



Florida Department of Transportation

RICK SCOTT
GOVERNOR

605 Suwannee Street
Tallahassee, FL 32399-0450

ANANTH PRASAD, P.E.
SECRETARY

July 15, 2014

Khoa Nguyen
Director, Office of Technical Services
Federal Highway Administration
545 John Knox Road, Suite 200
Tallahassee, Florida 32303

Re: State Specifications and Estimates Office
Section **410**
Proposed Specification: **4100100 Precast Concrete Box Culvert.**

Dear Mr. Nguyen:

We are submitting, for your approval, two copies of the above referenced Supplemental Specification.

These changes were proposed by Chase Knight of the Department's State Materials Office (SMO) to update the language for consistency with other sections regarding certification requirements for structures and to add liner repair systems to 410-2.

Please review and transmit your comments, if any, within two weeks. Comments should be sent via email to SP965DS or daniel.scheer@dot.state.fl.us.

If you have any questions relating to this specification change, please call me at 414-4130.

Sincerely,

Signature on file

Daniel Scheer, P.E.
State Specifications Engineer

DS/dt

Attachment

cc: Florida Transportation Builders' Assoc.
State Construction Engineer

PRECAST CONCRETE BOX CULVERT.

(REV ~~3-20-14~~~~5-12~~~~30-14~~)

SUBARTICLE 410-1 is deleted and the following substituted:

410-1 Description.

~~Obtain precast box culverts from a plant that is currently on the Department's list of Producers with Accepted Quality Control Programs. Producers seeking inclusion on the list shall meet the requirements of 105-3.~~

Provide precast four-sided concrete box culverts as an alternative to the structure shown in the Contract Documents. Only monolithic segments, or two-piece segments with three-sided bottom sections and a simple support top slab section, are permitted. Two-piece segments are limited to installations with a minimum of two feet fill height above the top slab.

Construct headwalls, wingwalls and other special features using cast-in-place concrete. Precast wingwalls, cut-off walls or headwalls are not permitted unless otherwise noted in the Contract Documents.

~~At the beginning of each project, provide a notarized certification statement to the Engineer from a company designated representative certifying that the plant will manufacture the products in accordance with the requirements set forth in the Contract Documents and plant's approved Quality Control (QC) Plan. The QC Manager's stamp on each product indicates certification that the product was fabricated in conformance with the Contractor's QC Plan, the Contract, and this Section. Ensure that each shipment of precast concrete products to the project site is accompanied with a QC signed or stamped delivery ticket providing the description and the list of the products. Meet the requirements in 449-1.~~

SUBARTICLE 410-2 is deleted and the following substituted:

410-2 Materials.

Ensure that the materials used for the construction of precast box culverts have certification statements from each source, showing that they meet the applicable requirements of the following:

Portland Cement Concrete	Section 346
Reinforcing Steel	Section 415
Precast Concrete Drainage Products	Section 449
Wire for Site Cage Machines	Section 931
Coarse Aggregate*	Section 901
Fine Aggregate*	Section 902
Curing Materials for Concrete	Section 925
Materials For Concrete Repair	Section 930
Non-Shrink Grout	Section 934
<i>Liner Repair Systems</i>	<i>Section 948</i>
Joint Materials.....	ASTM C443, ASTM C877
.....	or ASTM C990
Geotextile Fabrics	Section 985

4100100

All Jobs

* The gradation requirements of aggregates are not applicable when using dry-cast concrete.

** Use products listed on the Department's ~~Qualified~~*Approved* Products List (QAPL).

PRECAST CONCRETE BOX CULVERT.
(REV 5-30-14)

SUBARTICLE 410-1 is deleted and the following substituted:

410-1 Description.

Provide precast four-sided concrete box culverts as an alternative to the structure shown in the Contract Documents. Only monolithic segments, or two-piece segments with three-sided bottom sections and a simple support top slab section, are permitted. Two-piece segments are limited to installations with a minimum of two feet fill height above the top slab.

Construct headwalls, wingwalls and other special features using cast-in-place concrete. Precast wingwalls, cut-off walls or headwalls are not permitted unless otherwise noted in the Contract Documents.

Meet the requirements in 449-1.

SUBARTICLE 410-2 is deleted and the following substituted:

410-2 Materials.

Ensure that the materials used for the construction of precast box culverts have certification statements from each source, showing that they meet the applicable requirements of the following:

Portland Cement Concrete	Section 346
Reinforcing Steel	Section 415
Precast Concrete Drainage Products	Section 449
Wire for Site Cage Machines	Section 931
Coarse Aggregate*	Section 901
Fine Aggregate*	Section 902
Curing Materials for Concrete	Section 925
Materials For Concrete Repair	Section 930
Non-Shrink Grout	Section 934
Liner Repair Systems	Section 948
Joint Materials	ASTM C443, ASTM C877
.....	or ASTM C990
Geotextile Fabrics	Section 985

* The gradation requirements of aggregates are not applicable when using dry-cast concrete.

** Use products listed on the Department's Approved Product List (APL).