

UPDATE TO THE 2023 DESIGN GUIDELINES MANUAL

LIST OF REVISIONS

5. TRANSPORTATION

Revised the following:

5.0.2. Reference Standards and Guidelines

Ministry of Transportation

- MTO Design Supplement for TAC Geometric Design Guide for Canadian Roads, 2017 (latest revision)

6. SANITARY SEWERS

6.0 General Requirements

Revised the following:

All sanitary sewer and appurtenances are to be designed and constructed in accordance with the current City of St. Thomas Design Guidelines Manual and the Ministry of the Environment, Conservation, and Parks (MECP) Design Criteria for Sanitary Sewers, Storm Sewers and Forcemains for Alterations Authorized under Environmental Compliance Approval (most recent edition).

All sanitary sewers are to be constructed as per City of St. Thomas Supplementary Specifications (most recent edition) and OPSS and OPSD specifications.

6.1.4. Design Criteria

Revised the following:

Development Zoning	Population Density
Low density residential	44 people/ha
Medium density residential	65 people/ha
Institutional (schools, etc)	53 people/ha
Industrial	150 people/ha

Added the following:

- The minimum allowance for commercial flows shall be 28 m³/ha/day. Actual flow monitoring data (covering at least 2 years) at the subject site or a similar site observed locally can be used. For common sewage flow rates for Commercial/Institutional uses, see Table 1 on Page 10 of the MECP Design Criteria, July 2022 version.

6.1.6. Peak Rate of Flow

Revised the following:

P = Tributary population in thousands. At minimum, a peaking factor of 2.0 shall be used in the design.

7. STORM SEWERS

Added the following and updated numbering to sections:

7.0 General

All storm sewers and appurtenances are to be designed and constructed in accordance with the current City of St. Thomas Design Guidelines Manual and the Ministry of the Environment, Conservation and Parks (MECP) "(MECP) Design Criteria for Sanitary Sewers, Storm Sewers and Forcemains for Alterations Authorized under Environmental Compliance Approval (most recent edition).

In cases of new subdivisions, the Engineer is required to establish the geodetic invert elevations and ties of all storm sewer connections at street line and to make this information available on the as-built plans to the City of St. Thomas.

All storm sewers are to be constructed as per OPSS and OPSD specifications and City of St. Thomas Supplementary Specifications.

11. PARKS, OPEN SPACE AND LANDSCAPING

Revised references to Parks and Forestry to "Parks and Recreation".

12. TRAILS AND CONNECTIVITY

Revised the following:

12.1.1. Connectivity

To enhance public comfort and safety, a 3.0 metre tall, 1.0 metre wide buffer area on each side of the community trail shall be designed and maintained in such a way that sightlines are preserved. If a trail crosses a City street, appropriate signage is required. If barriers are required, they must not interfere

with visibility or create entrapment areas. In situations where a community trail is designed within the active storage area, the 1.0 metre wide buffer area adjacent the trail shall have a 5:1 maximum slope. The buffer area shall be planted with low ground cover.

12.1.3. Benches

The Parks and Forestry division of the City of St Thomas encourages the Memorial bench program for site furnishings along recreational trails. Pre-determined bench styles are placed at approximately 150m/500ft for rest areas. Styles and locations should be approved through the Parks and Forestry Division. In natural environment or other areas with unsuitable conditions, fewer benches may be appropriate. In such cases, the designer should consult with the Parks and Forestry Division to determine alternate locations.

13. STREET LIGHTING

Revised the following:

13.0. General

This section describes the standards to be followed for the design of street lighting in the City of St. Thomas and is to be used where required in conjunction with IESNA RP-8-21 Standard Practice for Roadway Lighting and the TAC Guide for Design of Roadway Lighting.

The classification of roadways and their recommended luminance light levels are as per IESNA RP-8-21 and TAC-2006 Guide for the Design of Roadway Lighting.

14. EROSION AND SEDIMENT CONTROL

Revised references to Sediment and Erosion Control to "Erosion and Sediment Control".

14.0. General

The erosion and sediment control (ESC) measures as indicated on the servicing drawings shall be installed and implemented prior to any construction taking place.

Erosion and sediment control measures and notes are to be identified on all lot grading drawings, storm water management facility drawings, channels, outlet structure drawings and plan and profile drawings where applicable. If erosion and sediment control measures are extensive, a separate drawing may be required.

The ESC plan, ESC measures and its installation, inspections and maintenance shall have regard to at least one of the following:

- CSA W202 Erosion and Sediment Control Inspection and Monitoring Standard, as amended from time to time;
- Erosion and Sediment Control Guideline for Urban Construction (2019), as amended from time to time, prepared by the Toronto Region Conservation Authority; or
- CSA W208 Erosion and Sediment Control Installation and Maintenance, as amended from time to time.

For any construction project, both private or City-led, records of ESC inspections need to take place on a regular basis, especially after a rainfall event or after a snow melt, to ensure ESC measures are working and in place. The records shall have the following:

- Include the name of the inspector, date of inspection, visual observations, and the remedial measures, if any, undertaken to maintain the temporary ESC measures.
- Be retained with records relating to the construction activity. If this construction activity is related to a subdivision development, the Developer and their Engineer shall provide these records to the City upon Substantial Completion as per the Development Agreement.
- Be retrievable and made available to the MECP upon request.
- Any regulated works other than those identified on the engineering drawings shall require additional approvals from all applicable authorities.

15. STANDARD DRAWINGS

No changes to drawings and will maintain the current revision dates.

TREE PLANTING LIST

Added link to St. Thomas Municipal Tree Bylaw 60-2019.