

SECTION 00590 - POLYMER MEMBRANE

(Follow all instructions and make all edits with "Track Changes" turned on. If there are no instructions [purple text] above a subsection, paragraph, sentence, or bullet, then include it in the project. Delete all purple text before preparing the final document. All other modifications to this Section will require ODOT Technical Resource and State Specifications Engineer approval.)

(Use this specification only for cast-in-place decks. Obtain information from the Bridge Designer.)

Comply with Section 00590 of the Standard Specifications modified as follows:-

00590.05(a) Supervisory Personnel - Replace the paragraph that begins "Hold a pre-placement conference ..." with the following paragraph:

Hold a pre-placement conference with the Engineer and all supervisory personnel, Subcontractors, Suppliers, and all other personnel involved in the membrane work. Meet at a mutually agreed time at least 14 Calendar Days before beginning the membrane work. Present and discuss all phases of the membrane work, including ACP placement.

00590.10(b) Polymer Membrane - Replace this subsection, except for the subsection number and title, with the following:

Furnish epoxy polymer from section 00556.10(a) of the QPL. Furnish epoxy polymer and primer from the same manufacturer.

00590.20(a) Tools - Replace this subsection, except for the subsection number and title, with the following:

Provide squeegees, heavy nap rollers, and other approved tools to apply the primer and the membrane polymer resin.

Provide a mechanical broadcaster to uniformly apply the membrane Aggregate.

Provide pickup type power brooms capable of removing loose Aggregate.

00590.20(b) Coring Equipment - Replace this subsection, except for the subsection number and title, with the following:

Provide core cutting Equipment that can produce a core 2 inches in diameter.

00590.20(c) Bond Testing Equipment - Replace the paragraph that begins "Furnish bond testing ..." with the following paragraph:

Provide bond testing Equipment that:

00590.20(d) Resin Conditioning Equipment - Replace this subsection, except for the subsection number and title, with the following:

Provide Equipment capable of conditioning resin to between 65 °F and 85 °F.

00590.20(e) Aggregate Heating Equipment - Replace this subsection, except for the subsection number and title, with the following:

Provide heating Equipment capable of pre-heating Aggregate to a minimum of 70 °F as measured at the time of placement.

00590.20(f) Membrane Heating Equipment - Replace the paragraph that begins "If required, furnish ..." with the following paragraph:

If required, provide heating Equipment that:

00590.30 Personnel Qualifications - Replace this subsection, except for the subsection number and title, with the following:

Provide supervisory personnel who are approved by the polymer material manufacturer, in writing, as qualified and who oversees the placement of the polymer membrane.

00590.40(e) Daily Report Requirements - Replace the paragraph that begins "Submit a daily written ..." with the following paragraph:

Submit a daily written report to the Engineer by the end of each Day that Work is being performed under this Section. Include the following in the daily written report:

00590.44 Delamination Survey and Repair - Replace the paragraph that begins "Perform bond testing on ..." with the following paragraph:

Perform bond testing on repair areas to ensure a membrane bond strength of at least 150 psi before paving and 250 psi if traffic is allowed on the membrane. Test at locations as identified by the Engineer.

00590.90 Payment - Replace the paragraph that begins "Payment will be payment ..." with the following paragraph:

Payment will be payment in full for furnishing and placing all Materials, and for providing all Equipment, labor, and Incidentals required to complete the Work as specified.