

# ARTICLE 5.1. RADON

## Rule 1. Radon

### 410 IAC 5.1-1-1 "Building" defined

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 1. As used in this rule, "building" means a roofed and walled structure built or used for human habitation. (*Indiana State Department of Health; 410 IAC 5.1-1-1; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

### 410 IAC 5.1-1-2 "Commissioner" defined

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 2. As used in this rule, "commissioner" means the state health commissioner or his or her authorized representative. (*Indiana State Department of Health; 410 IAC 5.1-1-2; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

### 410 IAC 5.1-1-3 "Contact hour" defined

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 3. As used in this rule, "contact hour" means an instructional session about radon-222, radon-222 testing, radon-222 mitigation, or the health effects of exposure to radon-222 of at least sixty (60) minutes duration. (*Indiana State Department of Health; 410 IAC 5.1-1-3; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

### 410 IAC 5.1-1-4 "Department" defined

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 4. As used in this rule, "department" means the Indiana state department of health. (*Indiana State Department of Health; 410 IAC 5.1-1-4; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

### 410 IAC 5.1-1-5 "Diagnostic testing" defined

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 5. As used in this rule, "diagnostic testing" means a test conducted to determine the presence or absence of radon-222 or to determine the primary source or sources of radon-222 leakage into a living area. This term shall not be construed as authorization for a person to perform testing to determine radon-222 concentrations in a living area for the purposes of determining the need for radon-222 mitigation without complying with this rule. (*Indiana State Department of Health; 410 IAC 5.1-1-5; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-6 "EPA" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 6. As used in this rule, "EPA" means the United States Environmental Protection Agency. (*Indiana State Department of Health; 410 IAC 5.1-1-6; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-7 "Instant readout device" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 7. As used in this rule, "instant readout device" means any hand-held instrument that immediately quantifies radon-222 concentrations or provides data necessary to perform calculations that will quantify radon-222 concentrations. (*Indiana State Department of Health; 410 IAC 5.1-1-7; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-8 "Interference with department agent" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 8. As used in this rule, "interference with department agent" means, but is not limited to, physical obstruction, attack, or threatened attack on a representative or agent of the department while that representative or agent is conducting inspection, certification, or enforcement activities pursuant to IC 16-41-38 or this rule. (*Indiana State Department of Health; 410 IAC 5.1-1-8; filed Oct 27, 1993, 9:00 a.m.: 17 IR 349; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; errata filed Jan 28, 2000, 7:48 a.m.: 23 IR 1401; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-9 "Laboratory" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 9. As used in this rule, "laboratory" means a place equipped for experimental study in a science. (*Indiana State Department of Health; 410 IAC 5.1-1-9; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-10 "Living area" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 10. As used in this rule, "living area" means the lowest area in a building that could be adapted for human habitation. For example, a basement would be a living area if it could be converted to a den, playroom, or bedroom without major structural changes. (*Indiana State Department of Health; 410 IAC 5.1-1-10; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-11 "Mitigate" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 11. As used in this rule, "mitigate" means to repair or alter a building or building design for the purpose in whole or in part of reducing the concentration of radon-222 in the indoor atmosphere. (*Indiana State Department of Health; 410 IAC 5.1-1-11; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-12 "Passive monitor" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 12. As used in this rule, "passive monitor" means those types of radon-222 detectors that do not require external power or batteries to operate. Charcoal canisters and alpha track detectors are the principle [*sic.*] types of passive monitors. (*Indiana State Department of Health; 410 IAC 5.1-1-12; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-13 "Person" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 13. As used in this rule, "person" means an individual, partnership, copartnership, corporation, firm, company, association, society, holding company, trustee, school corporation, school city, school town, school district, any unit of government, or any other legal entity, its or their successors or assigns, or agents of the aforesaid. (*Indiana State Department of Health; 410 IAC 5.1-1-13; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-14 "Picocuries per liter" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 14. As used in this rule, "picocuries per liter" means two and twenty-two hundredths (2.22) radioactive disintegrations per minute per liter of air. (*Indiana State Department of Health; 410 IAC 5.1-1-14; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-15 "Primary radon tester" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 15. As used in this rule, "primary radon tester" means an individual who measures radon-222 concentrations utilizing detection instruments other than passive monitors. A primary radon tester may also place passive monitors in buildings for radon-222 testing but may not analyze passive monitors. (*Indiana State Department of Health; 410 IAC 5.1-1-15; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-16 "Quality assurance program" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 16. As used in this rule, "quality assurance program" means a program which includes procedures that assure data are scientifically valid and of known precision and accuracy and a system for recording and monitoring these procedures. (*Indiana State Department of Health; 410 IAC 5.1-1-16; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-17 "Radon-222" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 17. As used in this rule, "radon-222" means the radioactive noble gas radon-222 and related decay products produced by the disintegration of radon-222. (*Indiana State Department of Health; 410 IAC 5.1-1-17; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-18 "Radon laboratory tester" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 18. As used in this rule, "radon laboratory tester" means an individual who manufactures passive monitors or analyzes passive monitors for radon-222 after they have been exposed to the atmosphere. A radon laboratory tester may also place passive monitors in buildings for radon-222 testing and measure radon-222 concentrations utilizing detection instruments other than passive monitors. (*Indiana State Department of Health; 410 IAC 5.1-1-18; filed Oct 27, 1993, 9:00 a.m.: 17 IR 350; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-19 "Research" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 19. As used in this rule, "research" means scientific investigation by testing or mitigating, or both, for radon-222. (*Indiana State Department of Health; 410 IAC 5.1-1-19; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-20 "Secondary radon tester" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 20. As used in this rule, "secondary radon tester" means an individual who places passive monitors in, and/or retrieves passive monitors from, buildings for radon-222 testing. (*Indiana State Department of Health; 410 IAC 5.1-1-20; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-21 "Test" defined**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 21. As used in this rule, "test" means the act of examining a building for the presence of radon-222 which may include analysis of the detector utilized. (*Indiana State Department of Health; 410 IAC 5.1-1-21; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-22 Certificate required; exclusion**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-35; IC 16-41-38

