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DCA08-DEC-344

FILING AND ACKNOWLEDGEMENT
FILED, on this date, with the designated
Clerk of the Florida Building Commission, which is hereby
acknowledged.

Paula P. Ford 11/24/08
Paula P. Ford Date
Commission Clerk

November 17, 2008

Florida Building Commission
c/o Ms. Paula P. Ford, Commission Clerk
2555 Shumard Oak Boulevard
Tallahassee, FL 32399

RE: Petition for Declaratory Statement before the Florida Building Commission
on Commission Rule 9B-3.0472

Dear Commissioners,

On behalf of the National Electrical Manufacturers Association (NEMA), I am writing to petition for a declaratory statement with respect to the commission's final rule 9B-3.0472 relating to the installation of carbon monoxide (CO) alarms. This rulemaking was authorized specifically by 553.885(2) FS.

Upon examination of the final rule (9B-3.0472) there appears to be an inconsistency between Section (1)(a) and Section (3) which has led local authorities having jurisdiction (AHJs) to disallow the installation of certain CO-sensing devices. To that end, NEMA requests a declaratory statement to address this inconsistency. The question for which NEMA is seeking clarification and reasons for this petition are outlined below.

Question:

As read in context, should Section (3) of the regulation be interpreted to mean: "In new construction, (a) any carbon monoxide detector listed or labeled ANSI/UL 2075 shall be installed, or (b) any listed or labeled ANSI/UL 2034 carbon monoxide alarm that receives its primary power from the building wiring shall be installed, provided that the ANSI/UL 2034 listed or labeled carbon monoxide alarm shall have a secondary power backup."?

Reason for Petition:

Many AHJs are not allowing ANSI/UL 2075 listed CO detectors to be installed in newly constructed homes due to the conflict between sections (1)(a) and (3) in rule 9B-3.0472 (attached). Section (1)(a) requires a CO alarm to be listed to either ANSI/UL 2034, Standard for Single and Multiple Station Carbon Monoxide Alarms, or ANSI/UL 2075, Standard for Gas and

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Vapor Detectors and Sensors, whereas Section (3) requires CO alarms installed in new construction to receive their primary power from the building wiring when such wiring is served from the local power utility and such alarms shall have battery backup.

The source of the conflict is that ANSI/UL 2075 detectors do not receive their power "directly" from the building's AC wiring. ANSI/UL 2075 is the product standard for CO detectors connected to a control panel via conductors or low-power radio frequency (wireless) signal. ANSI/UL 2075 detectors receive their power "indirectly" from the building's wiring by first going through a control panel or "directly" from an integral battery in a low-power radio frequency (wireless) detector.

Substantiation:

ANSI/UL 2075 carbon monoxide detectors are required to be connected to an approved carbon monoxide detection control panel via conductors or a low-power radio frequency (wireless) signal. The approved carbon monoxide detection control panel is required to be equipped with a rechargeable battery(s) that keeps the system operating during a power outage and has the capability of providing remote supervising station service if required by the AHJ or owner. During a power outage condition the standby capability of the carbon monoxide detection control panel permits the operation of the CO detection and notification at the premises and will communicate the power loss to the supervising station if remote supervising station service is provided. When the primary power is restored the carbon monoxide detection control panel will fully recharge the standby battery(s). ANSI/UL 2075 listed low-power radio frequency (wireless) carbon monoxide detectors are required to send a low battery trouble signal to the carbon monoxide detection control panel before the carbon monoxide detector becomes inoperable.

The performance and reliability of household carbon monoxide detection systems using ANSI/UL 2075 CO detectors are extremely high if they are installed and maintained in accordance with National Fire Protection Association (NFPA) 720. In September 2008, the International Code Council (ICC) recognized the value of carbon monoxide systems by adopting CO detection requirements into the International Residential Code (IRC).

It is important to note that the alarm thresholds of ANSI/UL 2034 CO alarms and ANSI/UL 2075 CO detectors are the same. Section 15.1(b) of ANSI/UL 2075 requires detectors to operate within the sensitivity parameters defined by ANSI/UL 2034. Table 38.1 of ANSI/UL 2034 defines the actual alarm thresholds, which are:

- 30 parts per million (ppm)—no less than 30 days
- 70 ppm—1 to 4 hours (but not less than 1 hour)
- 150 ppm—10 to 50 minutes
- 400 ppm—4 to15 minutes

In summary, given the performance and reliability thresholds required of ANSI/UL 2075 listed CO detectors and the intent of the Commission to allow their installation in accordance with Section (1)(a) of rule 9B-3.0472, NEMA believes that all carbon monoxide detectors listed to ANSI/UL 2075 should be allowed to be installed in new construction. By answering the question posed in the affirmative, the Commission would eliminate any inconsistency between Section (1)(a) and Section (3) of the rule and ameliorate the confusion of local AHJs.

NEMA would be grateful if you would issue a formal interpretation of this question/issue to ensure that all ANSI/UL 2075 listed devices may be permitted for installation in new construction. Thank you for your attention to this petition.

Respectfully,

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Attachment

9B-3.0472 Carbon Monoxide Protection.

(1) Definitions: For purposes of this rule, the following definitions shall apply:

(a) CARBON MONOXIDE ALARM. A device for the purpose of detecting carbon monoxide, that produces a distinct audible alarm, and is listed or labeled with the appropriate standard, either ANSI/UL 2034 - 96, Standard for Single and Multiple Station CO Alarms, incorporated herein by reference, or UL 2075 - 04, Gas and Vapor Detector Sensor, incorporated herein by reference, in accordance with its application. Both documents may be obtained by writing to: Codes and Standards Section, Department of Community Affairs, 2555 Shumard Oak Boulevard, Tallahassee, Florida 32399-2100.

(b) FOSSIL FUEL. Coal, kerosene, oil, fuel gases, or other petroleum or hydrocarbon product that emits carbon monoxide as a by-product of combustion.

(2) Every building for which a permit for new construction is issued on or after 7/1/08 and having a fossil-fuel-burning heater or appliance, a fireplace, or an attached garage shall have an operational carbon monoxide alarm installed within 10 feet of each room used for sleeping purposes.

(3) In new construction, alarms shall receive their primary power from the building wiring when such wiring is served from the local power utility. Such alarms shall have battery back up.

(4) Combination smoke/carbon monoxide alarms shall be listed or labeled by a Nationally Recognized Testing Laboratory.

Specific Authority 553.885(2) FS. Law Implemented 553.72, 553.73(2), (3), (7), (9), 553.885(2) FS. History–New 11-18-07.