

Request for Decision

Traffic Calming Street Ranking

Presented To:	Traffic Committee
Presented:	Monday, Aug 23, 2010
Report Date	Tuesday, Aug 17, 2010
Type:	Managers' Reports

Recommendation

That the Traffic Committee approve the 2010 ranking list for Traffic Calming Eligible Roadways contained in the report from the General Manager of Infrastructure Services dated August 23, 2010;

And that Staff be directed to initiate the public support component for the Traffic Calming process based on the ranking order. Projects from lower in the ranking may be chosen to fully utilize the annual budget;

And that Staff be directed to receive final approval from Council for Traffic Calming projects prior to issuing tenders for construction;

And that Staff forward the results of the speed studies to the Greater Sudbury Police Services and request increased enforcement on roadways identified with speeding problems.

Finance Implications

The 2010 capital budget provides for \$150,000 related to traffic calming. Annual expenditures for traffic calming will be limited to the approved budget.

BACKGROUND

The City's Traffic and Transportation Engineering Section receives numerous requests each year to install Traffic Calming measures such as speed humps and traffic circles to reduce speeding and improve safety on its roadways. In February, 2008, the City of Greater Sudbury retained IBI Group to develop a Traffic Calming Policy to aid staff in evaluating requests and the application of Traffic Calming devices. This policy was permanently adopted by City Council on May 12, 2010. Council also directed staff to bring forward a list ranking the roadways that qualify for traffic calming based upon the approved policy.

What is Traffic Calming?

The Institute of Transportation Engineering defines Traffic Calming as "the combination of mainly physical

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measures that reduce the negative effects of motor vehicle use, alter driver behaviour and improve conditions for non motorized street users.”

Traffic Calming Warrant

The City's Traffic Calming Warrant is based upon the review of the best practices of 24 jurisdictions throughout North America. In addition, public input was solicited through surveys posted on the City's website and at the Citizen Services Centres. Two (2) stakeholder workshops were also held with City departments and agencies including City Councillors, Police, Fire, EMS, Planning, Roads and Engineering.

The Traffic Calming Warrant consists of an initial screening where a combination of requirements must be met for a site to be eligible for Traffic Calming. The threshold criteria and screening process can be found in the attached Exhibits “A” and “B”.

Sites that pass the initial screening are then ranked against each other using a weighted point criteria based on the classification of the road. Each eligible site is awarded points based on its score for each factor, with a maximum score of 100 points. A score of 30 points has been established as a minimum threshold to qualify for traffic calming consideration. The scoring criteria for local and collector roads is outlined in the attached Exhibit “C”.

Initial Screening and Ranking of City of Greater Sudbury Roads

During the summer of 2009 and the spring of 2010, City staff collected collision and traffic data for all formally requested locations as well as a list of roads where the speed and volume of traffic is a frequent concern of residents. Roads in all 12 wards were selected for review to ensure that the policy was appropriate for all areas of the City. The initial screening process was completed for 138 road segments on 80 different roads. Of the 138 road segments reviewed, 40 qualified for the ranking process, and of these, 38 scored more than 30 points. As part of the final ranking process, any abutting road segments that scored greater than 30 points were combined into one segment and assigned the highest score, resulting in a total of 27 roadways. (see attached Exhibits “D” and “E”).

The results of the studies shows that the initial screening criteria used in the Traffic Calming Policy is working well. Approximately 30 percent (30%) of road segments reviewed, qualified for Traffic Calming. The goal of the initial screening is to ensure that Traffic Calming is appropriate for the road section being reviewed.

Final Ranking

As indicated in the attached Exhibit “D”, a total of 27 roadways qualify for Traffic Calming. Depending on the calming devices chosen and the length of the project, the City's Annual Traffic Calming of \$150,000 should be enough to complete one major roadway, similar in size to Southview Drive, or a couple of smaller projects per year.