Sec. 22. (a) No person may test, analyze, or mitigate for radon-222 in a building unless they are, or have in their employ, an individual certified to perform such services in accordance with this rule. However, a person who is testing or mitigating for radon-222 is exempt from the provisions of this rule if the person is:

- (1) performing the testing or mitigation on a building or area of land which the person owns; or
- (2) conducting research on radon-222 testing or mitigation with consent of the owner or occupant, and the owner or occupant is not charged for the testing or mitigation.

(b) Individuals certified to perform radon-222 measurement or mitigation services under this rule shall conduct such activities in accordance with IC 16-41-35, IC 16-41-38, this rule, and the application for certification submitted by the individual.

(c) Certification shall expire on December 31 of the year following the year of issuance. (*Indiana State Department of Health; 410 IAC 5.1-1-22; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; errata filed Jan 28, 2000, 7:48 a.m.: 23 IR 1401; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-23 Certification of secondary radon testers**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38-3

Sec. 23. (a) A secondary radon tester must be certified in order to place and/or retrieve, or represent or advertise that he or she can place and/or retrieve, passive monitors in a building for radon-222 testing.

(b) The requirements for all individuals seeking certification to test as a secondary radon tester are as follows:

(1) Submission of a sworn affidavit that the individual has read and agrees to adhere to EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004).

(2) Proof of successful completion, and current listing on, the EPA National Radon Measurement Proficiency Program, or an equivalent measurement proficiency program approved by the commissioner.

(3) Submission of a complete and accurate application form prescribed by the commissioner along with a fee of one hundred dollars (\$100). An application will not be considered complete unless the required fee has been submitted.

(*Indiana State Department of Health; 410 IAC 5.1-1-23; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; filed Apr 16, 1996, 4:10 p.m.: 19 IR 2280; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

**410 IAC 5.1-1-24 Certification of primary radon testers**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 24. (a) A primary radon tester must be certified in order to test for radon-222, or represent or advertise that he or she can test for radon-222, in a building.

(b) The requirements for all individuals seeking certification to test as a primary radon tester are as follows:

(1) Submission of a sworn affidavit that the individual has read and agrees to adhere to EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004).

(2) Proof of successful completion, and current listing on, the EPA National Radon Measurement Proficiency Program, or an equivalent measurement proficiency program approved by the commissioner, for the radon-222 detection instruments utilized, excluding passive monitors.

(3) Submission of a complete and accurate application form prescribed by the commissioner along with a fee of one hundred dollars (\$100). An application will not be considered complete unless the required fee has been submitted.

