



Paul R. LePage  
GOVERNOR

STATE OF MAINE  
DEPARTMENT OF TRANSPORTATION  
16 STATE HOUSE STATION  
AUGUSTA, MAINE 04333-0016

July 22, 2011

Subject: **Fairfield & Benton**

Federal Project No's: IM-A670(000)E,  
IM-1668(600)E, BR-1781(400)X  
& IM-1850(100)E

State PINs: 016700.00, 016686.00,  
017814.00 & 018051.00

**Amendment No. 4**

David Bernhardt  
COMMISSIONER

Dear Sir/Ms:

Make the following changes to the Bid Document:

In the Bid Book (pages 116 thru 122), **REMOVE** "SPECIAL PROVISION, SECTION 506, Lead Abatement and Field Coating Application" 6 pages dated June 23, 2011 and **REPLACE** with the attached new "SPECIAL PROVISION, SECTION 506, Lead Abatement and Field Coating Application" 6 pages Revised July 21, 2011.

In the Plans, Sheet Number 111 of 132, **CHANGE** note 10 as follows; in the third line of the note after the words "structural concrete slab" **ADD** the following in pen and ink "**and curb**".

In the Plans, Sheet Number 111 of 132, **ADD** the following note in pen and ink;  
**16. All Reinforcing Steel Fabricated, Delivered, and Placed in the full depth cast-in-place deck and curb will be considered incidental to the appropriate Section 502 Pay Item.**

**NOTE:** **DISREGARD** the response to the final question in Amendment No. 3 and replace with the following response:

**Question:** Why is it necessary to remove the temporary braces? Why not paint them and leave them in place instead of spending the money to remove them?

**New Response:** If the Contractor wishes to leave temporary bracing in place, all surfaces of the temporary bracing will need to be prime coated per 506, and existing surfaces in contact with temporary braces will have to be cleaned to SSPC SP 3 and prime coated per 506. All bracing material will have to meet 504. All applicable containment, removal, and disposal requirements for the material removed in the surface preparation of the existing surfaces shall be at no cost to the Department.

**NOTE:** The next amendment will contain a new Schedule Of Items.



PRINTED ON RECYCLED PAPER

The following questions have been received:

**Question:** Note #3 on sheet 111 states adjusts reinforcing steel around bridge drains. We cannot find any bridge drains on the MCRR bridges. Please confirm if or where the drains are located on the MCRR bridges.

**Response:** There are no proposed bridge drains on the MCRR bridges. This note will not apply to the MCRR bridges.

**Question:** In accordance with note #10 on sheet 111, the State will not pay for reinforcing steel under item 503.12 & 503.13 if the Contractor uses precast deck panels. This note penalizes the use of precast deck panels over cast in place deck. The use of precast deck panels will save the State money by reducing the quantity of reinforcing steel in bid items 503.12 & 503.13.

**Response:** The intent is for the Reinforcing Steel Pay Items to be considered incidental to the related Concrete Pay Items. Note 10 has been revised, a new Note 16 has been added, and the quantities for the Reinforcing Steel Pay Items have been revised accordingly. The next amendment will contain a new Schedule Of Items.

**Question:** In accordance with Special Provision, Section 524, Temporary Structural Supports (Be4am and Girder Support). Method of Measurement Payment will be as one unit for each bearing to be replaced. The bid quantity for item 524.32 does not match the number of bearings where cover plates will be installed. Please clarify?

**Response:** The Method of Measurement of Special Provision 524 Temporary Structural Supports (Beam and Girder Support) was intended to mean each pier of each Clauson Bridge, as stated under the Description. Temporary support of the girders will be necessary to perform the other work described, regardless of whether cover plates are installed at a particular bearing, and the Contractor's temporary support should consider all work to be performed at each pier location.

**Question:** In addition to the existing shear connectors, the existing bridge plans for the NB & SB Clauson Bridges show single and double rows of 6" diameter spirals welded to the top of the girders. Will the Contractor be required to remove the spirals?

**Response:** Yes, all existing shear connectors (studs and spirals) are to be removed in accordance with General Note 45 on Sheet 3 of 132.

