



April 29<sup>th</sup>, 2024

Canadian Board for Harmonized Construction Codes  
1200 Montreal Road, building M-20  
Ottawa, Ontario K1A 0R6

Via email: [Codes.publicreview@nrc-cnrc.gc.ca](mailto:Codes.publicreview@nrc-cnrc.gc.ca)

To whom it may concern,

**Re: Public review of proposed changes to the 2020 National Model Codes**

On behalf of the Canadian Federation of Agriculture (CFA), we offer the following joint submission on the Proposed Change 1807, the Introduction of Requirements for Screens and Curtains Used in Farm Buildings. These comments are supported by Fruit and Vegetable Growers of Canada (FVGC), Flowers Canada (FCG), Keystone Agricultural Producers (KAP), and BC Agriculture Council (BCAC).

The CFA is Canada's largest general farm organization, representing approximately 190,000 farm families from coast to coast to coast. CFA's mission is to promote the interests of Canadian agriculture and agri-food producers and ensure the continued development of a viable and vibrant agriculture and agri-food industry in Canada.

The FVGC is an Ottawa-based voluntary, not-for-profit, national association that represents fruit and vegetable growers across Canada. These growers are involved in the production of over 120 different types of crops, with farm cash receipts of \$6.9 billion in 2022. Since 1922, in collaboration with members and the government, FVGC has advocated on important issues to ensure a viable future for Canada's fruit and vegetable sector. As part of these efforts, FVGC represents the greenhouse vegetable sector which contributes an estimated \$3.7 billion to the Canadian economy with \$2.2 billion in farm gate sales.

FCG is the national not-for-profit association representing producers of greenhouse flowers and plants across Canada. Flower growers across Canada represented farm gate sales of over \$2 billion, and exports of \$934 million in 2023. In addition, the sector contributes significantly to the Canadian economy with a gross output economic impact multiplier of 1.9, or \$3.94 billion in economic impact. FCG works to give these producers a voice on issues of national urgency and importance.

Keystone Agricultural Producers (KAP) is Manitoba's general farm policy organization, providing a unified voice for farmers on issues that affect agriculture. KAP represents and promotes the interests of 4,400 producers and 19 commodity associations.

Through its membership of 30 unique commodity groups, BCAC represents the interests of about 20,000 farm families in British Columbia, who together account for 96% of farm gate sales in that province.



Our organizations appreciate the importance of ensuring the life safety of building occupants in case of fire. We also acknowledge that the Canadian Board for Harmonized Construction Codes (CBHCC) has developed the Proposed Change with a view to consistency across building types with Article 2.3.2.1. of Division B of the National Fire Code of Canada on the one hand and, on the other hand, ensuring the distinct uses of agricultural buildings are supported. This effort toward achieving an appropriate balance is reflected, for example, in Note A-2.3.2.4. (1), an exemption which we support.

However, our organizations are concerned that achieving the separations envisioned in Note A-2.3.2.4. (2) would fundamentally alter the characteristics of some agricultural buildings, particularly greenhouses. This is because plant growth within these structures relies upon adequate airflow and light control, and the essential purpose of a greenhouse is to support healthy plant growth. Airflow within a greenhouse could be obstructed if the building were to comply with proposed Clause 2.3.2.4(2)(c), while light control would be difficult or impossible if blackout or light diffusion screens were to be spaced within a greenhouse in such a way as to comply with proposed Clause 2.3.2.4(2)(a). In effect, Proposed Change 1807 would leave no other option than for greenhouse owners to install screens or curtains that comply with proposed Clauses 2.3.2.4(1) or 2.3.2.4(2)(b), which the accompanying impact analysis notes would substantially increase the material costs associated with operating a greenhouse.

We believe that no change to the National Building Code of Canada or the National Fire Code of Canada should fundamentally alter the characteristics of a building type. This is especially so if the changes undermine the essential purposes of that building type. Therefore, we strongly encourage the Committee to consider amending Proposed Change 1807 to include an exemption for greenhouses like the exemption granted to bird-control screens made from lightweight plastic mesh described in Note A-2.3.2.4(1).

If an exemption is not to be granted to greenhouses as proposed here, Proposed Change 1807 must be amended to include a phase-in period for the new requirements of at least five years. This will not only limit the potential financial impact on greenhouse operators who may have recently installed curtains or screens that would not meet the requirements in proposed Clauses 2.3.2.4(1) or 2.3.2.4(2), but it would also allow sufficient time for education and awareness-building among greenhouse operators and builders, thereby limiting the need for compliance and enforcement within the agriculture sector.

