

FAU. ROUTE NO.	SECTION	COUNTY	TOTAL SHEETS	SHEET NO.
9249	04-00015-00-FP	ST. CLAIR	41	22
STA. 10+00.00		TO STA. 79+10.00		
FEDERAL AID PROJECT			CONTRACT 97302	

STORM WATER POLLUTION PREVENTION PLAN

THE FOLLOWING PLAN WAS ESTABLISHED AND INCLUDED IN THESE PLANS TO DIRECT THE CONTRACTOR IN THE PLACEMENT OF TEMPORARY EROSION CONTROL SYSTEMS AND TO PROVIDE A STORM WATER POLLUTION PREVENTION PLAN FOR COMPLIANCE UNDER NPDES.

THE PURPOSE OF THIS PLAN IS TO MINIMIZE SILTATION WITHIN THE CONSTRUCTION ZONE AND TO ELIMINATE SEDIMENTS FROM ENTERING AND LEAVING THE CONSTRUCTION ZONE BY UTILIZING PROPER TEMPORARY EROSION CONTROL SYSTEMS AND PROVIDING GROUND COVER WITHIN A REASONABLE AMOUNT OF TIME.

CERTAIN ITEMS, AS SHOWN IN THIS PLAN, SHALL BE PLACED BY THE CONTRACTOR AT THE BEGINNING OF CONSTRUCTION. OTHER ITEMS SHALL BE PLACED BY THE CONTRACTOR AS DIRECTED BY THE ENGINEER ON A CASE BY CASE SITUATION RESULTING FROM THE CONTRACTOR'S SEQUENCE OF ACTIVITIES, TIME OF YEAR, AND EXPECTED WEATHER CONDITIONS.

THE CONTRACTOR SHALL PLACE PERMANENT EROSION CONTROL SYSTEMS AND SEEDING WITHIN A REASONABLE AMOUNT OF TIME; THEREFORE, REDUCING THE AMOUNT OF AREA BEING OPEN TO THE POSSIBILITY OF EROSION AND REDUCING THE AMOUNT OF TEMPORARY SEEDING. THE RESIDENT ENGINEER WILL DETERMINE IF TEMPORARY EROSION CONTROL SYSTEMS SHOWN IN THE PLAN CAN BE DELETED. THE SIZE OF THE PROPOSED DITCH CHECKS, THE PROPER METHOD OF INSTALLATION, AND IF ANY ADDITIONAL TEMPORARY EROSION CONTROL SYSTEMS SHALL BE ADDED WHICH ARE NOT INCLUDED IN THIS PLAN. THE CONTRACTOR SHALL PERFORM ALL WORK AS DIRECTED BY THE ENGINEER, AS SHOWN IN THE PLAN DETAILS, AND AS SHOWN IN STANDARD 280001 OF THE PLANS.

THE STANDARD SPECIFICATIONS AND SPECIAL PROVISION FOR TEMPORARY EROSION CONTROL ADDITIONALLY SUPPLEMENT THIS PLAN.

SITE DESCRIPTION
DESCRIPTION OF SITE ACTIVITY:

THE PROPOSED PROJECT CONSISTS OF THE RECONSTRUCTION OF 1.309 MILES OF MONROE STREET IN LEBANON, ILLINOIS (2-LANE ROADWAY).

CONSTRUCTION CONSISTS OF EARTHWORK, SIDEWALK, CURB AND GUTTER, PAVEMENT, DRAINAGE STRUCTURES, STORM SEWER, AND OTHER MISCELLANEOUS WORK TO COMPLETE THE PROPOSED ROADWAY.

DESCRIPTION OF INTENDED SEQUENCE FOR MAJOR CONSTRUCTION ACTIVITIES WHICH WILL DISTURB EARTH AND LEAD TO POSSIBLE EROSION FOR MAJOR PORTION OF THE CONSTRUCTION SITE:

EXCAVATION WILL BE COMPLETED ALONG THE MAJORITY OF THE LENGTH OF THE JOB TO GRADE THE PROPOSED ROADWAY AND GRADE FOR FUTURE SIDEWALK CONSTRUCTION.

DRAINAGE STRUCTURES AND STORM SEWER WILL BE INSTALLED DURING CONSTRUCTION OF THE EXCAVATION AND EMBANKMENT TO ALLOW FOR DRAINAGE.

PLACEMENT, MAINTENANCE, REMOVAL AND PROPER CLEANUP OF TEMPORARY EROSION CONTROL ITEMS INCLUDING EROSION CONTROL FENCE, DITCH CHECKS, SEEDING AND OTHER MISCELLANEOUS EROSION CONTROL MEASURES.