In addition to the eligible roadways, Exhibit “D” shows the project length, preliminary cost estimate and indicates whether the road is a transit route or primary emergency services route. It is noted that the cost estimates may vary greatly depending on the devices preferred by the residents. For example, on a 1 km road, you could paint bike lanes for \$5,000 or construct physical devices for \$100,000. Also, roadways that are not transit routes or primary emergency service routes qualify for vertical traffic calming measures such as speed humps. Speed humps are not only effective in reducing vehicle speed but are also less expensive to construct than many other calming devices.

Also, roadways that are eligible for Traffic Calming and are not part of the Road Capital Program will have recommended traffic calming devices incorporated as part of the design and construction. Kathleen Street is an example of where Traffic Calming was incorporated as part of the capital contract.

Recommendations

As indicated in the Traffic Calming Policy, Council approval is required for a project or series of projects

prior to initiating the public support component. Staff recommends that Council approve the list ranking the eligible roadways. Based on approved budget limitations, staff will initiate the public support component in the order the roadways are ranked. However, some similar projects may be selected out of order to fully utilize the available capital budget.

Based on the time of year, and length of time needed to complete the public consultation component, actual construction of traffic calming devices will not occur until next year.

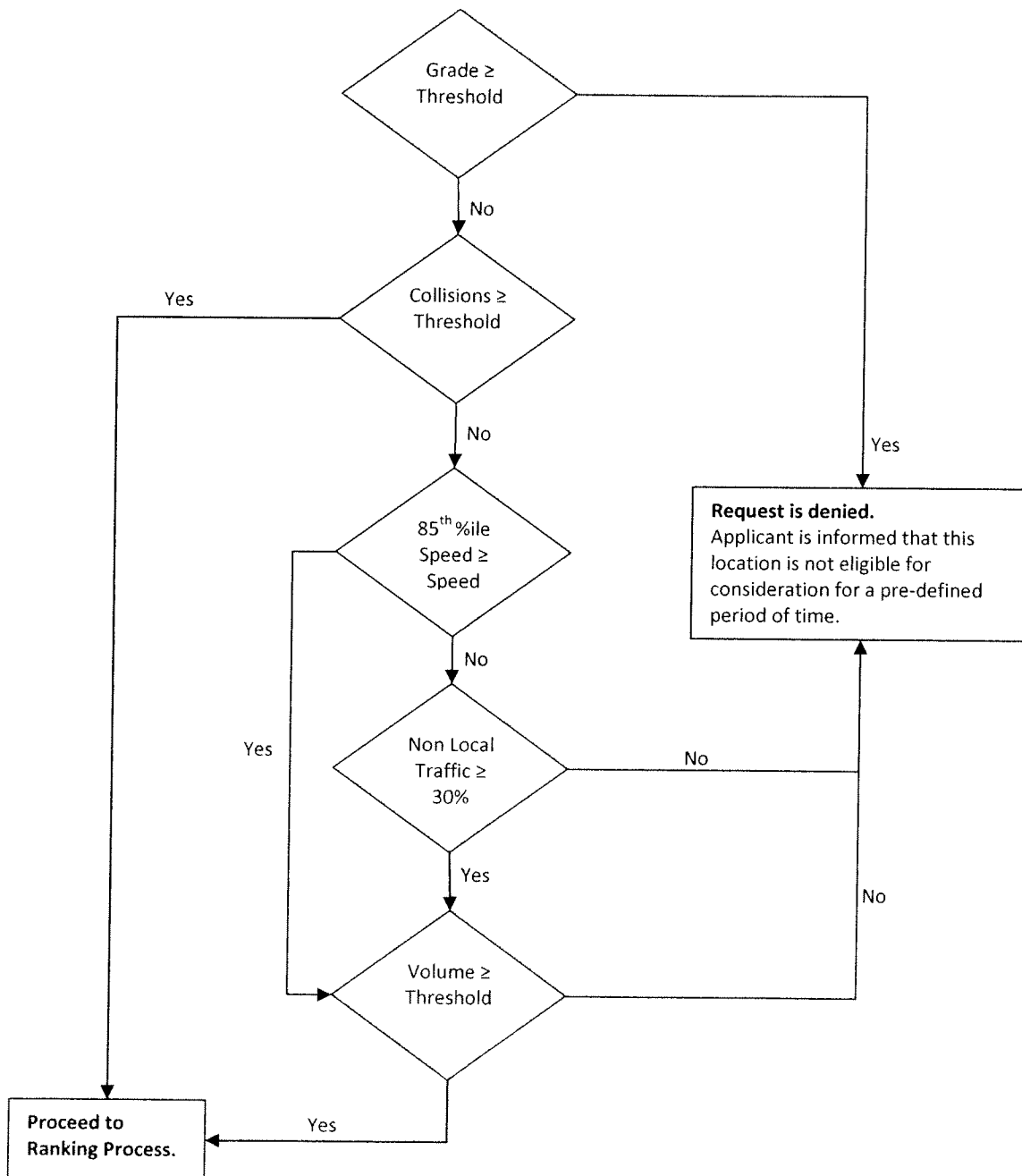
Prior to tendering, staff will obtain Council's approval for plans that have received the necessary public support. As indicated in the Traffic Calming Policy, if a request is rejected at any point in the process, the applicants and affected residents will be informed in writing, and Traffic Calming shall not be reconsidered for the same section of road for two years.

