Laboratory SOP 28 Revised: March 8, 2016

Department of Transportation Office of Materials and Testing

Standard Operating Procedure (SOP) 28 Inspection of Thermoplastic Drainage Pipe

I. General

This Standard Operating Procedure provides a means whereby qualified pipe producers can utilize certified personnel to fulfill the supplier's responsibility for furnishing thermoplastic drainage pipe, couplings and fittings conforming to the Georgia Department of Transportation Specifications.

Each pipe producer must qualify under the acceptance requirements set forth herein. Qualified producers are defined as those with a Georgia Department of Transportation approved Quality Control Program, a certified technician, and an acceptable record of producing quality thermoplastic pipe. The Office of Materials and Testing will publish a list of all thermoplastic pipe producers which have qualified under the program set forth in this Standard Operating Procedure. This list is identified as Qualified Products List (QPL) 51, "Thermoplastic Drainage Pipe Producers".

A. Related Specifications and Documents

Standard Specifications Section 845-Thermoplastic Pipe

QPL 51, Thermoplastic Drainage Pipe Producers

Ga. Std. 1030P, Thermoplastic Pipe

II. Producer and Plant Approval Procedure

A. Application Requirements

Pipe producers seeking approval for placement on QPL 51 to furnish thermoplastic drainage pipe to Georgia Department of Transportation projects must submit written application for plant approval to the Inspection Services Branch of the Office of Materials and Testing. This application is also required to be submitted annually, no later than December 1st of each year, to remain an approved producer for the following year. The application package shall include the following items:

- 1. The "QPL Information Form" with the company information and contacts. (copy attached)
- 2. An outline of the company's Quality Control and Assurance Program. This shall include a brief description of the equipment and materials which will be used to manufacture, inspect and test the product.
- 3. The "Annual Certification and Guarantee" letter with the notarized signature of a responsible officer of the company with the authority to bind the company to contract. (copy attached)
- 4. National Transportation Product Evaluation Program (NTPEP) Certification. Thermoplastic drainage pipe producers are required to participate in and obtain certification for each type of thermoplastic drainage pipe they produce and supply to Georgia Department of Transportation projects. Successful completion of the NTPEP Auditing Program is required for placement on QPL-51. Information regarding the programs and contacts can be found at the following address:

AASHTO/NTPEP

NTPEP Program Director
444 North Capitol Street N.W., Suite 249
Washington, DC 20001
www.ntpep.org

All application information shall be sent to the following address:

Georgia Department of Transportation
Office of Materials and Testing
Inspection Services Branch
15 Kennedy Drive
Forest Park, GA 30297-2599

B. Initial Inspection and Plant Evaluation

Upon receipt of the application package the Inspection Services Branch will review all documentation and, if complete and acceptable, will schedule an initial inspection and audit with the producer. Incomplete submissions will be returned for correction. The initial inspection will include a review of the producer's quality control techniques, quality control records, equipment and, if necessary, the testing and certification of the producer's selected Plastic Pipe Technician (PPT) candidate.

C. Certification of Technician

Personnel selected by producers to be the certified Plastic Pipe Technicians (PPT) shall establish their qualifications and proficiency by successfully completing written, oral, and/or on-the-job examinations prescribed by the Office of Materials and Testing. Quality control must be the primary function of the certified technician and the technician must not be under the supervision of the production manager and must report only to the general manager or owner. The general manager or owner must ensure that the technician is not overburdened with other miscellaneous duties that interfere with the technician's ability to perform quality control. The certified technician shall possess the authority to halt production upon discovery of manufacturing defects and/or improper manufacturing techniques until appropriate corrections are implemented.

D. Approval

Upon acceptance of the application package, successful plant inspection, and certification of a Plastic Pipe technician, the producer shall be submitted for approval to the State Materials Engineer as a qualified thermoplastic drainage pipe producer and be listed on QPL 51.

III. Producer Responsibilities - General

A. Quality Control

Each producer listed on Qualified Products List 51 shall have an approved materials control program that ensures that all raw materials used in the manufacture of thermoplastic drainage pipe for Georgia Department of Transportation projects conform to the applicable specifications and that all materials used in manufacturing have certified test reports meeting all requirements of the Department's governing specifications and are maintained on file at the plant. All producers shall have the testing equipment necessary at a central location to perform required testing as outlined in the governing Departmental, AASHTO, and ASTM specifications and are required to have all testing equipment certified on an annual basis by an independent third party testing/calibration agency. All producers shall have a means by which random samples of finished pipe can be obtained.