(c) If using an instant readout device for radon-222 detection, evidence that the calibration and accuracy tests recommended by the manufacturer are being met shall be provided to the commissioner yearly. If there are no manufacturer's recommended frequencies, calibration and accuracy tests shall be made in accordance with EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004). If frequencies for calibration and accuracy tests are not specified in the EPA's protocol for the type of equipment being utilized, calibration and accuracy tests shall be made at least once each year and in the same month each succeeding year. If repairs are indicated, such repairs must be made, and calibration tests must be conducted after the repairs are performed. (*Indiana State Department of Health; 410 IAC 5.1-1-24; filed Oct 27, 1993, 9:00 a.m.: 17 IR 351; filed Apr 16, 1996, 4:10 p.m.: 19 IR 2280; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-25 Certification of radon laboratory testers**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 25. (a) A radon laboratory tester must be certified in order to analyze or test for radon-222, or represent or advertise that he or she can analyze or test for radon-222, in a building.

(b) If a person employs one (1) or more individuals to perform radon-222 laboratory testing, the employer shall either be certified in accordance with this section or shall employ at least one (1) individual certified in accordance with this section on a full-time basis who shall be responsible for all of the employer's radon-222 laboratory testing activities. If the employer is not a certified radon laboratory tester and the employer is no longer able to keep a certified radon laboratory tester in its employ, the employer shall do the following:

(1) Notify the commissioner of the termination of the certified radon laboratory tester by telephone within two (2) working days of the termination.

(2) Notify the commissioner of the termination of the certified radon laboratory tester in writing within ten (10) working days of the termination.

(3) Immediately cease offering services as a radon laboratory tester until such time as a new full-time individual is employed to be responsible for all the employer's radon-222 laboratory testing activities.

This section shall not relieve other employees from the requirement to become certified if they perform work as a primary or secondary tester.

(c) The requirements for all individuals seeking certification as a radon laboratory tester are as follows:

(1) The individual must have a bachelor's degree from an accredited university or college in the physical sciences or engineering, or in a related field approved by the commissioner, or a minimum of two (2) years full-time experience, or equivalent as determined by the commissioner, in radiation measurement.

(2) Submission of a sworn affidavit that the full-time individual referenced in subsection (b) has read and agrees to adhere to EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004).

(3) Proof of successful completion, and current listing on, the EPA National Radon Measurement Proficiency Program, or an equivalent measurement proficiency program approved by the commissioner, for the radon-222 detection instruments utilized, excluding passive monitors.

(4) Submission of a complete and accurate application form prescribed by the commissioner along with a fee of one hundred dollars (\$100). An application will not be considered complete unless the required fee has been submitted.

(d) A radon laboratory tester's results of tests for radon-222 shall be submitted to the commissioner annually following the

procedures outlined in section 28(f) of this rule. If using an instant readout device for radon-222 detection, evidence that the calibration and accuracy tests recommended by the manufacturer are being met shall be provided to the commissioner yearly. If there are no manufacturer's recommended frequencies, calibration and accuracy tests shall be made in accordance with EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004). If frequencies for calibration and accuracy tests are not specified in the EPA's protocol for the type of equipment being utilized, calibration and accuracy tests shall be made at least once each year and in the same month each succeeding year. If repairs are indicated, such repairs must be made, and calibration tests must be conducted after the repairs are performed. (*Indiana State Department of Health; 410 IAC 5.1-1-25; filed Oct 27, 1993, 9:00 a.m.: 17 IR 352; filed Apr 16, 1996, 4:10 p.m.: 19 IR 2281; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-26 Certification of radon mitigators**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 26. (a) A radon mitigator must be certified before he or she can mitigate for radon-222, or represent or advertise that he or she can mitigate for radon-222, in a building.

(b) If a person employs one (1) or more individuals to perform radon-222 mitigation, the employer shall either be certified in accordance with this section or shall employ at least one (1) individual certified in accordance with this section on a full-time basis. The certified employer or the certified employee or employees shall be responsible for the employer's radon-222 mitigation activities. If the employer is not a certified radon mitigator and the employer is no longer able to keep a certified radon mitigator in its employ, the employer shall do the following:

(1) Notify the commissioner of the termination of the certified radon mitigator by telephone within two (2) working days of the termination.

(2) Notify the commissioner of the termination of the certified radon mitigator in writing within ten (10) working days of the termination.

(3) Immediately cease offering services as a radon mitigator until such time as a new individual is employed on a full-time basis to be responsible for all the employer's radon mitigation activities.

(c) It shall be the responsibility of the certified radon mitigator to report any diagnostic testing to the building owner or its representative prior to any mitigation performed.

(d) The requirements for all individuals seeking certification as a radon mitigator are as follows:

(1) Proof of successful completion, and current listing on, the most recent EPA National Radon Contractor Proficiency Program, or an equivalent proficiency program approved by the commissioner.

