

## GENERAL NOTES

1. ALL MATERIALS AND CONSTRUCTION SHALL CONFORM TO STATE OF VERMONT, AGENCY OF TRANSPORTATION, 2006 STANDARD SPECIFICATIONS FOR CONSTRUCTION, AND ITS LATEST REVISIONS, AND THE AASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES, DATED 2002, AND ITS LATEST REVISIONS.
2. ALL WORK AND ANY ASSOCIATED ACTIVITY ON THIS PROJECT SHALL BE PERFORMED WITHIN THE EXISTING RIGHT-OF-WAY LIMITS AS SHOWN IN THE REFERENCE PLANS.
3. THE CONTRACTOR SHALL TAKE PRECAUTIONS TO AVOID DAMAGE TO THE EXISTING BRIDGE DECK, SIDEWALK, RAILS AND APPROACH PAVEMENT. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE RESTORATION OF ANY PROPERTY WHICH HAS BEEN DAMAGED DURING THE PROSECUTION OF WORK.

## PROTECTIVE COATINGS

4. ALL EXISTING STEEL THAT IS NOT HOT DIP GALVANIZED SHALL BE CLEANED AND PAINTED IN ACCORDANCE WITH ITEM 900.645 SPECIAL PROVISION (QC/QA CLEAN AND PAINT EXISTING STEEL STRUCTURES, BARE STEEL). THE SURFACE PREPARATION OF THE EXISTING STEEL SHALL INCLUDE 100% REMOVAL OF THE EXISTING PAINT SYSTEM.
5. THE COLOR OF THE FINAL COAT OF PAINT SHALL BE RED (FEDERAL CHIP NO. 10076) IN ACCORDANCE WITH FEDERAL STANDARD NO. 595
6. MEMBERS THAT ARE HOT DIP GALVANIZED (HDG) SHALL NOT BE PAINTED AND SHALL BE PROTECTED FROM DAMAGE DUE TO CLEANING AND PAINTING OF ADJACENT SURFACES. BEFORE PROCEEDING WITH REMOVAL OF EXISTING PAINT IN LOCATIONS ADJACENT TO EXISTING HDG STEEL, THE CONTRACTOR SHALL DEMONSTRATE THE PROPOSED METHOD OF PROTECTION AND REMOVAL TO THE ENGINEER. HAND TOOL CLEANING MAY BE REQUIRED IF PROTECTION FROM BLASTING CAN NOT BE DEMONSTRATED. SHOULD AT ANY TIME, THE REMOVAL METHOD CAUSE DAMAGE TO THE HDG COATING, THE CONTRACTOR SHALL CEASE WORK UNTIL THEY CAN DEMONSTRATE A METHOD THAT DOES NOT RESULT IN DAMAGE. ANY DAMAGE SHALL BE REPORTED TO AND REPAIRED AS DIRECTED BY THE ENGINEER AT THE CONTRACTOR'S EXPENSE.
7. THE EXISTING STRUCTURAL STEEL ON THIS PROJECT WAS PAINTED WITH A MATERIAL WHICH MAY CONTAIN LEAD. THE CONTRACTOR SHALL INDEMNIFY AND HOLD THE STATE, ITS OFFICERS AND EMPLOYEES HARMLESS CONCERNING THE CONTRACTOR'S USE OR DISPOSITION OF THE STRUCTURAL STEEL. TEN DAYS PRIOR TO COMMENCING WORK WHICH INVOLVES THE HANDLING OR DISTURBANCE OF PAINTED COMPONENTS, THE CONTRACTOR SHALL PROVIDE DOCUMENTS TO THE ENGINEER, AS REFERENCED IN THE SPECIAL PROVISIONS.
8. A COAT OF GREASE RUST PROOFING COMPOUND SHALL BE APPLIED TO THE EXISTING GUSSET PLATES AT THE ABUTMENTS AND TO THE LOWER PORTION OF THE EXISTING END POSTS (BELOW THE TOP BRIDGE OF DECK).