**Question:** Most of the top flange is (1/2" x 9"). Does the State anticipate having to repair or replace some of the top flange due to excessive corrosion? A lot of existing shear connectors and spirals welded to the top flange will have to be ground smooth for the

new shear connectors. Can the State give the Contractor some minimum acceptable tolerances for these areas?

**Response:** In response to the first question: yes, see Note 2 on Sheet 69 of 132. In response to the second question: yes, see Section 505 of the MaineDOT Standard Specifications.

**Question:** SP 652, Maintenance of Traffic. Where will the Temporary Raised Pavement Marking (RPM) be installed? What is the quantity? How will they be paid?

**Response:** Temporary Raised Pavement Marking is intended to be placed along both the left and right of the crossovers for the time period between paving and striping, as well as locations directed by the Resident. Special Provision Section 652 identifies the installation as 10 feet on center and/or as directed by the Resident. Payment for Raised Pavement Marking is incidental to the related contract items under the lump sum for the crossover, Item 510.301.

**Question:** SP 609 Special Curb (Plastic). Is this item for temporary traffic control? Where will this item be installed? If the item is for temporary traffic control; are they maintained and replaced under Item 652.361 maintenance of traffic control devices?

**Response:** This item is intended to be placed along the SB mainline EP at the end of construction to prevent drivers from leaving the mainline and accidentally entering the crossover. The only placement is near station 1276+00 of I-95 SB as I-95 NB is protected by guardrail to be reinstalled. Since this is not a temporary traffic control device, it would not be maintained and replaced under item 652.361.

**Question:** Amendment #3, SP 107, Prosecution and Progress (Contract Time) Note 2. The Contractor is required to work 7 days per week until the project is completed in December 2013. SP Section 105 will not allow work on Sundays?

**Response:** Supplemental Liquidated Damages will not apply to Sundays not worked.

**Question:** Why is there two bid items 652.35 and 652.361 for Maintenance of Traffic Control Devices?

**Response:** Item 652.35 is for construction signs. Item 652.361 is for maintenance of traffic control devices.

**Question:** Pay item 506.30 is to shop coat 45,512 lbs. of new structural steel. Does this pay item also include the surface preparation of the steel to be shop painted? Are three

(3) coats required to be shop applied or is the new steel to be primed only at the shop? Do all the new miscellaneous pieces of repair steel such as the short plates, etc to repair the braces need to be shop coated or can they be field prepped and coated? Perhaps you should clarify the entire pay item 506.30. Either that or eliminate it entirely and leave all the surface prep and coating to be done in the field.

**Response:** All new structural steel is to be shop coated Primer only per Special Provision Section 506, including surface preparation.

**Question:** Is the Hot Mix Asphalt Pavement shown in the Two Way Traffic Typical Section sheet 33, paid under item 510.301 Expressway Median Crossover or under the 403 Hot Mix Asphalt items?

**Response:** The pavement shown on the two way typical section to reduce the shoulder cross slope and return to the existing condition is considered to be part of the LS crossover item and is included in Item 510.301.

**Question:** Item 607.184 – Snow Fence, do you want 1” mesh size Item Screening Fence, are you looking for a fabric or something else?

**Response:** As noted in Section 710.03 of the MaineDOT Standard Specifications, chain link fence fabric shall conform to the requirements of AASHTO 181, Type I, Class D (zinc-coated steel) or Type II (aluminum-coated steel). The nominal opening size should be 1 inch.

**Question:** Reference Plans – Sheets 7 through 10 – Plan 2 thru 5 indicates various milling and overlay. How will this be paid for, milling & the pavement? Is this part of the final construction? And if so, how does it fit in with addendum 3 mill & fill add on?

**Response:** In response to the first two questions, milling and pavement for approaches will be paid under item 403.211. Shoulder pavement milling and shimming in the two-way traffic typical section is included in the crossover lump sum and will be paid under Item 510.310. The approach paving and shoulder final paving is part of the final construction. In response to the third question, the bridge portion should have removal of pavement surface and pavement items to cover those quantities. The intent is the two projects will be coordinated so that milling and paving is completed in conjunction with the bridge construction. It is up to the Prime contractor to schedule the sequencing.

