2006 Radon Certification Training and Workshops

Homebuilders – Contractors – Remodelers
Home Inspectors – Environmental Consultants
HVAC Contractors – Health Officials
Radon Measurement and Mitigation Specialists

Why Radon Matters

Radon is a colorless, odorless and tasteless cancer-causing radioactive gas that comes from the natural decay of uranium found in different types of soils, rock and some groundwater. Because it is a gas, it can migrate toward the surface and enter homes, schools and workplaces through openings in the foundation. The National Academy of Science, the Surgeon General’s Office and the US Environmental Protection Agency (EPA) indicate that radon is second only to smoking as a cause of lung cancer and that radon causes approximately 21,000 lung cancer deaths per year in the United States.

Because there is no known safe level of exposure to radon, EPA also recommends that Americans consider fixing or mitigating their homes for radon levels between 2 pCi/L and 4 pCi/L. Problems may arise when radon concentrations reach high levels in areas where people spend large amounts of time. Testing is the only way to know if there is a risk from high radon levels. EPA and the Office of the Surgeon General recommend that all homes below the third floor be tested for radon. EPA recommends mitigating homes with high levels of radon.

Peter Jennings’ death and Dana Reeve’s announcement have raised public awareness about lung cancer, especially among people who have never smoked. Smoking, radon, and secondhand smoke are the leading causes of lung cancer. Although lung cancer can be treated, the survival rate is one of the lowest of all types of cancer. See more information at the EPA website: [http://www.epa.gov/iaq/radon/](http://www.epa.gov/iaq/radon/).
The Southern Regional Radon Training Center

The Southern Regional Radon Training Center (SRRTC) is one of the four USEPA regional radon training centers (RRTCs) established by Congress in the Radon Abatement Act of 1988. SRRTC partners with USEPA, State Radon Programs to offer quality radon training and exams. SRRTC recognizes the radon proficiency certification programs and provides training for builders, realtors, architects, home inspectors, HVAC contractors, public health officials and others wishing to become certified as a radon measurement or mitigation specialist.

A primary function of SRRTC is to provide technical training courses related to radon measurement and mitigation for persons who wish to become certified and provide professional radon services. SRRTC also targets other groups for training about radon problems that may impact citizens in their homes, schools and workplaces. Trainings are offered throughout USEPA Region 4 and Region 6 which covers the states of Alabama, Arkansas, Florida, Georgia, Kentucky, Louisiana, Mississippi, New Mexico, North Carolina, Oklahoma, South Carolina, Tennessee and Texas.

SRRTC training programs are often sponsored by state radon programs utilizing monies provided by the USEPA. Training and exam fees may differ from state to state. Training locations and topics are subject to change. Other locations and states may be added for training during the year.

Visit the SRRTC website: http://eng.auburn.edu/distance-learning/ce/live/srrtc/links.html for links to all of the state radon programs and radon certification programs, along with links to the American Society of Home Inspectors (ASHI) and National Association of Certified Home Inspector (NACHI) websites.

Radon Certification Programs

The National Environmental Health Association’s National Radon Proficiency Program (NEHA/NRPP) is one of two national radon proficiency programs. Most of SRRTC programs have been approved for continuing education (CE) credits through NEHA/NRPP. Contact Angel Price (800) 269-4174 or check the website www.radongas.org for more information on becoming certified.

The National Radon Safety Board (NRSB) is an independent organization, governed by a certification panel for radon certifications. Contact NRSB at (866) 329-3474 or check the website www.nrsb.org for more details.
SRRTC 2006 Training and Exam Schedule

This list may change and will be updated on the SRRTC website. Other trainings may be offered in various states for CE credits and also will be posted on the website. Complete registration form and circle indicate the date and training you wish to attend. All registrants will receive a confirmation letter or packet.

