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	<b>MISSOURI HIGHWAYS AND TRANSPORTATION COMMISSION</b> 105 W. CAPITOL AVE. JEFFERSON CITY, MO 65101 Phone (888) 275-6636
	If a seal is present on this sheet, JSP's has been electronically sealed and dated.
	JOB NO. J3P3206 Pettis County, MO Date Prepared: 10/30/2025
Only the following items of the Job Special Provisions (Bridge) are authenticated by this seal: All	

JOB SPECIAL PROVISIONS (BRIDGE)

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A. CONSTRUCTION REQUIREMENTS

**1.0 Description.** This provision contains general construction requirements for this project.

**2.0 Construction Requirements.** The plans and the asbestos and lead inspection report(s) for the existing structure(s) are included in the contract in the bridge electronic deliverables zip file for informational purposes only.

**2.1** In order to assure the least traffic interference, the work shall be scheduled so that the bridge closure is for the absolute minimum amount of time required to complete the work. The bridge shall not be closed until material is available for continuous construction and the contractor is prepared to diligently pursue the work until the closed bridge is opened to traffic.

**2.2** Bridge work by contractor forces, including erection, rehabilitation or demolition, shall not be allowed over traffic unless a bridge platform protection system is installed below the work area except for work performed above a deck that is intact. The protection system shall be capable of catching all falling objects such as tools, overhang brackets or materials. Lifting of objects that are heavier than the capacity of the bridge protection system shall not be permitted.

**2.3** The existing slab for the bridge(s) to be redecked was constructed as composite or non-composite as indicated in the table below.

Bridge No.	Type of deck
A08081	Composite

**2.4** Provisions shall be made to prevent any debris and material from falling into the waterway. If determined necessary by the engineer, any debris and material that falls below the bridge outside the previously specified limits shall be removed as approved by the engineer at the contractor's expense.

**2.5** Any damage sustained to the remaining structure as a result of the contractor's operations shall be repaired or the material replaced as approved by the engineer at the contractor's expense.

**2.6** Provisions shall be made to prevent damage to any existing utilities. Any damage sustained to the utilities as a result of the contractor's operations shall be the responsibility of the contractor. All costs of repair and disruption of service shall be as determined by the utility owners and as approved by the engineer.

**2.7** A washer shall be required under head and nut when any reaming is performed for bolt installation.

**2.8** SSPC-SP2 and SSPC-SP3 surface preparation shall be in accordance with the environmental regulations in [Sec 1081](#), and collection of residue shall be in accordance with [Sec 1081](#) for collection of blast residue. SSPC-SP6, SSPC-SP10 and SSPC-SP11 surface preparation shall be in accordance with the approved blast media and environmental regulations in [Sec 1081](#), and collection of blast residue shall be in accordance with [Sec 1081](#).

### **3.0 Coating Information.**

**3.1 Environmental Contact.** Environmental Section may be contacted at the below address or phone number. The Missouri Department of Health may be contacted at (573) 751-6102.

MoDOT - Design Division - Environmental Section  
P.O. Box 270  
105 W. Capitol Ave., Jefferson City, MO 65102  
Telephone: (573) 526-4778

**3.2 Approved Smelter and Hazardous Waste Treatment, Storage and Disposal Facility.** The following is the approved smelter and hazardous waste treatment, storage and disposal facility:

Doe Run Company - Resource Recycling Division - Buick Facility  
Highway KK  
Boss, MO 65440  
Telephone: (573) 626-4813

**4.0 Method of Measurement.** No measurement will be made.

**5.0 Basis of Payment.** Payment for the above described work will be considered completely covered by the contract unit price for other items included in the contract.

## **B. DEFLECTION AND HAUNCHING**

**1.0 Description.** The contractor shall determine haunching based on field measurements, existing bridge plans and/or adjusted dead load deflections based on the difference between the new and existing dead load weights. A spreadsheet showing adjusted girder or beam deflections due to the weight of the new deck and barriers is included in the contract in the bridge electronic deliverables zip file.