**Question:** Item 510.301 Crossovers – Is hot mix asphalt that is incidental to this item subject to the asphalt escalator?

**Response:** No, it is not.

**Question:** Addendum 3 adds 1.269 mile mill & fill. On the typical sections it shows milling the 6' passing lane shoulder, passing & travel lanes, & the rumble strip on the break down shoulder. Is this interpretation correct?

**Response:** Yes

**Question:** When milling, will the shoulder breaks be required to be milled first or can milling be done straight across the two lanes for the required width?

**Response:** The Department does expect the shoulder break on the passing lane to be milled and paved to the proper cross slope. The travel way with the rumble strip can be milled straight grade.

**Question:** Can existing bituminous pavement (including membrane) be removed for the Rt 201 and 2<sup>nd</sup> bridge with a milling machine?

**Response:** Yes

**Question:** Special Provision, Section 401, Plant Mix Pavements – General (Material Transfer Vehicle) was added in amendment #3, in Special Provision 403 that was added in Amendment #3, there are no notes associated with the MTV. Please specify when the MTV is to be used.

**Response:** MTV will be required on main line travel and passing lanes as well as the RTE 201 on and off ramp surface courses.

**Question:** Item 652.38 Flagger has a quantity of 3200 HR. When are these hours to be used?

**Response:** Flaggers are intended to be used for the milling and paving operations for 18051.00

**Question:** What is the intent for the new item 652.31 Portable Changeable Message Sign, quantity 2 EA?

**Response:** The message boards are intended for the milling and paving operations for 18051.00

**Question:** SP504 Section H requires all paint removal, containment and disposal to be performed by SSPC QP1 & QP2 certified contractors. This requirement seems excessive

for the limited amount of work to be performed and will be very costly to have a subcontractor with these credentials come to the site multiple times for minimal work. On current MDOT contracts with similar scope of work these credentials are not required. Can these requirements be waived?

**Response:** No, the requirements cannot be waived.

**Question:** Connection plate repair at type A crossframes, shown on sheets 72 & 73, is indicated as required on existing exterior girders D. The location of existing crossframe A is 25' each side of bearing piers 1 – 4. This location is also in an area of the girder haunch where the ½" x 15" cover plates are going to be added. (See sheet 75)

It appears that the bolts required for connection of the tension flange connection plate will have to also go through the cover plates and that the bottom of the WT6x25 will have to be skew cut to follow the haunch contour. Please confirm.

**Response:** Yes, that is correct.

**Question:** In Special Provision, Section 506, Lead Abatement and Field Coating Application, is it the Department's intention to require SSPC – QP1 and QP2 certifications for all Lead Abatement and all Painting for the project?

**Response:** Yes, that is correct.

**Question:** Item 524.32 Temporary Support – Beams and Girders has a quantity of 13 EA. This accounts for all of the pier support needed for both NB and SB Clauson Bridges. Where are the supports for the abutments for the 2 Clauson Bridges and Abutments and Piers for the MCRR Bridges paid for?

**Response:** Supports at the abutments of the two Clauson Bridges and at the abutments and piers of the MCRR bridges is included and paid under Item 523.52, Bearing Installation.

**Question:** Item 652.32 Battery Operated light has a quantity of 30 EA. Where and when are these lights to be utilized?

**Response:** The intent of Item 652.32, Battery Operated Light was to use these lights along I-95 to channelize traffic while the crossovers are in use. Locations or spacing intervals were not specified.

Consider these changes and information prior to submitting your bid on **July 27**, 2011.

Sincerely,

A handwritten signature in black ink, appearing to read "George MacDougall".

Scott Bickford

Contracts & Specifications Engineer

Handwritten initials "SBC" in black ink, with a long horizontal stroke extending to the left.

## **SPECIAL PROVISION**

### **SECTION 506**

#### Lead Abatement and Field Coating Application

**506.01 Description.** All requirements of this Specification are the responsibility of the Contractor unless otherwise specifically stated herein. This work shall consist of localized cleaning and coating of existing steel and coating of new structural steel at repair and cover plate areas. Provide all tools, equipment, materials, miscellaneous items and containment necessary for satisfactory completion of the work. Assume existing paint contains lead (BLSC). Areas requiring touch-up, as indentified by the Resident, shall conform to the requirements of this Special Provision.