<table>
<thead>
<tr>
<th>DATES</th>
<th>TRAINING</th>
<th>LOCATION</th>
<th>Registration Fees</th>
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<tbody>
<tr>
<td>March 20-24, 2006</td>
<td>Radon Mitigation &amp; Hands-on Training</td>
<td>Raleigh NC</td>
<td>NC Resident - $200</td>
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<tr>
<td>March 24, 2006</td>
<td>Radon Mitigation Exam</td>
<td></td>
<td>Non-NC Resident - $300</td>
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<td>Exam - $100</td>
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<tr>
<td>March 28-30, 2006</td>
<td>Radon Measurement Training</td>
<td>Franklin TN</td>
<td>TN Residents - $100</td>
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<tr>
<td>March 30, 2006</td>
<td>Radon Measurement Exam</td>
<td>Franklin TN</td>
<td>Non-TN Resident - $150</td>
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<td></td>
<td>Exam - $100</td>
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<tr>
<td>March 31, 2006</td>
<td>Inspecting the Mitigation System</td>
<td>Franklin TN</td>
<td>TN Resident - $75</td>
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<td>During Home Inspection Workshop</td>
<td></td>
<td>Non-TN Resident-$100</td>
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<tr>
<td>April 25-27, 2006</td>
<td>Radon Measurement Training</td>
<td>Elizabethtown KY</td>
<td>KY Resident - $100</td>
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<td>April 27, 2006</td>
<td>Radon Measurement Exam</td>
<td>Elizabethtown KY</td>
<td>Non-KY Resident - $200</td>
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<td></td>
<td></td>
<td>Exam - $100</td>
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<tr>
<td>April 28, 2006</td>
<td>Karst Measurement &amp; Mitigation One-Day Workshop</td>
<td>Elizabethtown KY</td>
<td>KY Resident - $100</td>
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<td></td>
<td></td>
<td></td>
<td>Non-KY Resident - $150</td>
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<tr>
<td>May 9-11, 2006</td>
<td>Radon Measurement Training</td>
<td>Gainesville GA</td>
<td>Registration Fee - $300</td>
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<tr>
<td>May 11, 2006</td>
<td>Radon Measurement Exam</td>
<td>Gainesville GA</td>
<td>Exam Fee - $125</td>
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<tr>
<td>May 12, 2006</td>
<td>Inspecting the Mitigation System</td>
<td>Gainesville GA</td>
<td>Registration Fee - $150</td>
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<tr>
<td>June 8, 2006</td>
<td>Radon Resistant New Construction Techniques for Large Buildings</td>
<td>East Tennessee</td>
<td>Registration Fee - $100</td>
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<tr>
<td>June 9, 2006</td>
<td>Karst Geology Measurement &amp; Mitigation One Day Workshop</td>
<td>East Tennessee</td>
<td>Registration Fee - $100</td>
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<td>June 12-16, 2006</td>
<td>Radon Mitigation &amp; Hands-On Training</td>
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<td>Exam - $100</td>
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<td>July 12-14, 2006</td>
<td>Radon Measurement Training</td>
<td>Atlanta GA</td>
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<td>July 14, 2006</td>
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<td>August 7-11, 2006</td>
<td>Radon Mitigation Training</td>
<td>Auburn University</td>
<td>Watch for updates on</td>
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<td>August 11, 2006</td>
<td>Radon Mitigation Exam</td>
<td>Auburn AL</td>
<td>website for fees</td>
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<td>October 4-6, 2006</td>
<td>Radon &amp; Home Inspections</td>
<td>Cities in Tennessee</td>
<td>Special for Realtors</td>
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Certification Training

Radon Measurement Certification Training and Exam  (2½ to 3 days)
This workshop prepares participants to conduct competent radon measurements in residential settings and interpret results for clients. It also prepares the student to sit for the national radon proficiency certification exam. Some of the topics covered include:

- Basics of radon
- Health effects of radon
- Radon measurements
- Quality assurance/quality control
- Radon measurement devices/protocols
- Basic radon mitigation techniques

Typically, home inspectors, environmental consultants, public health officials, and real estate professionals attend the training. EPA and the state programs encourage participants to pass the measurement exam and apply for certification. Continuing education credits have been approved by home inspector associations. Discounts may be provided to ASHI, NACHI and other inspector associations as requested.