PLACEMENT OF PERMANENT EROSION CONTROL ITEMS, INCLUDING DITCH RIP RAP AND SEEDING.

FINAL ROADWAY GRADING, PAVING, AND OTHER MISCELLANEOUS ITEMS.

AREA OF CONSTRUCTION SITE:

THE TOTAL AREA OF THE CONSTRUCTION SITE IS ESTIMATED TO BE 4.7 ACRES OF WHICH 4.7 ACRES WILL BE DISTURBED BY EXCAVATION, GRADING AND OTHER ACTIVITIES.

OTHER REPORTS, STUDIES AND PLANS WHICH AID IN THE DEVELOPMENT OF THIS STORM WATER POLLUTION PREVENTION PLAN AS REFERENCED DOCUMENTS:

SITE MAPS INDICATING DRAINAGE PATTERNS WERE EVALUATED. APPROXIMATE SLOPES ANTICIPATED BEFORE AND AFTER MAJOR GRADING ACTIVITIES, USGS DRAINAGE MAPS, AND PROJECT PLAN DOCUMENTS WERE ALSO UTILIZED FOR PROPOSED PLACEMENT OF THE TEMPORARY EROSION CONTROL SYSTEMS.

DRAINAGE TRIBUTARIES RECEIVING WATER FROM THIS CONSTRUCTION SITE:

UNNAMED TRIBUTARIES TO SILVER CREEK
UNNAMED TRIBUTARIES TO HORNER PARK LAKE

CONTROLS - EROSION CONTROLS AND SEDIMENT CONTROL DESCRIPTION OF STABILIZATION PRACTICES AT THE BEGINNING OF CONSTRUCTION

1. THE AREA BETWEEN THE PROPOSED RIGHT-OF-WAY BOUNDARIES AND LIMITS OF THE PROJECT WILL BE IMPROVED AND MANAGED FOR THE PURPOSED OF CONTROLLING EROSION WITHIN THE AREA, REDUCING WATER FLOW BY TEMPORARY DIVERSION AND MINIMIZING SILTATION INTO THE CONSTRUCTION ZONE, AND ESTABLISHING VEGETATIVE COVER WHICH WILL BECOME PERMANENT VEGETATION AND ACT AS AN EROSION BARRIER. WORK AT THE BEGINNING OF THE CONSTRUCTION WILL CONSIST OF THE FOLLOWING:
 - A. AREAS OF EXISTING VEGETATION (WOODS AND GRASSLANDS) OUTSIDE THE PROPOSED CONSTRUCTION SLOPE LIMITS SHALL BE IDENTIFIED FOR PRESERVING AND SHALL BE PROTECTED FROM MOWING, BRUSH CUTTING, TREE REMOVAL AND OTHER ACTIVITIES WHICH WOULD BE DETRIMENTAL TO THEIR MAINTENANCE AND DEVELOPMENT.
 - B. DEAD, DISEASED, OR UNSUITABLE VEGETATION WITHIN THE SITE SHALL BE REMOVED AS DIRECTED BY THE ENGINEER, ALONG WITH REQUIRED TREE REMOVAL.
 - C. AS SOON AS REASONABLE ACCESS IS AVAILABLE (SUCH AS TREES CLEARED) TO ALL LOCATIONS WHERE WATER DRAINS AWAY FROM THE PROJECT, PERIMETER EROSION BARRIER SHALL BE INSTALLED AS CALLED OUT IN THIS PLAN AND AS DIRECTED BY THE ENGINEER.
 - D. BARE AND SPARSELY VEGETATED GROUND IN HIGHLY ERODIBLE AREAS AS DETERMINED BY THE ENGINEER SHALL BE TEMPORARILY SEEDED AT THE BEGINNING OF CONSTRUCTION WHERE NO CONSTRUCTION ACTIVITIES ARE EXPECTED WITHIN FOURTEEN CALENDAR DAYS.
 - E. IMMEDIATELY AFTER TREE REMOVAL IS COMPLETED IN CERTAIN AREA WHICH ARE HIGHLY ERODIBLE AS DETERMINED BY THE ENGINEER, THE AREAS SHALL BE TEMPORARILY SEEDED WHERE NO CONSTRUCTION ACTIVITIES ARE EXPECTED WITHIN FOURTEEN CALENDAR DAYS.
 - F. AT LOCATIONS WHERE A SIGNIFICANT AMOUNT OF WATER DRAINS INTO THE CONSTRUCTION ZONE FROM OUTSIDE AREAS (ADJACENT LANDOWNERS), TEMPORARY DITCH CHECKS WILL BE UTILIZED TO LOCALLY DIVERT WATER, REDUCE FLOW RATES, AND COLLECT OUTSIDE SILTATION INSIDE THE RIGHT-OF-WAY LINE.
2. ESTABLISHMENT OF THESE TEMPORARY EROSION CONTROL MEASURES WILL HAVE ADDITIONAL BENEFITS TO THE PROJECT. DESIRABLE GRASS SEED WILL BECOME ESTABLISHED IN THESE AREAS AND MAY SPREAD SEEDS ONTO THE CONSTRUCTION SITE UNTIL PERMANENT SEEDING/MOWING AND OVERSEEDING CAN BE COMPLETE.
3. A THIRD BENEFIT OF THESE AREAS IS THAT THEY WILL BEGIN TO PROVIDE A SCREEN AND BUFFER. THEY WILL HELP PROTECT THE CONSTRUCTION SITE FROM WINDS AND EXCESS SUN AND MITIGATE CONSTRUCTION NOISE AND DUST.

