CITY OF VAUGHAN

EXTRACT FROM COUNCIL MEETING MINUTES OF SEPTEMBER 17. 2013

Item 25, Report No. 35, of the Committee of the Whole, which was adopted without amendment by the Council of the City of Vaughan on September 17, 2013.

ALLWAY STOP CONTROL AT APPLE BLOSSOM DRIVE AND SANTA AMATO CRESCENT

The Committee of the Whole recommends approval of the recommendation contained in the following resolution submitted by Councillor Yeung Racco, dated September 3, 2013:

Member's Resolution

25

Submitted by Councillor Sandra Yeung Racco

Whereas, a number of residents living near the intersection of Apple Blossom Drive and Santa Amato Crescent have expressed concerns regarding pedestrian safety and sight line issues; and

Whereas, staff have confirmed that the roadway characteristics and curve design of Apple Blossom Drive has a limited sight line; and

Whereas, with the current development of Spring Blossom Park on the south side of Apple Blossom Drive at Santa Amato Crescent, pedestrian activity will likely increase at this intersection; and

Whereas, the south side of this intersection also serves as a school bus stop and children utilizing this bus stop must cross from the north side of Apple Blossom Drive to the south side of the roadway during peak traffic times; and

Whereas, it is anticipated that the minimum vehicular volume warrant for this intersection will be met in the near future as a result of ongoing development occurring north of Apple Blossom Drive;

It therefore recommended that an allway stop control, as well as advance notification signage, be installed at the intersection of Apple Blossom Drive and Santa Amato Crescent to provide safe crossing for pedestrians and safe access for surrounding residents crossing Apple Blossom Drive.

Attachments

1. Memorandum from Jack Graziosi, Director of Engineering Services, regarding Traffic Operations Review for the intersection of Apple Blossom Drive and Santa Amato Crescent

(A copy of the attachments referred to in the foregoing have been forwarded to each Member of Council and a copy thereof is also on file in the office of the City Clerk.)



MEMBER'S RESOLUTION

Date: SEPTEMBER 3, 2013 – COMMITTEE OF THE WHOLE

Title: ALLWAY STOP CONTROL AT APPLE BLOSSOM DRIVE AND

SANTA AMATO CRESCENT

Submitted by: Councillor Sandra Yeung Racco

Whereas, a number of residents living near the intersection of Apple Blossom Drive and Santa Amato Crescent have expressed concerns regarding pedestrian safety and sight line issues; and

Whereas, staff have confirmed that the roadway characteristics and curve design of Apple Blossom Drive has a limited sight line; and

Whereas, with the current development of Spring Blossom Park on the south side of Apple Blossom Drive at Santa Amato Crescent, pedestrian activity will likely increase at this intersection; and

Whereas, the south side of this intersection also serves as a school bus stop and children utilizing this bus stop must cross from the north side of Apple Blossom Drive to the south side of the roadway during peak traffic times; and

Whereas, it is anticipated that the minimum vehicular volume warrant for this intersection will be met in the near future as a result of ongoing development occurring north of Apple Blossom Drive;

It therefore recommended that an allway stop control, as well as advance notification signage, be installed at the intersection of Apple Blossom Drive and Santa Amato Crescent to provide safe crossing for pedestrians and safe access for surrounding residents crossing Apple Blossom Drive.

Respectfully submitted,

Sandra Yeung Racco Councillor, Ward 4 (Concord/Thornhill North)

Attachments

 Memorandum from Jack Graziosi, Director of Engineering Services, regarding Traffic Operations Review for the intersection of Apple Blossom Drive and Santa Amato Crescent



memorandum

DATE: August 14, 2013

TO: Councillor Sandra Yeung Racco – Ward 4

FROM: Jack Graziosi

Director of Engineering Services

RE: Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road

Traffic Operations Review

Further to the concerns raised by area residents regarding traffic operations near the intersection of Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road, staff undertook a traffic operations review. This included an analysis of the physical characteristics of the roadway, traffic controls, vehicular speeds and collision history.