Many roads which did not pass the initial screening for traffic calming had 85th percentile speeds that exceeded the posted speed. City staff will compile a list of these roadways and forward it to Greater Sudbury Police Services to be considered for speed enforcement campaigns.

Traffic Calming Criteria

Criteria	Threshold		Notes
	Local Road	Collector/ Tertiary Arterial	
Grade	< 8%		If the grade is equal to or greater than 8%, traffic calming is not permitted
Collision History	≥ 6	≥ 12	Number of collisions within the last three years involving vulnerable road users and/or which may be potentially corrected by traffic calming measures.
Volume	≥ 900 vpd	≥ 3,000 vpd (Collector) ≥ 5,000 vpd (Tertiary Arterial)	Two-way AADT volume
Speeds	≥ posted speed limit		85 th percentile speed
Non-Local Traffic	≥ 30%		'Cut-through traffic'

Screening Process



Scoring Criteria

Local Roads

Factor	Point Criteria	Maximum Points
Collision History	4 points for each qualifying collision in the past three years	20
Traffic Speeds	1 point for each km/h above posted speed limit	15
Non-Local Traffic	3 points for each 10% of non-local traffic above 20% (maximum reached at 60% non-local traffic)	15
Traffic Volumes	1 point for each 50 vehicles above 900	20
Pedestrian Generators	5 points for each school or park within the study area (other Pedestrian Generators may be defined by City staff)	10
Pedestrian Facilities	5 points if there are no sidewalks in the study area	5
Emergency Services and Routes	4 points if the study area is a primary Emergency Services route	0
Transit Services and Routes	2 points if the study area is an existing or planned transit route	0
Block Length	1 point for each 50 metre increment between stop-controlled points	10
Adjacent Land Uses (residential)	1 point for each 20% of residential land use	5
		100

Collector and Tertiary Arterial Roads

Factor	Point Criteria	Maximum Points
Collision History	3 points for each qualifying collision in the past three years	15
Traffic Speeds	1 point for each km/h above posted speed limit	20
Non-Local Traffic	2 points for each 10% of non-local traffic above 20% (maximum reached at 60% non-local traffic)	10
Traffic Volumes	1 point for each 100 vehicles above 3000 for Collector roads and 5000 for Tertiary Arterials	20
Pedestrian Generators	5 points for each school or park within the study area (other Pedestrian Generators may be defined by City staff)	10
Pedestrian Facilities	10 points if there are no sidewalks in the study area, 5 if only on one side	10
Emergency Services and Routes	6 points if the study area is a primary Emergency Services route	0
Transit Services and Routes	4 points if the study area is an existing or planned transit route	0
Block Length	1 point for each 50 metre increment between stop-controlled points	10
Adjacent Land Uses (residential)	1 point for each 20% of residential land use	5
		100