(2) Submission of a complete and accurate application form prescribed by the commissioner along with a fee of one hundred dollars (\$100). An application will not be considered complete unless the required fee has been submitted.

(*Indiana State Department of Health; 410 IAC 5.1-1-26; filed Oct 27, 1993, 9:00 a.m.: 17 IR 352; filed Apr 16, 1996, 4:10 p.m.: 19 IR 2282; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-27 Recertification of primary and secondary radon testers, radon laboratory testers, and radon mitigators**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 27. (a) Prior to recertification as a primary or secondary radon tester, radon laboratory tester, or radon mitigator, the following must occur:

(1) Continuing education shall be completed within the prior two (2) years and may be obtained as follows:

(A) Continuing education must be from a course approved by the commissioner and must be at least six (6) contact hours. Written confirmation of attendance, signed by the course instructor, or its designee, shall be submitted at the time of application for recertification.

(B) Full-time employment as a certified primary radon tester, secondary radon tester, radon laboratory tester, or radon mitigator, whichever is applicable, for the prior two (2) years, provided written confirmation of full-time employment, signed by the business owner or chief executive officer of the business which employed the individual, has been submitted along with the application for recertification.

(2) A complete and accurate application for recertification shall be submitted to the commissioner on a form prescribed by the commissioner and shall include the fee specified in section 23(b)(3), 24(b)(3), 25(c)(4), or 26(d)(2) of this rule, whichever is applicable. An application will not be considered complete unless the required fee has been submitted.

(b) Individuals shall satisfy the requirement for biennial reexamination of primary radon testers, secondary radon testers, radon laboratory testers, and radon mitigators established in IC 16-41-38-3 if they comply with section 23(b)(2), 24(b)(2), 25(c)(3), or 26(d)(1) of this rule, whichever is applicable. (*Indiana State Department of Health; 410 IAC 5.1-1-27; filed Oct 27, 1993, 9:00 a.m.: 17 IR 353; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; errata filed Jan 28, 2000, 7:48 a.m.: 23 IR 1401; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-28 Certification standards; passive monitors; records; reporting**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 28. (a) No individual required to be certified in accordance with this rule may advertise a service unless the individual has previously obtained a valid certificate from the commissioner to perform that service.

(b) Radon-222 mitigation activities shall be conducted in accordance with mitigation protocols set forth in the EPA National Radon Contractor Proficiency Program (Interim Radon Mitigation Standards, December 15, 1991), and the following:

(1) In the case of an existing building, the individual performing mitigation shall ensure that the building is tested for radon-222 concentrations before and after any mitigation is performed. However, diagnostic testing is not required to be performed by a certified primary radon tester, secondary tester, or laboratory tester.

(2) The test conducted before mitigation shall be conducted by a certified primary radon tester, a certified secondary radon tester, or a certified laboratory tester and shall be at least forty-eight (48) hours in duration.

(3) The postmitigation test shall be conducted by a certified primary radon tester, a certified secondary radon tester, or a certified laboratory tester and shall be conducted no sooner than twelve (12) hours after completion of the mitigation. If passive monitors are utilized, they may be left with the building owner or occupant to be opened, set out, collected, sealed, and forwarded to a certified laboratory tester or a certified primary radon tester, provided the owner or occupant is given written instructions on the proper procedure to follow to assure that representative radon-222 measurements are obtained.

(4) Results of radon-222 tests shall be reported to the commissioner on a form prescribed by the commissioner and shall meet the requirements of subsection (f).

(5) Prior to conducting any radon-222 mitigation work, the radon mitigator shall submit a written outline of the mitigation work to be performed to the building owner or its representative. Along with the outline the radon mitigator must submit a written statement about any diagnostic testing he or she has performed, including where in the building such tests were conducted and what the results were in picocuries per liter. If no diagnostic testing was performed, that must be specifically reported, in writing, to the building owner or its representative. Information on any approvals and permits which must be obtained in the locality in which the mitigation work is to be performed also must be provided to the building owner or its representative, if applicable.

(6) Any construction undertaken to mitigate for radon-222 shall be in accordance with all applicable state and local building codes. Such construction shall be conducted or supervised by a certified radon mitigator who, at a minimum, shall be present at the start of such construction and at the conclusion of such construction.

(7) Warranty information and information on the proper method of checking and servicing of mitigation equipment installed by the radon mitigator to maintain its function shall be provided in writing to the client.