DESCRIPTION OF STABILIZATION PRACTICES DURING CONSTRUCTION

1. DURING ROADWAY CONSTRUCTION, AREA OUTSIDE THE CONSTRUCTION SLOPE LIMITS AS OUTLINED PREVIOUSLY HEREIN SHALL BE PROTECTED FROM DAMAGING EFFECTS OF CONSTRUCTION. THE CONTRACTOR SHALL NOT USE THIS AREA FOR STAGING (EXCEPT AS DESIGNATED ON THE PLANS OR DIRECTED BY THE ENGINEER), PARKING OF VEHICLES OR CONSTRUCTION EQUIPMENT, STORAGE OF MATERIALS, OR OTHER CONSTRUCTION RELATED ACTIVITIES.
 - A. WITHIN THE CONSTRUCTION ZONE, CRITICAL AREAS WHICH HAVE HIGH FLOWS OF WATER AS DETERMINED BY THE ENGINEER SHALL REMAIN UNDISTURBED UNTIL FULL SCALE CONSTRUCTION IS UNDERWAY TO PREVENT UNNECESSARY SOIL EROSION.
 - B. EARTH STOCKPILES SHALL BE TEMPORARILY SEEDED IF THEY ARE TO REMAIN UNUSED FOR MORE THAN FOURTEEN CALENDAR DAYS.
 - C. AS THE CONTRACTOR PROCEEDS WITH CONSTRUCTION, HE/SHE SHALL FOLLOW THE FOLLOWING STEPS AS DIRECTED BY THE ENGINEER:
 - I. PLACE TEMPORARY EROSION CONTROL SYSTEMS AT LOCATIONS WHERE WATER LEAVES AND RETURNS FROM THE CONSTRUCTION ZONE.
 - II. TEMPORARILY SEED HIGHLY ERODIBLE AREAS OUTSIDE THE CONSTRUCTION SLOPE LIMITS.
 - III. CONSTRUCT ROADSIDE DITCHES AND PROVIDE TEMPORARY EROSION CONTROL SYSTEMS.
 - IV. TEMPORARILY DIVERT WATER AROUND PROPOSED CULVERT LOCATIONS.
 - V. BUILD NECESSARY EMBANKMENT AT CULVERT LOCATIONS AND THEN EXCAVATE AND PLACE CULVERT.

- VI. CONTINUE BUILDING UP THE EMBANKMENT TO THE PROPOSED GRADE WHILE AT THE SAME TIME PLACING EROSION CONTROL SUCH AS RIP RAP, DITCH LINING AND CONDUCT FINAL SHAPING TO THE SLOPES.
- D. EXCAVATED AREA AND EMBANKMENTS SHALL BE PERMANENTLY SEEDED WHEN FINAL GRADED. IF NOT, THEY SHALL BE TEMPORARILY SEEDED IF NO CONSTRUCTION ACTIVITY IN THE AREA IS PLANNED FOR FOURTEEN CALENDAR DAYS.
- E. CONSTRUCTION EQUIPMENT SHALL BE STORED AND FUELED ONLY AT DESIGNATED LOCATIONS. ALL NECESSARY MEASURES SHALL BE TAKEN TO CONTAIN ANY FUEL OR POLLUTION RUN-OFF IN COMPLIANCE WITH EPA WATER QUANTITY REGULATIONS. LEAKING EQUIPMENT OR SUPPLIES SHALL BE IMMEDIATELY REPAIRED OR REMOVED FROM THE SITE.
- F. THE RESIDENT ENGINEER SHALL INSPECT THE PROJECT ON A REGULAR BASIS, AT LEAST ONCE EVERY SEVEN CALENDAR DAYS AND WITHIN 24 HOURS OF THE END OF EACH 0.5 INCH RAINFALL OR EQUIVALENT SNOWFALL, TO DETERMINE THAT EROSION CONTROL EFFORTS ARE IN PLACE AND EFFECTIVE AND IF OTHER EROSION CONTROL WORK IS NECESSARY.
- G. SEDIMENT COLLECTED DURING CONSTRUCTION BY THE VARIOUS TEMPORARY EROSION CONTROL SYSTEMS SHALL BE DISPOSED OF ON THE SITE ON A REGULAR BASIS AS DIRECTED BY THE ENGINEER. SILT FENCE SHALL HAVE SEDIMENT REMOVED WHEN IT REACHED 50% OF THE HEIGHT OF THE CONTROL DEVICE. THE COST OF THE MAINTENANCE AND CLEANING OF THE EROSION AND SEDIMENT CONTROL ITEMS SHALL BE INCLUDED IN THE RESPECTIVE PAY ITEMS. NO ADDITIONAL COMPENSATION WILL BE ALLOWED.
- H. THE TEMPORARY EROSION CONTROL SYSTEMS SHALL BE REMOVED AS DIRECTED BY THE ENGINEER AFTER USE IS NO LONGER NEEDED OR NO LONGER FUNCTIONING. THE COST OF THIS REMOVAL SHALL BE INCLUDED IN THE UNIT BID PRICE FOR THE TEMPORARY EROSION CONTROL SYSTEM. NO ADDITIONAL COMPENSATION WILL BE ALLOWED.

