Professional Engineers Act Loi sur les ingénieurs

ONTARIO REGULATION 260/08 PERFORMANCE STANDARDS

Consolidation Period: From July 1, 2014 to the e-Laws currency date.

Last amendment: O. Reg. 91/14.

This Regulation is made in English only.

Definitions

1. In this Regulation,

"building" means a building as defined in the Building Code Act, 1992;

"building code" means Ontario Regulation 332/12 (Building Code) made under the *Building Code Act, 1992.* O. Reg. 260/08, s. 1; O. Reg. 91/14, s. 1.

Design of certain buildings

1.1 The following are prescribed as performance standards with respect to the preparation and provision by a professional engineer of a design for the construction, enlargement or alteration of a building described in paragraph 2 of subsection 12 (6) of the Act:

- 1. In preparing the design, the professional engineer shall provide information about the building's compliance with the building code. The information shall be organized in a table and shall be listed under the following headings:
 - i. Project description (new, addition, alteration, change of use).
 - ii. Major occupancy or occupancies.
 - iii. Importance category.
 - iv. Building area.
 - v. Gross area of building.
 - vi. Number of storeys above and below grade.
 - vii. Building height.
 - viii. Number of streets and access routes.
 - ix. Building classification.
 - x. Sprinkler system proposal.
 - xi. Standpipe requirements.
 - xii. Fire alarm requirements.
 - xiii. Adequacy of water service or supply for fire fighting purposes.
 - xiv. Whether the building is a high building.
 - xv. Construction restrictions (combustible, non-combustible or both).
 - xvi. Mezzanine information (number, area, locations).
 - xvii. Occupancy load per floor and method of determination.
 - xviii. Provision of barrier-free design.
 - xix. Presence of hazardous materials in the building.
 - xx. Requirements respecting fire resistance rating of horizontal assemblies and supporting members.
 - xxi. Exterior wall construction type and requirements respecting spatial separations.
 - xxii. Plumbing fixture requirements.

- 2. The professional engineer shall ensure that the table is affixed to the topmost sheet of the drawings that he or she prepares as part of the application for a building permit for the building's construction, enlargement or alteration, or is included in the drawings in a similarly prominent location.
- 3. The professional engineer shall provide a copy of the table to any other person who the professional engineer knows to be responsible, for the purposes of the building code, for any portion of the design of the construction, enlargement or alteration of the building. O. Reg. 91/14, s. 2.

Construction of a building

2. (1) In this section,

"construct" and "construction" have the same meaning as in the Building Code Act, 1992;

"plans and specifications" means a plan or other document which formed the basis for the issuance of a building permit and includes any changes to the plan or other document that are authorized by the chief building official as defined in the *Building Code Act, 1992.* O. Reg. 260/08, s. 2 (1).

(2) The following are prescribed as performance standards with respect to the general review of the construction of a building by a professional engineer as provided for in the building code:

- 1. The professional engineer, with respect to the matters that are governed by the building code, shall,
 - i. make periodic visits to the construction site to determine, on a rational sampling basis, whether the work is in general conformity with the plans and specifications for the building,
 - ii. record deficiencies found during site visits and provide the client, the contractor and the owner with written reports of the deficiencies and the actions that must be taken to rectify the deficiencies,
 - iii. review the reports of independent inspection and testing companies called for in the plans and specifications and which pertain directly to the work being reviewed,
 - iv. interpret plans and specifications in writing when requested to do so by the client, the contractor or the owner, and
 - v. review shop drawings and samples submitted by the contractor for consistency with the intent of the plans and specifications.
- 2. The professional engineer may delegate one or more of the functions or requirements described in paragraph 1 to another person if it is consistent with prudent engineering practice to do so and the functions or requirements are performed under the supervision of the professional engineer. O. Reg. 260/08, s. 2 (2).

(3) Subsection (2) applies with necessary modifications to a limited licence holder, if the holder undertakes a general review of the construction of a building. O. Reg. 260/08, s. 2 (3).

Demolition

3. (1) In this section,

- "demolish" means to do anything in the removal of a building or structure, as the case may be, or of any material part of a building or structure;
- "demolition plan" means a plan or other document prepared by a professional engineer, limited licence holder or provisional licence holder in accordance with subsection (3) with respect to the demolition of a building or structure, and includes any changes to the plan or other document that are made by a professional engineer, limited licence holder or provisional licence holder;
- "methodology" means a detailed description of the systematic and sequential procedure for cutting, destroying, removing or otherwise demolishing a building or structure in a manner that does not endanger the health or safety of any persons or negatively affect the integrity of any other buildings, structures, buried or above ground utilities or any other real property;

"structure" means any permanent structure other than a building, including a bridge, dam or lock. O. Reg. 260/08, s. 3 (1).