(c) No person may test, analyze, or mitigate radon-222 without first providing evidence that the person is certified in accordance with this rule or that the person has in its employ an individual certified in accordance with this rule.

(d) Prior to conducting any radon-222 testing or mitigation, the certified individual shall give each client a copy of a notice



about radon-222 testing and mitigation prepared by the department specifically for that purpose.

(e) A secondary radon tester, primary radon tester, or radon laboratory tester may only distribute those passive monitors which have been manufactured or prepared by a person who is certified in accordance with section 25 of this rule, or who employs at least one (1) individual on a full-time basis who is certified in accordance with section 25 of this rule.

(f) All certified primary radon testers and certified laboratory testers providing radon-222 services shall submit to the commissioner, on a form approved by the commissioner, the results of all radon-222 screening measurements, follow-up measurements, and postmitigation measurements, if known. All certified radon mitigators shall submit to the commissioner, on a form approved by the commissioner, any radon-222 mitigation conducted for each calendar year. Said reports must be submitted by January 31 for the previous calendar year. For radon-222 measurements and for any mitigation conducted, the information must, at a minimum, contain the following:

- (1) The name of the certified individual providing the service.
- (2) The complete mailing address of the building involved.
- (3) The county in which the building is located.
- (4) The type of radon-222 mitigation conducted, if any.
- (5) The type of measurement conducted (screening, follow-up, or postmitigation) and the results in picocuries per liter.
- (6) The date of last calibration of the detection instrument and the instrument serial number.

(g) Within thirty (30) days after providing mitigation or postmitigation testing, the individual providing the service shall report to the owner of the building or its representative the results of all radon-222 testing conducted in picocuries per liter.

(h) Records of radon-222 tests, quality assurance programs, calibration measurements, and equipment repairs conducted by a certified secondary radon tester, primary radon tester, or radon laboratory tester shall be retained by that individual for at least three (3) years. Records of mitigation conducted by a certified radon mitigator shall be retained by that individual for at least three (3) years. (*Indiana State Department of Health; 410 IAC 5.1-1-28; filed Oct 27, 1993, 9:00 a.m.: 17 IR 353; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-29 Remedies; right of entry; reciprocity**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 4-21.5; IC 16-41-38

Sec. 29. (a) The radon certification of any individual may be denied, revoked, or suspended in accordance with IC 4-21.5 if it is determined that the individual:

(1) has engaged in unethical or unprofessional conduct of a character likely to deceive, defraud, or harm the building owner or occupant or the public, including, but not limited to:

(A) intentional placement of testing devices in areas likely to bias results; or

(B) for radon-222 mitigation, performing mitigation activities in existing buildings without prior testing;

(2) does not meet the education, training, and testing requirements for certification;

(3) does not submit annual test data as required;

(4) does not provide the client with a copy of the notice prepared by the department as required by section 28(d) of this rule; or

(5) does not comply with other applicable sections of this rule.

(b) No individual may provide applicable radon-222 testing or radon-222 mitigation services after revocation, denial, suspension, or voluntary surrender of a secondary radon tester, primary radon tester, radon laboratory tester, or radon mitigator certificate.

(c) No individual whose certification for primary radon tester, secondary radon tester, radon mitigator, or radon laboratory tester has been suspended or revoked shall be eligible for reinstatement unless that person establishes, to the satisfaction of the commissioner, the following:

(1) The term of suspension prescribed in the order for suspension has elapsed.

(2) The individual has complied fully with the terms, if any, of the order for suspension or revocation.

(3) The individual can be safely recommended to the public as an individual fit to be reinstated and is able to practice its

radon-222 business with reasonable skill and safety.

(d) The commissioner, his or her agents, and his or her employees shall have the right to enter, at all reasonable times, in or upon any public or private property, upon presentation of appropriate credentials, to inspect any equipment or records pertaining to radon-222 testing or mitigation, to inspect radon-222 testing laboratories, or to inspect radon-222 mitigation facilities or equipment that have been, or are to be, installed.

(e) A person accredited in another state to perform testing for, or mitigation of, radon-222 may be certified under this rule without passing an examination if:

- (1) the person pays the applicable fee;
- (2) the state in which the person is accredited maintains an accreditation program substantially similar to the certification program under this rule, as determined by the department; and
- (3) the person can document successful completion of EPA's National Radon Measurement Proficiency Program or EPA's National Radon Contractor Proficiency Program, whichever is applicable to the certification desired, or successful completion of an equivalent proficiency program applicable to the certification desired, which has been approved by the commissioner.

