ULC STANDARD

ULC-S135:2004-AM1-R2016 (Reaffirmed 2016)

STANDARD TEST METHOD FOR THE DETERMINATION OF COMBUSTIBILITY PARAMETERS OF BUILDING MATERIALS USING AN OXYGEN CONSUMPTION CALORIMETER (CONE CALORIMETER)

Prepared and Published by:



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The intended primary application of this standard is stated in its scope. It is important to note that it remains the responsibility of the user of the standard to judge its suitability for the particular application.

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AMENDMENT NOTICE

UNDERWRITERS' LABORATORIES OF CANADA

STANDARD TEST METHOD FOR THE DETERMINATION OF COMBUSTIBILITY PARAMETERS OF BUILDING MATERIALS USING AN OXYGEN CONSUMPTION CALORIMETER (CONE CALORIMETER)	ULC-S135-04
AMENDMENT 1	DATE OF AMENDMENT: AUGUST 2006

The following amendments are being incorporated into ULC-S135-04:

- 1. Revised Clause 6.1.5
- 2. Note added to Clause 6.1.6
- 3. Note added to Clause 8.2.8.1

NOTICE

PLEASE NOTE THAT THIS STANDARD INCLUDES AMENDMENT(S). THE CURRENT EDITION OF THIS STANDARD IS <u>NOT</u> VALID UNLESS USED TOGETHER WITH THE AMENDMENT(S).

IT IS POSSIBLE, HOWEVER, THAT CERTAIN CODES WILL REFER TO THE SUPERSEDED EDITION OF THIS STANDARD, WITHOUT THE AMENDMENT(S). IN THOSE INSTANCES, THE COMPILATION OF THIS DOCUMENT ALLOWS FOR REFERENCE TO BE MADE TO THE STANDARD PRIOR TO THE INCLUSION OF THE AMENDMENT(S).

6.1.5 When the test specimen is a material or composite that would normally be attached to a well-defined substrate, it shall be tested in conjunction with that substrate using the recommended fixing technique, and bonded with the appropriate adhesive or mechanically attached.

6.1.6 The composite material or assembly shall be prepared as specified in 6.1.1 through 6.1.3 and exposed in a manner typical of end use conditions. The influence of the underlying layers shall be understood and care taken to ensure that the test result obtained is relevant to its use in practice.

Note: If a composite material referenced in Clauses 6.1.5 and 6.1.6 consists of discrete layers and testing reveals that the surface layer or layers protect the underlying layers such that complete combustion of the underlying layers does not occur, the National Building Code 2005 requires the outer layers be removed sequentially until all layers have been exposed during testing, or until complete combustion occurs.

8.2.8.1 The total *heat release* per unit area as determined by clause 10.2.5.2 shall be compared for the three specimens. If any of these readings differ by more than 10% from the average of the three readings, then a further set of three specimens shall be tested. In such cases, report the averages for peak *heat release rate*, total *heat release* and total *smoke extinction area* using the set of six readings.

Note: For composite materials tested as described in Clause 6.1.6, the heat release and smoke extinction area shall be determined from the cumulative emissions from all layers.