

ITEM 659 – SEEDING AND MULCHING

SEEDING AND MULCHING SHALL BE APPLIED TO ALL AREAS OF EXPOSED SOIL BETWEEN THE RIGHT-OF-WAY LINES, AND WITHIN THE CONSTRUCTION LIMITS FOR AREAS OUTSIDE THE RIGHT-OF-WAY LINES COVERED BY WORK AGREEMENT OR SLOPE EASEMENT. QUANTITY CALCULATIONS FOR SEEDING AND MULCHING ARE BASED ON THESE LIMITS AND MAY BE FOUND ON SHEET 7.

ITEM 614 – MAINTAINING TRAFFIC, AS PER PLAN

A MINIMUM OF 1 LANE OF TRAFFIC IN EACH DIRECTION SHALL BE MAINTAINED AT ALL TIMES BY USE OF TEMPORARY SIGNALS, THE EXISTING PAVEMENT, THE COMPLETED PAVEMENT, ITEM 615 PAVEMENT FOR MAINTAINING TRAFFIC, ITEM 615 ROADS FOR MAINTAINING TRAFFIC, AND TEMPORARY SURFACES USING ITEMS 410, AND 614.

LENGTH AND DURATION OF LANE CLOSURES AND RESTRICTIONS SHALL BE AT THE APPROVAL OF THE ENGINEER. IT IS THE INTENT TO MINIMIZE THE IMPACT TO THE TRAVELING PUBLIC. LANE CLOSURES OR RESTRICTIONS OVER SEGMENTS OF THE PROJECT IN WHICH NO WORK IS ANTICIPATED WITHIN A REASONABLE TIME FRAME, AS DETERMINED BY THE ENGINEER, SHALL NOT BE PERMITTED. THE LEVEL OF UTILIZATION OF MAINTENANCE OF TRAFFIC DEVICES SHALL BE COMMENSURATE WITH THE WORK IN PROGRESS.

MAINTAIN TRAFFIC WITH PORTABLE CONCRETE BARRIER AS PER STANDARD CONSTRUCTION DRAWING MT-96.11. WORK AREA LENGTHS OF 570 FEET AND 480 FEET SHALL BE USED FOR MEG-681-4.95 AND MEG-681-5.51, RESPECTIVELY. MAINTAIN A MINIMUM LANE WIDTH OF 12 FEET DURING CONSTRUCTION

IF IN THE OPINION OF THE ENGINEER, THE CONTRACTOR FAILS TO COMPLY WITH THESE REQUIREMENTS AND THE PROVISIONS OF THE APPROVED MAINTENANCE OF TRAFFIC PLAN, THE ENGINEER SHALL SUSPEND WORK UNTIL ALL REQUIREMENTS ARE MET. ANY COST OR DELAYS INCURRED AS A RESULT OF THE FAILURE SHALL BE THE FULL RESPONSIBILITY OF THE CONTRACTOR.

ALL WORK AND TRAFFIC CONTROL DEVICES SHALL BE IN ACCORDANCE WITH CMS 614 AND OTHER APPLICABLE PORTIONS OF THE SPECIFICATIONS, AS WELL AS THE OHIO MANUAL OF UNIFORM TRAFFIC CONTROL DEVICES. PAYMENT FOR ALL LABOR, EQUIPMENT AND MATERIALS SHALL BE INCLUDED IN THE LUMP SUM CONTRACT PRICE FOR ITEM 614, MAINTAINING TRAFFIC, AS PER PLAN, UNLESS SEPARATELY ITEMIZED IN THE PLAN.

INTERVAL	φ ₁			φ ₂			φ ₃		
	1	2	3	4	5	6	7	8	9
GREEN	12			12			12		
YELLOW CHANGE		3			3			3	
ALL RED CLEARANCE			15			15			15
CYCLE LENGTH	90								

SEQUENCE OF CONSTRUCTION

MEG-681-4.95

PHASE 1:

- BUILD TEMPORARY PAVEMENT ADJACENT TO EASTBOUND LANE OF SR 681.

PHASE 2:

- WHILE USING FLAGGERS, INSTALL PORTABLE BARRIERS, IMPACT ATTENUATORS, SIGNALS, SIGNS, AND PLACE PAVEMENT MARKINGS FOR WORK TO BE PERFORMED IN ACCORDANCE WITH SCD'S MT-96.11, MT-96.20, MT-96.26, AND MT-97.10. TRAFFIC SHALL BE MAINTAINED IN THE EASTBOUND LANE OF SR 681.

- BUILD DRILLED SHAFT RETAINING WALL.

