



**FIRE PROTECTION ENGINEERS**  
[www.rpsa-fire.com](http://www.rpsa-fire.com)

R.P. SCHIFILITI ASSOCIATES, INC.  
P.O. Box 297  
Reading, MA 01867 - 0497  
USA  
781.944.9300 Fax / Data  
781.942.7500 Telephone

## **The Top 10 Reasons for Walking Away from the First Scheduled Acceptance Test of a Fire Alarm System**

10. Unable to access all rooms for testing devices. It's obvious the door is locked. Yes, a 100% test means everything. It's your (contractor's) test, therefore it's your job to schedule the test and coordinate access.
  9. Fire or smoke barrier penetrations have not been sealed. So what if you did not make the hole but just used it. Seal it – with properly rated and listed material. Yes, this too is part of the Specifications and Drawing Notes.
  8. Unprepared to properly test waterflow switches. If you're afraid of water – or sprinkler systems – then you should have coordinated with another contractor to conduct the test. Yes, water must be flowed. Yes, it's in NFPA 72.
  7. Labeling is missing or incorrect. Yes, junction boxes, terminal cabinets, monitor modules and control modules are supposed to be labeled. See the specifications. And, don't forget this is a requirement of the Electrical Code also – though not as stringent as the project specs.
  6. Insufficient number of test personnel present. The Owner, Engineer and Fire Department personnel are witnesses – they don't touch anything. To properly test, you need at least: One person to activate each device; one person to tell us what is displayed on the panel; one person (at least) to tell us if fans, dampers, elevators, deluge systems or other controlled systems operated or did not operate for each device that is alarmed. Yes, we want to know that the fans did not stop or that the deluge solenoid did not release when they were not supposed to. That's just as important as verifying that they started or operated when they were supposed to start or operate – sometimes more important.
  5. Improper spacing of smoke detectors or strobes. OK, so if you scale the drawings the symbol for a smoke detector is two to four feet in diameter. But the center is about where that detector needed to be. Besides, you're supposed to know the spacing requirements of NFPA 72. And yes, you can go more than 15 ft from the wall and more than 30 feet between detectors – under the right circumstances. Read the code. Check the specifications and drawing notes.
  4. The closeout documents were not provided. You know: Partial Certificate of Completion; as-built drawings – floor plans and riser revised to reflect changes and installed conditions; copy of contractor's pre-test documentation; point list; copy of the program; revised battery calculations; revised wire size calculations; Owner's Manuals for all equipment; complete Operating Instructions; one page Operating Instruction Sheet; written record of all system passwords. See the Specifications for specifics including electronic copies of software database. Yes, all this is spelled out in the Specifications. Yes, most of these are required by NFPA 72 also.
  3. Some speakers were not set at the correct power tap or horns were not set for the correct output. No, they are not all the same. See the drawings and check the specifications.
  2. All work has not been completed and tested as part of the contractor's pre-test (which, is also a 100% test). No, installing that last device on the morning of the test and testing it as I arrive does NOT meet the project Specifications. No, adding that device or reprogramming after I find a problem is NOT OK. Look-up the definition and requirements of *re-acceptance tests* in NFPA 72.
- ... and the number 1 reason...
1. Some strobes were not set for the correct value. No, they are not all 15 cd. Some may be 60 or 110 cd. See the drawings. Know the NFPA 72 rules.