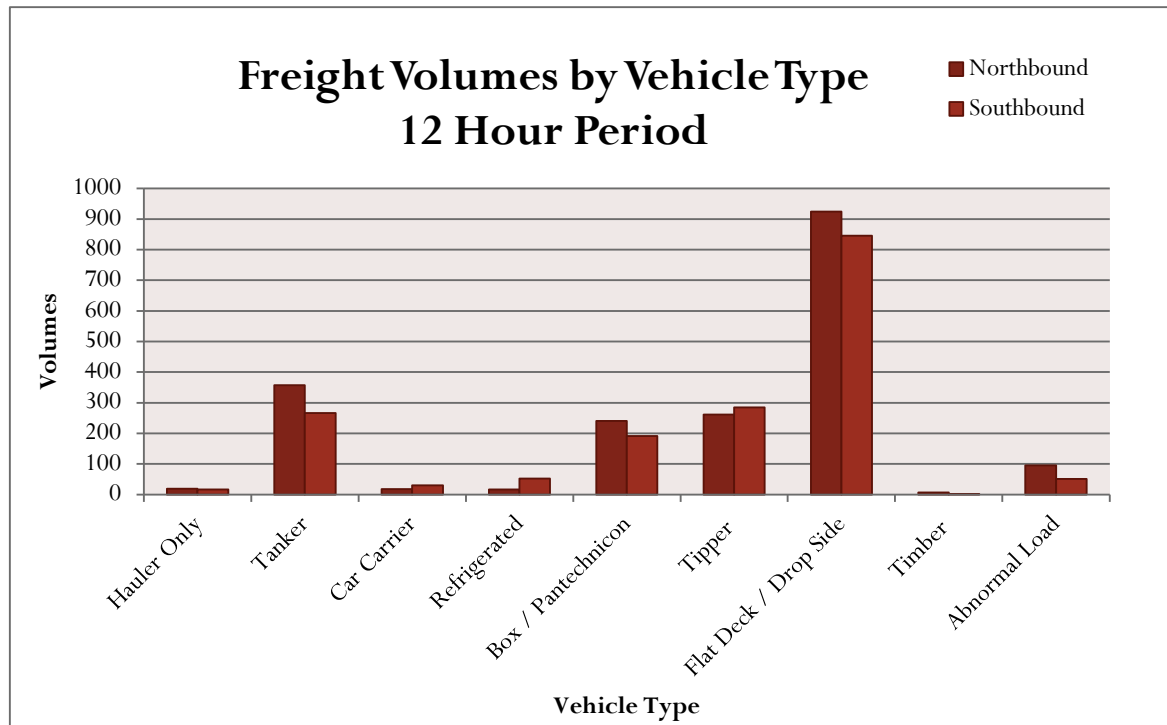
Tugela (Johannesburg to Ladysmith)