**2.0 Construction Requirements.** In order to properly form the haunches for the new deck, the contractor shall survey top of deck elevations above each girder or beam including centerline of roadway and along each girder or beam line (top or bottom flange) prior to deck removal followed by surveying elevations of the girders or beams (top or bottom flange) after deck removal.

**3.0 Method of Measurement.** No measurement will be made.

**4.0 Basis of Payment.** Payment for the above described work will be considered completely covered by the contract unit price for other items included in the contract.

## **C. SELF-CONSOLIDATING CONCRETE**

**1.0 Description.** Self-Consolidating Concrete (SCC) is a specially designed concrete that enables the concrete to flow under the influence of its own weight and does not require mechanical vibration for consolidation. All material, proportioning, mixing and transporting of concrete shall be in accordance with Sec 501, except as specified herein.

**2.0 Materials.**

**2.1 Aggregate.** Fine and coarse aggregate shall be in accordance with Sec 1005, except that the requirements for gradation will not apply.

**2.1.1 Gradation.** The contractor shall submit the target gradation and allowable gradation range of each fraction of each aggregate source used in the mix design. During production, the contractor shall be within the allowable gradation range for each aggregate that was submitted.

**2.1.2 Maximum Size.** For SCC mixes, 100 percent of each fraction shall pass the  $\frac{3}{4}$ -inch sieve.

**2.2 Admixture.** All chemical admixtures shall be in accordance with section 1054, except as noted herein.

**2.2.1 High Range Water Reducer.** The polycarboxylate based high range water reducer shall be in accordance with AASHTO M 194, Type F or G. The high range water reducing admixture shall be added only after the concrete has reached the job site to reduce the potential for flash setting.

**2.2.2 Viscosity Modifier.** The viscosity-modifying admixture shall be evaluated according to the test methods and mix design proportions referenced in AASHTO M 194.

**2.2.3 Combination.** The self-consolidating admixture system shall consist of either a polycarboxylate based high range water-reducing admixture or a polycarboxylate based high range water reducer combined with a separate viscosity-modifying admixture.

**3.0 Concrete Mix Design.** At least 14 days prior to using SCC, the contractor shall submit a mix design for approval to Construction and Materials. The SCC mix shall be designed by absolute volume methods or an optimized mix design method such as Shilstone or other recognized optimization method.

**3.1 Required Information.** The mix design shall contain the following information:

- (a) Source, type and specific gravity of Portland cement
- (b) Source, type (class, grade, etc.) and specific gravity of supplementary materials, if used
- (c) Source, name, type and amount of admixture
- (d) Source, type (formation, etc.), ledge number if applicable, and gradation of the aggregate
- (e) Specific gravity and absorption of each fraction in accordance with AASHTO T 85 for coarse aggregate and AASHTO T 84 for fine aggregate, including raw data
- (f) Unit weight of each fraction in accordance with AASHTO T 19
- (h) The design air content and target slump flow
- (i) Batch weights of Portland cement and supplemental cementitious materials
- (j) Batch weights of coarse, intermediate and fine aggregates

(k) Batch weight of water

**3.2 Water Amount.** The water per cementitious materials ratio shall meet the following requirements:

Water/Cementitious Materials Ratio	
Minimum	Maximum
0.32	0.45

**3.3 Percent Fine Aggregate.** The percent fine aggregate by absolute volume should range from 35 to 50 percent.

**3.4 Minimum Cementitious Amount.** The total amount of cementitious materials shall not be below 650 pounds per cubic yard.

**3.5 Slump Flow.** The slump flow test shall be performed in accordance with ASTM C 1611. The slump flow shall meet the following requirements:

Slump Flow (inches)	
Minimum	Maximum
22	30

**3.6 Passing Ability.** Passing ability of SCC shall be determined in accordance with ASTM C 1621 and shall not exceed 2 inches.

