

# STAFF REPORT ACTION REQUIRED

## All-way "Stop" sign control – Admiral Road and Bernard Avenue

| Date:                | May 19, 2009   |
|----------------------|--|
| To:                  | Toronto and East York Community Council                          |
| From:                | Director, Transportation Services Toronto and East York District |
| Wards:               | Trinity-Spadina, Ward 20   |
| Reference<br>Number: | Ts09096te.top.doc  |

## **SUMMARY**

This staff report is about a matter for which Community Council has delegated authority from City Council to make a final decision.

Transportation Services has investigated and has been requested to report to Toronto and East York Community Council by Councillor Adam Vaughan on implementing all-way "Stop" sign control at the intersection of Admiral Road and Bernard Avenue.

Staff's investigation indicates that the intersection of Admiral Road and Bernard Avenue does not satisfy Council's adopted criteria for the installation of all-way "Stop" sign control. Therefore, installation of "Stop" signs on Admiral Road at Bernard Avenue, to create all-way stop control is not recommended.

## **RECOMMENDATIONS**

Transportation Services recommends that Toronto and East York Community Council:

1. Not authorize the installation of "Stop" signs on Admiral Road at Bernard Avenue.

## **Financial Impact**

There are no funding implications resulting from the adoption of the foregoing recommendation. If Toronto and East York Community Council approves the installation of "Stop" signs on Admiral Road at Bernard Avenue, the estimated cost of \$500.00 can be accommodated in the Transportation Services Division 2009 Operating Budget.

## **ISSUE BACKGROUND**

At the request of Councillor Adam Vaughan, Transportation Services investigated the need to provide all-way "Stop" sign control at the intersection of Admiral Road and Bernard Avenue to enhance safety at this intersection.

#### **COMMENTS**

### Intersection Characteristics

Admiral Road is a local road that operates one-way northbound on a pavement width of 7.3 metres and has a maximum speed limit of 40km/h. Admiral Road, in the vicinity of Bernard Avenue, has a daily traffic volume of approximately 560 vehicles.

Bernard Avenue is a local road that operates two-way on a pavement width of 7.3 metres and has a maximum speed limit of 40 km/h. Bernard Avenue, in the vicinity of Admiral Road has a daily two-way traffic volume of approximately 4,500 vehicles. A "Stop" sign is posted on Admiral Road at Bernard Avenue to clearly establish right-of-way.

## Investigation

The data gathered from a recent eight-hour traffic study undertaken at the subject intersection was evaluated against the installation warrants for all-way "Stop" sign control approved by City Council in 2002. The criteria includes factors such as: vehicular and pedestrian usage of the intersection; physical and geometric configuration; right-of-way conflicts; and safety experience.

Toronto Police Service collision data records for a three-year period ending October 31, 2008 revealed no collisions were reported at this intersection.

The following table shows the numerical criteria required to justify installation of all-way "Stop" sign control and the actual numerical values occurring at the intersection of Admiral Road and Bernard Avenue.

| Inter-<br>section                           | Present<br>Condition                 | Minimum<br>Vehicle Volume<br>(Required 250<br>Vehs/hr Each of 4<br>Peak Hrs) | Combined Vehicle and Pedestrian Crossing Volume (Required 100 Units/hr) | Volume<br>Split<br>(<70%/30%) | Collision<br>Hazard<br>(≥2<br>preventable<br>per year)) | All-way<br>"Stop"<br>Warrants<br>Satisfied<br>(Yes/No) |
|---|--------------------------------------|--|---|-------------------------------|---|--|
| Admiral<br>Road<br>and<br>Bernard<br>Avenue | "Stop"<br>sign on<br>Admiral<br>Road | Actual:<br>415 Vehs./hr.   | Actual:<br>18 Units/hr.   | 88% /12%                      | 0 / yr.   | No   |

To satisfy the installation criteria all aspects of the criteria should be satisfied. Due to the disproportionate volume split between Bernard Avenue and Admiral Road (about 9:1 ratio) the intersection only satisfies the "Minimum Vehicle Volume" aspect of the criteria. If implementation of all-way "Stop" sign control were approved at this intersection, eastbound/westbound motorists will experience significant delays. This will result in queuing and elevated levels of vehicle emission pollutants in proximity to the intersection. Also, significant noncompliance with the compulsory stop regulation is anticipated, which will result in a less safe environment for pedestrians and other road users.

Based on staff's evaluation, the intersection of Admiral Road at Bernard Avenue is operating safely at this time, the criteria for all-way stop control is not satisfied and the installation of "Stop" signs on Admiral Road at Bernard Avenue is not recommended.

## **CONTACT**

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#### **SIGNATURE**

Peter Noehammer, P.Eng. Director, Transportation Services

## LIST OF ATTACHMENTS

(1) Drawing No. 421F-9672, dated May 2009

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