
Draft Regulations

Draft regulation

Building Act
(chapter B-1.1)

Construction Code — Amendment

Notice is hereby given, in accordance with sections 10 and 11 of the Regulations Act (chapter R-18.1), that the Regulation to amend the Construction Code, appearing below, may be approved by the Government, with or without amendment, on the expiry of 45 days following this publication.

The draft Regulation amends Chapter I.1 of the Construction Code (chapter B-1.1, r. 2), Energy efficiency of buildings. It adds a requirement concerning the management of the peak electrical power demand, applicable only where the path selected to ensure the compliance of a building with the requirements of the Code is the energy performance path, provided for in the Code. The new requirement takes into account the maximum electrical power demand of the proposed building, for the period from 1 December to 31 March, and provides that the sum of that demand and of the annual energy consumption of the building must be equal to or lower than that calculated for the reference building provided for in the Construction Code.

The new measure is not likely to generate additional costs for the public or for enterprises, including small and medium-sized businesses.

Further information on the draft Regulation may be obtained by contacting Nathalie Lessard, architect, Régie du bâtiment du Québec, 255, boulevard Crémazie Est, 1^{er} étage, Montréal (Québec) H2M 1L5; telephone: 514 873-5935; email: nathalie.lessard@rbq.gouv.qc.ca.

Any person wishing to comment on the draft Regulation is requested to submit written comments within the 45-day period to Caroline Hardy, Secretary General and Director of Institutional Affairs, Régie du bâtiment du Québec, 800, place D'Youville, 16^e étage, Québec (Québec) G1R 5S3; email: projet.reglement.commentaires@rbq.gouv.qc.ca.

JEAN BOULET
Minister of Labour

Regulation to amend the Construction Code

Building Act

(chapter B-1.1, s. 173, 1st par., 2nd par., 3rd par., subpars. 1 and 6, and 4th par., s. 176.1, s. 178, s. 185, pars. 0.4 and 38, and s. 192)

1. The Construction Code (chapter B-1.1, r. 2) is amended in section 1.1.6

(1) by inserting the following lines, in numerical order, in the section of the table amending Part 8 of Division B of the National Energy Code of Canada for Buildings 2015 and in the section of the table amending Part 2 of Division C of that Code:

Articles	Amendments
Division B Part 8	
8.4.1.1	Replace “annual energy consumption” in Sentence (2) by “annual energy needs”.
8.4.1.2.	<p>Replace Sentence (2) by the following:</p> <p>“(2) The annual energy needs of the proposed <i>building</i> must not be greater than those of the reference <i>building</i> and must assessed as follows:</p> $2200 D_{\text{Prop}} + \text{AEC} \leq 2200 D_{\text{Ref}} + \text{BET}$ <p>where</p> <p>D_{Prop} = the maximum power demand of the electrical system determined during one year, from 1 December to 31 March inclusively, analyzed using time intervals no greater than 15 minutes unless the calculation engine only offers 60-minute intervals, for the proposed <i>building</i>, in kW;</p> <p>AEC = the <i>annual energy consumption</i> of the proposed <i>building</i>, corresponding to the sum of the annual electricity needs, in kW × h, and the annual fuel needs, in kW × h equivalents;</p> <p>D_{Ref} = the maximum power demand of the electrical system determined during one year, from 1 December to 31 March inclusively, analyzed using time intervals no greater than 15 minutes unless the calculation engine only offers 60-minute intervals, for the reference <i>building</i>, in kW; and</p> <p>BET = the <i>building energy target</i> of the reference <i>building</i> corresponding to the sum of the annual electricity needs, in kW × h, and the annual fuel needs, in kW × h equivalents;”.</p>