**3.7 Visual Stability.** The visual stability index rating shall be a maximum of 1.

**3.8 Air Content.** The minimum air content, when placed in the work, shall be 5.0 percent. Test shall be performed in accordance with AASHTO T 152.

**3.9 Compressive Strength.** Concrete shall have a 28-day minimum compressive strength of 4000 psi (28 MPa). Test shall be performed in accordance with AASHTO T 22.

**4.0 Additional Information.** The contractor shall submit a Batching Sequence Plan outlining how the SCC mix will be batched and mixed. The Batching Sequence Plan shall be submitted to the Engineer for approval.

**4.1 Trial Batch** A trial batch shall be done prior to SCC being used to ensure the mix is in accordance with this special provision. The SCC mix design shall not be used until all of the specified criteria have been met. The trial batch shall be at least 2 cubic yards. The Engineer shall be present during the trial batch. The SCC mix shall be tested for air content, slump flow, visual stability index, passing ability and compressive strength.

**5.0 Production.** SCC mix shall not be used until the concrete mix, the Batching Sequence Plan and the trial batch have been approved. The SCC mix shall not vary from the mix design submitted for approval. Any changes in material sources, aggregate gradations, or material content shall require a new SCC mix be resubmitted for approval. Changes to the water content and chemical admixture dosages will be allowed to handle changes in environmental conditions.

**5.1 Forms.** SCC mixes generate higher fluid pressures than conventional concrete mixes. Forms shall be mortar-tight and capable of supporting the additional pressure.

**5.2 Reinforcement.** Reinforcement and other critical components shall be tightly secured in the form to prevent these items from shifting during concrete placement.

**6.0 Quality Control.** The quality of freshly mixed SCC may fluctuate, the contractor shall conduct air test, slump flow, visual stability index, and passing ability for every truck until consistent and compliant results are obtained. Subsequently, all testing shall be conducted in accordance with MoDOT specifications.

**6.1 Slump Flow Requirement.** The slump flow shall be within +/- 2 inches of the target slump flow designated by the contractor and shall not exceed 30 inches.

#### D. TEMPORARY FALSEWORK

**1.0 Description.** This work consists of but is not limited to supporting the existing plate girders as required to lift bearings for placement of roofing felt as shown on bridge plans and performing all other required preparations prior to pouring Self-Consolidating Concrete, as approved by the engineer.

#### **2.0 Construction Requirements.**

**2.1 Falsework.** The responsibility for the design and construction of falsework required to support the plate girders shall rest solely with the contractor. The design shall insure that the falsework be capable of supporting all applicable dead loads and any construction loads. The design shall also provide an adequate factor of safety when selecting the temporary support members. The falsework design including detailed computations shall be signed, sealed and stamped by a registered professional engineer in the State of Missouri in accordance with Authentication of Certain Documents in [Sec 107](#) and shall be submitted to the engineer to be reviewed prior to commencement of work.

**2.2 Supporting the Superstructure.** The contractor shall exercise caution when supporting the existing plate girders. Before commencing operations, the contractor shall submit to the engineer for review the method and sequence of operation proposed to be used in performing this work. The supporting operation shall be done only when authorized, but such authorization shall not relieve the contractor of responsibility for the safety of the operation or for damage to the structure. After the plate girders are supported and authorization given by the engineer to proceed, the contractor shall be allowed to proceed with necessary work as shown on the bridge plans or as approved by the engineer. Any damage caused by the contractor's operations shall be repaired at the contractor's expense as approved by the engineer.

**2.3 Site Repair** All existing fill slopes damaged by the temporary falsework supports shall be repaired to the satisfaction of the engineer.

**3.0 Method of Measurement.** No measurement will be made.

**4.0 Basis of Payment.** Payment for the above described work, including all material, equipment, labor and any other incidental work necessary to complete this item, will be considered completely covered by the contract lump sum price for Temporary Falsework.