



Florida Department of Transportation

RON DESANTIS
GOVERNOR

605 Suwannee Street
Tallahassee, FL 32399-0450

JARED W. PERDUE, P.E.
SECRETARY

August 19, 2026

Daniel Holt, PE, PTOE
Director, Project Delivery
Director, Technical Services
FHWA
400 West Washington Street, Suite 4200
Orlando, FL 32801

Re: State Specifications Office
Section: 611
Proposed Specification: **6110100 Acceptance Procedures For Traffic Control Signals
and Devices**

Dear Mr. Holt:

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

The changes are proposed by Ronald Meyer to update section title, updated requirements for ITSFM as-built submittals, and remove limiting term ITS from System Acceptance Test Subarticle.

Please review and transmit your comments, if any, within two weeks (10 business days). Comments should be sent via email daniel.strickland@dot.state.fl.us.

If you have any questions relating to this specification change, please call me at (850) 414-4130.

Sincerely,

Signature on File

Daniel Strickland, P.E.
State Specifications Engineer

DS/jb

Attachment

cc: Florida Transportation Builders' Assoc.
State Construction Engineer

**ACCEPTANCE PROCEDURES FOR TRAFFIC CONTROL SIGNALS AND DEVICES,
~~AND INTELLIGENT TRANSPORTATION SYSTEM DEVICES~~**
(REV 7-14-26)

SUBARTICLE 611-2.3 is deleted and the following substituted:

611-2.3 As-Built Documentation: ~~As a condition precedent to acceptance under 611-2.1 or 611-2.2, s~~Submit as-built drawings for all installations, signed and sealed by a Professional Engineer or Professional Surveyor and Mapper registered in the State of Florida, along with supplemental as-built information ~~using Feature Import Templates and Attribute Forms~~ used for the Department's ITS Facility Management (ITSFM) System. Additional information on the ITSFM cloud-based GPS mapping system, Attribute Forms, and Feature Import Templates can be found on the Department's web site: <https://www.fdot.gov/traffic/itsfm>.

611-2.3.1 Submittal Requirements: Submit as-built plans for review by the Engineer. As-built plans must be PDF files, in the same scale and content as the Plans and formatted on 11-inch by 17-inch sheets. Signing and pavement marking plan sheets may be used instead of signalization plan sheets, if a substantial number of changes from the original Plans must be recorded. If, in the opinion of the Engineer, the changes cannot be clearly delineated on the existing drawings, clearly delineate all changes on 11-inch by 17-inch detail sheets, enlarged 200% from the reproductions.

Submit fiber optic splicing diagrams detailing all cable splices, terminations, equipment port assignments, and optical circuit path names within the communication network. Include cable manufacturer, type, strand count, and cable sequential reading at each pull box entrance/exit, each side of the splice enclosure, and at patch panel terminations.

As-built submittals must include an inventory of all traffic control signals and devices, and support structures. The inventory must include horizontal position geographic coordinate data collected using Differential Global Positioning System (DGPS) equipment. The inventory must include, at a minimum, the manufacturer, model, and serial number for each device or completed assembly. Submit coordinate data for pull boxes as well as conduit and cable at 100-foot intervals including changes in direction. All new and existing support structures, equipment cabinets and other fixed location features must be assigned a unique site ID name to create a common association between the as-built plans, inventory forms, and the ITSFM system. Include data for all components listed in 611-2.3.2 in accordance with the Statewide ITSFM Functional Requirements, except those listed in 611-2.3.2.2 and 611-2.3.2.5.

Aerial photographs may be submitted with as-built plan submittals to provide supplementary information. The aerials should not include extra features such as the right of way, baseline, or roadway edges. The aerials may be used as a base for the as-built plans with mile post and offset dimensions. Make any corrections resulting from the Engineer's review and resubmit final as-built plans ~~as a condition precedent to acceptance of the installation. in~~ accordance with 9-8.1.

Enter as-built information directly in the assigned ITSFM project folder. Submit as-built information that is not directly entered into the ITSFM project folder in ~~Submit the ITSFM electronic files in any of~~ the following software formats:

1. As-built Plans – Design Files (DGN) and Portable Document Format (PDF)

2. Feature Import Templates – Spreadsheet format (XLSX)
3. Feature Attribute Forms – Portable Document Format (PDF)
4. Differentially Corrected GPS files – (COR)
5. GPS Export Files – Comma-Separated Values (CSV)
6. Photos – Joint Photographic Experts Group (JPG)

611-2.3.2 Components: As a minimum, identify all traffic control devices, poles, support structures, cabinets, pull and splice boxes, hubs, conduit duct banks, access points, and power services, and utility demarcation points.

