SUBJECT: Hwy 404 Mid-Block Crossing Cost Sharing with York Region (North of 16th Avenue, North of Major Mackenzie Drive and North of Elgin Mills Road)

PREPARED BY: Alain Cachola, P. Eng., Senior Manager, Infrastructure and Capital Works, Engineering Department, Ext. 2711

RECOMMENDATION:

1. That the report entitled “Hwy 404 Mid-Block Crossing Cost Sharing with York Region (North of 16th Avenue, North of Major Mackenzie Drive and North of Elgin Mills Road); and,
2. That staff be authorized to issue a Purchase Order to the Regional Municipality of York, in the amount of $1,223,540.22, inclusive of HST impact, for the City of Markham’s share of the cost for the following projects:
   a. Mid-block Crossing North of 16th Avenue (EA and detailed design)
   b. Mid-block Crossing North of Major Mackenzie Drive (EA)
   c. Mid-block Crossing North of Elgin Mills Road (EA); and,
3. That the amount of $1,223,540.22, inclusive of HST impact, be funded from Capital Project #18048 (Regional Mid-block Crossing EA and Design) which currently has an available funding of $1,366,900; and,
4. That the remaining funds of $143,359.78 be returned to the original funding source upon the completion of the N of 16th Avenue detailed design; and,
5. That Staff be directed to prepare a Tri-Party Agreement for the construction of the Hwy 404 Mid-Block Crossing (North of 16th Avenue.); and further,
6. That Staff be authorized and directed to do all things necessary to give effect to this resolution.

PURPOSE:
The purpose of this report is to obtain Council approval to:

- Issue a Purchase Order to the Regional Municipality of York, in the amount of $1,223,540.22, inclusive of HST impact for the City of Markham’s share of the Mid-block crossing projects north of 16th Avenue, Major Mackenzie Drive and Elgin Mills Road
- Fund the Purchase Order from Capital Project #18048 (Regional Mid-block Crossing EA and Design) which currently has an available funding of $1,366,900.
BACKGROUND:

At the Council meeting on September 12, 2012, Council endorsed the findings of the York Region Highway 404 Mid-Block Crossing Study and directed staff to participate in a Working Group with York Region and the Town of Richmond Hill to develop an implementation plan (see Attachment ‘A’). York Region now completed the Environmental Assessment (EA) and detailed design for the following Hwy 404 Mid-block crossings as part of its Capital program:

a. Mid-block Crossing North of 16th Avenue (EA and detailed design)
b. Mid-block Crossing North of Major Mackenzie Drive (EA)
c. Mid-block Crossing North of Elgin Mills Road (EA); and,

The Hwy 404 mid-block crossing projects are grade separated crossings of a municipal road over Hwy 404, similar to what was constructed north of Hwy 7. The mid-block crossing projects are funded equally between the Region of York, City of Markham and Town of Richmond Hill as per Regional Policy on Funding Collector Road Crossings of 400 Series Highways, see Attachment ‘B’.

The commencement and completion of the EA and design for these projects are as follows:

**Mid-block Crossing North of 16th Avenue**

The EA for this mid-block crossing commenced in January 2014 and was filed in February 2015. The preferred alignment as identified in the EA is shown in Attachment ‘C’ – Mid-block Crossing Preferred Alignment (North of 16th Avenue). The final cost of the EA is $625,346.75 and is to be shared equally between the three parties. The new mid-block crossing will provide a continuous collector road link from Warden Avenue to Leslie Street parallel to 16th Avenue.

The detailed design for this project commenced in 2016 and is currently scheduled to be finalized by Q2 2020. The current estimate to complete the detailed design for this project is $1,968,775.23 and is to be shared equally between the three parties.

Construction of this mid-block crossing is identified in the Region of York’s Infrastructure Acceleration Reserve to be accelerated to 2022.

**Mid-block Crossing, North of Major Mackenzie Drive**

The EA for this mid-block crossing commenced in June 2016 and was filed in December 2017. The preferred alignment as identified in the EA is shown in Attachment ‘D’ – Mid-block Crossing Preferred Alignment (North of Major Mackenzie Drive). A Part 2 Order Request was filed for this EA, and was subsequently denied by the Minister of the Environment, Conservation and Parks in November 2018. The final cost of the EA is $560,901.12 and is to be shared equally between the three parties.

The detailed design for this project has not commenced and the construction is identified in the Region’s Infrastructure Acceleration Reserve to be in 2026. Staff will provide a
separate report regarding the construction timing of this project and other Region’s accelerated projects.

Mid-block Crossing North of Elgin Mills Road

The EA for this Mid-block crossing commenced in May 2013 and was filed in September 2015. The preferred alignment as identified in the EA is shown in Attachment ‘E’ – Mid-block Crossing Preferred Alignment (North of Elgin Mills Road). The final cost of the EA is $515,597.57 and is to be shared equally between the three parties.

