

How do I get the CIOWTS credential?

- Step 1. Go to www.neha.org/onsite website to familiarize yourself with the CIOWTS credential, or call Heidi Shaw, Credentialing Coordinator at NEHA at (303) 756-9090 ext. 339
- Step 2. Review the eligibility requirements for the Basic and Advanced level CIOWTS examinations. Decide which level would be the best fit for you.
- Step 3. Complete the CIOWTS Application, which can be downloaded from the www.neha.org/onsite website.
- Step 4. Choose where you would like to take the examination:
 - Option One – NEHA Annual Educational Conference and Exhibition. The next conference is scheduled for June 19-24, 2007 in Atlantic City, NJ.
 - Option Two – State Affiliate/Regional Meeting – NEHA will make arrangements with state affiliates or groups planning to test at their meetings throughout the year. Please check our website for added test dates at www.neha.org/onsite.
 - Option Three – Computer Testing at LaserGrade Testing Centers. These exams are on computer at LaserGrade Testing Centers throughout the United States. LaserGrade has about 1000 testing centers nationwide. This option is on demand, meaning if you choose to test through LaserGrade, once your application is approved NEHA will send you a testing voucher with your authorization code and LaserGrade's 800#. You can call LaserGrade and set up a testing date at your convenience and receive your scores the same day. There is an additional fee of \$80.00 for this option.
- Step 5. Send in your application to NEHA with the appropriate fees.
- Step 6. You will receive an admission letter from NEHA if you chose testing option one or two; or you will receive a testing voucher from NEHA if you chose testing option three.
- Step 7. Study for the examination. There is a list of recommended study references available for viewing and downloading at www.neha.org/onsite. Please keep in mind as you are preparing that the CIOWTS is a national credential and therefore does not test on local codes/regulations. The CIOWTS exams test for basic knowledge of installation practices.
- Step 8. Make sure you know where to go on test day and leave yourself plenty of time to get there. Bring your photo ID (i.e. driver's license, passport), #2 pencils, and erasers.
- Step 9. While taking the exam relax. Take your time. Carefully read each question and answer choice before making your selection.
- Step 10. Once the exam over breathe easy. You should receive your exam results from NEHA within 4-6 weeks.

C.I.O.W.T.S. Exam Description/ Content Areas

There are 75 questions on the basic level exam, and 125 questions on the advanced level exam. All questions are written in multiple choice format. You will have 2 hours to complete the basic level exam and 3 hours to complete the advanced level exam. The CIOWTS exam is based upon the following content areas. Next to each subject area the approximate percentage of questions in that content area on the exam. The content areas and approximate percentages of exam questions are the same for both the basic level and the advanced level. The advanced level exam includes more questions and questions of greater difficulty.

- **PLAN ASSESSMENT 10%**
 - Knowledge of site plans; basic surveying; topography; site features
 - Knowledge of materials requirements; standards and specifications; soil profile descriptions; pump performance; treatment and dispersal technologies
 - Ability to conceptualize an installation activity
 - Ability to make mathematical calculations of area, volume, elevation, rates, measures and weights
- **JOB STAGING 20%**
 - Knowledge of installation plans; elevations; topography
 - Ability to transfer designer's plan to site; reconcile variations; identify conflicts
 - Knowledge of equipment needs and limitations; materials and supplies; soil characteristics
 - Ability to make mathematical calculations
 - Ability to identify subcontractor and homeowner needs and potential conflicts
- **SITE DEVELOPMENT/ INSTALLATION 70%**
 - Knowledge of soil characteristics; ability to recognize soil characteristics in the field
 - Knowledge of specifications and installation techniques for tanks, baffles, filters and screens, piping and fittings, aggregate and fill material, proprietary treatment components, pumps and siphons, liner materials, valves, switches and tubing
 - Knowledge of electrical requirements
 - Knowledge of gravity and pump/siphon dosed system requirements
 - Knowledge of timers and remote monitoring
 - Knowledge of bedding, testing, pipe connection methodologies
 - Knowledge of pump performance specifications; total dynamic head in pressurized systems
 - Ability to make mathematical calculations, conversions

Certified Installer Onsite Wastewater Systems (CIOWTS) Credential Reference List

1. *U.S. EPA Onsite Wastewater Treatment Systems Manual*
available for download at:
<http://cfpub.epa.gov/owm/septic/publications.cfm?view=all>
2. *Residential Building Design & Construction*. Jack Willenbrock, Harvey Manbeck, and Michael Suchar, (1998) Prentice-Hall.
3. *Septic System Checkup: The Rhode Island Handbook for Inspection and Inspection Report Forms*.
4. *Small and DeCentralized Wastewater Management Systems*. Crites & Tchobanoglous. (1998) McGraw-Hill.
5. *Wells and Septic Systems, 2nd Edition*. Max & Charlotte Alth, Revised by S. Blackwell Duncan, (1992) TAB Books.
6. *Ohio Pipe and Excavation Contracting*. Dave Roberts. (1987) Craftsmen Book Co.
7. *Plumber's Handbook Revised Edition*. Howard Massey (1978)
8. *OSHA Guidelines*
9. *Plumber's Guidelines*

IOWWA CERTIFICATION PROCEDURES & CONTINUING EDUCATION

1. Any person who has passed the NEHA CIOWTS exam may apply to IOWWA for classification as an IOWWA Certified Installer. To do so an application must be filled out and submitted to IOWWA along with a \$50 fee
2. Board Reviews and approves or denies application
3. If approved the applicant is issued a certificate and certification number
4. IOWWA will list all certified installers on the web site and ask NOWRA to do the same in the septic locator
5. All certificates will be for a two year period. It is the certified installer's responsibility to notify IOWWA of attendance at training sessions, once so notified IOWWA will track the continuing education earned.
6. At the annual conference and all other IOWWA sponsored training sessions, if the installer needs continuing education credit a sign up sheet or punch card will be available. The person will be responsible for obtaining the certificate of attendance
7. At the end of the two year period the certified installer would need to provide IOWWA with the NEHA renewal certificate and pay a \$50 renewal registration fee.
8. The certified installer is responsible for registering his CEU's with NEHA. This can be done on line
9. 1 CEU is equal to 1 clock hour of training. NEHA requires 12 CEU in a 2 year period. IOWWA is requiring 18 CEU in a 2 year period to maintain your IOWWA certified installer status.