Freight Volumes by Vehicle Class 2023 - Yearly Period



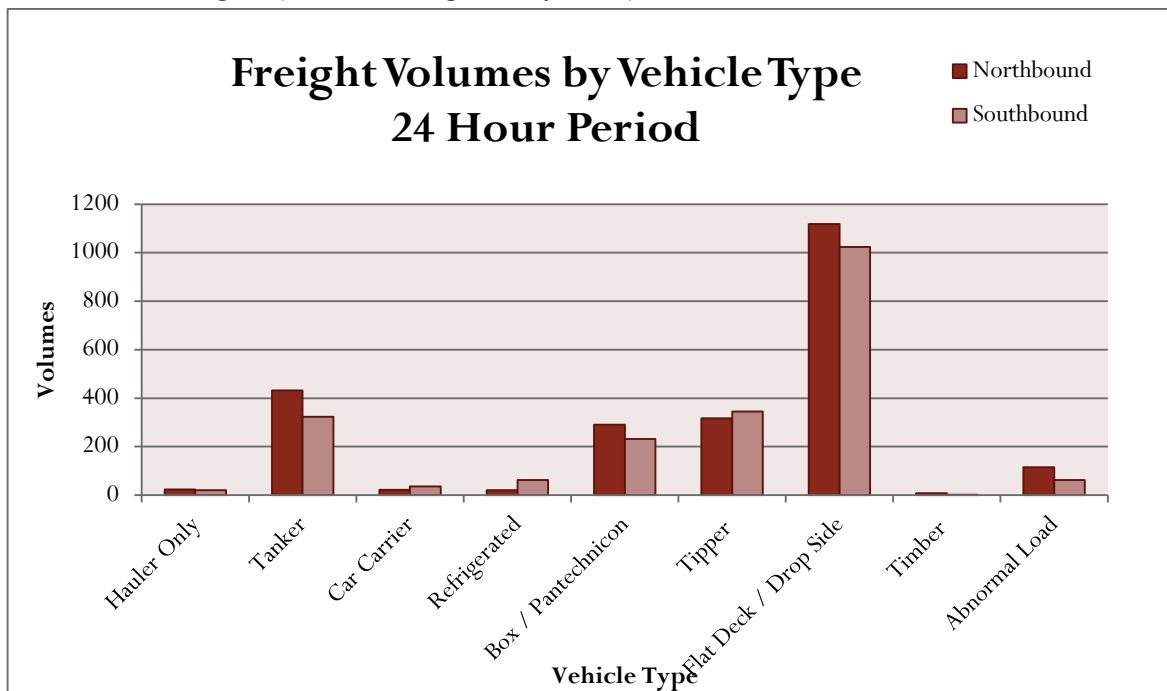
Tugela (Johannesburg to Ladysmith)

Date: 08-06-2023

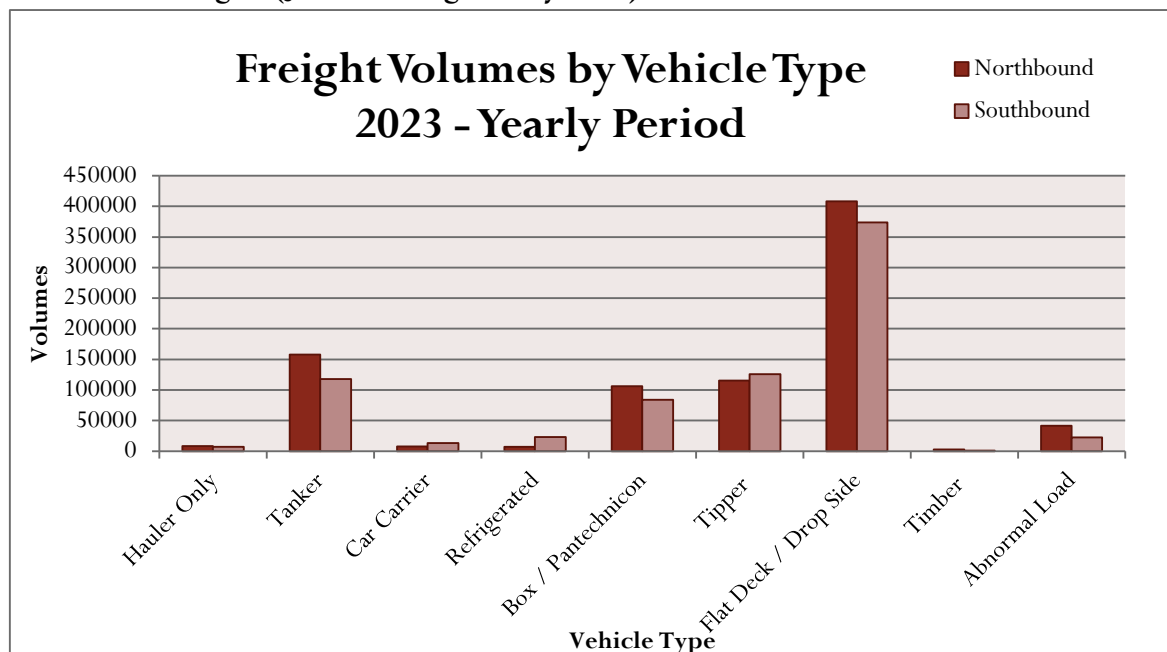


Tugela (Johannesburg to Ladysmith)