Radon Mitigation Training and Exam  (4½ to 5 days)
This workshop provides a comprehensive approach, through classroom presentations and hands-on fieldwork, for design and installation of a mitigation system. It prepares participants to sit for the radon mitigation proficiency exam and covers these topics:

- Building diagnostics
- Building investigation
- Design of a mitigation system
- Worker health and safety
- Radon resistant new construction techniques

Typically homebuilders, remodelers, HVAC contractors, environmental consultants and health officials are recommended to take the training. Participants are encouraged to pass the mitigation exam and apply for certification. Home Builder Associations and other associations could receive CE credits and discounts as requested.

Continuing Education (CE) Workshops

Inspecting the Mitigation System During the Home Inspection
This workshop is designed to teach home inspectors how to inspect an active radon mitigation system during a typical home inspection. The course was developed in cooperation with EPA and the American Society of Home Inspectors (ASHI). The training features classroom presentations and fieldwork in a residential home to inspect an active mitigation system. All home inspectors, realtors, or health officials are recommended to attend this workshop. ASHI grants 2 MRCs for attendance.

Quality Assurance and Quality Control
Recommended for measurement specialists, the objective of this workshop is to familiarize participants with the purpose and intent of a quality assurance plan and increase confidence in their radon measurements. By applying the principles of quality assurance, participants will realize the benefit of improved radon measurements and be more aware of the conditions causing error in their measurements.

Mitigating Houses with a Crawl Space
This new workshop provides information to certified mitigators on problems with mitigating houses with crawl spaces and includes both classroom and field exercises.
Radon Mitigation in Difficult Houses
This workshop provides certified mitigators an opportunity to gain more knowledge of and experience with mitigation problem solving in difficult homes. The training has been approved for continuing credits with NEHA/NRPP.

Radon Measurement and Mitigation in Karst Geology Areas
This workshop was originally offered as the Livingston Tennessee Housing Investigation Course. It is an advanced classroom and hands-on workshop featuring case studies from the Tennessee Housing Investigation Training Program in which measurement and mitigation strategies were developed for situations influenced by karst geology.

Some of the topics covered include:

- Overview of measurement and mitigation efforts in the area
- Summary of activities in the current investigation
- Detailed explanation of methods and techniques implemented
- Activities might include hands-on performance of diagnostic radon measurement procedures, analysis and use of results in system design, system performance prediction, simulation
- Classroom exchange of experiences, methods and techniques

Radon Resistant New Construction Techniques for Large Buildings
Typically held for builders, realtors, or health officials this workshop provides information on Resistant New Construction Techniques during building design and construction. The workshop will be offered for CE credits.

Marketing Your Radon Business
This seminar will provide classroom presentations from experts in various business and professional fields and provide helpful handouts from entities involved with marketing a business. The one day seminar will provide an opportunity to learn important tips and gain knowledge for either improving an existing radon business or starting a new radon business.

Large Building Radon Mitigation
The one-day version introduces a procedural framework for the investigation of large buildings and the design of radon mitigation strategies based on the results of that investigation. Using materials from real buildings, participants will learn building investigative procedures, including:

- Evaluation of radon test data
- Building plan examination
- Determination of HVAC system design
- Investigative procedures
- Field verification for building structural and mechanical characteristics
- Assessment of building pressure relationships
- Identification of potential radon entry points

The course will include training on an Active Soil Depressurization (ASD) system design method which treats ASD systems as air-handling systems and employs quantitative diagnostic procedures to enable optimal system design. These procedures include the determination of the required extent and strength of pressure fields; determination of system resistance characteristics and required airflows; and performance requirement-based selection of system components and configurations. The second day of the two-day version consists of field exercises in building investigation, diagnostics and system design. Participants will assist with a mitigation strategy design for the building based on the results of their investigation.
Advanced Diagnostics and System Design Workshop

This ASD workshop on diagnostic methods treats ASD systems as air-handling systems. It incorporates air-handling system design principles into the process of determining the ASD system mechanical performance requirements, the selection of appropriate system components to meet those requirements, and the verification of the proposed system's operational characteristics. Use of this method ensures that installed systems will perform as predicted in terms of airflow and pressure field extension. This workshop has been approved for CE credits for one or two days.

