ORIGINATION FORM
Proposed Revisions to the Specifications

(Please provide all information - incomplete forms will be returned)

Date: 11-03-20

Office: SDO

Originator: Jacqui Petrozzino-Roche

Specification Section: 462

Telephone: 850-414-4290

Article/Subarticle: 462-7.4.1.5.3- Production Test

email: Jacqueline.petrozzino@dot.state.fl.u

****Will the proposed revision require changes to:**

Publication	Yes	No	Office Staff Contacted and date contacted
Standard Plans Index	○	◉	Rick Jenkins
Traffic Engineering Manual	○	◉	Javier Ponce
FDOT Design Manual	○	◉	Bobby Bull
Construction Project Administration Manual	○	◉	Scott Arnold
Basis of Estimate/Pay Items	○	◉	Melissa Hollis
Structures Design Guidelines	○	◉	Ben Goldsberry
Approved Product List	○	◉	Karen Byram
Materials Manual	○	◉	Tim Counts

**This section must be completed prior to processing proposed revisions.

Will this revision necessitate any of the following:

Design Bulletin ☐ **Construction Bulletin** ☐ **Estimates Bulletin** ☐ **Materials Bulletin** ☐

Are all references to external publications current? **Yes** ◉ **No** ○

If not, what references need to be updated? (Please include changes in the redline document.)

Why does the existing language need to be changed?

The change in language is needed to clearly state the Department's policy. Both the flow cone test and the Wet Density Test are required when grout filler is used to fill post-tensioning tendon ducts.

Summary of the changes:

Change the word "Alternately" to "Additionally" in Section 462-7.4.1.5.3.2.b. Both the flow cone test and the Wet Density Test are required when grout filler is used to fill post-tensioning tendon ducts.

Are these changes applicable to all Department jobs? **Yes** ○ **No** ◉

If not, what are the restrictions?

This change is applicable to projects which utilize post-tensioning with grout filler.

Contact the State Specifications Office for assistance in completing this form.

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M E M O R A N D U M

DATE: December 3, 2020

TO: Specification Review Distribution List

FROM: Daniel Strickland, P.E., State Specifications Engineer

SUBJECT: Proposed Specification: **4620704 Post-Tensioning**

In accordance with Specification Development Procedures, we are sending you a copy of a proposed specification change.

This change was proposed by Jacqueline Petrozzino-Roche from the Structures Design Office to modify the word “Alternately” to “Additionally to clearly state the Department’s policy. Both the flow cone test and the wet density test are required when grout filler is used to fill post-tensioning tendon ducts.

Please share this proposal with others within your responsibility. Review comments are due within four weeks and should be sent to Mail Station 75 or online at http://fdotewp1.dot.state.fl.us/programmanagement/development/industryreview.aspx . Comments received after **January 5, 2021,** may not be considered. Your input is encouraged.

DS/rf

Attachment

POST-TENSIONING
(REV 11-12-20)

SUBARTICLE 462-7.4.1.5.3 is deleted and the following substituted:

462-7.4.1.5.3 Production Test:

1. Test grout fluidity to verify it is within limits established by grout manufacturer during grouting operations. Target fluidity rate is established by manufacturer's representative based on ambient weather conditions.

2. Determine grout fluidity in accordance with Section 938.

a. Perform a fluidity test using flow cone on grout discharged from anchorage cap outlet immediately after uncontaminated uniform consistency discharge begins for each tendon greater than 50 feet in length. For tendons 50 feet or less, perform a fluidity test on a per batch basis. For fluidity tests done on a per batch basis, perform test after new batch has been transferred from mixing tank to holding tank and thoroughly mixed with remains of the previous batch to produce a new homogenous mixture. During mixing process, continually re-circulate grout from hose into holding tank. Ensure measured grout efflux time is not less than efflux time measured at injection end of grout hose.

b. Additionally~~Alternately~~, check grout fluidity using Wet Density method contained in Section 938. Density at discharge outlet must not be less than grout density at inlet. Continuously discharge grout until density requirements are met. Discard grout used for testing fluidity.

3. Perform fluidity test for each tendon to be grouted without modifying water-cement ratio.

4. Check temperature of grout at inlet end of grout hose hourly to verify conformance to this Section.

5. Obtain a sample from first production batch of grout and perform a wick induced bleed test on this sample in accordance with Section 938 at beginning of each day's grouting operation. Begin grouting operations after sample is obtained.

6. Once grouting has begun, if zero bleed requirement is found to not have been achieved in the wick induced bleed test at any time during required test time period, complete grouting of any partially grouted tendons currently being grouted but do not begin grouting any new or additional tendons. Immediately inform the Engineer when grouting operations have ceased due to non-compliance of the wick induced bleed test.

7. Do not re-start grouting operations until such time that testing shows grout meets specified requirements.