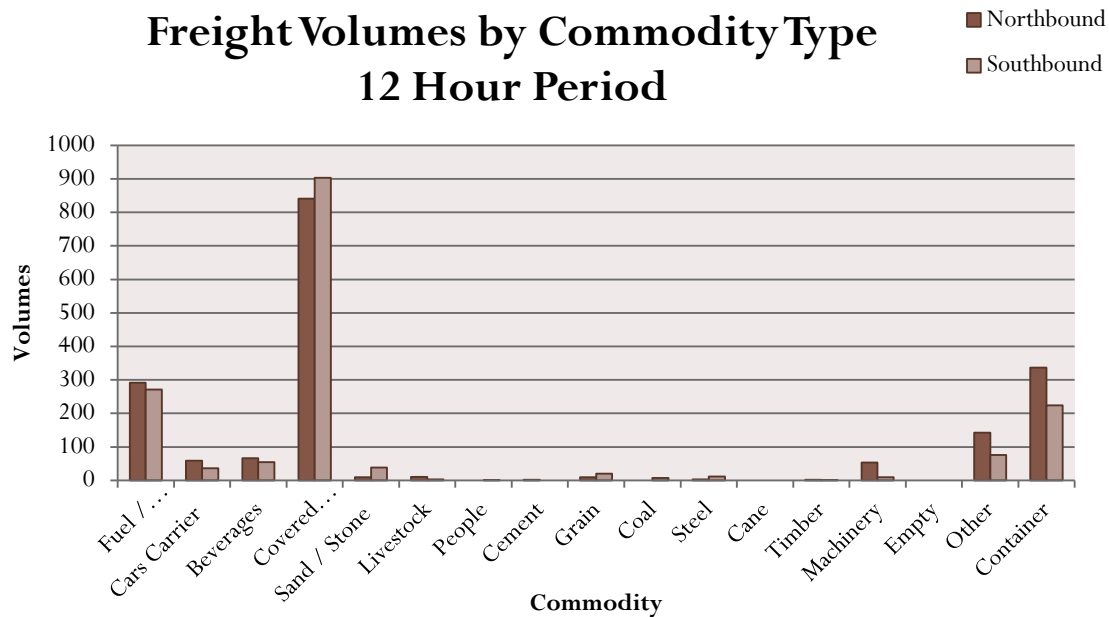
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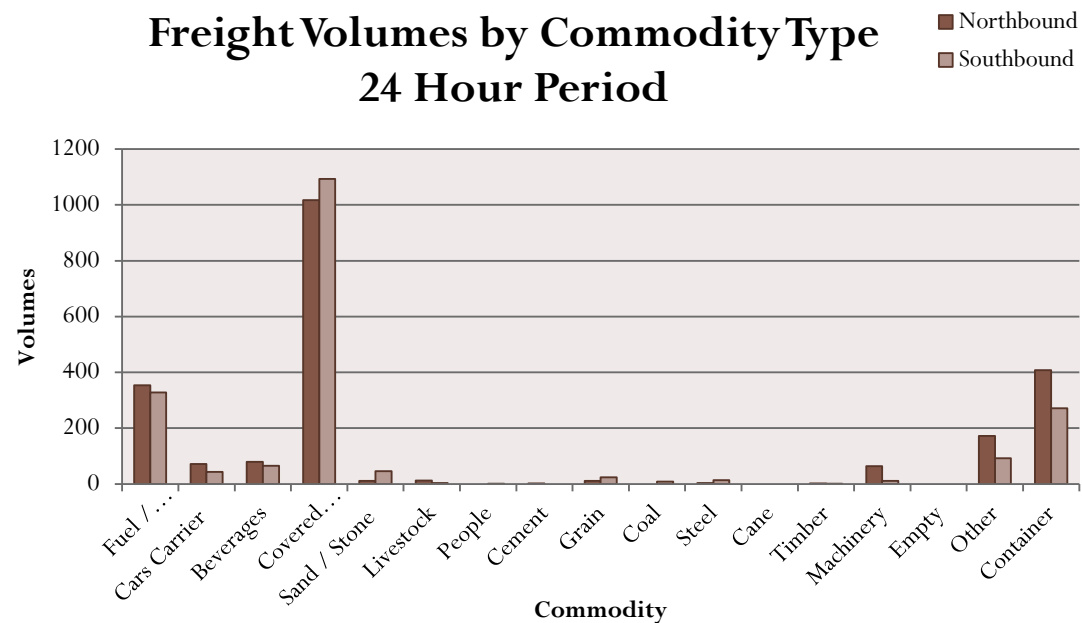
Tugela (Johannesburg to Ladysmith)



