

Service Business Plan



Service Name Traffic Operations Management

Service Lead Name Jeff Black

Service Lead Title Manager of Traffic Services

Service Description

A public service to provide controlled traffic on public roads and sidewalks.

Strategic Alignment with Vision to Focus Plan

Improving integrated city mobility

Service Goals

To provide a safe and efficient transportation network for all road users.

Current State

Customers & Their Expectations	<p>This service is delivered to:</p> <ul style="list-style-type: none"> • users of the transportation network including motorists, pedestrians, and cyclists, who expect access to a safe and efficient road and sidewalk network • local businesses and other users of traffic information such as traffic volumes and road closure details. • residents expecting functioning streetlights for safety on the roads and within their neighbourhoods.
Existing Service Delivery	<p>In partnership with internal department and external agencies, provide traffic services including:</p> <ul style="list-style-type: none"> • reviewing the need for, installing and maintaining traffic control devices such as signs, pavement markings and traffic signals; • reviewing and approving road use permits; • developing and approving traffic detour routes for construction and special event road closures; • managing the operation of traffic signal network throughout the City using the computerized central signal system; • providing school crossing guards at key locations throughout the City; and, • maintaining functional street lights and related infrastructure.
Existing Customer Engagement Tools / Methods	<p>Website, email, voicemail, telephone, resident surveys and notification, public meetings and open houses and 311.</p>

Is this Service Provincially Legislated?	Yes The Municipal Act and Highway Traffic Act
For this Service are there Approved Service Standards?	Yes City of Burlington Standard Operating Procedures and Standards, Highway Traffic Act, Traffic By-Law 86-2007, Ontario Traffic Manual.

Programs

Traffic Operations	Review, installation and maintenance of traffic signs and pavement markings, approving road use permits and implementing traffic safety initiatives aimed at addressing concerns of aggressive driving, pedestrian safety and motor vehicle collisions.
Traffic Signals	Managing the operation of the city's traffic signals through a computerized traffic signal system, ongoing signal timing calculations, and design and installation of new traffic signals.
Crossing Guard Program	Deliver the school crossing guard program at key locations across the city to provide for safe crossing of school-aged children.
Streetlighting	Managing and maintaining streetlights throughout the city to provide safety and security to motorists, pedestrians and residents within neighbourhoods.

Recent Continuous Improvement Initiatives

In 2019:

- Completed the installation of wireless radio communications hardware along the Plains Road corridor resulting in a significant increase in communication reliability between the central traffic signals system and equipment in the field.
- Implemented a lawn sign campaign road safety involving the supply of cost-effective vinyl signs to interested residents as a measure to raise awareness about speeding on residential streets.
- Reviewed numerous streets for the need to implement traffic calming measures in accordance with the Council-approved Traffic Calming Policy, including the reduction of speed limit to 40 km/h on streets meeting the council approved criteria throughout the city.
- Completed a sign inventory and condition assessment citywide to enhance our ability to manage assets and monitor maintenance activities.
- Made significant progress toward migrating paper-based collision reports to electronic files to improve efficiency and accuracy withn the city's collision database.

Environmental Considerations

The continued focus on reducing travel time and delay for motorists through effective traffic signal coordination will result in reduced vehicle emissions into the environment.

Emerging Opportunities and Anticipated Risks

Emerging Opportunities	New technology is emerging to further enhance the city's capability to respond to changing traffic demands. Examples of technology planned for implementation include adaptive traffic signal systems, Bluetooth travel time system, traffic signal performance measures and a traffic management centre.
Anticipated Risks	New technology may result in additional costs, the need for staff training and the need to provide public awareness. However, the benefits could result in improvements to traffic flow, congestion reduction and incident responsiveness along the city's transportation network.
Enterprise Risk Considerations	Climate Change - Increasing number of severe weather events Capacity and Volume of Work - CM and SLT Work Plans, Projects, Technology Changes Transportation - Changing Societal Trends, Strong link to Growth and Development Disruptive Technology - Uber, Lyft, Driverless Vehicles

Service Initiatives

Target Completion

Implement adaptive traffic signal control systems	Jun 2020
Implement and utilize traffic signal performance measures	Jun 2020
Procure and implement a Bluetooth travel time system	Jul 2020
Construct a traffic management centre	May 2020
Continue to review the feasibility of technology-based enforcement programs such as red light cameras and automated speed enforcement for Burlington roadways.	Jun 2020