Areas of existing steel where the existing coating has been previously damaged, and the contractor's activities do not exacerbate or promote further damage to the existing coating system will not be touched up, painted, topcoated, or addressed in any other manner.

**506.02 Materials.** Provide a coating Primer from the following list:

Carboline – Primer Carboguard 954 5 mils DFT

Wasser - Primer MC-Mozinc 4 mils DFT

Sherwin-Williams–Primer Corothane Galvapak Zinc Moisture Cure Urethane 1K 3 mils DFT

Provide the manufacturer's product data sheet and MSDS for the coating to the Resident for review prior to beginning coating. Provide coating in the smallest kit sizes or containers available from the coating manufacturer.

**506.03 Contractor Qualification.** Have a current SSPC-QP1 and QP2 certification.

Provide a surface preparation, coating application, containment and waste management plan for review by the Resident. The plan shall be stamped by a Professional Engineer licensed in the State of Maine. Have a pre-job meeting with the Resident, the Department's hazardous waste representatives, and the Contractor's hazardous waste transporter to discuss containment, removal, coating and waste disposal. Do not perform any work until the plan is reviewed by the Department.

**506.04 Quality Control.** Provide a Quality Control Inspector that has successfully completed NACE Coating Inspector Training, Session One, SSPC BCI training or has other inspection experience acceptable to the Resident.

The Quality Control Inspector shall:

- Inspect surface preparation.
- Record coating lot numbers and manufacture date.
- Witness the mixing of the coating.
- Measure and record the environmental conditions in the immediate vicinity of the coating operation.
- Measure and record dry film thickness of each coat.
- Record all Quality Control activity in a format acceptable to the Resident.
- Provide the Department with a copy of all test results and measurements.
- Reject unacceptable work and cause it to be re-done.

**506.05 Containment.** Meet the requirements of SSPC Guide 6, Table P-Power Tool Cleaning and all state and Federal requirements for the removal and containment of hazardous materials at locations of coating removal.

**506.06 Waste Management.** The Contractor shall collect, store and dispose of lead paint and related waste in compliance with all Federal, State and local laws and requirements. The procedures used for disposal shall conform to the latest requirements of Steel Structures Painting Council Guide 7, Guide for the Disposal of Lead-Contaminated Surface Preparation Debris. The Contractor shall have a copy of this guide available on site at all times. The Contractor shall also have a copy of the Maine Department of Environmental Protection's (MDEP's) Handbook for Hazardous Waste Generators and a copy of the State of Maine Hazardous Waste Management Rules, 06-096 CMR Chapters 850-857, on site at all times. Thirty days prior to generating any waste, the Contractor shall submit their Waste Management Plan which shall include the Spill Prevention Control and Countermeasure (SPCC) Plan to the Department for review and comment. Emergency procedures to be taken in the event of a release of hazardous/special waste or hazardous matter to the environment shall be part of the SPCC Plan. Work shall not proceed until the Department has formally accepted the Waste Management Plan as being complete.

The Department has "Small Quantity Generator-Plus (SQG-Plus)" hazardous waste status for the hazardous waste activities associated with this Contract, as defined by MDEP in the Handbook for Hazardous Waste Generators. Except for a generation rate and site specific identification number, all requirements associated with SQG-Plus status apply. Given the temporary nature of the work, MDEP has excluded the SQG-Plus generation rate restriction and permanent identification number for these bridge maintenance efforts as long as all other SQG-Plus requirements are fully complied with.