Traffic Calming Final Street Ranking - 2010

	Location	Score	Length (m)	Transit or ES Route?	Preliminary Cost Estimate
1	Attlee Avenue (Lasalle Boulevard to Westmount Avenue)	77.8	1660	Yes	\$250,000
2	Auger Avenue (Lasalle Boulevard to Gemmell Street)	74.2	1000	Yes	\$150,000
3	Riverside Drive (Regent Street to Broadway Street)	74.2	960	Yes	\$145,000
4	Michelle Drive (MR 80 to Ivan Street)	71.6	1100	Yes	\$165,000
5	Brenda Drive (Moonrock Avenue to St Charles Lake Road)	69.8	1300	No	\$195,000
6	Lansing Avenue (Lasalle Boulevard to Maley Drive)	63.4	1750	Yes	\$265,000
7	Grandview Boulevard (Montrose Avenue to Wedgewood Drive)	63.1	290	Yes	\$45,000
8	Hillcrest Drive (Brian Street to Mikkola Road)	63.0	710	Yes	\$110,000
9	Loach's Road (Regent Street to Lo-Ellen Park School)	59.3	360	Yes	\$55,000
10	Kelly Lake Road (Southview Drive to Copper Street)	59.3	490	Yes	\$75,000
11	Hawthorne Drive (Barry Downe Road to Auger Avenue)	54.3	860	Yes	\$130,000
12	Dublin Street (Attlee Avenue to Arthur Street)	50.3	540	No	\$85,000
13	Robinson Drive (Kelly Lake Road to Southview Drive)	49.4	950	Yes	\$145,000
14	Balsam Street (Garrow Road to Nickel Street (East Leg))	48.2	1200	Yes	\$180,000
15	Hawthorne Drive (Auger Avenue to Claudia Court (East Leg))	47.4	300	No	\$45,000
16	Meehan Street (Dennie Street to Coulson Street)	47.0	330	No	\$50,000
17	Valleyview Road (Municipal Road 80 to L Horizon Secondary School)	39.8	180	No	\$30,000
18	Second Avenue (Highway 17 to Government Road)	39.2	940	Yes	\$145,000
19	Gemmell Street (Attlee Avenue to Downland Avenue)	37.4	200	No	\$30,000
20	Kathleen Street (CP Rail Crossing to Flood Road)	37.4	420	Completed 2010	
21	Edward Avenue (Highway 144 to Falcon Street)	37.3	570	Yes	\$90,000
22	Woodbine Avenue (Agincourt Avenue to Roy Avenue)	37.1	450	Yes	\$70,000
23	Mackenzie Street (Baker Street to Elgin Street)	35.6	380	Yes	\$60,000
24	Douglas Street (Brady Street to Riverside Drive)	34.3	170	No	\$30,000
25	Copper Street (Martindale Road to Zinc Street)	32.8	1300	Yes	\$195,000
26	Loach's Road (Oriole Drive to Cerilli Crescent)	32.6	660	Yes	\$100,000
27	Stonewate Drive (Beatrice Crescent to Attlee Avenue)	31.7	250	No	\$40,000