Physical Characteristics

Apple Blossom Drive is a minor collector roadway with a 23 metre right-of-way, an 11.5 metre pavement width, and sidewalks along both sides of the roadway. It is identified as a primary emergency response route. The existing speed limit is statutory un-posted 50 km/h, with the exception of the school zone between Pleasant Ridge Avenue and Clovis Street, where the posted speed limit is 40 km/h.

Santa Amato Crescent is a local roadway with a 17.5 metre right-of-way, an 8 metre pavement width, and sidewalk along the east side of the roadway. Spring Arbour Road is a local roadway with a 17.5 metre right-of-way, and an 8 metre pavement width. The existing speed limit on these two roadways is statutory un-posted 50 km/h. Refer to Attachment No. 1.

Analysis

Please note that the details of the technical analysis can be found in Attachment 2.

Traffic Controls

Engineering Services staff conducted turning movement counts at the intersection of Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road in fall 2012 and in spring 2013. The data collected was compared to the Provincial Warrant for All-way Stop Control, and the study results did not meet the minimum requirements of the Provincial All-way Stop Warrant.

Vehicular Speeds

A review of the speed data collected reveals that the vehicular speeds on Apple Blossom Drive demonstrates very good compliance with the existing speed limit. Motorists travelling along Apple Blossom Drive are fairly compliant with the existing speed limit between Santa Amato Crescent/Spring Arbour Road and Thornhill Woods Drive.

Apple Blossom Drive, near Carville Mills Public School, was part of the 2013 Speed Compliance Program. This initiative was launched in 2010 in partnership with York Regional Police, to raise awareness of motorist travel speed, in comparison to the posted speed limit, using Radar Message Boards (RMBs).

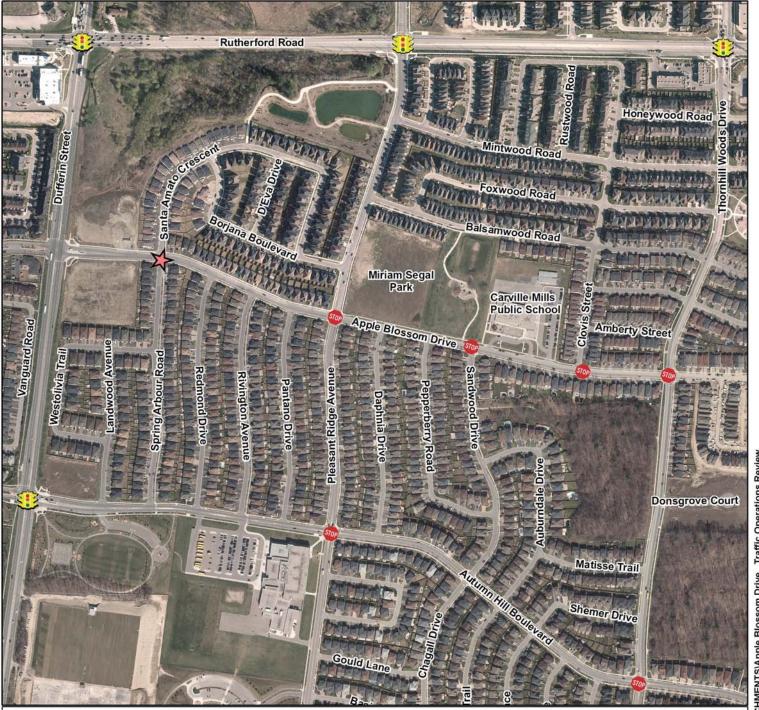
Collision History

A review of the four year collision history, from 2009 to July 2012 (to date, this is the latest available collision data) at the intersection of Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road show no reported collisions.

Conclusion

Apple Blossom Drive is a minor collector roadway, and is operating as it was designed. The traffic volumes recorded and the 85th percentile speeds are in keeping with industry standards. No further changes are recommended at this time. This information has been communicated with the area residents who have raised concerns.