All hazardous waste shall be stored in USDOT approved drums. The waste drums shall be placed in an approved locking structure which has a firm, impervious, floor surface and secondary containment that is either 110% of the largest container or 20% of all containers, whichever is larger. All waste containers must be labeled with the words "Hazardous Waste", the hazard (e.g., Toxic, Flammable, etc.), the start date, full date, site location and generator information. The lockable container must be labeled "Danger-Unauthorized Personnel Keep

Out” and shall be locked at all times when not being accessed. No more than 1,320 pounds and no more than three 55-gallon drums of hazardous waste may be stored at the site at any time. The waste storage locker must be inspected each operating day in accordance with MDEP regulations. The written log shall detail the findings of the daily inspections and it must be maintained by the Contractor and provided to the Department at the end of the project. The Contractor shall store all hazardous waste, in conformance with all other MDEP and Federal Rules, including Chapter 851, Section 13, Part C(7)(i) and 40 CFR 2674.14. Hazardous wastes are limited to an on-site storage time of 180 days following the filling of a drum.

Hazardous/special paint debris and other waste shall not be placed or accumulated on unprotected ground or released to waters of the State. Work areas shall be adequately shielded at all times to prevent dispersion of debris by wind or rain. All of the Contractor’s equipment and storage areas used for the handling and storage of hazardous waste, special wastes and hazardous materials shall have impervious tarps placed under them. Any evidence of improper storage and handling shall be cause for immediate suspension of work in progress and work will not be allowed until corrective actions are taken.

All paint-related waste material generated as part of this initiative must be managed as a hazardous waste. Management of the remaining waste materials will depend on the results of laboratory testing. The Contractor may assume these wastes are hazardous or may test the debris (including personal protective equipment, gray water, etc.) to determine the appropriate disposal options. The Department must be notified at least one week in advance of the date of sampling activities and provided the proposed protocol for sample collection. The Department shall witness the sampling. Chain-of-custody must be adhered to for sample removal. Certified laboratory test results shall be provided to the Department upon receipt by the Contractor.

The Contractor shall inform the Department at least three days in advance of planned date(s) for removal of hazardous waste from the job site. The Department shall obtain a provisional Environmental Protection Agency Identification Number prior to shipping any hazardous waste for disposal. This provisional number must be used by the Contractor to ship hazardous waste off site. The Contractor shall secure a MaineDOT approved transporter (e.g., Enpro Services, Inc., or Environmental Products, Inc.) licensed by MDEP for transportation of hazardous waste. Preparation of all necessary forms is the responsibility of the Contractor. The Hazardous Waste Manifest must be approved and signed by the Department. A multi-part, pre-numbered Uniform Hazardous Waste Manifest (EPA Form 8700-22) shall be prepared when shipping hazardous waste. The appropriate original sheets of the multi-part hazardous waste manifest must be provided to the Department and must be sent to the Department’s Supervisor of Groundwater and Hazardous Waste Management, Environmental Office, State House Station #16, Augusta, Maine, 04330.

Failure of the Contractor to comply with this section shall result in the following:

- First finding of non-conformity shall be a written warning which will include deadline for compliance.
- Second finding of non-conformity shall be documented in writing, and all operations by the Contractor, except those needed to restore compliance, will be immediately suspended, until full compliance has been restored.
- Third and subsequent findings of non-conformity will be documented in writing and all operations shall be immediately suspended, except those needed to restore compliance, until full compliance has been fully restored, and the Contractor assessed a penalty of \$10,000.00 per incident. If the Contractor fails to restore the Project into compliance, additional fines shall be assessed.

All penalties assessed shall be in addition to any fines assessed by MDEP/EPA for failing to comply with the Federal, State, or local regulations. The Contractor shall not be granted additional time for suspensions of work due to noncompliance.

**506.07 Surface Preparation.** After welding and/or bolting, prepare the surfaces to a minimum of SSPC-SP 11-Power Tool Cleaning to Bare Metal. Develop an anchor profile that corresponds with the requirements of the primer coat manufacturer's product data sheet. For repair areas, clean the steel six inches in all directions from the weldment or 1 inch in all directions from any bolting. For areas to be cover plated, clean the edges and outside three inches of the bottom flange. Clean the full width of the flange at the end row of cover plate bolts. Use SSPC VIS 3-Visual Standard for Power-and Hand-Tool Cleaning to evaluate the cleanliness of the steel. Measure the anchor profile using ASTM D 4417 Method C (replica tape). Measure the anchor profile on each plane to be coated. If the results are consistent the Resident may require a reduced level of measurement, however, not less than one measurement at each end of a repair piece.