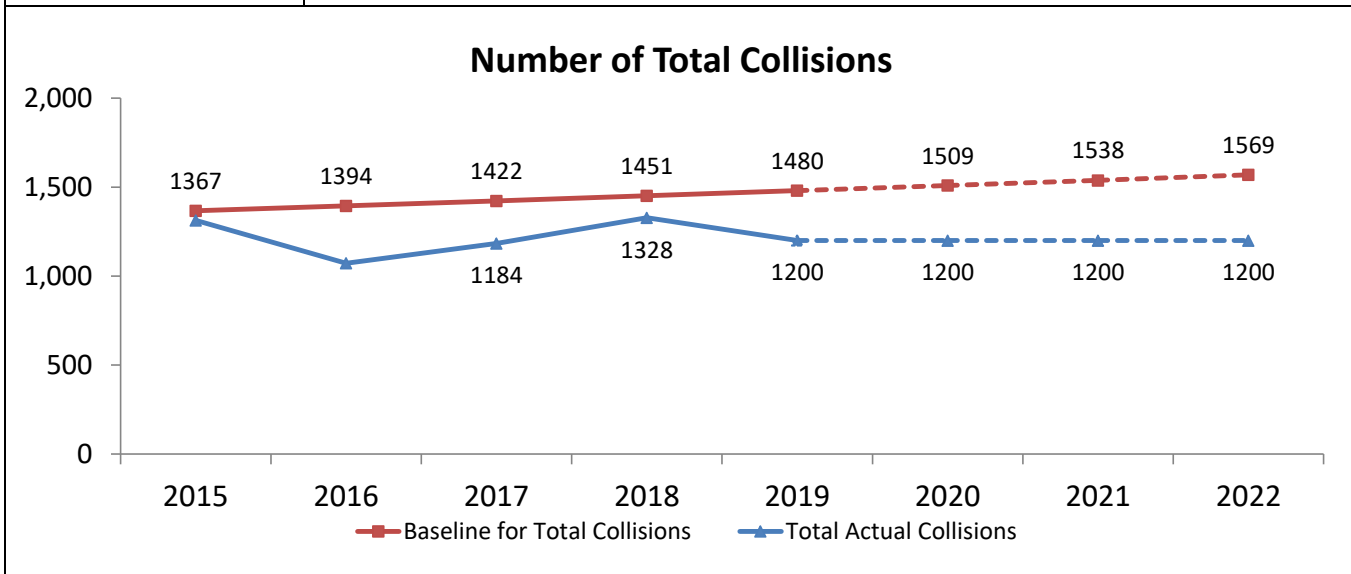
MEASURING SUCCESS

How much did we do?

Performance Measurement	2015 Actual	2016 Actual	2017 Actual	2018 Actual	2019 Forecast	2020 Forecast	2021 Forecast	2022 Forecast
Road Permits Issued	225	123	135	190	150	155	160	165
Traffic Calming Projects Processed	32	33	37	-	25	25	20	15
Speed Limit Reviews Complete	19	86	67	-	31	25	25	20
Traffic Signal/Intersection Pedestrian Signals Installation & Major Modification Installed	5	1	2	2	1	2	1	1

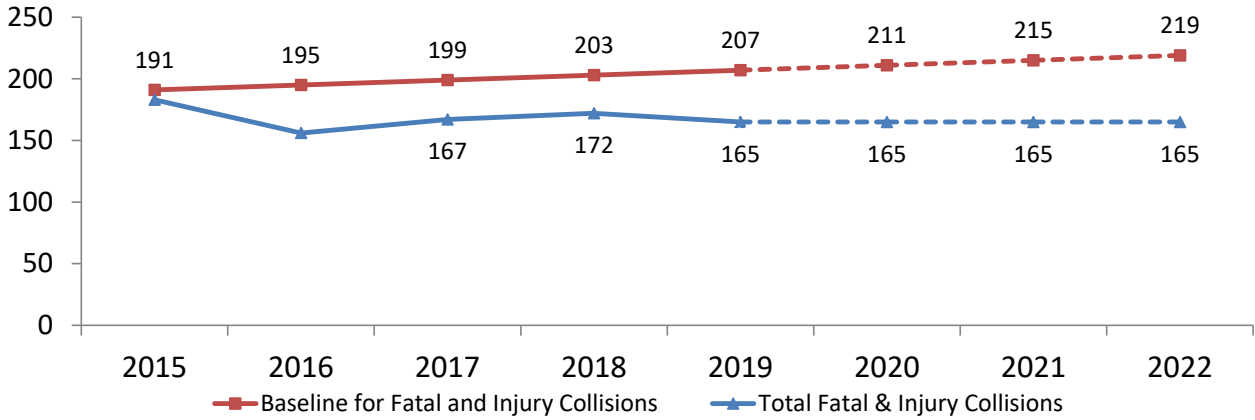
How well did we do it?

Performance Measurement	Number of Total Collisions
Story behind the data	Motor vehicle collision data is collected and analysed by staff as a means to identify trends and contributing factors causing collisions on Burlington's roads. Details such as frequency and type of collisions allow for analysis of both network-wide and site specific locations. The above graph illustrates the total annual collisions on Burlington's roads and compared to a baseline collision trend (2% increase annually).