- PERFORM FULL-DEPTH PAVEMENT REPAIR AS SHOWN ON PLANS. PAVEMENT BUILDUP SHOULD BE PERFORMED ONLY TO THE BOTTOM OF THE SURFACE COURSE.

PHASE 3:

- PLACE ASPHALT SURFACE COURSE AND FINAL PAVEMENT MARKINGS.

MEG-681-5.51

PHASE 1:

- BUILD TEMPORARY PAVEMENT ADJACENT TO WESTBOUND LANE OF SR 681.

PHASE 2:

- WHILE USING FLAGGERS, INSTALL PORTABLE BARRIERS, IMPACT ATTENUATORS, SIGNALS, SIGNS, AND PLACE PAVEMENT MARKINGS FOR WORK TO BE PERFORMED IN ACCORDANCE WITH SCD'S MT-96.11, MT-96.20, MT-96.26, AND MT-97.10. TRAFFIC SHALL BE MAINTAINED IN THE WESTBOUND LANE OF SR 681.

- BUILD DRILLED SHAFT RETAINING WALL.

- PERFORM FULL-DEPTH PAVEMENT REPAIR AS SHOWN ON PLANS. PAVEMENT BUILDUP SHOULD BE PERFORMED ONLY TO THE BOTTOM OF THE SURFACE COURSE.

PHASE 3:

- PLACE ASPHALT SURFACE COURSE AND FINAL PAVEMENT MARKINGS.

ITEM 614 – WORK ZONE IMPACT ATTENUATOR, 24" WIDE HAZARDS. (BIDIRECTIONAL)

THIS ITEM SHALL CONSIST OF FURNISHING AND INSTALLING A NON-GATING IMPACT ATTENUATOR. FURNISH AN IMPACT ATTENUATOR FROM THE OFFICE OF ROADWAY ENGINEERING'S APPROVED LIST FOR WORK ZONE IMPACT ATTENUATORS, FROM THE ROADWAY STANDARDS WEB PAGE FOR ROADWAY STANDARDS WEB PAGE.

INSTALLATION SHALL BE AT THE LOCATIONS SPECIFIED IN THE PLANS IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFICATIONS.

THE CONTRACTOR SHALL REPAIR OR REPLACE A DAMAGED UNIT WITHIN 24 HOURS OF A DAMAGING IMPACT.

WHEN BIDIRECTIONAL DESIGNS ARE SPECIFIED, THE CONTRACTOR SHALL SUPPLY APPROPRIATE TRANSITIONS.

WHEN GATING IMPACT ATTENUATORS ARE DESIRED, THE CONTRACTOR SHALL SUBMIT DOCUMENTATION TO THE ENGINEER FOR ACCEPTANCE.

THE COST FOR THE ADDITIONAL BARRIER REQUIRED FOR A GATING IMPACT ATTENUATOR SHALL BE INCLUDED IN THE COST OF THE GATING IMPACT ATTENUATOR.

PAYMENT FOR THE ABOVE WORK SHALL BE MADE AT THE UNIT PRICE BID AND SHALL INCLUDE ALL LABOR, TOOLS, EQUIPMENT AND MATERIALS NECESSARY TO CONSTRUCT AND MAINTAIN A COMPLETE AND FUNCTIONAL IMPACT ATTENUATOR SYSTEM, INCLUDING ALL RELATED BACKUPS, TRANSITIONS, LEVELING PADS, HARDWARE AND GRADING, NOT SEPARATELY SPECIFIED, AS REQUIRED BY THE MANUFACTURER.

A TOTAL OF 4 EACH CARRIED TO THE GENERAL SUMMARY

ITEM 614 – WORK ZONE LIGHTING SYSTEM

LIGHTING SHALL BE PROVIDED AT EACH END OF THE LANE CLOSURE FOR THE CLOSING OF ONE LANE OF A TWO-LANE HIGHWAY.

LIGHTING SHALL BE BY CONVENTIONAL METHODS, WITH LUMINAIRE ARMS ATTACHED TO THE SIGNAL SUPPORTS. AREA ILLUMINATION SHALL BE PROVIDED BY USING 150 WATT MINIMUM HIGH PRESSURE SODIUM LUMINARIES OR 250 WATT MINIMUM MERCURY LUMINARIES. THE MINIMUM HEIGHT OF THE LUMINAIRE SHALL BE 27 FT FROM THE GROUND SURFACE.

PAYMENT FOR LIGHTING SHALL INCLUDE DELIVERY, ERECTION, MAINTENANCE AND REMOVAL.

