

CONCRETE CERTIFICATION TRAINING DESCRIPTION

CONCRETE FIELD TECHNICIAN: This entry-level training allows the student to become ACI and NCDOT certified. This course will include a fundamental understanding of NCDOT specifications, basic concepts and components of concrete, and how to correctly complete NCDOT forms relating to concrete sampling. In addition, the student will be trained and tested on all field performance tests which include; calibration of "Type B" air pressure meter, measurement of air content in concrete using the "Type B" air pressure meter, temperature specifications, sampling specifications, making and curing of test specimens, air content using the volumetric method (roll-o-meter), unit weight, Chace Indicator, and slump test. To be certified, each student must pass all field performance tests, the NCDOT written exam, and the ACI written exam. **ALL STUDENTS WILL BE REQUIRED TO COMPLETE ALL THREE PARTS- NO EXCEPTIONS.** The cost for this school is **\$500.00** per student.

NCDOT CERTIFICATION ONLY: Individuals who are currently ACI Concrete Field Testing –Grade 1 certified and seek NCDOT certification only will participate in this class option and be exempted from the ACI written exam and the field performance tests portions (except for the Chace Indicator Test). Students are notified after registering for class by confirmation memo to show up the first day of class for review of NCDOT and testing. The cost of the school is **\$250.00** per student.

NCDOT WRITTEN RETEST: Individuals failing the NCDOT written exam are allowed to retake the exam within one year of the original school. NCDOT Written Retest is selected as the option for class-after registering for class a confirmation memo instructs student to show up last day of class for testing only. The cost of the retest is **\$250.00** per student.

ACI WRITTEN RETEST: This class option is selected for those that have failed the ACI Written Test but have passed the NCDOT part. After registering for class, a confirmation memo will be sent instructing student to show up on last day of class for retest only. The cost of this retest is **\$250.00**.

ACI PERFORMANCE RETEST: This class option is selected for those that have failed the ACI Performance Test but have passed the NCDOT part and ACI Written test. A confirmation memo will be sent to those instructing student to show up on last day of class for testing only. The cost for this school is **\$200.00** per student.

CONCRETE BATCH TECHNICIAN: This two-day school is for the individual whose job responsibilities pertain to activity at a concrete batch plant. Subjects covered include: NCDOT specifications, plant operations, admixtures used in concrete and their characteristics, moisture determinations, and batch weight adjustments. This school will provide a NCDOT Batch certification only after a separate on-site evaluation is successfully completed. The evaluation will be administered to the students that successfully complete the classroom portion. The purpose of the evaluation is to ensure the student's ability to actually batch concrete according to the NCDOT specifications. Students who have never been NCDOT Certified Batch Technicians have a prerequisite of being a Certified Concrete Field Technician. Training is conducted in a classroom setting where a basic understanding of batching operations is

needed and mathematical formulas and calculations are used routinely. This certification is required of all technicians batching concrete for NCDOT or a NCDOT- related project. The cost for this school is **\$200.00** per student.

CONCRETE MIX DESIGN TECHNICIAN: This three-day advanced school instructs an in-depth, step-by-step procedure to produce the following: ACI concrete mix designs, design variations, weight – volume relationships, and aggregate gradation. Additional subjects include: admixtures and their uses in concrete, use of Portland cement, use of fly ash in concrete, and placing and curing of concrete. Training is conducted entirely in a classroom setting where mathematical formulas and calculations are used extensively. Prerequisite for the school is a Concrete Batch Certification. The cost for this school is **\$150.00** per student.

CONCRETE MIX DESIGN TECHNICIAN: This three-day advanced school instructs an in-depth, step-by-step procedure to produce the following: ACI concrete mix designs, design variations, with-volume relationships, and aggregate gradation. Additional subjects include: admixtures and their uses in concrete, use of Portland cement, use of fly ash in concrete, and placing and curing of concrete. Training is conducted entirely in a classroom setting where mathematical formulas and calculations are used extensively. Prerequisite for the school is Concrete Batch Certification. The cost for the school is **\$150.00** per student.

CONCRETE PAVEMENT TECHNICIAN (PCCP): This two-day school is for the individual whose job responsibilities include concrete paving placement, sampling, and testing. Subjects covered include: NCDOT specifications, MIT SCAN, maturity and joint scoring. Prerequisite for the school is completion of the requirements for Certified Concrete Field Technician. Batchers of pavement concrete must also be Certified Concrete Batch Technicians. Once the classroom portion of the Concrete Pavement Technician School is successfully completed, all personnel involved in the testing and acceptance of concrete pavement must complete field tests conducted by the Materials and Tests representative at an approved concrete laboratory site. All personnel in the operation, recording, or interpretation of data relating to the Rainhart Profilograph (Model No. 860) must demonstrate operation and data interpretation on an approved jobsite in the presence of designated personnel. The cost for this school is **\$200.00** per student.