ATTACHMENT No. 1



APPLE BLOSSOM DRIVE AND SANTA AMATO CRESCENT/ SPRING ARBOUR ROAD TRAFFIC OPERATIONS REVIEW

LEGEND



REVIEW INTERSECTION



EXISTING ALL-WAY STOP CONTROL



EXISTING TRAFFIC SIGNAL

Note: Aerial Photography Taken in Spring, 2012



ATTACHMENT NO. 2

Technical Analysis and Review of Apple Blossom Drive at Santa Amato Crescent/Spring Arbour Road

The findings of the traffic studies completed in 2012, and 2013 are summarized below.

All-way Stop

Staff conducted all-way stops studies to determine the feasibility of implementing all-way stop control at the locations listed below. Traffic volumes were collected during the peak time periods of 7:00-9:00 a.m. and 3:00-6:00 p.m.

LocationDateApple Blossom Drive and Santa Amato Crescent/Spring Arbour RoadOctober 17, 2012Apple Blossom Drive and Santa Amato Crescent/Spring Arbour RoadMarch 27, 2013

The data collected was compared to the Provincial Warrant for All-way Stop Control with the following results.

Date	Warrant 1	Warrant 2	Warrant 3
	Min Vehicular Volumes	Accident Hazard	Sight Restriction
October 17, 2012	88%	0%	0%
March 27, 2013	85%	0%	0%

All-way stop controls are recommended when one of the above warrants is satisfied 100% or more.

Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road

The minimum vehicular volumes collected at Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road only warranted 88% in October 2012 and warranted 85% in March 2013 of requirement. There were zero reported collisions at this intersection. Due to the curve design of Apple Blossom Drive, sight line from Spring Arbour viewing east has only 50 metres (required 65 metres). An "Intersection Ahead" sign had installed on November, 2012 to warn drivers of approaching an intersection. According to the results above, this intersection did not meet the minimum requirements of the Provincial All-way Stop Warrant.

Vehicular Speeds

Utilizing Automatic Traffic Recorders (ATRs), Staff collected the traffic speed data over a 24-hour time period, listed below:

- Apple Blossom Drive, west of Santa Amato Crescent

Study Period	Direction	Posted Speed Limit	Average Speed	85 th Percentile
Oct 29 - Nov 2, 2012	Eastbound	50 km/h	49 km/h	58 km/h
	Westbound	50 km/h	48 km/h	58 km/h

The 2012 data indicates that the average speeds on Apple Blossom Drive range between 48 km/h and 49 km/h, which comply with the 50 km/h speed limit.

The Radar Message Boards were installed on Apple Blossom Drive near Carville Mills Public School, staff collected data over a 24-hour time period, list below:

- Apple Blossom Drive near Carville Mills Public School

Study Period	Direction	Posted Speed Limit	Average Speed	85 th Percentile
Jun 10 - 14, 2013	Eastbound	40 km/h	36 km/h	44 km/h
	Westbound	40 km/h	35 km/h	40 km/h

The 2013 study results show that average speeds on Apple Blossom Drive range between 35-36 km/h, which represents excellent compliance with the posted speed limits (40 km/h). Further, the 85th percentile speeds range between 40-44 km/h. In summary, Apple Blossom Drive is operating within industry design guidelines.

In accordance with the Council approved Neighbourhood Traffic Committee Policy and Procedure (June 2010), the traffic calming warrant requires the 85th percentile speed, the speed at which 85% of the motorists travel at or below, to exceed the speed limit by 10 km/h. The recorded 85th percentile speeds (40 km/h - 44 km/h) do not fulfill the warrant requirement for traffic calming measures. Further, all vertical traffic calming measures (such as speed humps and raised crosswalks) are to be discontinued on emergency response routes/feeder/primary/collector roadway. Since Apple Blossom Drive is an emergency response route and a collector roadway, vertical traffic calming measures are not recommended.

Collision History

The collision history at the intersection of Apple Blossom Drive and Santa Amato Crescent/Spring Arbour Road was reviewed from 2009 to July 2012. There are no record collisions at this intersection.