611-2.3.2.1 Conduit and Cable: Identify all conduit and cable with unique line styles for routing (communication, electrical, and joint-use trenched) that are clearly identified in a legend on each plan sheet. Identify the type of cable (example - 7 conductor signal cable) and label the number of conductors, fiber strands or other identifying features of the cable. For conduit duct banks, clearly note conduit and innerduct size, length, material, and number of runs.

611-2.3.2.2 Loops and Detection Zones: Identify the location of all installed loops (including the distance from the stop bar for the advance loops), the path of each loop to the pull box, the loop window and the path of the loop lead-in to the controller cabinet. Identify the device location and the approximate detection area for detection systems that are not embedded in or under pavement.

611-2.3.2.3 Pull Boxes: Label unused and out of service pull boxes clearly. Show distances to each pull box from the nearest edgeline, stop bar, or other permanent feature. If an edgeline is not near a pull box or would not clearly identify its location; a fixed monument may be used (example - FDOT pole or structure).

611-2.3.2.4 Poles: Identify poles from the nearest edgeline of both approaches. If an edgeline is not near a pole or would not clearly identify its location, a fixed monument may be used.

611-2.3.2.5 Signal Heads: As-built plans must show the final location of signal heads. Each signal head shall be identified by its corresponding movement number.

611-2.3.2.6 Cabinet: The type of cabinet and inventory of internal components must be documented. Controller manufacturer along with the controller model number shall be submitted for all traffic signal cabinets. A cabinet corner “blow up” shall be submitted detailing pull box locations with all conduit and cable.

ARTICLE 611-5 is deleted and the following substituted:

611-5 ITS-System Acceptance Test.

After the stand-alone tests have been completed and approved by the Engineer, perform the System Acceptance Test in the presence of the Engineer and, when applicable, a representative of the agency designated to accept maintenance responsibility.

Conduct an approved 30-day System Acceptance Test during which all ITS-Systems, Sub-Systems and, at a minimum, all control, monitoring, and communication functions of the field equipment are evaluated from a Transportation Management Center (TMC). Complete the System Acceptance Test documentation and turn them over to the Engineer for approval.

During the 30-day test period, limit device outages to 10% or less, a minimum of a single unit if less than 10 devices or the allowable threshold required in the Contract Documents, whichever is less. Should an outage of more than 10% of the total number of devices occur, a

single unit or more if less than 10 devices or the allowable threshold in the Contract Documents, then the System Acceptance Test has failed.

Upon the failure of the System Acceptance Test, the 30-day testing window shall pause until all devices are fully functional. In addition to pausing and extending the test period by the number of days lost by failure and repair time, the Engineer has the option of restarting the full 30-day test.

Upon the successful completion of the System Acceptance Test, the Engineer will submit to the Contractor a letter of approval stating the first and last day of the 30-day system test period.

ACCEPTANCE PROCEDURES FOR TRAFFIC CONTROL SIGNALS AND DEVICES (REV 7-14-26)

SUBARTICLE 611-2.3 is deleted and the following substituted:

611-2.3 As-Built Documentation: Submit as-built drawings for all installations, signed and sealed by a Professional Engineer or Professional Surveyor and Mapper registered in the State of Florida, along with supplemental as-built information used for the Department's ITS Facility Management (ITSFM) System. Additional information on the ITSFM cloud-based GPS mapping system, Attribute Forms, and Feature Import Templates can be found on the Department's web site: <https://www.fdot.gov/traffic/itsfm>.

611-2.3.1 Submittal Requirements: Submit as-built plans for review by the Engineer. As-built plans must be PDF files, in the same scale and content as the Plans and formatted on 11-inch by 17-inch sheets. Signing and pavement marking plan sheets may be used instead of signalization plan sheets, if a substantial number of changes from the original Plans must be recorded. If, in the opinion of the Engineer, the changes cannot be clearly delineated on the existing drawings, clearly delineate all changes on 11-inch by 17-inch detail sheets, enlarged 200% from the reproductions.

Submit fiber optic splicing diagrams detailing all cable splices, terminations, equipment port assignments, and optical circuit path names within the communication network. Include cable manufacturer, type, strand count, and cable sequential reading at each pull box entrance/exit, each side of the splice enclosure, and at patch panel terminations.