*(Indiana State Department of Health; 410 IAC 5.1-1-29; filed Oct 27, 1993, 9:00 a.m.: 17 IR 354; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA)*

#### **410 IAC 5.1-1-30 Civil penalties**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 4-21.5; IC 16-41-38

Sec. 30. (a) The commissioner may commence an action under IC 16-41-38 to levy civil penalties against an individual who:

- (1) fails to comply with IC 16-41-38 or this rule; or
- (2) interferes with or obstructs the department or its designated agent in the performance of official duties pursuant to IC 16-41-38 or this rule.

(b) A civil penalty in an amount in the appropriate range specified in this section may be sought for each day of each violation documented by the commissioner.

(c) In determining the seriousness of the violation and the specific amount of the civil penalty to be sought for each violation, the commissioner will consider the following:

- (1) The potential for harm or imminent threat to public health.
- (2) The extent of deviation from statutory or regulatory requirements.
- (3) Degree of willfulness or negligence.
- (4) History of noncompliance.

The absence of direct harm will not result in assessment of a lower penalty for a violation.

(d) Unless adjusted as provided for in subsection (e), all penalties shall be in accordance with the following schedule:

<u>Violation</u>	<u>Rule Citation</u>	<u>Range of Penalty</u>
Interference with department agent	410 IAC 5.1-1-30	\$ 0 to \$1,000
General requirements; exclusion	410 IAC 5.1-1-22	\$ 0 to \$1,000
Certification of secondary radon testers	410 IAC 5.1-1-23	\$ 0 to \$1,000
Certification of primary radon testers	410 IAC 5.1-1-24	\$ 0 to \$1,000
Certification of radon laboratory testers	410 IAC 5.1-1-25	\$ 0 to \$1,000
Certification of radon mitigators	410 IAC 5.1-1-26	\$ 0 to \$1,000
Recertification of primary and secondary radon testers, radon laboratory testers, and radon mitigators	410 IAC 5.1-1-27	\$ 0 to \$1,000
Certification standards; passive monitors; records; reporting	410 IAC 5.1-1-28	\$ 0 to \$1,000
Remedies; right of entry; reciprocity	410 IAC 5.1-1-29	\$ 0 to \$1,000

(e) After determining the appropriate penalty based on the schedule in this section, the commissioner may adjust the penalty

to reflect a good faith effort to comply by the individual engaged in radon-222 activities.

(f) Each individual penalty may be multiplied by the number of days the particular violation has been documented by the commissioner.

(g) Penalties for all violations documented in an inspection or series of inspections will be totaled and sought under one (1) cause of action.

(h) After filing an action pursuant to IC 4-21.5, and in an attempt to resolve violations of IC 16-41-38 and this rule without resorting to a hearing, the commissioner may negotiate and enter into agreed orders. An agreed order may suspend all or part of the civil penalty calculated under the requirements and deadlines established in the agreed order.

(i) As provided by IC 16-41-38, an individual who violates this rule commits a Class A misdemeanor. (*Indiana State Department of Health; 410 IAC 5.1-1-30; filed Oct 27, 1993, 9:00 a.m.: 17 IR 355; errata filed Nov 9, 1993, 9:00 a.m.: 17 IR 410; errata filed Jan 28, 2000, 7:48 a.m.: 23 IR 1401; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

#### **410 IAC 5.1-1-31 Incorporation by reference**

Authority: IC 16-19-3-4; IC 16-41-38-2

Affected: IC 16-41-38

Sec. 31. The following documents are incorporated by reference as part of this rule:

(1) EPA's "Indoor Radon and Radon Decay Product Measurement Device Protocols" (July 1992, EPA-402-R-92-004).

(2) EPA's "National Radon Contractor Proficiency Program Protocol" (Interim Radon Mitigation Standards, December 15, 1991).

Two (2) copies of these documents are located in the files of the commissioner at 1330 West Michigan Street, Indianapolis, Indiana 46206-1964. Copies may also be obtained by request, mailed to the U.S. Environmental Protection Agency, Office of Air and Radiation, Washington, D.C. 20460. (*Indiana State Department of Health; 410 IAC 5.1-1-31; filed Oct 27, 1993, 9:00 a.m.: 17 IR 356; readopted filed Jul 11, 2001, 2:23 p.m.: 24 IR 4234; readopted filed May 22, 2007, 1:44 p.m.: 20070613-IR-410070141RFA; readopted filed Sep 11, 2013, 3:19 p.m.: 20131009-IR-410130346RFA*)

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