Road Segments Which Did Not Qualify

Location	Reason Segment is not Eligible
Algonquin Road (Trailridge Drive to Maurice Street)	Volume Does Not Meet Minimum Requirements
Arlington Drive West (Gilles Court to Gerard Avenue)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Arnold Street (400 m west of Skyward Drive to Moonrock Avenue)	Volume Does Not Meet Minimum Requirements
Arnold Street (Barbara Street to Skyward Drive)	Volume Does Not Meet Minimum Requirements
Arnold Street (Regent Street to Barbara Street)	Volume Does Not Meet Minimum Requirements
Arnold Street (Skyward Drive to 400 m west of Skyward Drive)	Volume Does Not Meet Minimum Requirements
Balsam Street (Godfrey Drive to Garrow Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Brebeuf Avenue (Kathleen Street to Tanguay Avenue)	Grade of Road is Greater Than 8%
Carl Street (Cote Boulevard to North End)	Speed & Volume Do Not Meet Minimum Requirements
Centennial Road (Lapointe Street to Centennial Arena)	Volume Does Not Meet Minimum Requirements
Church Street (Spruce Street to Falconbridge Highway)	Volume Does Not Meet Minimum Requirements
Church Street (Spruce Street to Pine Street)	Volume Does Not Meet Minimum Requirements
Colonial Court (Melbourne Street to Melbourne Street - East Leg)	Speed, Non-Local Traffic and Volume Do Not Meet Minimum Requirements
Colonial Court (Melbourne Street to Melbourne Street - West Leg)	Speed, Non-Local Traffic and Volume Do Not Meet Minimum Requirements
Copper Street (Kelly Lake Road to Zinc Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Corsi Hill (Between Gold Street and Gemma Street)	Scored Less Than 30 Points in Ranking Process
Dell Street (Bruce Avenue to Boivin Avenue)	Volume Does Not Meet Minimum Requirements
Desmarais Road (MR 80 to Talon Street)	Volume Does Not Meet Minimum Requirements
Dugas Street (East Street to MR 80)	Volume Does Not Meet Minimum Requirements
Edward Avenue (Falcon Street to Gaudette Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Gateway Drive (Long Lake Road to Treeview Road)	Volume Does Not Meet Minimum Requirements
Gatien Avenue (MR 80 to Francis Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Gemmell Street (Barrydowne Road to Westmount Avenue)	Volume Does Not Meet Minimum Requirements
Gemmell Street (Downland Avenue to Barrydowne Road)	Volume Does Not Meet Minimum Requirements
Gemmell Street (Westmount Avenue to Auger Avenue)	Volume Does Not Meet Minimum Requirements
Godfrey Drive (Balsam Street to Serpentine Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Godfrey Drive (Power Street to Balsam Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Godfrey Drive (Serpentine Street to North End)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Grandview Boulevard (Inglewood Court to Montrose Avenue)	Volume Does Not Meet Minimum Requirements
Grandview Boulevard (Rideau Street to Inglewood Court)	Volume Does Not Meet Minimum Requirements
Greenwood Drive (Second Avenue to Bayridge Court)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Hawthorne Drive (Attlee Avenue to Lynwood Drive)	Volume Does Not Meet Minimum Requirements
Hawthorne Drive (Beatrice Crescent to Attlee Avenue)	Volume Does Not Meet Minimum Requirements
Hawthorne Drive (Lynwood Drive to Barry Downe Road)	Scored Less Than 30 Points in Ranking Process
Holland Road (Lamothe Street to Woodbine Avenue)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Holland Road (Sparks Street to Lamothe Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Holland Road (Woodbine Avenue to Lillian Boulevard)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Houle Avenue (Arlington Drive to Riverside Drive)	Volume Does Not Meet Minimum Requirements
Houle Avenue (Highway 144 to Arlington Drive)	Volume Does Not Meet Minimum Requirements
Junction Avenue (Notre Dame Road to Laurin Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Keith Avenue (Edward Avenue to Pinellas Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Lamothe Street (Holland Road to Leon Avenue)	Volume Does Not Meet Minimum Requirements
Lamothe Street (Paquette Street to Lansing Avenue)	Volume Does Not Meet Minimum Requirements
Levesque Street (Bancroft Drive to Rheal Street)	Volume Does Not Meet Minimum Requirements
Levesque Street (Rheal Street to Kingsway)	Volume Does Not Meet Minimum Requirements
Lillian Boulevard (Holland Road to Barry Downe Road)	Volume Does Not Meet Minimum Requirements
Lincoln Crescent (Sellwood Avenue to Dennie Street)	Speed & Volume Do Not Meet Minimum Requirements
Loach's Road (Lo-Ellen Park School to Oriole Drive)	Volume Does Not Meet Minimum Requirements
Long Lake Road (McFarlane Lake Road to Chief Lake Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Lourdes Street (Van Horne Street and St. Raphael Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Mackenzie Street (Kathleen Street to Baker Street)	Volume Does Not Meet Minimum Requirements
Madison Avenue (Gary Avenue to Sherwood Avenue)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Madison Avenue (Lansing Avenue to Gary Avenue)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Madison Avenue (Sherwood Avenue to Old Falconbridge Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Marie Avenue (MR 15 to Helene Street)	Volume Does Not Meet Minimum Requirements
Marier Street (Notre Dame Street to MR 35)	Volume Does Not Meet Minimum Requirements
Mont Adam Street (Between Cochrane Street and Sunrise Ridge Road)	Grade of Road is Greater Than 8%
Mont Adam Street (Between Sunrise Ridge Drive and Mountain Street)	Grade of Road is Greater Than 8%
Nephawin Avenue (Paris Street to Walford Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Niemi Road (MR 24 to Turner Road)	Scored Less Than 30 Points in Ranking Process
Niemi Road (Santala Road to West End)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Niemi Road (Turner Road to Santala Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Notre Dame Avenue (Jules Street to Gravel Drive)	Volume Does Not Meet Minimum Requirements
Notre Dame Avenue (St. Isidore Street to Jules Street)	Volume Does Not Meet Minimum Requirements
O'Neil Drive East (Margaret Street to Garson-Coniston Road)	Volume Does Not Meet Minimum Requirements
O'Neil Drive East (Penman Avenue to Margaret Street)	Volume Does Not Meet Minimum Requirements
O'Neil Drive West (Pilotte Road to Heino Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Paquette Street (Lasalle Boulevard to Lamothe Street)	Volume Does Not Meet Minimum Requirements
Ramsey Road (Worthington Crescent to John Street)	Speed & Non-Local Traffic Do Not Meet Minimum Requirements