Articles	Amendments
8.4.3.	<p>Replace the heading by the following: “8.4.3. Annual energy consumption and maximum power demand of the electrical system of the proposed building”.</p>
8.4.3.1.	<p>Replace Sentence (1) by the following: “(1) The <i>annual energy consumption</i> and the maximum power demand of the electrical system of the proposed <i>building</i> must be calculated in accordance with this Subsection.”.</p>
8.4.4.	<p>Replace the heading by the following: “8.4.4. Building energy target and maximum power demand of the electrical system of the reference building”.</p>
8.4.4.1.	<p>Replace Sentence (1) by the following: “(1) The <i>building energy target</i> and the maximum power demand of the electrical system of the reference <i>building</i> must be calculated based on the parameters described in this Subsection.”.</p>
Division C Part 2	
2.2.2.8.	<p>Replace Clauses (3)(f)(iv) and (3)(f)(v) by the following:</p> <ul style="list-style-type: none"> “(iv) the <i>building energy target</i> of the reference <i>building</i> (sum of all energy sources), in MJ; (v) a breakdown of energy consumption, by energy source, for the following components and technical installations of the <i>building</i>: space-heating equipment, space-cooling equipment, <i>interior lighting</i>, <i>service water</i> heating devices, elevators and escalators, fans, pumps and other HVAC equipment, and various equipment, including receptacle equipment; and (vi) the maximum power demand of the electrical system determined during one year, from 1 December to 31 March inclusively, analyzed using time intervals no greater than 15 minutes unless the calculation engine only offers 60-minute intervals, for the proposed building and for the reference <i>building</i>, in kW.”;

Articles	Amendments
	Replace Sentence (5) by the following: “(5) If the annual energy needs of the proposed <i>building</i> are not greater than the annual energy needs of the reference <i>building</i> , the report must specify that the proposed <i>building</i> meets the requirements of the annual energy needs, as described in Article 8.4.1.2. and in this Code.”.

(2) by replacing the amendment to replace Figure A-1.1.2.1., in the section of the table amending Schedule A of Part 1 of Division B of the National Energy Code of Canada for Buildings 2015, by the following:

“Replace Figure A-1.1.2.1. by the following:

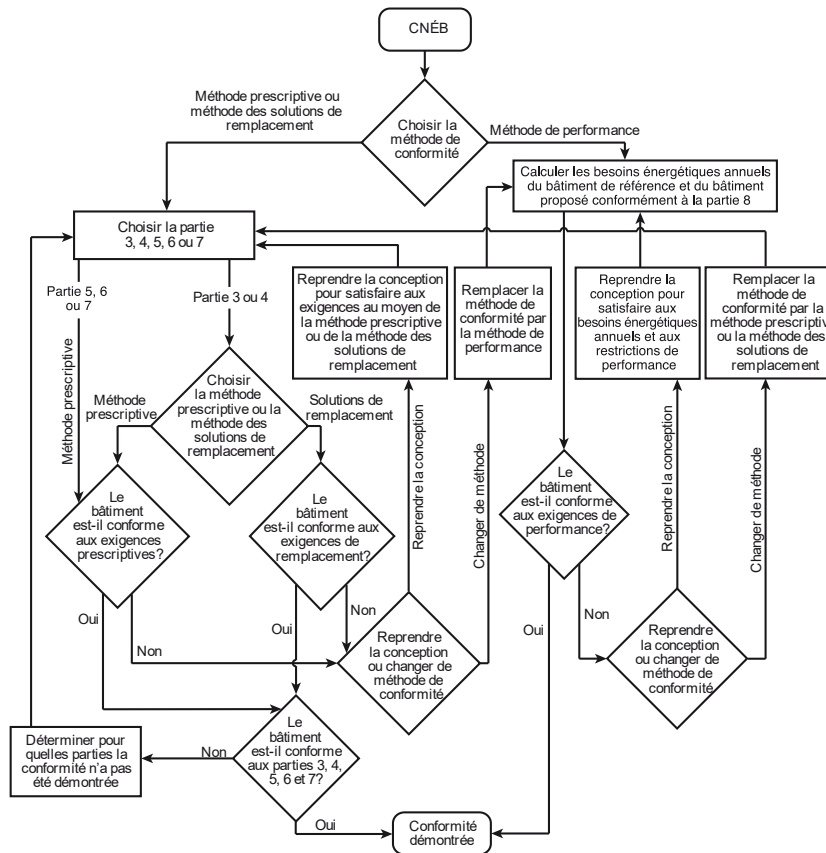


Figure A-1.1.2.1. Decision flow chart for Code compliance”.

(3) by replacing Sentence (2) of the amendment to replace Article 8.4.2.2., in the section of the table amending Part 8 of Division B of the National Energy Code of Canada for Buildings 2015, by the following:

“(2) The same program must be used to determine the maximum power demand of the electrical system and the *annual energy consumption* of the proposed *building*, as well as the maximum power demand of the electrical system and the *building energy target* of the reference *building*.”.