B. Plastic Pipe Technician (PPT) Responsibilities

The technician's responsibilities shall include supervising the producer's quality control program. The technician will take appropriate action to ensure that all pipes, couplings and fittings are manufactured to meet the governing Specifications. In addition, to ensure the Department that all pipes produced for Georgia Department of Transportation usage meets all governing Specifications, the technician shall personally test and inspect all thermoplastic pipes as outlined in the governing Departmental, AASHTO and ASTM specifications and reject any pipe which fails to meet the requirements. The technician shall then personally place an approval stamp (PPT-#), by means of either a thermal branding iron or approved sticker, on the interior wall of each pipe section that is found to meet requirements of the governing Specifications, and/or approved plans. This approval stamp is required to be applied to all thermoplastic drainage pipes shipped and supplied to Georgia Department of Transportation projects and shall not be placed on any pipe prior to completion of the testing and inspection process.

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C. Shipment of Pipe

All thermoplastic drainage pipe shall be direct shipped to GDOT construction projects from approved producer's listed on QPL 51 and reported per Section V. Shipping, stockpiling and storage of stamped pipe by third party distributors and vendors is not permitted. Shipment reporting form OMR-INSP-89 and material certifications are to be provided with each shipment to GDOT construction projects.

IV. Office of Materials and Testing Responsibilities

The Office of Materials and Testing will monitor each plant's quality control procedures. This will include a review of the records of production, shipment, material control, certification, and inspection. In addition, the Department shall randomly perform tests, visually inspect, and sample finished pipe. The Office of Materials and Testing shall provide the producers with a copy of all test reports for any samples secured at that location, and these reports shall also become part of the producers' records.

V. Reporting

All producers shall comply with the approved system of reporting each shipment of pipe to a GDOT construction project. Each shipment shall be reported on Form OMR-INSP-89 and shall have certified test reports attached that include all test results required by the Specifications. These reports shall be submitted to the Office of Materials and Testing within one week of inspection and shipment. Authorized plant personnel shall complete this form and certify all information to be correct. The Office of Materials and Testing will review each report for accuracy and maintain these reports on file in the Inspection Services Branch.

VI. Removal of Fabricators from Qualified Products List 51

The State Materials Engineer will remove any producer from the approved list due to failure to comply with any of the requirements of this SOP, governing specifications, and approved plan drawings.

VII. Project Acceptance of Thermoplastic Drainage Pipe

The construction project engineer may accept pipe from any approved producer listed on QPL 51 provided that the OMR-INSP-89 shipment report form is provided and each pipe section is clearly marked with the producer's approval PPT-# stamp and there is no evidence of damage due to shipping and handling.

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QPL Information Form Georgia Department of Transportation

Office of Materials and Testing Inspection Services Branch

			DATE:					
Compan	ny Name:							
Contact [#] 1:	t			Contact #2:				
E-mail:				E-mail:				
Address	:			Address:				
Phone [‡]				Phone #				
	Area C	ode	EXT	— #	Area Code	EXT		
Toll Fr	ee "	888	EXT	Toll Free #	800 or 888	EXT		
Fax#				Fax [#]				
	Area C	ode			Area Code			
Compan Address	ny Name:							
Phone [‡]	# Area C	'ode	EXT	_ Customer Servi	ce # 800 or 888 or Area	Code		
Fax #			Internet Address					
QPL #	Initial Eval.	Annual Eval.		Type of Mat	Type of Material			

ANNUAL CERTIFICATION AND GUARANTEE

	guarantees that all
(Company Name	e)
(Type of Materia	furnished to State
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of Georgia projects in the forthcoming twe	elve (12) months will be in accordance with and
will conform fully to the requirements	of the governing specifications and will be
replaced without cost to the purchaser and	State of Georgia when found not in conformity
with any of the specified requirements. V	We certify that we accept full responsibility for
determining the governing specifications	s for each order and further certify that al
	tions and details which apply to each order.
14:	Very truly yours,
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(Notary Public) (Date)	

OMR-INSP-89 Rev.2016

Georgia Department of Transportation Office of Materials & Testing

Thermoplastic Pipe Shipping Report

Contract ID No.				PI No.			
Project No.							
Manufactured by				Location			
Pipe Type							
Date Shipped							
Lot No.							
Date Manufactured							
Diameter in/mm							
No of Sections							
Length of Sections feet/meter							
Total feet/meter							
Invoice Number							
PPT No.							
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				Notary Public			