The faying surface between the existing flange and the cover plate shall meet Class B requirements. The coating for faying surfaces of slip critical connections shall be an organic zinc-rich primer. The primer shall meet Class B (0.5 or greater) slip coefficient requirements of the Research Council on Structural Connections' Specification for Structural Joints Using ASTM A325 or A490 Bolts. The slip coefficient shall be verified by testing according to the Testing Method to Determine the Slip Coefficient of Coatings Used in Bolted Connections' Specification for Structural Joints Using ASTM A325 or A490 Bolts, Appendix A. Prior to coating, the contractor fabricator shall furnish the Engineer with the certification of testing showing that the primer meets Class B slip coefficient.

**506.08 Application.** Apply the coating using brushes, rollers or other methods acceptable to the Resident. Do not spray the coating in the field, only shop applied coating may be sprayed. Single component coatings may be opened and re-sealed as long as the remaining coating has not begun to degrade or cure in the container.

Two-component kits may be split if the components are measured in the proper proportions by mass using a calibrated scale and the measuring and mixing are witnessed by the Resident and Quality Control Inspector. The proportions shall be provided on a company letterhead by the coating manufacturer.

Apply the coating after the Quality Control Inspector has measured and recorded the environmental conditions in the immediate vicinity of the work and has given permission to begin coating.

Cure the coating for the maximum amount of time specified for the minimum temperature encountered during the cure cycle. The environmental conditions recorded at the nearest airport may be used to settle disputes between the Department and the Contractor.

Advise the Resident when dry film thicknesses are measured in order that the Resident may witness the measurements. Do not remove the access to the work area until the Work has been completed and accepted by the Quality Control Inspector.

**506.09 Touch-up and Repairs** Repair damaged or unacceptable shop coating before the piece is removed from the paint area in the shop. Damaged areas shall be prepared in accordance with the manufacturer's published instructions. Damaged or unacceptable coatings shall be repaired using the same coating system. Environmental conditions, cure times and DFTs shall be in accordance with manufacturer's published data sheets.

Touch-up and repairs of damaged coating at the bridge site shall be done in accordance with the manufacturer's published instructions. Prepare areas to be touched-up/repared in a manner that assures the proper adhesion of the coating.

Payment for all touch-up and repairs shall be incidental to the Work.

**506.10 Method of Measurement.**

Surface Preparation of Existing and New Structural Steel shall be measured for payment as one lump sum, complete and accepted.

Field Painting of Existing and New Structural Steel shall be measured for payment as one lump sum, complete and accepted.

Containment and Pollution Control Measures shall be measured for payment as one lump sum, complete and accepted.

Disposal of Special Waste or Hazardous Waste materials shall be measured for payment as one lump sum.

**506.11 Basis of Payment.**

The accepted quantity of Surface Preparation of Existing and New Structural Steel will be paid at the respective Contract lump sum price, which shall be full compensation for furnishing all materials, labor, tools, equipment, scaffolding, QC inspections, and any other incidentals necessary for the satisfactory performance of the work.

The accepted quantity of Field Painting of Existing and New Structural Steel will be paid at the Contract lump sum price, which shall be full compensation for furnishing all material, labor, equipment, scaffolding and incidentals necessary for the satisfactory performance of the work.

Containment and pollution control will be paid for at the Contract lump sum price, which price shall be compensation for furnishing all materials, labor, equipment, and incidentals necessary for the satisfactory performance of the work.

Disposal of Special Waste or Hazardous Waste materials will be paid at the Contract lump sum price, which price shall be full compensation for all permits, tests, transportation, tipping fees and incidentals necessary for the satisfactory performance of the work.

Payment will be made under:

<b><u>Pay Item</u></b>	<b><u>Pay Unit</u></b>
506.142      Field Painting of Existing Structural Steel	LS
506.144      Field Painting of New and Existing Structural Steel	LS
506.17        Surface Preparation of New and Existing Structural Steel	LS
506.18        Containment and Pollution Control Measures	LS
506.191      Disposal of Special Waste or Hazardous Waste Material	LS
506.30        Shop Coating of Structural Steel	LS