

Technical Memorandum

To: Beth Henderson, Senior Land Development Manager

Date: October 17, 2018

Cc:

From: Andrew Harte, P.Eng.

Project Number: 2018-34

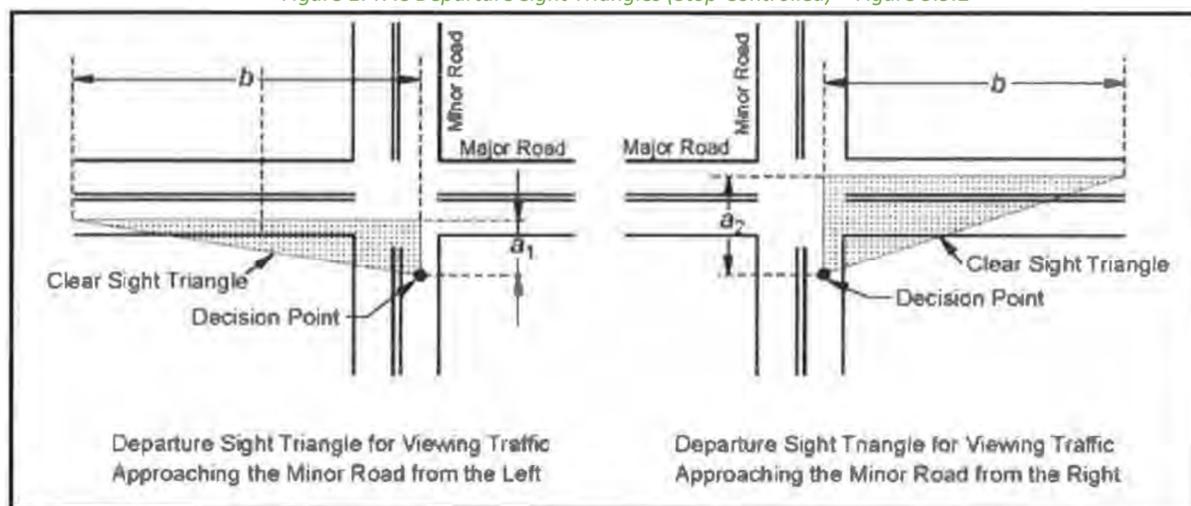
Re: Aquaview Local Road Access Sight Line Analysis

As part of the second submission of the Aquaview plan of subdivision, which addressed City comments, the revised accesses were reviewed for departure sight lines for each of the local road connections to Aquaview Drive. The existing City right-of-way will be opened at the north end of the subdivision, 3 new local roads along Aquaview Drive opposite the Aquaview Park, and a new road opposite Louis Toscano Drive. This memo will summarize the sight line review.

1 Methodology

The Transportation Association of Canada 2017 (TAC) Chapter 9, Section 9.9 provides the various departure sight line scenarios and methodology to assess the right and left turn movements from a roadway. For the Aquaview subdivision, the accesses are minor stop-controlled intersections and fall under the Case B, Intersections with Stop Control on the Minor Road. Figure 1 illustrates the departure sight lines from TAC.

Figure 1: TAC Departure Sight Triangles (Stop-Controlled) – Figure 9.9.2



The sight distance, along the travel line of the major road (Aquaview Drive) is summarized in Table 1 and Table 2 for the left turn and right turn movements from the stop sign.

Table 1: TAC Case B1, Left Turn from Stop

Design Speed (km/h)	Stopping Sight Distance (m)	Intersection Sight Distance for Passenger Cars	
		Calculated (m)	Design (m)
50	65	104.3	105