(4) by replacing Note A-8.4.1. of the amendment to add Notes A-8.1.1.2., A-8.4.1 and A-8.4.1.2. (3) and (4), in the section of the table amending Schedule A of Part 8 of Division B of the National Energy Code of Canada for Buildings 2015, by the following:

“**A-8.4.1. Compliance.** The energy performance compliance path offers designers an alternative to the prescriptive requirements and trade-offs in Parts 3 to 7 of the Code. Those prescriptive requirements and trade-offs constitute compliance demonstration means that are relatively simple to apply, but offer less flexibility to designers who wish to design projects that meet the regulatory objectives without necessarily applying all the prescriptive requirements of the Code. For example, the energy performance compliance path allows the increase of the fenestration area of an immovable above the prescribed limit. In return, the designer may choose a heat-recovery unit with an efficiency greater than the minimum prescribed requirements that will make up for energy efficiency losses caused by the increase of the fenestration area. The objective is that the annual energy needs of the proposed building are lower than or equal to the annual energy needs of the reference building, determined according to the energy performance compliance path provided for in this Part.

Contrary to the prescriptive requirements and trade-offs, the energy performance compliance path allows accounting the cross effects and interdependence of solutions implemented in the proposed building. For example, the importance of thermal gains from indoor lighting systems will have an impact on the sizing of the HVAC systems and their subsequent energy consumption. Similarly, the efficiency of a heating system will influence the choice of a designer to further insulate the building envelope in order to achieve the annual energy needs of the reference building.”.

(5) by replacing Note A-8.4.2. in the amendment to add Notes A-8.4.1.4. (3), A-8.4.2. and A-8.4.2.2. (1), in the section of the table amending Schedule A of Part 8 of Division B of the National Energy Code of Canada for Buildings 2015, by the following:

“**A-8.4.2. Compliance Calculation.** The maximum power demand of the electrical system and the annual energy consumption are evaluated by an energy modeling software, also called energy simulation software. The software includes at least one program, also called calculation engine. The software often includes graphic interfaces facilitating data entry and result analysis.”.

2. This Regulation comes into force on the forty-fifth day following the date of its publication in the *Gazette officielle du Québec*.

106458

Draft Regulation

Building Act
(chapter B-1.1)

Construction Code

Application of the Act —Amendment

Notice is hereby given, in accordance with sections 10 and 11 of the Regulations Act (chapter R-18.1), that the Regulation to amend the Construction Code and the Regulation respecting the application of the Building Act, appearing below, may be approved by the Government, with or without amendment, on the expiry of 45 days following this publication.

The draft Regulation replaces Chapter IV, Elevators and other elevating devices, to include by reference the 2019 editions of ASME A17.1-2019/CSA B44:19, Safety Code for Elevators and Escalators, and CSA B355:19, Platform lifts and stair lifts for barrier-free access, published by CSA Group, to which amendments have been made to meet the specific needs of Québec.

The draft Regulation provides that before carrying out construction work on an elevator or other elevating device other than maintenance, repair or demolition work, plans and specifications must be prepared by a recognized person. The draft Regulation also provides that, following such work, a certificate of conformity with the Construction Code (chapter B-1.1, r. 2) must be produced by a recognized person and sent to the Régie du bâtiment du Québec.

The draft Regulation also designates, in the Construction Code (chapter B-1.1, r. 2), the elevators and other lifts that are facilities intended for use by the public and strikes out such designations in the Regulation respecting the application of the Building Act (chapter B-1.1, r. 1).

The measures proposed will result in additional construction costs estimated at \$38.9 million per year.

Further information on the draft Regulation may be obtained by contacting Amar Khif, engineer, Direction de la réglementation, Régie du bâtiment du Québec,

255, boulevard Crémazie Est, Bureau 100 Montréal (Québec) H2M 1L5; telephone: 514-864-8902; email: amar.khif@rbq.gouv.qc.ca.

Any person wishing to comment on the draft Regulation is requested to submit written comments within the 45-day period to Caroline Hardy, Secretary General and Director of Institutional Affairs, Régie du bâtiment du Québec, 800, place D'Youville, 16^e étage, Québec (Québec) G1R 5S3; email: projet.reglement.commentaires@rbq.gouv.qc.ca.

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