As-built submittals must include an inventory of all traffic control signals and devices, and support structures. The inventory must include horizontal position geographic coordinate data collected using Differential Global Positioning System (DGPS) equipment. The inventory must include, at a minimum, the manufacturer, model, and serial number for each device or completed assembly. Submit coordinate data for pull boxes as well as conduit and cable at 100-foot intervals including changes in direction. All new and existing support structures, equipment cabinets and other fixed location features must be assigned a unique site ID name to create a common association between the as-built plans, inventory forms, and the ITSFM system. Include data for all components listed in 611-2.3.2 in accordance with the Statewide ITSFM Functional Requirements, except those listed in 611-2.3.2.2 and 611-2.3.2.5.

Aerial photographs may be submitted with as-built plan submittals to provide supplementary information. The aerials should not include extra features such as the right of way, baseline, or roadway edges. The aerials may be used as a base for the as-built plans with mile post and offset dimensions. Make any corrections resulting from the Engineer's review and resubmit final as-built plans in accordance with 9-8.1.

Enter as-built information directly in the assigned ITSFM project folder. Submit as-built information that is not directly entered into the ITSFM project folder in the following software formats:

1. As-built Plans – Design Files (DGN) and Portable Document Format (PDF)
2. Feature Import Templates – Spreadsheet format (XLSX)
3. Feature Attribute Forms – Portable Document Format (PDF)
4. Differentially Corrected GPS files – (COR)
5. GPS Export Files – Comma-Separated Values (CSV)

6. Photos – Joint Photographic Experts Group (JPG)

611-2.3.2 Components: As a minimum, identify all traffic control devices, poles, support structures, cabinets, pull and splice boxes, hubs, conduit duct banks, access points, and power services, and utility demarcation points.

611-2.3.2.1 Conduit and Cable: Identify all conduit and cable with unique line styles for routing (communication, electrical, and joint-use trenched) that are clearly identified in a legend on each plan sheet. Identify the type of cable (example - 7 conductor signal cable) and label the number of conductors, fiber strands or other identifying features of the cable. For conduit duct banks, clearly note conduit and innerduct size, length, material, and number of runs.

611-2.3.2.2 Loops and Detection Zones: Identify the location of all installed loops (including the distance from the stop bar for the advance loops), the path of each loop to the pull box, the loop window and the path of the loop lead-in to the controller cabinet. Identify the device location and the approximate detection area for detection systems that are not embedded in or under pavement.

611-2.3.2.3 Pull Boxes: Label unused and out of service pull boxes clearly. Show distances to each pull box from the nearest edgeline, stop bar, or other permanent feature. If an edgeline is not near a pull box or would not clearly identify its location; a fixed monument may be used (example - FDOT pole or structure).

611-2.3.2.4 Poles: Identify poles from the nearest edgeline of both approaches. If an edgeline is not near a pole or would not clearly identify its location, a fixed monument may be used.

611-2.3.2.5 Signal Heads: As-built plans must show the final location of signal heads. Each signal head shall be identified by its corresponding movement number.

611-2.3.2.6 Cabinet: The type of cabinet and inventory of internal components must be documented. Controller manufacturer along with the controller model number shall be submitted for all traffic signal cabinets. A cabinet corner “blow up” shall be submitted detailing pull box locations with all conduit and cable.

ARTICLE 611-5 is deleted and the following substituted:

611-5 System Acceptance Test.

After the stand-alone tests have been completed and approved by the Engineer, perform the System Acceptance Test in the presence of the Engineer and, when applicable, a representative of the agency designated to accept maintenance responsibility.

Conduct an approved 30-day System Acceptance Test during which all Systems, Sub-Systems and, at a minimum, all control, monitoring, and communication functions of the field equipment are evaluated from a Transportation Management Center (TMC). Complete the System Acceptance Test documentation and turn them over to the Engineer for approval.

During the 30-day test period, limit device outages to 10% or less, a minimum of a single unit if less than 10 devices or the allowable threshold required in the Contract Documents, whichever is less. Should an outage of more than 10% of the total number of devices occur, a single unit or more if less than 10 devices or the allowable threshold in the Contract Documents, then the System Acceptance Test has failed.

Upon the failure of the System Acceptance Test, the 30-day testing window shall pause until all devices are fully functional. In addition to pausing and extending the test period by the

number of days lost by failure and repair time, the Engineer has the option of restarting the full 30-day test.

Upon the successful completion of the System Acceptance Test, the Engineer will submit to the Contractor a letter of approval stating the first and last day of the 30-day system test period.