(2) The following are prescribed as performance standards with respect to the general review of the demolition of a building by a professional engineer as provided for in the building code:

- 1. The professional engineer shall not undertake a general review of the demolition of a building unless,
 - i. the professional engineer has satisfied himself or herself that a permit for the demolition has been issued under the *Building Code Act, 1992*, and
 - ii. a demolition plan has been prepared with respect to the demolition.
- 2. The professional engineer shall,

- i. make periodic visits to the demolition site to determine whether the demolition is proceeding in general conformity with the demolition plan,
- ii. record any material deviation from the demolition plan found during a site visit and as soon as reasonably possible notify the client, the contractor and the owner in writing of the deviation and of the professional engineer's opinion on the impact the deviation may have on the health or safety of any person or the integrity of any other building, structure, buried or above ground utility or any other real property,
- iii. record any site condition or other issue relating to the demolition identified during a site visit that may endanger the health or safety of any person or the integrity of any other building, structure, buried or above ground utility or any other real property and as soon as reasonably possible notify the client, the contractor and the owner in writing of the condition or other issue,
- iv. notify the client, the contractor and the owner in writing about any site condition or other issue that requires the demolition plan to be changed,
- v. review the reports of any independent inspection and testing companies called for in the demolition plan and which pertain directly to the work being reviewed, and
- vi. interpret the demolition plan in writing when requested to do so by the client, the contractor or the owner. O. Reg. 260/08, s. 3 (2).
- (3) The following are prescribed as performance standards with respect to the preparation of a demolition plan:
- 1. The professional engineer, limited licence holder or provisional licence holder shall, before preparing a demolition plan with respect to the demolition of a building or structure,
 - i. visit and examine the demolition site in order to assess site limitations and adjacent conditions that may affect the content of the demolition plan, and
 - ii. verify the structural characteristics and condition of the building or structure by conducting one or more inspections of the building or structure and by reviewing any existing drawings or specifications relating to the building or structure.
- 2. The professional engineer, limited licence holder or provisional licence holder shall include in a demolition plan made with respect to the demolition of a building or structure,
 - i. a description of the structural characteristics and condition of the building or structure as verified by the professional engineer, limited licence holder or provisional licence holder under subparagraph 1 ii,
 - ii. the methodology a contractor should follow in demolishing the building or structure,
 - iii. a description of the measures necessary to ensure that the health or safety of any person, including an occupant of a building being demolished if the building is not vacated before the demolition commences as permitted by the building code, is not endangered as a result of the demolition,
 - iv. a description of the measures necessary to ensure that the integrity of any other buildings, structures, buried or above ground utilities or any other real property is not negatively affected as a result of the demolition,
 - v. identification of all buried or above ground utilities under or at the demolition site and a description of the requirements for their safe disconnection, removal or protection before the commencement of the demolition,
 - vi. a description of any environmental hazard that would or could arise as a result of the demolition, and of the measures necessary to address the hazard, with reference to the applicable municipal, provincial or federal statutes, regulations, rules, by-laws, codes, standards or other legislation, and
 - vii. identification of any inspection or testing to be carried out by an independent company during the demolition. O. Reg. 260/08, s. 3 (3).

(4) A professional engineer may delegate one or more of the functions or requirements described in subsection (2) to another person if it is consistent with prudent engineering practice to do so and the functions or requirements are performed under the supervision of the professional engineer. O. Reg. 260/08, s. 3 (4).

(5) A professional engineer or limited licence holder may delegate one or more of the functions or requirements described in subsection (3) to another person if it is consistent with prudent engineering practice to do so and the functions or requirements are performed under the supervision of the professional engineer or limited licence holder. O. Reg. 260/08, s. 3 (5).

(6) Subsections (2) and (4) apply with necessary modifications to a limited licence holder, if the holder undertakes a general review of the demolition of a building. O. Reg. 260/08, s. 3 (6).

