

An AHJ and fire alarm contractor discussion: The up to date national and as amended national codes in the AHJ for Washington DC

Introduction:

I am Paul Zweig C-2089 Inspector for the DC AHJ since 2006.

Since 2006. Before joining DCRA I was a 3rd Party Inspector and Consultant for TII of DC.

Board of Directors Member of NAESAI.

Served on the DC CCCB Elevator Technical Advisory Committee 2008, 2013, 2017 & 2021.

- DCRA.DC.GOV
 - <https://dcra.dc.gov/page/dc-construction-codes>
 - Local construction & National Codes 12A DCMR-2017.
 - ADOPTED 05.29.2020
 - Contains all modifications to the ICC, IFC, IPC, IPMC etc.
 - Combined versions coming-just like the set of codes on the same web page for 2013.2
 - Also adopted NEC-2014
 - Washington DC Building Code -2017
 - This is the version of the ICC 2015 combined with local construction codes.
 - Available for free viewing on the above website.

○ 12A DCMR 2017 SECTION 123 “TRANSITORY PROVISIONS”

- Now in effect:

12A DCMR 2017 -SECTION 123

TRANSITORY PROVISIONS

123.1 Applicability of prior editions of the Construction Codes.

The prior edition of the Construction Codes, in force on the date that a new edition of the Construction Codes is adopted pursuant to Section 122, shall remain in full force and effect for the purposes specified in Sections 123.1.1 through 123.1.5.

123.1.1 Permits issued prior to adoption of Construction Codes. Work authorized by a permit issued before the effective date of the new edition of the Construction Codes, which permit has not expired pursuant to Section 105.10 or been revoked pursuant to Section 111, shall be allowed to be carried to completion under the edition of the Construction Codes under which the permit was issued, subject to the exceptions stated in Section 102.6.

123.1.2 Applications filed prior to adoption of Construction Codes. An application for permit for which the application filing deposit has been paid before the effective date of the new edition of the Construction Codes, pursuant to Section 108.2.1.1, shall be allowed to be processed to issuance of the permit, and any work authorized thereby shall be allowed to be carried to completion under the edition of the Construction Codes in effect on the date said application was filed, subject to the exceptions stated in Section 102.6 and the following conditions:

- 1. Each such application shall have been filed prior to the effective date of the new edition of the Construction Codes accompanied by submittal documents and other information sufficiently complete to allow processing of the permit application without substantial change or deviation.*
- 2. Each such permit shall be paid in full and obtained by the applicant within 12 months after the effective date of the new edition of the Construction Codes.*
- 3. All work authorized by such permit shall be carried to completion under the terms of the permit.*
- 4. Any permits granted under Section 123.1.2, if permitted to expire under Section 105.10 or if revoked pursuant to Section 111, shall not be extended under Section 105.11.*

123.1.3 Applications filed after adoption of Construction Codes. Where a contract for design has been executed prior to the effective date of the new edition of the Construction Codes, but no permit applications for work covered by the design contract have been filed, permit applications for work covered by the design contract shall be allowed to be filed, processed to issuance of permit, and any work authorized thereby

shall be allowed to be carried to completion, under the previous edition of the Construction Codes, subject to the exceptions stated in Section 102.6 and the following conditions:

- 1. The applicant shall file the permit application, accompanied by submittal documents and other information conforming to Sections 106.1 and 106.1.1 of the new edition of the Construction Codes, sufficiently complete to allow processing of the permit without substantial change or deviation, within 12 months after the effective date of the new edition of the Construction Codes.*
- 2. The applicant shall submit a copy of the design contract for the work covered by the permit application, with a notarized affidavit stating that the submitted copy is a true and accurate copy of the contract, that the contract was in effect on or before the effective date of the Construction Codes, and that the design submitted with the permit application was made under such contract.*
- 3. The permit shall be obtained and the permit fee paid in full by the applicant within 12 months after the filing date.*
- 4. All work authorized by such permit shall be carried to completion under the terms of the permit.*
- 5. Any permit granted under Section 123.1.3, if permitted to expire under Section 105.10 or if revoked pursuant to Section 111, shall not be extended under Section 105.11.*

- ASME A17.1-2013 – CATEGORY 1 INSPECTIONS AND TESTS NEW COD LANGUAGE

ASME A17.1-2013 – CATEGORY 1 INSPECTIONS AND TESTS NEW COD LANGUAGE

- 13) **8.6.4.19.6 Firefighters' Emergency Operation.**
Firefighters' Emergency Operation (Phase I and II) shall be tested to determine conformance with the applicable requirements. Phase I recall shall be tested by individually activating fire alarm initiating device inputs to the elevator control, the three-position key switch at the designated landing and, where provided, the two-position switch at the building fire control station (Part 6).

- The following document was distributed to all DC authorized 3rd Party Elevator Professionals' in charge for their inspector's use:

Recently adopted ASME 17.1-2013 FES code enforcement explanation for DC licensed inspectors.

Updated 11.04.2020

The adoption of 12A DCMR 2017 including ASME A17.1-2013 and the IBC 2015 as amended by 12A DCMR 2017 changes the requirements for the CAT1 testing for electric & hydraulic elevators.

CAVEAT! – This conversation includes all the existing elevators in DC.