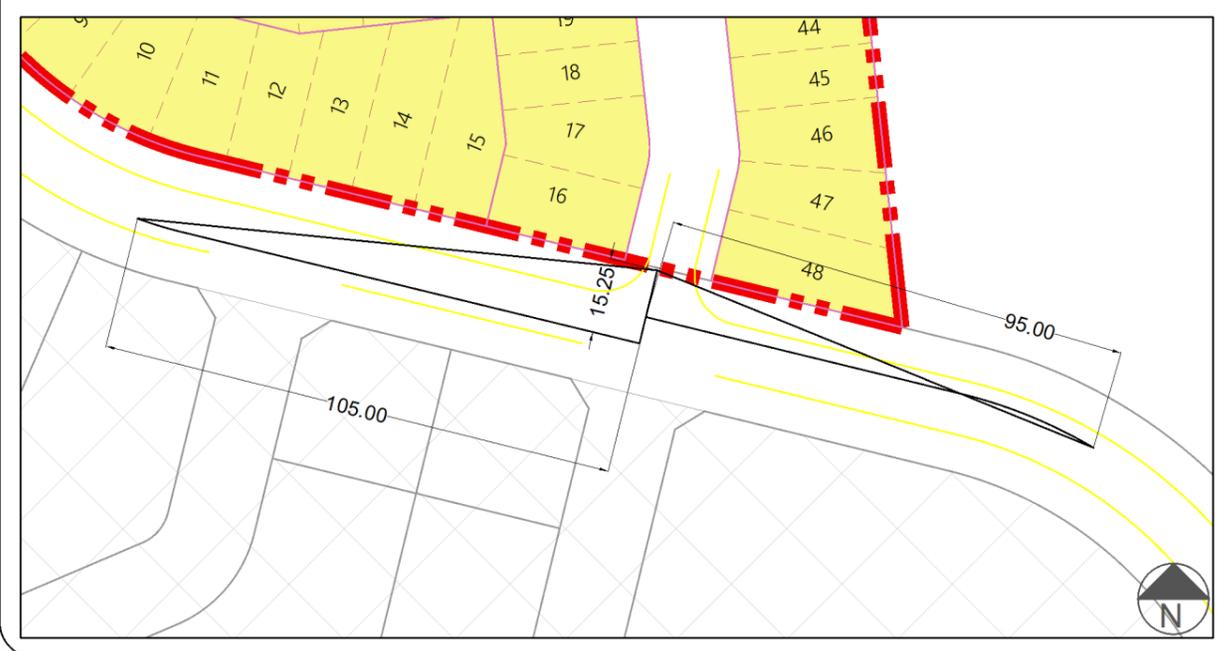
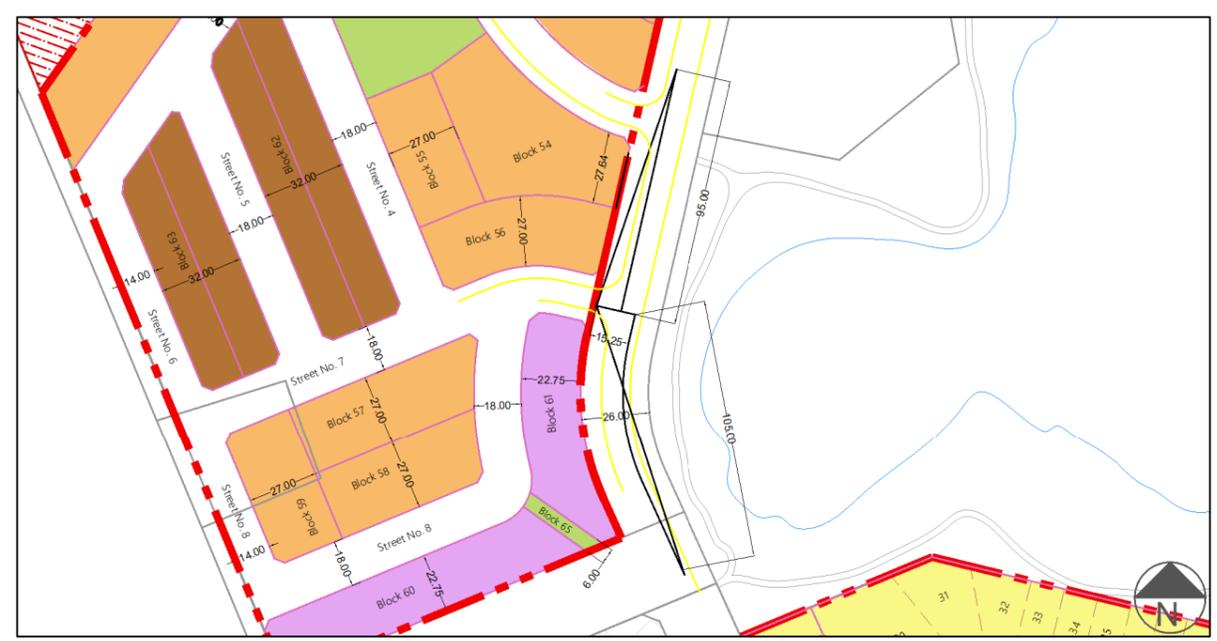
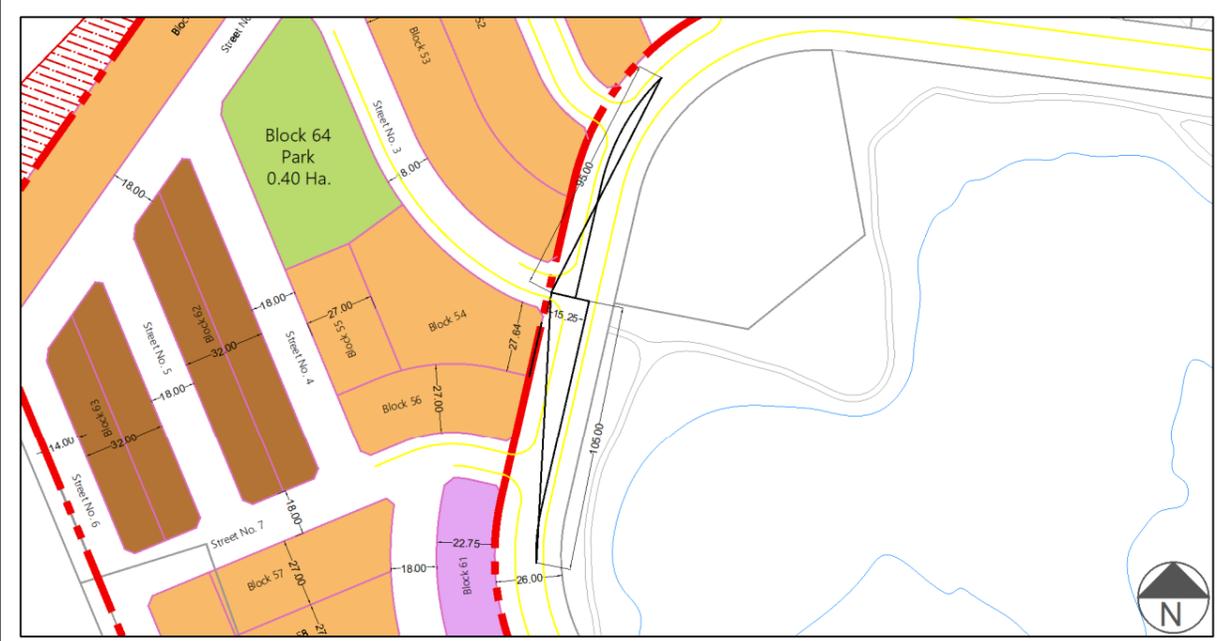
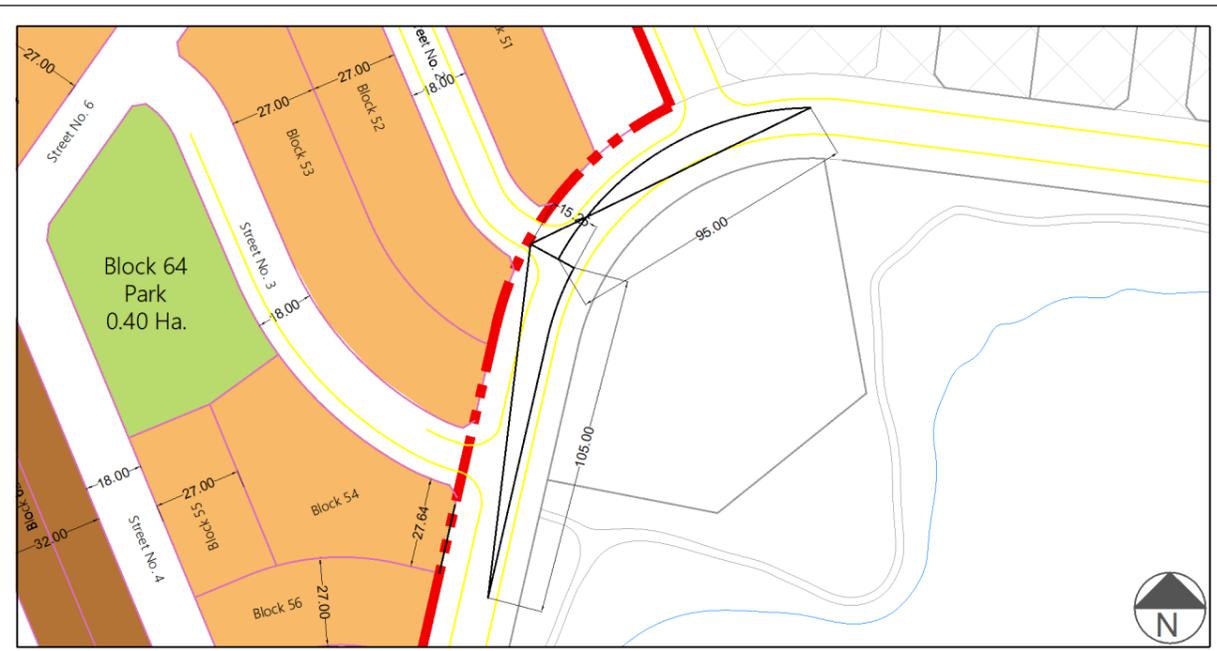
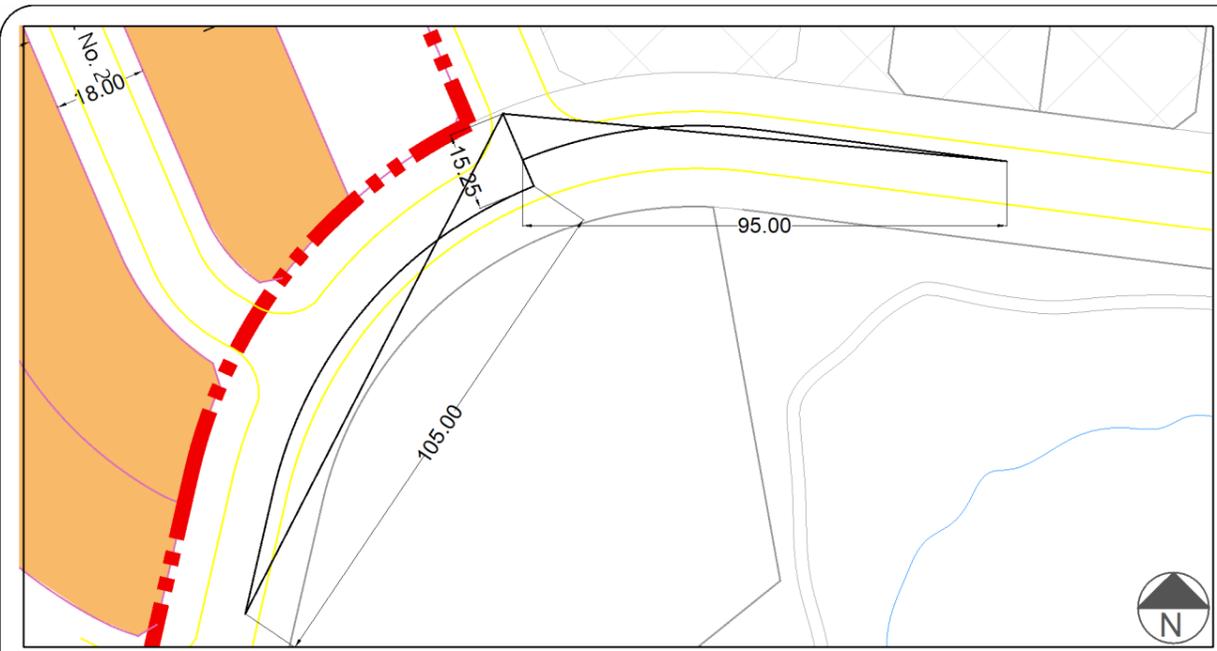
Table 2: TAC Case B2, Right Turn from Stop

Design Speed (km/h)	Stopping Sight Distance (m)	Intersection Sight Distance for Passenger Cars	
		Calculated (m)	Design (m)
50	65	90.4	95

2 Departure Sight Lines

The departure sight lines for each of the accesses are illustrated in Figure 2. No sight line issues are noted for the proposed lotting and intersection locations. The sight lines are contained within the right-of-way for Aquaview Drive.

If new trees are proposed along Aquaview Drive, the locations should be reviewed to not conflict with the sight lines, either maintaining branch/leaf cover above the sight line height or outside of the sight triangle.



Notes:

1	For 2nd Submission	By:	2018/10/17
REV:	DESCRIPTION:	BY:	DATE:
STATUS:			

CGH Transportation
 13 Markham Ave
 Nepean, ON
 K2G 3Z1
 (343) 999-9117

CLIENT: Minto Communities
 ARCHITECT:

SITE: Aquaview
 Plan of Subdivision

TITLE: Sightline Review
 Local Road Intersections

SCALE AT A3: NTS	DATE: 2018-10-17	DRAWN: AH	CHECKED:
PROJECT NO: 2018-34	DRAWING NO: 1	REVISION: R2	