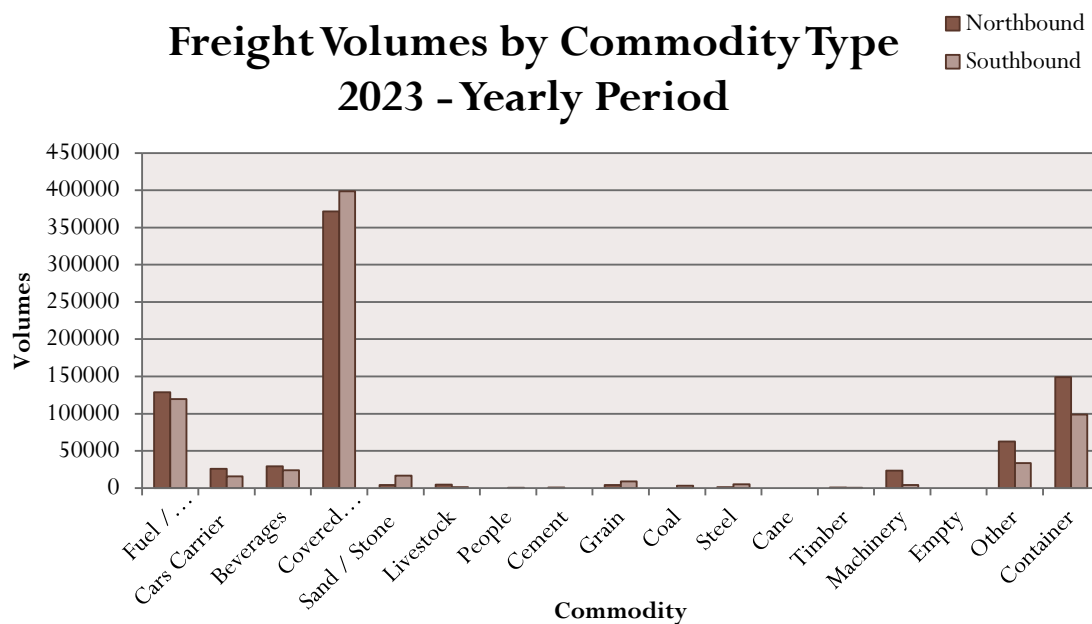
Freight Volumes by Commodity Type 12 Hour Period



