## TRAFFIC SHOP DRAWING REVIEW PROCESS

The following requirements supplement the shop plan submittal procedures and review timeline in Section 725 of the SCDOT Standard Specifications for design-build projects.

Obtain Railroad approval, for any items requiring Railroad review, prior to submittal to SCDOT.

Following SCDOT shop plan approval, have the fabricator of the material component notify SCDOT Office of Materials and Research (OMR) a minimum of 14 calendar days prior to the start of fabrication. Do not begin fabrication or construction of any items prior to receiving SCDOT approval.

## 1. **DEFINITIONS**

**Traffic Shop Plans** are shop plans and associated engineering calculations provided for structures and foundations permanently supporting traffic control devices, such as overhead sign structures, extruded panel signs, I-beam posts, high mast light poles, signal poles/mast arms, and ITS structures/components. Traffic shop plans are approved by the SCDOT Traffic Engineering Office or designated consultant representative.

# 2. PACKAGES

In order to expedite the review process, multiple shop plan submittals may be grouped together into the following options defining a "package". Items shall be grouped into packages by item type or applicable structure. Shop Plans submitted individually (not in a package defined in the transmittal) will be considered its own package and subjected to the timeline and flowchart presented herein.

Acceptable Package options:

- One (1) item from Category A
- One (1) item from Category B

For items not specifically listed, the Contractor shall request a category assignment from SCDOT or its designated consultant representative a minimum of 5 business days prior to submittal.

CATEGORY A items	CATEGORY B items
<ul> <li>Overhead Sign and VMS Structures<sup>1</sup></li> <li>Extruded Panel Signs</li> <li>I-beam Posts</li> </ul>	<ul> <li>Signal Poles/Mast Arms</li> <li>Highway Lighting</li> <li>ITS and WZITS Structures</li> </ul>

<sup>&</sup>lt;sup>1</sup>Each submittal is limited to a maximum of <del>510</del> overhead sign structures.

Examples: Package 001 contains five (5)ten (10) sets of Overhead Sign Structure shop plans. Package 002 contains one (1) set of Signal shop plans (one set per intersection). Package 003 contains shop plans for Highway Lighting.

#### 3. TIMELINE & REVIEW TYPE:

The Design-Build engineer of record (Design-Build EOR) provides the primary shop plan review, prior to submittal to SCDOT.

Following the EOR review, the Contractor or Lead Designer must transmit the EOR-approved shop plan package via ProjectWise Deliverables Management (PWDM). The initial review period for each shop plan package shall be 15 business days following the date SCDOT receives a compliant submittal package. The Owner Verification (OV) team will notify the appropriate SCDOT offices and consultant reviewers via PWDM notification email of the shop plan package upload. Consultant reviewers will complete reviews in sufficient time to allow for SCDOT, or designeea designated consultant representative, to stamp and return the shop plan package within the 15-day review period.

For Category A shop plan submittals, only one package can be submitted at a time with a review time of 15 business days. A new Category A submittal cannot be submitted until 15 business days after submittal of the previous package.

For Category B shop plan submittals, if the Contractor elects to submit an additional shop plan package prior to completion of a previously-submitted-package initial-review-period, an additional 5 business days will be added to its 15-day review allowance. Each subsequent overlapping package will continue to receive an additional 5 business days of review time.

Example Review Timeline for Example Category B Packages noted in Section 2: 2 new packages are submitted to SCDOT within the initial 15 days allotted for Package 001, therefore Package 002 is granted 20 days, and Package 003 is granted 25 days.

If, following a compliant package submittal and the initial 15-day review period, SCDOT or a designated consultant representative returns a shop plan package to the Contractor for revisions and resubmittal, the review period for revised packages will be 5 business days following the day of successful transmittal of the revised package. Revised packages are not subject to the extra 5-days of time for overlapping Category B submittals that is applied to the initial review period.

See the flowchart below for illustration of the shop plan review process.

### 4. FORMAT:

Shop plans must be electronically submitted for review in PDF format via PWDM. Fabricators may either physically or digitally sign and seal shop plans (except for Category B items identified above that do not require a South Carolina Professional Engineering seal and signature).

Digitally-signed shop plans must comply with SCDOT Preconstruction Design Memorandum PCDM-04 titled "Digital Signatures for Licensed Professionals". If Digitally-signed shop

plans are prepared, the copy that is submitted for the review process shall be a flattened, combined PDF that contains all sheets, includes a signature and date with the P.E. seal, and is able to be digitally stamped by multiple reviewers. Following package approval, any subsequent shop plan revisions, and accompanying as-built plans, the Contractor shall submit the official, digitally-signed set of shop plans as individual sheets.

If physically-signed shop plans are prepared, the plans shall be scanned at a size and resolution that renders all text and detailing legible.

Shop plan sheet sizes shall be either 22"x36", 22"x34", or 11"x17" and shall be oriented "landscape" in the package PDF. Leave room on each sheet for two shop plan review stamps.

For calculations that accompany shop drawings, the cover-sheet-only shall be signed and sealed by a South Carolina Professional Engineer.

During the review process, each plan sheet that is signed and sealed by a South Carolina Professional Engineer shall receive a stamp by the Design-Build EOR to indicate whether the sheet is "approved" with or without comments marked in red. As an exception, if the entire shop plan set contains no comments in red, the EOR may stamp only the title/first sheet and indicate underneath the stamp that it "Applies to all sheets".

The transmittal from the Contractor via PWDM shall list all shop plan package content.

Upon review completion, SCDOT or its designee will stamp each sheet that is stamped by the Design-Build EOR. The stamp will indicate whether the shop plans are "Accepted", "Accepted as Noted", or "Not Accepted". Shop Plans stamped "Not Accepted" and "Accepted as Noted" require a resubmittal for confirmation review.accepted "For Fabrication" or "For Fabrication Comments in Red" The SCDOT transmittal letter will include the date of approval, the date when the initial package was received by SCDOT for review, and dates when any subsequent revised packages for the same item were received by SCDOT for review and be transmitted to the Contractor via PWDM.

