Tennessee Department of Transportation Division of Materials and Tests

Field Technician Certification Requirements (SOP 1-3)

<u>Purpose:</u> The purpose of this document is to establish the minimum qualifications for personnel

involved in the sampling and testing of materials for process control, acceptance, and

assurance purposes.

<u>Background:</u> Federal regulations (23 CFR 637B) require that all sampling and testing used in the

materials and construction acceptance process be conducted by qualified technicians.

<u>Policy:</u> Personnel must be certified in the applicable TDOT certification workshops as required

in the Standard Specifications, or when otherwise required. To become certified individuals must attend the classroom instruction and/or presentations, successfully complete the written examination, and successfully complete the sampling and testing

proficiency demonstrations when applicable.

American Concrete Institute (ACI) Aggregate Testing Technician - Level 1 is acceptable in lieu of the TDOT Aggregate Quality Control Testing Technician certification.

American Concrete Institute (ACI) Concrete Field Testing Technician Grade I is acceptable in lieu of the TDOT Concrete Field Testing Technician certification with the following exception. When self-consolidating concrete (SCC) is being produced, ACI Concrete Field Testing Technician Grade I as well as ACI Self-Consolidating Concrete Testing Technician will be required in lieu of the TDOT Concrete Field Testing Technician certification.

A copy of the ACI Certification(s) Card must be submitted to Kim Whitby at Kimberly. Whitby@tn.gov

<u>Certification:</u> Upon successful completion of a certification course, every individual must complete the

TDOT Technician Certification Agreement to receive their certification cards.

<u>De-certification:</u> TDOT will assure all individuals that are certified continue to correctly perform and conduct the sampling and testing requirements per their certification. TDOT will maintain the right to revoke certifications from individuals whom:

- Improperly perform sampling, testing, or inspection of materials or workmanship to assure its acceptance or quality.
- Improperly report or falsify, quality control, acceptance, or assurance testing data,
- Deliberately and intentionally report data that was not obtained by testing,
- Accept materials or products that are obviously of poor workmanship and non-compliant with the TDOT Specifications.
- To retain a Concrete Plant Quality Control and Concrete Mix Design Certification all prerequisite certifications must be current during the certification

period. Prerequisite requirements are waived for individuals that have a current P.E.

Each infraction, as listed above, will be evaluated on a case-by-case basis. TDOT will determine the appropriate disciplinary action based on the severity, intent, type, and number of infractions. Disciplinary actions may include, written warning, verbal warning, temporary or permanent de-certification, re-examination, etc.

Courses:

The Materials and Tests Division website gives a full description of each certification course offered below. The Materials and Tests Division website also contains a course schedule and registration process for each certification course. Course participation shall be waived for those recertifying in Aggregate Technician, Concrete Plant Quality Control Technician, and Concrete Mix Design Technician for technicians that have accrued nine (9) credit hours of Continuing Education Units (CEU). Technicians must be present to sign in at each event and must attend one (1) event in the last six (6) months prior to expiration. Only one (1) annual meeting and one (1) regional meeting will be allowed per year.

Certification Program	Required for:	Certificati on Valid for:	Required Per Specification:	Description of Workshop
Asphalt Level 1 Roadway Paving Inspector	TDOT, CEI, and Contractor paving inspectors and foreman	5 years	407.14	Classroom presentation and written exam.
Asphalt Level 1 Roadway Paving Inspector RECERTIFICATION	TDOT, CEI, and Contractor paving inspectors and foreman	5 years	407.14	Online training and testing
Asphalt Level 2 Plant Technician	TDOT, CEI, and Contractor Acceptance and Process Control	5 years	407.03 (D)2(a)	Classroom presentation, laboratory/test demonstration, written exam, and laboratory/test proficiency demonstrations.
Asphalt Level 3 Mixture Design Technician	TDOT Verification and Contractor Mix Designers	5 years	407.03(C)1	Classroom presentation, written exam, and laboratory/test proficiency demonstrations.
Concrete Field Testing Technician	TDOT, CEI, and Contractor Field Acceptance and Process Control	5 years	501.03(B) 604.03(B)	Classroom presentation, test method demonstration, written exam, and performance exam.
Concrete Field Testing Technician RECERTIFICATION	TDOT, CEI, and Contractor Field Acceptance and Process Control	5 years	501.03(B) 604.03(B)	Classroom workshop/presentation, written exam, and performance exam.
Concrete Plant Quality Control Technician	Contractor Concrete Plant Process Control	5 years	501.03(B) 604.03(B)	Classroom presentation of test methods, and written exam
Concrete Plant Quality Control Technician RECERTIFICATION	Contractor Concrete Plant Process Control	5 years	501.03(B) 604.03(B)	Continuing Education Units (CEU) via annual attendance at TDOT Annual OR Regional Producer's Meeting
Concrete Mix Design Technician	Contractor Concrete Mix Design	5 years	501.03(A) 604.03(A)	Classroom presentation of test methods, and written exam.
Concrete Mix Design Technician	Contractor Concrete Mix Design	5 years	501.03(A) 604.03(A)	Continuing Education Units (CEU) via annual attendance at

RECERTIFICATION				TDOT Annual OR Regional Producer's Meeting
Concrete Mix Design Technician PE REQUIREMENTS	PE	5 years		Online Presentation and written exam
Aggregate Technician	Aggregate Producers	5 years		Classroom presentation, test method demonstration, performance exam and written exam.
Aggregate Technician	TDOT, CEI	5 years		Classroom presentation, test method demonstration, performance exam and written exam.
Aggregate Technician RECERTIFICATION	Aggregate Producers	5 years		Continuing Education Units (CEU) via annual attendance at TDOT Annual Meeting OR Regional Producer's Meeting
Radiation Safety Certification Course	TDOT	3 years	CL G-1	Online training and testing
Nuclear Gauge Field	TDOT, CEI	3 years	407.20	Online training and testing