Freight Volumes by Commodity Type 24 Hour Period

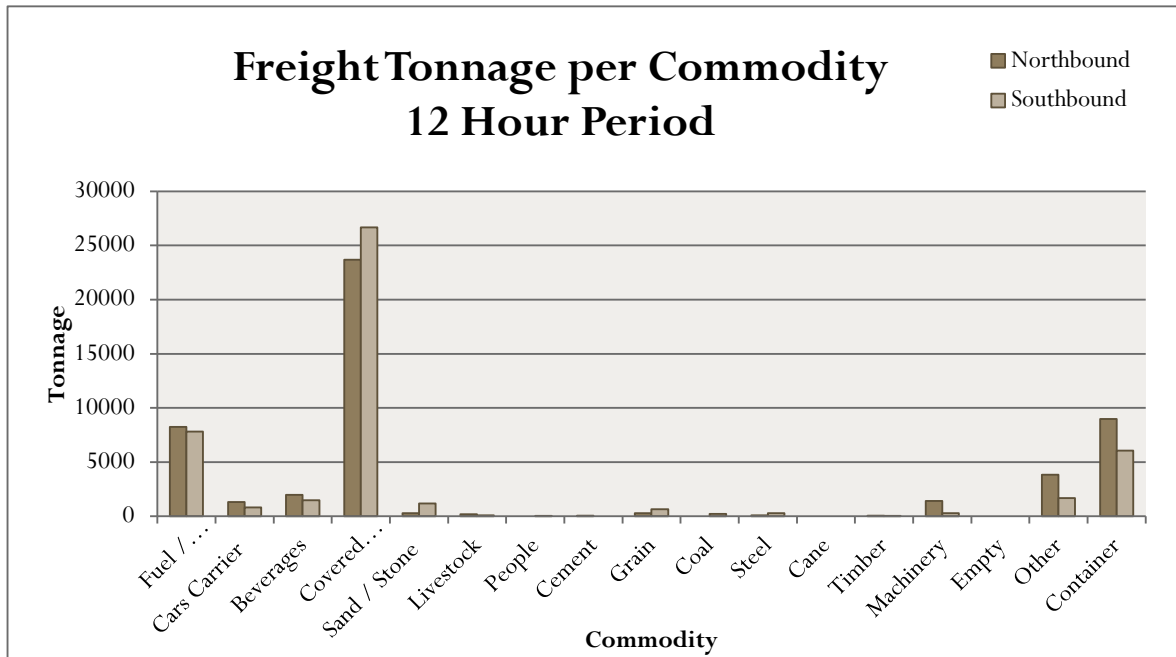


Freight Volumes by Commodity Type 2023 - Yearly Period



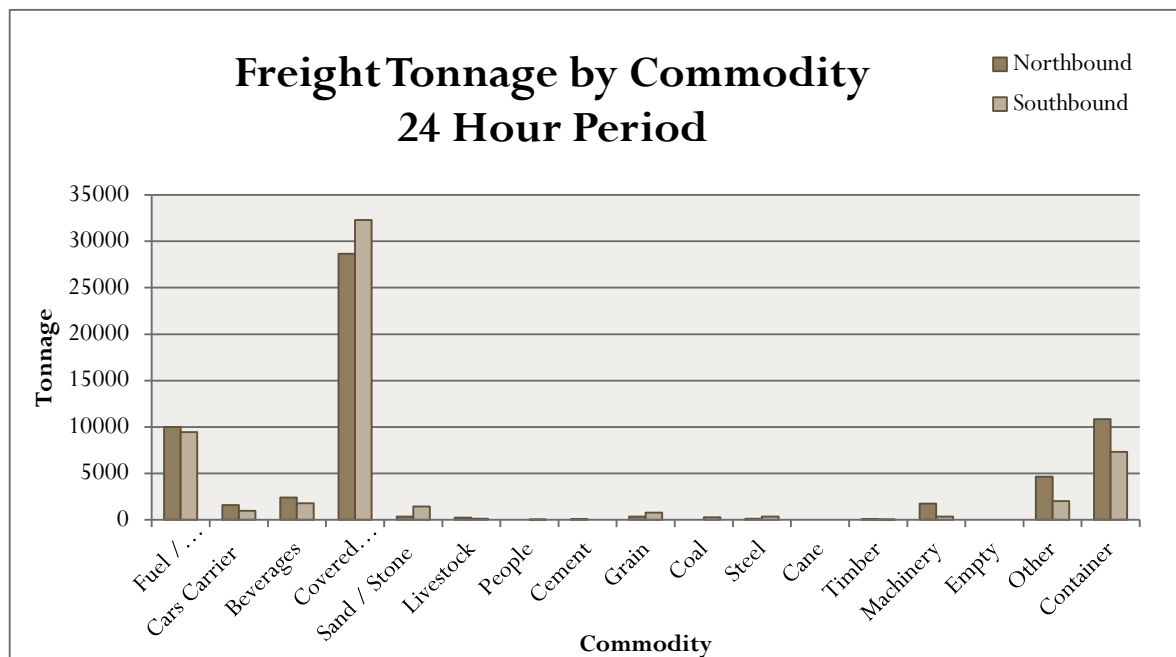
Tugela (Johannesburg to Ladysmith)