Performance Measurement	Number of Total Fatal & Injury Collisions
Story behind the data	Fatal and injury-related collisions have the greatest impact to our community. For this reason, identifying locations with high frequency serious collisions is key to implementing road safety initiatives and programs such as the use of driver feedback signs, Road Watch program and enhanced communication and coordination with our Road Safety Stakeholder partners, such as the Halton Regional Police Service and the Ministry of Transportation. The graph below illustrates the total number of fatal and injury collisions on Burlington's roads annually. Also provided is a baseline collision trend (2% increase annually).

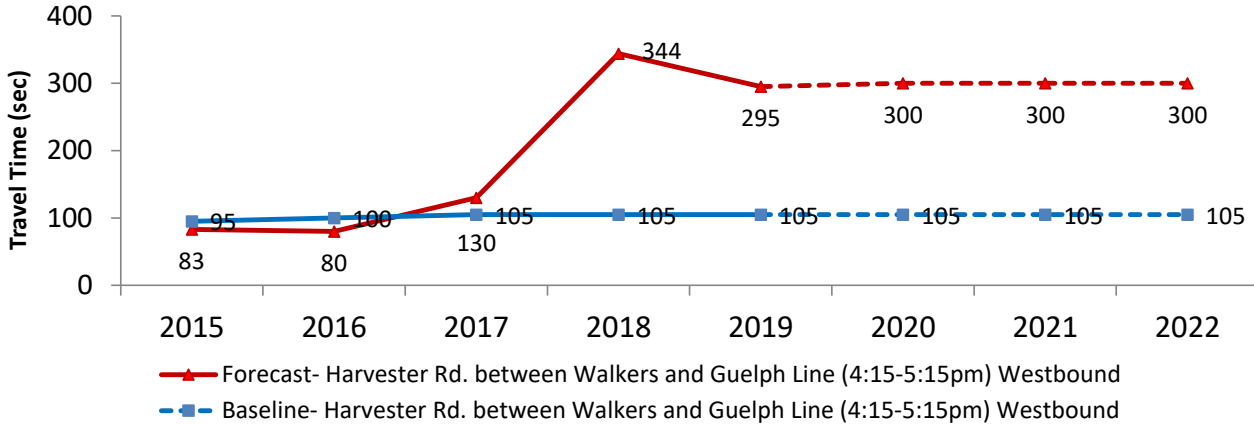
Number of Total Fatal & Injury Collisions



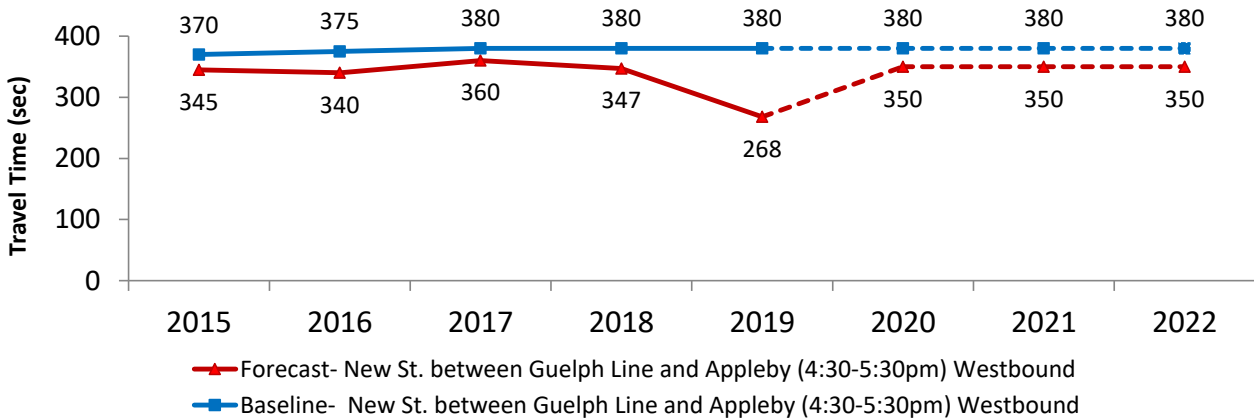
Is anyone better off?

Performance Measurement	Travel Time for Vehicle Drivers
Story behind the data	Travel time is a measure of the performance traffic along a key corridor in the City. Travel times along key corridors can be affected by factors such as construction activity, weather conditions and amount of traffic displaced from adjacent provincial highways.
Where do we want to go?	The City's Traffic Signal Control System allows for signal timing plans to be implemented in order to minimize delays at intersections as well as traffic signal coordination along key corridors in the City.

Travel Time for Vehicle Drivers (Harvester Road)



Travel Time for Vehicle Drivers (New Street)



Travel Time for Vehicle Drivers (Lakeshore Road)