Engineering evaluation reports under Safe Drinking Water Act, 2002 (drinking water systems)

4. (1) In this section,

- "available" means, in reference to a document, that it is present at or immediately accessible from the site of a drinking water system, whether in paper or electronic format;
- "distribution system", "drinking water system", "raw water" and "raw water supply" have the same meaning as in the *Safe Drinking Water Act*, 2002;
- "Drinking Water Systems Regulation" means Ontario Regulation 170/03 (Drinking Water Systems) made under the *Safe Drinking Water Act*, 2002;
- "operational check equipment" means equipment installed in a drinking water system, or portable equipment present at the site of a drinking water system, for the purpose of carrying out,
 - (a) operational checks, sampling and testing under Schedule 6 to the Drinking Water Systems Regulation, and
 - (b) the maintenance and operational checks under Schedules 8 and 9 to that Regulation. O. Reg. 91/14, s. 3.

(2) The following are prescribed as performance standards with respect to the assessment of a drinking water system and the preparation of an engineering evaluation report on a drinking water system under Schedule 21 to the Drinking Water Systems Regulation by a holder of a licence, temporary licence or limited licence:

- 1. Subject to paragraph 17, the holder shall complete and deliver the report in a timely manner that gives the owner of the drinking water system a reasonable opportunity to meet the timing requirements set out in Schedule 21 to the Drinking Water Systems Regulation.
- 2. The holder shall ensure that the report contains all of the information that section 21-5 of Schedule 21 to the Drinking Water Systems Regulation requires in order for the report to comply with that section.
- The information and opinions that the holder provides in the report shall be based on observations made during one or more visits to the drinking water system by the holder or by a person under his or her supervision, and the holder shall include in the report,
 - i. the date of every visit to the drinking water system for the purposes of preparing the report by the holder or by a person under his or her supervision,
 - ii. in each case, the name of the person who visited the drinking water system, and
 - iii. in the case of a visit by a person under the holder's supervision, the person's title and relationship to the holder.
- 4. The holder shall determine and identify the location of the raw water supply for the drinking water system and shall provide as part of the report,
 - i. an indication as to whether the source of the raw water supply is ground water, surface water, or a combination of the two,
 - ii. a site plan showing,
 - A. the boundary of the drinking water system, any significant topographic features within those boundaries, and an indication of site grading that may impact on the source of the raw water supply,
 - B. the location of all parts of the drinking water system used for the collection, storage and treatment of raw water, and
 - C. the distribution system used for distributing treated water to users of the drinking water system, and
 - iii. the information described in paragraph 5 or 6 or both, as the circumstances require.
- 5. If any part of the source of the raw water supply is ground water, the holder shall,
 - i. include in the site plan the location of any wells that form part of the drinking water system and the location of any known water courses, drains, septic tanks, tile fields and any other structures that may affect the quality of the well water, and
 - ii. a description of the physical characteristics of each well that forms part of the drinking water system including, if available, a copy of the well record, and an indication of whether any of the wells obtains water from a raw water supply that was determined for the purposes of section 2 of the Drinking Water Systems Regulation to be ground water that is under the direct influence of surface water.
- 6. If any part of the source of the raw water supply is surface water, the holder shall state the name of the surface water body.
- 7. The holder shall provide in the report a description of the drinking water system, which shall include, at a minimum,
 - i. an estimate of the number of persons served by the drinking water system,