Date: 08-06-2023

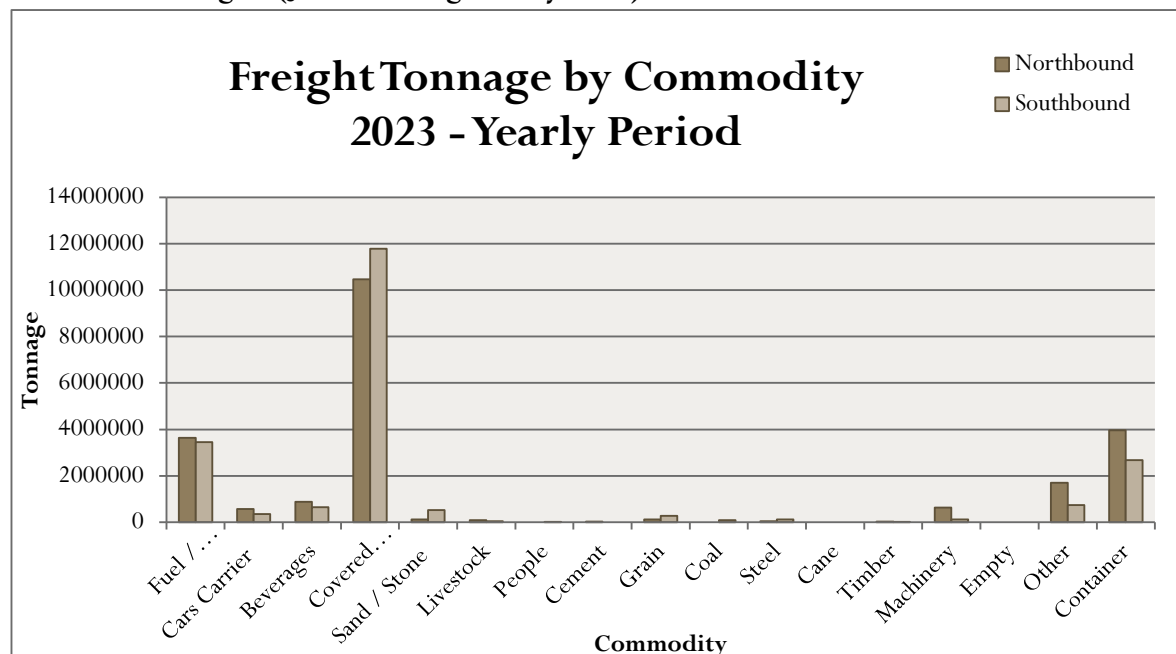


Tugela (Johannesburg to Ladysmith)

Date: 08-06-2023



Tugela (Johannesburg to Ladysmith)