## UTILITIES

9. EXISTING WATERLINE AND SEWER FORCE MAIN SHALL REMAIN IN SERVICE AND BE PROTECTED FROM CONSTRUCTION ACTIVITIES.

## TRAFFIC CONTROL /STAGING

10. THE CONTRACTOR SHALL DEVELOP A TRAFFIC CONTROL PLAN TO MAINTAIN SINGLE LANE ALTERNATING VEHICULAR TRAFFIC ON THE BRIDGE THROUGHOUT CONSTRUCTION. MAINTAINING PEDESTRIAN AND BICYCLE TRAFFIC IS NOT REQUIRED. THE TRAFFIC CONTROL PLAN SHALL INCLUDE APPROPRIATE SIGNAGE TO DESIGNATE RESTRICTIONS TO PEDESTRIAN AND BICYCLE TRAFFIC.
11. THE CONTRACTOR MAY USE THE CLOSED PORTION OF THE EXISTING BRIDGE DECK FOR STORAGE OF LIGHT MATERIAL AND EQUIPMENT. THE LINEAR WEIGHT OF CONSTRUCTION LOADS (INCLUDING ALL STAGING, MATERIALS, AND EQUIPMENT AND TRAFFIC BARRIERS) SHALL NOT EXCEED 700 POUNDS PER LINEAR FOOT. THE CONTRACTOR SHALL INCLUDE A SUMMARY OF ANTICIPATED CONSTRUCTION LOADS AND THE POSITION OF THOSE LOADS FOR APPROVAL AS PART OF THE TRAFFIC CONTROL PLAN.
12. TEMPORARY REMOVAL AND RESETTING OF GUARDRAIL OR APPROACH RAIL TO MAKE ROOM FOR STAGING OF EQUIPMENT WILL BE PERMITTED IN AREAS WHERE THE LANE ADJACENT TO THOSE RAILS IS CLOSED TO TRAFFIC. THE WORK SHALL BE PERFORMED IN ACCORDANCE WITH SECTION 62L. THE COST OF REMOVING AND RESETTING GUARDRAIL AND OR APPROACH RAIL SHALL BE CONSIDERED INCIDENTAL TO TRAFFIC CONTROL.

## TRAFFIC CONTROL /STAGING (CONTINUED)

13. ALL TRAFFIC CONTROL MEASURES FOR THIS PROJECT SHALL BE INSTALLED IN ACCORDANCE WITH THE CURRENT EDITION OF THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD) AND THE VTRANS STANDARD DRAWINGS, AS NEEDED. FOR CONFLICTS BETWEEN THE MUTCD AND THE VTRANS STANDARD DRAWINGS, THE MUTCD WILL GOVERN.
14. TEMPORARY BARRIER, IF USED, SHALL MEET THE REQUIREMENTS OF SECTION 62L. BARRIER ENDS FACING ONCOMING TRAFFIC SHALL BE TAPERED BEYOND THE CLEAR ZONE. THE CLEAR ZONE CAN BE TAKEN AS 3'-0" OUTSIDE THE TRAVEL WAY FOR PROPOSED 15 MPH CONSTRUCTION SPEED. IF NECESSARY, PAYMENT FOR INSTALLING, RESETTING, AND REMOVING ANY TEMPORARY TRAFFIC BARRIER WILL BE PAID FOR DIRECTLY UNDER ITEM 62L.90. ACCEPTABLE 'TEMPORARY TRAFFIC BARRIER' WILL INCLUDE WATER FILLED TYPE BARRIERS THAT HAVE MET THE NHCPR REPORT 350 CRITERIA FOR A RE-DIRECTIVE BARRIER AT TL-2 OR ABOVE.
15. ENERGY ABSORPTION ATTENUATORS, IF USED, SHALL MEET THE REQUIREMENTS OF SECTION 62L. PAYMENT FOR INSTALLING AND REMOVING ANY ENERGY ABSORPTION ATTENUATORS WILL BE INCIDENTAL TO ITEM 64L.10, TRAFFIC CONTROL.
16. SIGNS, BARRICADES, AND TRAFFIC CONTROL DEVICES SHALL BE CLEANED WEEKLY OR AS DIRECTED BY ENGINEER. THIS WORK SHALL BE INCLUDED IN THE BID PRICE FOR ITEM 64L.10, TRAFFIC CONTROL.

## SIGNAL NOTES

17. THE SIGNAL SYSTEM SHALL CONSIST OF POLES, SIGNS AND POSTS, TEMPORARY PAVEMENT MARKINGS (INCLUDING MASKING OF EXISTING MARKINGS AS REQUIRED), WARNING SIGNS, LUMINARIES, FLASHING BEACONS, AND SIGNAL EQUIPMENT TO PROVIDE FOR AN ADEQUATE DESIGN AND FULLY FUNCTIONAL SIGNAL SYSTEM. IT ALSO INCLUDES PERMITS AND COSTS ASSOCIATED WITH PROVIDING ELECTRICAL POWER. PAYMENT FOR THIS WORK WILL BE MADE UNDER ITEM 678.40, TEMPORARY TRAFFIC SIGNAL SYSTEM. PAYMENT FOR TEMPORARY DETECTORS WILL BE MADE UNDER CONTRACT ITEM 678.42.  