- ii. a schematic diagram of any treatment process used in the drinking water system for the purpose of meeting the requirements of Schedule 2 to the Drinking Water Systems Regulation, and
- iii. a list of all water treatment equipment and operational check equipment installed in the drinking water system.
- 8. The opinion that the holder provides for the purposes of subclause 21-5 (b) (i) of Schedule 21 to the Drinking Water Systems Regulation respecting whether all equipment required in order to ensure compliance with Schedule 2 to that Regulation is being provided, shall be with respect to all expected flow conditions and quality variations.
- 9. In addition to the opinions required to be included in the report by section 21-5 of Schedule 21 to the Drinking Water Systems Regulation, the holder shall provide in the report his or her opinion regarding,
 - i. the reliability of the water treatment equipment and operational check equipment listed under subparagraph 7 iii and whether there are any redundancies in or observable problems with it, and
 - ii. the operating conditions that must be maintained for the water treatment equipment listed under subparagraph 7 iii in order to ensure that the requirements of Schedule 2 to the Drinking Water Systems Regulation are met.
- 10. The holder shall,
 - i. list in the report all equipment installed or used at the drinking water system, including water treatment equipment and operational check equipment listed under subparagraph 7 iii, that requires periodic maintenance, and
 - ii. review the relevant maintenance records and maintenance schedules that are available for the equipment listed under subparagraph i, and give his or her opinion as to,
 - A. whether the equipment has been inspected, tested, replaced and calibrated at the frequency recommended by the equipment manufacturer,
 - B. if the equipment manufacturer does not recommend a maintenance schedule, whether the existing maintenance schedule for inspection, testing, replacement and calibration of the equipment would provide for reliable operation of the drinking water system, and
 - C. whether the equipment is being inspected, tested, replaced and calibrated so that the drinking water system is in compliance with the applicable requirements set out in Schedules 2, 6, 8 and 9 to the Drinking Water Systems Regulation.
- 11. The holder shall provide reasons for the opinions required to be provided by paragraphs 8, 9 and 10, along with the technical and other information he or she relied on in reaching those opinions.
- 12. The holder shall attach to the report,
 - i. a list of all available manuals and similar information relevant to the operation and maintenance of the water treatment equipment and operational check equipment listed under subparagraph 10 i, and
 - ii. a list of the water treatment equipment and operational check equipment listed under that subparagraph for which such manuals or information are not available.
- 13. In preparing the maintenance schedule referred to under clause 21-5 (d) of Schedule 21 to the Drinking Water Systems Regulation, the holder shall, subject to paragraph 14, base the maintenance schedule on the applicable maintenance schedules contained in the manuals and information referred to in subparagraph 12 i.
- 14. If a maintenance schedule for a piece of equipment is not available, or if the holder is of the opinion that the available maintenance schedule would not provide for the reliable operation of the drinking water system or ensure compliance with the applicable requirements of Schedules 2, 6, 8 and 9 to the Drinking Water Systems Regulation, the holder shall develop a maintenance schedule for the equipment that would, if followed, provide for such operation and compliance.
- 15. If the holder determines that water treatment equipment or operational check equipment at a drinking water system may be bypassed, or discovers any other problem with the drinking water system that, in his or her opinion, may lead to improperly treated water being delivered to users of the drinking water system but does not constitute a failure to comply with Schedule 2, 6, 8 or 9 to the Drinking Water Systems Regulation, he or she shall include in the report a description of the problem, together with recommendations that would rectify the problem or mitigate risks associated with it.
- 16. If at any time during the assessment of the drinking water system or the preparation of the report the holder determines that the drinking water system does not comply with a requirement in Schedule 2, 6, 8 or 9 to the Drinking Water Systems Regulation and that the lack of compliance may lead to improperly treated water being delivered to users of the drinking water system, he or she shall immediately inform the owner of the drinking water system in writing of the fact, identifying those provisions of the Drinking Water Systems Regulation with which the drinking water system does not comply and the problems that need to be resolved, and recommending changes that would bring the drinking water system into compliance.

- 17. If the holder makes the determination described in paragraph 16, the holder shall not complete the report, subject to paragraph 18.
- 18. If the owner of the drinking water system notifies the holder in writing that the changes recommended under paragraph 16 have been made, the holder shall review the changes, and if, in the holder's opinion, the altered drinking water system is in compliance with Schedules 2, 6, 8 and 9 to the Drinking Water Systems Regulation, the holder shall complete the report.
- 19. On completing a report, the holder shall promptly sign and give to the owner of the drinking water system a declaration, in the form provided for the purpose by the Ministry of the Environment, containing the opinion of the holder that is required to be provided for the purposes of clause 21-5 (b) of Schedule 21 to the Drinking Water Systems Regulation. O. Reg. 91/14, s. 3.

Environmental site assessment reports

5. (1) In this section,

"environmental site assessment" means an investigation in relation to land to determine the environmental condition of property, and includes a phase one environmental site assessment or a phase two environmental site assessment under Ontario Regulation 153/04 (Records of Site Condition — Part XV.1 of the Act) made under the *Environmental Protection Act*. O. Reg. 91/14, s. 3.

(2) A holder of a licence, temporary licence or limited licence who prepares or supervises the preparation of a report as part of an environmental site assessment shall ensure that the following is included on the signature page of the report:

- 1. In the case of a report for a phase one environmental site assessment or a phase two environmental site assessment under Ontario Regulation 153/04 (Records of Site Condition Part XV.1 of the Act), a statement that the objectives and requirements set out in that Regulation for a phase one environmental site assessment or a phase two environmental site assessment, as the case may be, were applied in carrying out the environmental site assessment and preparing the report.
- 2. In any other case, a statement specifying which objectives, requirements or standards were applied in carrying out the environmental site assessment and preparing the report. O. Reg. 91/14, s. 3.

Back to top