Tugela (Johannesburg to Ladysmith)													
Freight Tonnage by Commodity by Vehicle Class (12 Hours)												Date: 08-06-2023	
Northbound							Southbound						
	2-3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total		2-3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total
Fuel / Chemicals	24	15	115	6776	1312	8242	Fuel / Chemicals	0	0	46	5936	1824	7806
Cars Carrier	32	210	414	616	32	1304	Cars Carrier	16	60	506	196	32	810
Beverages	16	30	0	308	1632	1986	Beverages	64	0	92	168	1152	1476
Covered Load / Sail or Tarp	792	300	437	2324	19840	23693	Covered Load / Sail or Tarp	448	105	276	4452	21408	26689
Sand / Stone	0	0	0	0	288	288	Sand / Stone	8	0	0	56	1120	1184
Livestock	32	0	69	28	64	193	Livestock	0	0	23	28	32	83
People	0	0	0	0	0	0	People	8	0	0	0	0	8
Cement	0	0	0	28	32	60	Cement	0	0	0	0	0	0
Grain	0	0	0	84	192	276	Grain	0	0	0	0	640	640
Coal	0	0	0	0	0	0	Coal	0	0	0	84	128	212
Steel	0	0	0	84	0	84	Steel	32	0	0	56	192	280
Cane	0	0	0	0	0	0	Cane	0	0	0	0	0	0
Timber	0	0	0	28	32	60	Timber	0	0	0	28	0	28
Machinery	40	0	92	812	480	1424	Machinery	0	0	0	112	160	272
Empty	0	0	0	0	0	0	Empty	0	0	0	0	0	0
Other	120	45	69	1792	1824	3850	Other	184	60	161	560	704	1669
Container	0	600	506	6356	1504	8966	Container	32	225	230	4760	800	6047

Tugela (Johannesburg to Ladysmith)													
Freight Tonnage by Commodity by Vehicle Class (24 Hours)												Date: 08-06-2023	
Northbound							Southbound						
	3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total		3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total
Fuel / Chemicals	29	18	139	8199	1588	9973	Fuel / Chemicals	0	0	56	7183	2207	9445
Cars Carrier	39	254	501	745	39	1578	Cars Carrier	19	73	612	237	39	980
Beverages	19	36	0	373	1975	2403	Beverages	77	0	111	203	1394	1786
Covered Load / Sail or Tarp	958	363	529	2812	24006	28669	Covered Load / Sail or Tarp	542	127	334	5387	25904	32294
Sand / Stone	0	0	0	0	348	348	Sand / Stone	10	0	0	68	1355	1433
Livestock	39	0	83	34	77	234	Livestock	0	0	28	34	39	100
People	0	0	0	0	0	0	People	10	0	0	0	0	10
Cement	0	0	0	34	39	73	Cement	0	0	0	0	0	0
Grain	0	0	0	102	232	334	Grain	0	0	0	0	774	774
Coal	0	0	0	0	0	0	Coal	0	0	0	102	155	257
Steel	0	0	0	102	0	102	Steel	39	0	0	68	232	339
Cane	0	0	0	0	0	0	Cane	0	0	0	0	0	0
Timber	0	0	0	34	39	73	Timber	0	0	0	34	0	34
Machinery	48	0	111	983	581	1723	Machinery	0	0	0	136	194	329
Empty	0	0	0	0	0	0	Empty	0	0	0	0	0	0
Other	145	54	83	2168	2207	4659	Other	223	73	195	678	852	2019
Container	0	726	612	7691	1820	10849	Container	39	272	278	5760	968	7317