For example, in some regions of Canada, greenhouse operators and builders have previously installed curtains and screens that comply with the California Code of Regulations, Title 19, Chapters 2, 7, and 8, collectively known as the California Flame Retardant Regulations. This was done out of a widespread belief within the sector that these standards were more rigorous than those in the National Fire Code of Canada. In consulting with our members regarding Proposed Change 1807, it was not readily apparent to many greenhouse operators and builders whether a structure that meets the standards set by the California Flame Retardant Regulations would still comply with the standards envisioned in Proposed Change 1807.

Clearly, there is a need for much more engagement with greenhouse operators and builders to ensure there is a better understanding of the extent to which the sector is already in compliance. The accompanying text to Proposed Change 1807 describing the enforcement implications underestimates the seriousness of this need for awareness-building. While it may certainly be true that “authorities having jurisdiction are familiar with flame-test requirements for materials,” this is not always true for those responsible for building and operating the structures that would be affected by Proposed Change 1807.

Furthermore, it is important to note that some curtains or screens are external to agricultural buildings. For example, livestock barns may have roll-up curtain systems that normally function as the exterior wall of the building but are sometimes raised to allow optimum ventilation in hot and humid weather. In a fire situation, such screens would not delay a person from exiting the barn safely because they constitute part of the exterior to that barn and would not reasonably be used as an exit route. As another example, high tunnels or hoop houses are farm buildings that typically consist of a metal frame over which a curtain or screen is stretched. In this latter example, the application of Proposed Change 1807 would again fundamentally alter the characteristics of the building type since the curtain or screen effectively constitutes the entire structure of a high tunnel or hoop house.

We strongly recommend that the Committee amend Proposed Change 1807 to stipulate that curtains or screens that constitute all or part of the exterior of an agricultural building are exempted. This would ensure that the fundamental characteristics of a high tunnel or hoop house are not affected by the Proposed Change and that the standards are applied to only those situations which could reasonably impact life safety.

The accompanying text to Proposed Change 1807 describing the problem the CBHCC is seeking to address notes, “the cost and continuity of farming operations are key issues within the agricultural industry. As such, reasonable provisions need to be added to the Code to balance these issues with the life-safety aspects of large farm buildings.” The amendments described in this submission are needed to achieve that balance. In summary, these are:

- Specifying that Sentence 2.3.2.4.(1) is not intended to apply to greenhouses, or phasing in the requirement over a period of no less than five years, and
- Specifying that Sentence 2.3.2.4(1) is not intended to apply to any screens or curtains that form all or part of the external surface of an agricultural building.

We kindly ask you to respond to our members’ feedback to the proposed changes, and recommendations to improve the consultation processes for large farm buildings/greenhouses:

- Establish a risk profile with supporting data to demonstrate a need and justifies the proposed changes within the published impact analysis.
- Engage in robust discussion to arrive at proposed changes in collaboration with certified architects, engineers and authorities that interact with greenhouse operators.
- In particular inform these discussions with information from manufactures, who develop, test, and sell the curtain and screen solutions our members implement, e.g., Ludvig Svensson and Ridder, as well as service providers who install (and maintain/repair) flame



retardant curtains for greenhouse operators to evaluate and measure the lifespan of materials, and to provide valuable insights into energy and blackout screen solutions on the market.

- Recognize the modernization and consolidation of insurance coverage in greenhouse operators' policies whereby underwriters, e.g., Hortica, Hagalunie, stipulate a requirement for flame retardant curtains and screens.
- Support grower compliance by ensuring proposed changes align with various entities with regulatory mandates and oversight, including Municipal governments (building permits, fire departments, and building inspectors).
- Assess the impact of the administrative burden on greenhouse growers who must prepare for inspections and compliance verification.
- Provide technical assistance to help growers assess their operations, plan for compliance, provide guidelines and transitional provisions/flexibility, and alleviate the financial costs.

Our members promote worker safety and compliance to a range of national, provincial and municipal regulations. Greenhouse growers are known for their early adoption of high-tech innovation that demonstrate their commitment to excellence within their environment-controlled production systems.

We would welcome further discussions relevant not solely to this proposed code change, but any set of subsequent future recommendations which would impact greenhouse buildings. Thank you for your consideration in this matter.

If the Committee might require any additional information or details in support of this submission, please do not hesitate to contact Brodie Berrigan, Director of Government Relations and Farm Policy at [brodie@canadian-farmers.ca](mailto:brodie@canadian-farmers.ca).

We would welcome the opportunity to discuss these issues further.

Sincerely  
Keith Currie President,  
Canadian Federation of Agriculture  
21 Florence Street | Ottawa, ON | K2P 0W6