This conversation DOES NOT change/remove any requirement for final FES/FAID acceptance of EN, EA or ER inspections for new, altered or repair permitted work.

This conversation DOES NOT cover the changes in ICC 2015 hoistway design or changes to sprinklers and heats/shunts in elevator space.

This AHJ enforces the codes applicable to existing DC conveyances as required by: International Property Maintenance Code 2017 (as extensively amended by) - 12G DCMR 2013 & 2017 section 30. (Available at www.dkra.dc.gov).

Note that this discussion “takes place” in the CAT1 section of the A17.1-8.6.4.19.6 & 7 [electric elevators] and 8.6.5.14.3(e)&(f) [hydraulic elevators].

Only CAT1 requirements are changed; these paragraphs are included although not specifically stated in the CAT5 sections.

DC has just caught up to our neighboring jurisdictions that adopted A17.1-2013 some years ago.

Note: The difference between DC and Maryland is that no fire alarm report is to be left in the machine room for the DC approved elevator inspector to attach to his report. This is not a DC code requirement.

The Fire alarm Initiation Device [FAID] test for CAT1 has been removed.

Elevator inspectors in DC will not witness the FAID portion of the CAT1 tests and therefore are not part of the inspection report chain of evidence for FAID compliance.

The Q.E.I. CAT1 witnessed test by an elevator inspector for elevator sequence of response during a fire emergency is now the manual activation (by the elevator mechanic) of each FES input site on the elevator controller(s) to verify proper elevator performance for each command (as per applicable code year):

- a) Phase I main return floor.*
- b) Phase I alternate return floor (if present)*
- c) Phase I with flashing hat (if required).*

The requirements for FES test witnessing for 2019 will be enforced to assure successful completion of the code requirements.

If the 2019 A17.1-2010-8.6.19.6/7 & 8.6.5.14.3(e)(f) life safety requirements were not met in 2019 then there are two paths in 2020:

- (1) Perform & complete the 2019 testing requirements in 2020 to assure that life safety is compliant or
- (2) The owner is eligible for a \$2,000.00 infraction per car for failure to perform CAT1 life safety testing in 2019. This infraction is exclusive of any IFC infraction applicable.
 - a. The goal is simple: assure life safety compliance.

EMERGENCY POWER:

CAT1 emergency power in A17.1-2013 remains unchanged.

The requirement is that the test be performed with no load.

The AHJ code, [12A DCMR 2008,2013,2017 SECTION 3009 or 3011] requires that if emergency power is provided with an automatic sequence of return function, then this function shall be verified within the requirements of the OEM.

This requirement applies to A17.2-Item 1.17. The sequence function is tested congruent with the code at time of installation.

Note: No codes have been modified by this explanation.

- **FIRE PANEL FOR LOW AND HI RISE BUILDINGS AS PERTINENT FOR HOISTWAY MOTORIZED DAMPER LOBBY FIRE PANEL CONTROLS**

FIRE PROTECTION SYSTEMS

2013 DISTRICT OF COLUMBIA BUILDING CODE

909.16 Fire-fighter's smoke control panel.

A fire-fighter's smoke control panel for fire department emergency response purposes only shall be provided and shall include manual control or override of automatic control for mechanical smoke systems. The panel shall be located in a fire command center complying with Section 911 in high-rise buildings or buildings with smoke-protected assembly seating. In all other buildings, the fire-fighter's smoke control panel shall be installed in an approved location adjacent to the fire alarm control panel. The fire-fighter's smoke control panel shall comply with Sections 909.16.1 through 909.16.3.

Exception:

Where buildings are equipped with stair pressurization systems and/or elevator hoistway venting systems or elevator hoistway pressurization systems and no mechanical smoke control systems per Section 909, the required manual controls may be integral to the fire alarm control panel or located at another approved location and are not required to comply with the provisions of Section 909.16.

909.16.1 Smoke control systems.

Fans within the building shall be shown on the fire-fighter's control panel. A clear indication of the direction of airflow and the relationship of components shall be displayed. Status indicators shall be provided for all smoke control equipment, annunciated by fan and zone, and by pilot-lamp-type indicators as follows:

1. Fans, dampers and other operating equipment in their normal status—WHITE.
2. Fans, dampers and other operating equipment in their off or closed status—RED.
3. Fans, dampers and other operating equipment in their on or open status—GREEN.
4. Fans, dampers and other operating equipment in a fault status—YELLOW/AMBER.

909.16.2 Smoke control panel.

The fire-fighter's control panel shall provide control capability over the complete smoke-control system equipment within the building as follows:

1. ON-AUTO-OFF control over each individual piece of operating smoke control equipment that can also be controlled from other sources within the building. This includes stairway pressurization fans; smoke exhaust fans; supply, return and exhaust fans; elevator shaft fans and other operating equipment used or intended for smoke control purposes.

2. OPEN-AUTO-CLOSE control over individual dampers relating to smoke control and that are also controlled from other sources within the building.
3. ON-OFF or OPEN-CLOSE control over smoke control and other critical equipment associated with a fire or smoke emergency and that can only be controlled from the fire-fighter's control panel.

Exceptions:

1. Complex systems, where approved, where the controls and indicators are combined to control and indicate all elements of a single smoke zone as a unit.
2. Complex systems, where approved, where the control is accomplished by computer interface using approved, plain English commands

- Questions.
Thank you.
End.