Tugela (Johannesburg to Ladysmith)													
Freight Tonnage by Commodity by Vehicle Class (Yearly Period)													
Northbound							Southbound						
	3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total		3 Axle	4 Axle	5 Axle	6 Axle	≥ 7 Axle	Total
Fuel / Chemicals	10600	6625	50790	2992620	579445	3640079	Fuel / Chemicals	0	0	20316	2621634	805570	3447520
Cars Carrier	14133	92747	182843	272056	14133	575912	Cars Carrier	7066	26499	223475	86563	14133	357737
Beverages	7066	13250	0	136028	720773	877117	Beverages	28266	0	40632	74197	508781	651875
Covered Load / Sail or Tarp	349787	132495	193001	1026395	8762336	10464013	Covered Load / Sail or Tarp	197859	46373	121895	1966226	9454843	11787197
Sand / Stone	0	0	0	0	127195	127195	Sand / Stone	3533	0	0	24732	494648	522914
Livestock	14133	0	30474	12366	28266	85238	Livestock	0	0	10158	12366	14133	36657
People	0	0	0	0	0	0	People	3533	0	0	0	0	3533
Cement	0	0	0	12366	14133	26499	Cement	0	0	0	0	0	0
Grain	0	0	0	37099	84797	121895	Grain	0	0	0	0	282656	282656
Coal	0	0	0	0	0	0	Coal	0	0	0	37099	56531	93630
Steel	0	0	0	37099	0	37099	Steel	14133	0	0	24732	84797	123662
Cane	0	0	0	0	0	0	Cane	0	0	0	0	0	0
Timber	0	0	0	12366	14133	26499	Timber	0	0	0	12366	0	12366
Machinery	17666	0	40632	358620	211992	628910	Machinery	0	0	0	49465	70664	120129
Empty	0	0	0	0	0	0	Empty	0	0	0	0	0	0
Other	52998	19874	30474	791437	805570	1700353	Other	81264	26499	71106	247324	310922	737114
Container	0	264990	223475	2807127	664242	3959834	Container	14133	99371	101580	2102254	353320	2670658

Tugela (Johannesburg to Ladysmith)													
Twenty Foot Equivalent Unit (TEU) (12 Hours)											Date: 08-06-2023		
Northbound							Southbound						
	1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL		1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL
2 Axle						0	2 Axle	2			2		6
3 Axle						0	3 Axle						0
4 Axle				38		76	4 Axle	1	1		13	1	32
5 Axle				20		40	5 Axle	1			7		15
6 Axle	1			171	1	346	6 Axle	51	2		116	1	290
≥ 7 Axle		16	1	7	22	115	≥ 7 Axle	9	6		3	6	45
TOTAL						577	TOTAL						388

Tugela (Johannesburg to Ladysmith)													
Twenty Foot Equivalent Unit (TEU) (24 Hours)											Date: 08-06-2023		
Northbound							Southbound						
	1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL		1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL
2 Axle	0	0	0	0	0	0	2 Axle	2	0	0	2	0	7
3 Axle	0	0	0	0	0	0	3 Axle	0	0	0	0	0	0
4 Axle	0	0	0	46	0	92	4 Axle	1	1	0	16	1	39
5 Axle	0	0	0	24	0	48	5 Axle	1	0	0	8	0	18
6 Axle	1	0	0	207	1	419	6 Axle	62	2	0	140	1	351
≥ 7 Axle	0	19	1	8	27	139	≥ 7 Axle	11	7	0	4	7	54
TOTAL						698	TOTAL						469

Tugela (Johannesburg to Ladysmith) Twenty Foot Equivalent Unit (TEU) (Yearly Period)													
Northbound							Southbound						
	1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL		1x6	2x6	3x6	1x12	1x6 + 1x12	TOTAL
2 Axle	0	0	0	0	0	0	2 Axle	883	0	0	883	0	2650
3 Axle	0	0	0	0	0	0	3 Axle	0	0	0	0	0	0
4 Axle	0	0	0	16783	0	33565	4 Axle	442	442	0	5741	442	14133
5 Axle	0	0	0	8833	0	17666	5 Axle	442	0	0	3092	0	6625
6 Axle	442	0	0	75522	442	152811	6 Axle	22524	883	0	51231	442	128079
≥ 7 Axle	0	7066	442	3092	9716	50790	≥ 7 Axle	3975	2650	0	1325	2650	19874
TOTAL						254832	TOTAL						171360