THE SIGNAL SYSTEM SHALL INCLUDE THREE REMOTE PREEMPTION UNITS TO BE PROVIDED TO THE TOWN FOR THE DURATION OF CONSTRUCTION. THE CONTRACTOR SHALL COORDINATE WITH THE RESIDENT ENGINEER, TOWN FIRE, AMBULANCE, POLICE AND ANY OTHER APPROPRIATE DEPARTMENTS TO DETERMINE THE PROPER TIMING REQUIRED FOR EMERGENCY VEHICLES TO CLEAR THE PROJECT AREA ONCE PREEMPTION IS ACTIVATED. SEVERAL TRIAL RUNS SHALL BE MADE. PAYMENT FOR THE TEMPORARY TRAFFIC SIGNAL SYSTEM INCLUDING ALL POLES, MAST ARMS, SIGNAL HEADS, WIRING, PHASING DIAGRAM, TIMING ADJUSTMENTS, PREEMPTION, ACTIVATION AND ANY OTHER INCIDENTALS REQUIRED TO INSTALL, MAINTAIN & REMOVE THE FULLY OPERATIONAL SIGNAL SYSTEM SHALL BE INCLUDED IN THE UNIT PRICE BID FOR ITEM 678.40 TEMPORARY TRAFFIC SIGNAL SYSTEM.
18. SIGNAL HEADS MAY BE HUNG ON A SPAN WIRE OR ON A CANTILEVER MAST ARM. AT LEAST ONE SIGNAL HEAD SHALL BE UNMISTAKABLY IN LINE WITH THE CENTER OF APPROACHING TRAFFIC AT ALL TIMES. THE SECOND SIGNAL HEAD MAY BE POST MOUNTED, LOCATED AT A DISTANCE OF NO GREATER THAN 14.5 FEET FROM THE CENTER OF THE APPROACH LANE WHEN THE STOP BAR IS 40 FEET FROM THE SIGNAL HEAD. CONSULT THE CURRENT EDITION OF THE M.U.T.C.D. FOR ADDITIONAL INFORMATION CONCERNING SIGNAL PLACEMENT.
19. SIGNAL HEAD PLACEMENT IS CRITICAL. HEADS SHALL BE ADJUSTED TO REFLECT LANE LOCATION CHANGES.
20. THE CONTRACTOR SHALL BE RESPONSIBLE FOR DETERMINING SIGNAL PHASING. THE CONTRACTOR SHALL SUBMIT PHASING DIAGRAM TO THE ENGINEER FOR APPROVAL. THE CONTRACTOR SHALL MAKE SIGNALS OPERATIONAL ONLY AFTER RECEIVING APPROVAL OF THE PHASING DIAGRAM BY THE ENGINEER.
21. DESIGN OF THE SIGNAL SUPPORTS AND ANY REQUIRED GUYING IS THE RESPONSIBILITY OF THE CONTRACTOR.
22. SIGNAL TIMING/TIMING ADJUSTMENTS REQUESTED BY THE ENGINEER SHALL BE ACCOMPLISHED WITHIN A 48 HOUR PERIOD. PAYMENT FOR THIS WORK WILL BE CONSIDERED INCIDENTAL TO ITEM 678.40, TEMPORARY TRAFFIC SIGNAL SYSTEM. AS DIRECTED BY THE ENGINEER, THE CONTRACTOR SHALL MAKE SEVERAL TRIAL RUNS TO DETERMINE THE PROPER ALL-RED CLEARANCE INTERVAL.
23. SIGNAL FACES SHALL CONSIST OF 12" LENSES. (RED, YELLOW, AND GREEN)
24. THE BOTTOM OF THE HOUSING OF A SIGNAL FACE SUSPENDED OVER A ROADWAY SHALL NOT BE LESS THAN 16.5 FEET NOR MORE THAN 19 FEET ABOVE THE PAVEMENT GRADE AT THE CENTER OF THE ROADWAY. THE BOTTOM OF A SIGNAL FACE NOT MOUNTED OVER A ROADWAY SHALL NOT BE LESS THAN 8 FEET NOR MORE THAN 15 FEET ABOVE THE GROUND.