Roland Street (Lauzon Avenue to Attlee Avenue)	Volume Does Not Meet Minimum Requirements
Roxborough Drive (Winchester Avenue to Laura Avenue)	Volume Does Not Meet Minimum Requirements
Roy Avenue (Lamothe Street to Lasalle Boulevard)	Volume Does Not Meet Minimum Requirements
Sixth Avenue (B Street to Maple Street)	Volume Does Not Meet Minimum Requirements
Sixth Avenue (Coronation Boulevard to MR 24)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Sixth Avenue (Maple Street to Tenth Avenue)	Volume Does Not Meet Minimum Requirements
Sixth Avenue (MR 24 to B Street)	Volume Does Not Meet Minimum Requirements
Spruce Street (Gilman Street to Ethelbert Street)	Volume Does Not Meet Minimum Requirements
Spruce Street (Travers Street to Gilman Street)	Volume Does Not Meet Minimum Requirements
St. Agnes Street (Leo Street to Montée Principale)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
St. Agnes Street (Montcalm Street to Leo Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
St. Raphael Street (Lourdes Street to Howey Drive)	Speed, Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Sunnyside Road (Orange Road to Norma Street)	Traffic Calming is Not Typically Applied to Rural Roads
Talon Street (Desmarais Road to Tremblay Street)	Speed & Volume Do Not Meet Minimum Requirements
Telstar Avenue (Moonrock Avenue to Skyward Drive)	Volume Does Not Meet Minimum Requirements
Telstar Avenue (Regent Street to Skyward Drive)	Volume Does Not Meet Minimum Requirements
Third Avenue (Bancroft Drive to Kenwood Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Third Avenue (Evergreen Street to First Avenue)	Volume Does Not Meet Minimum Requirements
Third Avenue (Kenwood Street to Kingsway)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Third Avenue (Nickel Street to Evergreen Street)	Volume Does Not Meet Minimum Requirements
Tupper Street (Centennial Road to east end)	Speed, Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Valleyview Road (L'Horizon Secondary School to Fournier Drive)	Volume Does Not Meet Minimum Requirements
Victoria Street (Regent Street to Eyre Street)	Speed, Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Wembley Drive (Killarney Avenue to Winchester Avenue)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Wembley Drive (Laura Avenue to Marion Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Wembley Drive (Regent Street to Wellington Heights)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Westmount Avenue (Barrydowne Road to Kingston Court)	Volume Does Not Meet Minimum Requirements
Westmount Avenue (Gemmell Street to Hawthorne Drive)	Volume Does Not Meet Minimum Requirements
Westmount Avenue (Kingston Court to Gemmell Street)	Volume Does Not Meet Minimum Requirements
Worthington Crescent (Marion Street to Ramsey Road)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements
Worthington Crescent (Riverside Road to Marion Street)	Non-Local Traffic & Volume Do Not Meet Minimum Requirements