DESCRIPTION OF STRUCTURAL PRACTICES AFTER FINAL GRADING:

TEMPORARY EROSION CONTROL SYSTEMS SHALL BE LEFT IN PLACE WITH PROPER MAINTENANCE UNTIL PERMANENT EROSION CONTROLS ARE IN PLACE AND WORKING PROPERLY AND ALL PROPOSED TURF AREA SEEDED AND ESTABLISHED WITH A PROPER STAND.

ONCE PERMANENT EROSION CONTROL SYSTEMS AND ITEMS AS PROPOSED IN THE PLANS ARE FUNCTIONAL AND ESTABLISHED, TEMPORARY ITEMS SHALL BE REMOVED, CLEANED UP, AND DISTURBED TURF RESEEDED.

MAINTENANCE AFTER CONSTRUCTION:

FINAL INSPECTION WILL OCCUR AFTER ALL ROADWAY IS COMPLETED AND THE ROADWAY SIGNING IS IN PLACE AND THE ROAD COMPLETELY OPEN TO TRAFFIC.

CONSTRUCTION IS COMPLETE AFTER ACCEPTANCE IS RECEIVED AT THE FINAL INSPECTION.

EROSION AND SEDIMENT CONTROL NOTES:

TEMPORARY DITCH CHECKS SHALL BE LOCATED AS SHOWN ON THE PLANS.

TEMPORARY EROSION CONTROL SEEDING SHALL BE APPLIED AT A RATE OF 100LB/ACRE.

MULCH METHOD 1 AS APPLIED TO TEMPORARY SEEDING SHALL CONFORM TO SECTION 251 OF THE STANDARD SPECIFICATIONS.


MULCH METHOD 1 FOR TEMPORARY EROSION CONTROL SEEDING WILL NOT BE PAID FOR SEPARATELY, BUT SHALL BE INCLUDED IN THE UNIT BID PRICE FOR THE CONTRACT AND NO ADDITIONAL COMPENSATION WILL BE ALLOWED.

CONSTRUCT PERIMETER EROSION CONTROL AT BEGINNING OF CONSTRUCTION. REMOVE AT END OF CONSTRUCTION.

ALL EROSION CONTROL PRODUCTS FURNISHED SHALL BE SPECIFICALLY RECOMMENDED BY THE MANUFACTURER FOR THE USE SPECIFIED IN THE EROSION CONTROL PLAN. PRIOR TO THE APPROVAL AND USE OF THE PRODUCT, THE CONTRACTOR SHALL SUBMIT TO THE ENGINEER A NOTARIZED CERTIFICATION BY THE PRODUCER STATING THE INTENDED USE OF THE PRODUCT AND THAT THE PHYSICAL PROPERTIES REQUIRED FOR THIS APPLICATION ARE MET OR EXCEEDED. THE CONTRACTOR SHALL PROVIDE MANUFACTURER INSTALLATION PROCEDURES TO FACILITATE THE ENGINEER IN CONSTRUCTION INSPECTION.

LEGEND

ITEM	SYMBOL	ITEM	SYMBOL
TEMPORARY DITCH CHECKS		EROSION CONTROL BLANKET	
PERIMETER EROSION BARRIER		INLET AND PIPE PROTECTION	
RIP RAP			

 3/15/07
 SIGNATURE DATE
 MAYOR OF LEBANON, ILLINOIS
 TITLE