## SIGNAL NOTES (CONTINUED)

25. SIGNAL FACES FOR ANY ONE APPROACH SHALL NOT BE LESS THAN 8 FEET APART MEASURED HORIZONTALLY BETWEEN CENTER FACES.
26. INSTALL WIRING BETWEEN SIGNAL POLES BY WHATEVER MEANS POSSIBLE OR CONVENIENT TO PROVIDE FOR A SAFE INSTALLATION. ATTACHMENT TO UTILITY POLES TO BE COORDINATED BY THE CONTRACTOR WITH THE UTILITY COMPANY. THIS WORK WILL BE CONSIDERED INCIDENTAL TO ITEM 678.40, TEMPORARY TRAFFIC SIGNAL SYSTEM.
27. PLACE TEMPORARY POLES BEHIND GUARDRAIL WHERE POSSIBLE.
28. POLES SUPPORTING SPAN WIRES AND/OR MAST ARMS SHALL BE ADEQUATELY BRACED OR GUYED AND SHALL NOT BE PLACED SO AS TO CREATE A HAZARD TO THE TRAVELING PUBLIC.
29. ALL TEMPORARY SIGNAL EQUIPMENT, SIGNS, ETC., SHALL BELONG TO THE CONTRACTOR AT THE END OF THE PROJECT AND THE CONTRACTOR SHALL BE RESPONSIBLE FOR THEIR REMOVAL. THIS INCLUDES ANY TEMPORARY PAVEMENT MARKING, MARKING MASKS, UTILITY POLES, WIRES, ETC. THIS WORK WILL BE INCLUDED IN THE UNIT PRICE BID FOR ITEM 678.40, TEMPORARY TRAFFIC SIGNAL SYSTEM.
30. A 250 WATT MER/150 WATT HPS LUMINAIRE AND MAST ARM SHALL BE PROVIDED ON A POLE ON EACH APPROACH AT A MOUNTING HEIGHT OF 30 FEET ABOVE ROADWAY CENTERLINE. THE INTENT IS TO LIGHT UP THE AREA AROUND THE SIGNAL HEADS AND STOP BAR FOR INCREASED VISIBILITY. THE ENGINEER SHALL DETERMINE THE ADEQUACY OF THE LIGHTING AND DIRECT CHANGES IF THE LIGHTING IS INSUFFICIENT. LIGHTING SHALL BE PAID INCIDENTAL TO ITEM 678.40, TEMPORARY TRAFFIC SIGNAL SYSTEM.
31. STOP BARS SHALL BE LOCATED A MINIMUM OF 40' AND A MAXIMUM OF 120' FROM THE NEAREST SIGNAL HEAD. PAYMENT WILL BE MADE UNDER ITEM 678.40 TEMPORARY TRAFFIC SIGNAL SYSTEM.
32. SEE STD. E-140 FOR 'STOP HERE ON RED' SIGN DETAIL AND E-101 FOR 'SIGNAL AHEAD' SYMBOL SIGN. SEE STD. E-121 FOR SIGN PLACEMENT. SEE STD. E-171A AND E-172 FOR ADDITIONAL INFORMATION ON SIGNALS.
33. ALL ELECTRICAL WORK SHALL MEET THE REQUIREMENTS OF THE NATIONAL ELECTRICAL CODE AND STATE INSPECTOR.
34. ALL STOP SIGNS AND ANY TRAFFIC SIGNS MADE IRRELEVANT DUE TO THE TEMPORARY SIGNAL SHALL BE COVERED DURING OPERATION OF THE TEMPORARY SIGNAL OR AT THE DISCRETION OF THE ENGINEER. THE COSTS OF COVERING AND UNCOVERING THESE SIGNS SHALL BE PAID INCIDENTAL TO ITEM 64L.10 TRAFFIC CONTROL.
35. CONSTRUCTION APPROACH SIGNS SHALL BE PROVIDED ON EACH APPROACH PER THE 'TRAFFIC CONTROL APPROACH SIGN PACKAGE' SHOWN ON SHEET 3. ADDITIONAL CONSTRUCTION APPROACH SIGNS SHALL BE INSTALLED AS REQUIRED BY THE ENGINEER PER STANDARDS E-100A, E-101, E-102 AND E-102A. PAYMENT FOR THESE SIGNS, THE REFLECTORIZED PLASTIC DRUMS, ETC., SHALL BE INCLUDED IN THE UNIT PRICE BID FOR ITEM 64L.10 TRAFFIC CONTROL.

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PROJECT NOTES

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