

Water Supplies and Access for Fire Fighting

ISSUE

Fire safety provisions for owners, workers and firefighters at construction and demolition sites are established in **Section 5.6 Construction and Demolition Sites** of Division B of the Alberta Fire Code (AFC). Prior to the adoption of these requirements in the AFC there has been an inconsistent understanding and application of these measures.

Article 5.6.1.4. Access for Fire Fighting sets out specific conditions to give the fire department the ability to ensure that fire fighting crews, equipment and apparatus can reach a construction or demolition site in order to effectively control a fire situation. These provisions also ensure that firefighters have access to all levels of the buildings on the site and to the portable and fixed fire protection equipment serving the site.

During the public review of recommendations for High Intensity Residential Fires (HIRF) it was determined that concerns regarding fire department access and water supplies for fire fighting be further clarified.

INTERPRETATION

The AFC applies to all construction and demolition sites including single family residential developments.

The owner, developer or contractor responsible for a construction or demolition site is required to incorporate measures which:

- a) provide the fire department with unobstructed access to roads, routes, stairways and lifts (where applicable) that accommodates fire fighting personnel, apparatus and equipment,
- b) ensure that unobstructed access is always provided to fire hydrants (or other water supplies and connections acceptable to the authority having jurisdiction) serving the site as well as to the portable extinguishers and fire department connections for standpipe and sprinkler systems on the site, and
- c) verifying, in cooperation with the municipality and the fire department, that water supply systems, where required by the Alberta Building Code (ABC), the AFC, municipal infrastructure standards, development permit conditions and/or subdivision approval, are operational and sufficient for firefighting operations.

Given the potential complexity that may be involved in undertaking these measures on any particular site or sites based on:

- weather,
- location,
- road surfaces,
- geography,
- topography,
- security provisions,
- shared access to infrastructure,
- impacts of other related activities,
- material storage,
- parking of vehicles and equipment
- multiple employees and/or employers,
- multiple owners of multiple sites, and
- other issues that may arise during construction or demolition,

It is critical that regular communication take place between the owner(s), developer(s), municipality and the building and fire authorities to ensure that appropriate action has been taken and that these measures and equipment are maintained and continue to operate to an acceptable level throughout the duration of construction and, where applicable, on into the occupancy phase.

All of the matters noted above are required to be taken under consideration and addressed where applicable in the required Fire Safety Plan as per Article 5.6.1.3. of the AFC.