A TOTAL OF 2 EACH CARRIED TO THE GENERAL SUMMARY

ENDANGERED BAT HABITAT REMOVAL

THE PROJECT IS LOCATED WITHIN THE KNOWN HABITAT RANGES OF THE FEDERALLY LISTED AND PROTECTED INDIANA BAT AND NORTHERN LONG-EARED BAT. NO TREES SHALL BE REMOVED UNDER THIS PROJECT FROM APRIL 1 THROUGH SEPTEMBER 30. ALL NECESSARY TREE REMOVAL SHALL OCCUR FROM OCTOBER 1 THROUGH MARCH 31. THIS REQUIREMENT IS NECESSARY TO AVOID AND MINIMIZE IMPACTS TO THESE SPECIES AS REQUIRED BY THE ENDANGERED SPECIES ACT. FOR THE PURPOSES OF THIS NOTE, A TREE IS DEFINED AS A LIVE, DYING, OR DEAD WOODY PLANT, WITH A TRUNK THREE INCHES OR GREATER IN DIAMETER AT A HEIGHT OF 4.5 FEET ABOVE THE GROUND SURFACE, AND WITH A MINIMUM HEIGHT OF 13 FEET.

WETLANDS

WETLAND HABITATS HAVE BEEN IDENTIFIED BEYOND THE EXISTING RIGHT-OF-WAY NORTH OF STATE ROUTE 681 BETWEEN STATIONS 255+00 AND 261+35. TO AVOID UNAUTHORIZED IMPACTS TO WETLANDS, NO CONSTRUCTION ACTIVITIES OR ANCILLARY CONSTRUCTION (STAGING AREAS, WASTE LOCATIONS, AND/OR BORROW LOCATIONS) ARE PERMITTED BEYOND THE EXISTING RIGHT-OF-WAY NORTH OF STATE ROUTE 681 BETWEEN THE STATIONS DEFINED ABOVE.

ITEM 606 – ANCHOR ASSEMBLY, MGS TYPE E

THIS ITEM SHALL CONSIST OF FURNISHING AND INSTALLING ANY OF THE GUARDRAIL END TERMINALS FOR TYPE MGS GUARDRAIL AS LISTED ON ROADWAY ENGINEERING'S WEB PAGE UNDER ROADSIDE SAFETY DEVICES FOR APPROVED GUARDRAIL END TREATMENTS. INSTALLATION SHALL BE AT THE LOCATIONS SPECIFIED IN THE PLANS, IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFICATIONS.

THE FACE OF THE TYPE E IMPACT HEAD SHALL BE COVERED WITH A SHEET OF TYPE J, ASTM D4956 TYPE XI REFLECTIVE SHEETING, PER CMS 730.193.

REFER TO THE MANUFACTURER'S INSTRUCTIONS REGARDING THE INSTALLATION OF, AND THE GRADING AROUND THE FOUNDATION TUBES AND GROUND STRUT. THE TOP OF ANY FOUNDATION TUBE SHOULD BE LESS THAN 4 INCHES ABOVE THE GROUND. THE PLACEMENT OF THE FOUNDATION TUBES SHOULD BE AN APPROPRIATE DEPTH BELOW THE LEVEL LINE IN ORDER TO MAINTAIN THE FINISHED GUARDRAIL HEIGHT OF 31 INCHES FROM THE EDGE OF THE SHOULDER.

ON-SITE GRADING IS REQUIRED IF THE TOP OF THE FOUNDATION TUBES OR TOP OF THE GROUND STRUT DOES PROJECT MORE THAN 4 INCHES ABOVE THE GROUND LINE.

PAYMENT FOR THE ABOVE WORK SHALL BE MADE AT THE UNIT PRICE BID FOR ITEM 606, ANCHOR ASSEMBLY, MGS TYPE E, EACH, AND SHALL INCLUDE ALL LABOR, TOOLS, EQUIPMENT AND MATERIALS NECESSARY TO CONSTRUCT A COMPLETE AND FUNCTIONAL ANCHOR ASSEMBLY SYSTEM, INCLUDING ALL RELATED TRANSITIONS, REFLECTIVE SHEETING, HARDWARE, GRADING, EMBANKMENT AND EXCAVATION NOT SEPARATELY SPECIFIED, AS REQUIRED BY THE MANUFACTURER.

I:\ProjectData\MEG-681-4.95\ProjAdmin\PlanPackage\MEG-681-4.95\ProjAdmin\Design\Roadway\Sheets\14587-SNO02.dgn Sheet 8/30/2021 12:44:32 PM amorelan

CALCULATED
MPB
CHECKED
FJG

GENERAL NOTES

MEG-681-4.95 / 5.51