SSRTTC Program Contacts and Instructors

Jan Carrington is Program Manager of the Southern Regional Radon Training Center (SRRTC) based in the Business and Engineering Continuing Education office at Auburn University, AL. Ms. Carrington has coordinated all phases of radon training, organizing programs and examinations throughout the 13 southeastern states since 1990. Ms. Carrington maintains the SRRTC 1-800 Radon hotline and also assists with other Business and Engineering Continuing Education programs as a program developer.

Jack Hughes entered the radon industry in 1989 after 15 as a building contractor. Since 1996 Mr. Hughes has been the lead instructor for SRRTC. In addition to teaching standard measurement and mitigation courses, his duties include development and presentation of specialized courses for various audiences, as well as the design and implementation of investigative projects. Hughes developed an innovative mitigation course for school maintenance personnel, enabling cost-effective in-house solutions to school radon problems. As chief investigator, he has overseen the EPA/SRRTC investigation into karst geology and its influence on radon behavior and the associated problems of measurement and mitigation. This effort now includes additional investigations into the karst/radon phenomena in several states.

Robby Cardwell is an instructor and technical assistant for the SRRTC. He has a broad background in mechanical, civil and environmental engineering and is a graduate of the University of Tennessee. He has 15 years experience in the home construction industry, in addition to providing the “hands-on” environmental services. Mr. Cardwell provides technical and educational assistance to SRRTC through training programs.

Bradley Turk is a research consultant and president of Environmental Building Sciences in Las Vegas, NM. His clients include private businesses, state governments, universities, and EPA. He investigates indoor air quality, radon and energy efficiency in residences, schools and offices and develop courses on these topics. Mr. Turk is a trainer for the regional radon training centers consortium. He is the lead investigator for the EPA Radon Moisture Study for SRRTC. Mr. Turk has a BA in Physics from Colorado College and experience investigating the indoor environment that stretches back over 20 years.

Harry Grafton has been involved with a variety of indoor environmental issues for more than a decade. He has been an instructor for EPA and has taught courses such as Introduction to Indoor Air Quality, Building Air Quality, Radon Measurement Operators Course, and Radon Training for Mitigators across the country. His approach to indoor air quality is to consider the building and the occupants as a system, rather than to consider each pollutant individually. Mr. Grafton is a trainer for the regional radon training center consortium.
Registration Form

Please complete the registration form, indicating which training and/or exam you will be attending. Registration must be received no later than one week prior to the training session or workshop. Mail or fax registration with payment to SRRTC - AUBURN UNIVERSITY. Registrants will receive a confirmation package which may include hotel and meeting space logistics, study materials and other information.

TRAINING: __________________________________________

EXAM: __________________________________________

DATE: __________________________

LOCATION: __________________________________________

TRAINING FEE: __________

EXAM FEE: __________

Name __________________________________________

First Name MI Last Name Nickname, other than First

Company __________________________________________ Last 4 digits of Social Security # __________

Address __________________________________________

City __________________________________________ State __________ Zip+4 __________

Business Phone ( ) ______ Fax # ( ) ______ E-Mail __________________________

☐ Check (made payable to Auburn University) ☐ Visa ☐ MasterCard

Credit Card Number __________________________ Exp. Date __________

Name on Credit Card __________________________

Signature __________________________________________

PLEASE FAX OR RETURN THE COMPLETED REGISTRATION FORM(S) TO:

Jan Carrington
SRRTC/Business & Engineering Continuing Education
217 Ramsay Hall
Auburn, AL 36849-5376
(800) 626-2703 or (800) 446-0382 or Fax (334) 844-5715
www.bece.auburn.edu/srrtc or E-mail: janc@eng.auburn.edu
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