The detailed design for this project has not commenced and the construction is identified in the Region’s Capital Program beyond 10 years.

OPTIONS/ DISCUSSION:

York Region’s Policy on Collector Road Crossings of 400-Series Highways

York Region has a Policy for funding of Collector Road Crossing of 400 Series Highways. The policy establishes the protocol and procedure used to determine the extent that a local municipal road project crossing a 400-series highway is eligible for Regional funding contributions.

The Region of York, Town of Richmond Hill and City of Markham recently completed the construction of the mid-block Crossing, North of Hwy 7 (Norman Bethune Avenue) and utilized the Collector Road Crossing of 400-Series Highways Policy as the framework for the Tri-party Agreement.

Staff recommend that Markham pays for its share of the completed EA and detailed design through a Purchase Order to the Region of York, in accordance to the City of Markham’s Purchasing By-law. Staff recommends that a tri-party agreement with York Region and the Town of Richmond Hill be prepared for the North of 16th Avenue crossing, in anticipation of the earlier construction timeframe. Staff will report back on the project timing and seek Council’s authorization for the Mayor and Clerk to execute the tri-party agreement in late 2020 or early 2021.

FINANCIAL CONSIDERATIONS

Table 1 below shows the EA and detailed design cost for the three mid-block crossings (MBC).

<table>
<thead>
<tr>
<th>MBC Location</th>
<th>EA Cost</th>
<th>Design Cost</th>
<th>Total Cost</th>
</tr>
</thead>
<tbody>
<tr>
<td>N of 16th Avenue</td>
<td>$625,346.75</td>
<td>$1,968,775.23</td>
<td>$2,594,121.97</td>
</tr>
<tr>
<td>N of Major Mackenzie Dr</td>
<td>$560,901.12</td>
<td>N/A</td>
<td>$560,901.12</td>
</tr>
<tr>
<td>N of Elgin Mills Road</td>
<td>$515,597.57</td>
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<td>$515,597.57</td>
</tr>
<tr>
<td><strong>Total:</strong></td>
<td><strong>$1,701,845.43</strong></td>
<td><strong>$1,968,775.23</strong></td>
<td><strong>$3,670,620.66</strong></td>
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</tbody>
</table>
Table 2 below shows the assessment of costs between the York Region, City of Markham and Town of Richmond Hill.

Table 2 – Cost Sharing Summary

<table>
<thead>
<tr>
<th>MBC Location</th>
<th>Total Cost</th>
<th>Markham Share</th>
<th>York Region Share</th>
<th>Richmond Hill Share</th>
</tr>
</thead>
<tbody>
<tr>
<td>N of 16th Avenue</td>
<td>$2,594,121.97</td>
<td>$864,707.32</td>
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<tr>
<td>N of Major Mackenzie Dr</td>
<td>$560,901.12</td>
<td>$186,967.04</td>
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<tr>
<td>N of Elgin Mills Roads</td>
<td>$515,597.57</td>
<td>$171,865.86</td>
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<tr>
<td>Total:</td>
<td>$3,670,620.66</td>
<td>$1,223,540.22</td>
<td>$1,223,540.22</td>
<td>$1,223,540.22</td>
</tr>
</tbody>
</table>

Capital Account #18048 (Regional Mid-block Crossing EA and Design) currently has an available funding of $1,366,900.00. Staff recommend that a Purchase Order of $1,223,540.22, inclusive of HST, be issued to York Region. The remaining funds of $143,359.78 is recommended to be returned to the original funding source upon the completion of the N of 16th Avenue detailed design.

ALIGNMENT WITH STRATEGIC PRIORITIES:
The proposed work for the mid-block crossings are required to continue to accommodate development in City of Markham and southern York Region. Therefore, the recommendations align with the City’s Strategic Plan goals of “Safe & Sustainable Community” and “Stewardship of Money & Resources”

BUSINESS UNITS CONSULTED AND AFFECTED:
The Finance Department was consulted and its comments have been addressed in this report.

RECOMMENDED BY:

Brian Lee, P.Eng.                        Arvin Prasad, MCIP, RPP
Director of Engineering                  Commissioner, Development Services

ATTACHMENTS:
Attachment ‘A’ – Highway 404 Mid-Block Crossing Study
Attachment ‘B’ – Region Policy Collector Road Crossing of 400 Series Highways
Attachment ‘C’ – Mid-block Crossing Preferred Alignment (North of 16th Avenue)
Attachment ‘D’ – Mid-block Crossing Preferred Alignment (North of Major Mackenzie)
Attachment ‘E’ – Mid-block Crossing Preferred Alignment (North of Elgin Mills)