THIS PLAN HAS BEEN PREPARED TO COMPLY WITH THE PROVISIONS OF THE NPDES PERMIT NUMBER ILR10, ISSUED BY THE ILLINOIS ENVIRONMENTAL PROTECTION AGENCY ON MAY 30, 2003 FOR STORM WATER DISCHARGES FROM CONSTRUCTION SITE ACTIVITIES. THIS PLAN HAS ALSO BEEN PREPARED TO COMPLY WITH THE PROVISIONS OF NPDES PERMIT NUMBER ILR40 FOR DISCHARGES FROM SMALL MUNICIPAL SEPARATE STORM SEWER SYSTEMS IF CHECKED BELOW.

NPDES PERMITS ASSOCIATED WITH THIS PROJECT:

CT TI D10

☑ ILR40 PERMIT NO. 0493

I CERTIFY UNDER PENALTY OF LAW THAT THIS DOCUMENT AND ALL ATTACHMENTS WERE PREPARED UNDER MY DIRECTION OR SUPERVISION IN ACCORDANCE WITH A SYSTEM DESIGNED TO ASSURE THAT QUALIFIED PERSONNEL PROPERLY GATHERED AND EVALUATED THE INFORMATION SUBMITTED. BASED ON MY INQUIRY OF THE PERSON OR PERSONS WHO MANAGE THE SYSTEM, OR THOSE PERSONS DIRECTLY RESPONSIBLE FOR GATHERING THE INFORMATION, THE INFORMATION SUBMITTED IS, TO THE BEST OF MY KNOWLEDGE AND BELIEF, TRUE, ACCURATE AND COMPLETE. I AM AWARE THAT THERE ARE SIGNIFICANT PENALTIES FOR SUBMITTING FALSE INFORMATION, INCLUDING THE POSSIBILITY OF FINE AND IMPRISONMENT FOR KNOWING VIOLATIONS.

MARY C. LAMIE

PRINT NAME

DEPUTY DIRECTOR OF HIGHWAYS
REGION FIVE ENGINEER

TITLE

DATE

IL DEPT. OF TRANSPORTATION

AGENCY

I. SITE DESCRIPTION:

A. THE FOLLOWING IS A DESCRIPTION OF THE PROJECT LOCATION

THE PROJECT IS LOCATED IN MADISON COUNTY ALONG A SECTION OF I-55/70 FROM APPROXIMATELY 1.0 MILE NORTH OF IL 157 TO 0.3 MILE NORTH OF THE I-55/70/270 INTERCHANGE AND INCLUDES THE INTERCHANGE RAMPS AT IL 159 AND US 40. THE PROJECT IS 7.7 MILES IN LENGTH.

B. THE FOLLOWING IS A DESCRIPTION OF THE CONSTRUCTION ACTIVITY WHICH IS THE SUBJECT OF THIS PLAN:

SAFETY IMPROVEMENTS ARE THE FOCUS OF THE CONSTRUCTION ACTIVITIES FOR THIS PROJECT. THESE ACTIVITIES WILL INCLUDE: 1) MILLING AND RESURFACING OF EXISTING HOT-MIX ASPHALT SURFACES TO PROVIDE EXTRA THICKNESS NEEDED BECAUSE OF HEAVY TRUCK VOLUMES, WHILE MAINTAINING MINIMUM CLEARANCES UNDER EACH OVERPASS STRUCTURE; 2) REMOVING VEGETATION AND DEBRIS TO RESTORE THE HYDRAULIC EFFICIENCY OF TWO CULVERTS (ONE AT CANTEEN CREEK AND ONE AT A DRAINAGE DITCH THAT EMPTIES INTO WENDELL BRANCH OF SILVER CREEK); 3) INSTALLATING APPROXIMATELY FOUR HUNDRED PIPE UNDERDRAIN OUTLETS IN THE SHOULDERS OF THE MAINLINE; 4) IMPROVING GUARDRAILS WITH CRASHWORTHY END TERMINALS; 5) REMOVING CALL BOX FOUNDATIONS WHERE POSTS ARE MISSING; 6) REMOVING SELECTED TREES ALONG I-55/TO BETWEEN IL 157 AND IL 159 TO DECREASE THE INCIDENCE OF LIMBS FALLING ONTO THE PAYEMENT DURING STRONG WINDS AND STORMS; AND 7) WIDENING SHOULDERS AT THE GUARD RAIL TERMINALS. RIPRAP WILL ALSO BE INSTALLED AS AN EROSION CONTROL MEASURE NEAR THE MARYVILLE WEIGH STATION.

C. THE FOLLOWING IS A DESCRIPTION OF THE INTENDED SEQUENCE OF MAJOR ACTIVITIES WHICH WILL DISTURB SOILS FOR MAJOR PORTIONS OF THE CONSTRUCTION SITE, SUCH AS GRUBBING, EXCAVATION AND GRADING:

DESCRIPTION OF INTENDED SEQUENCE FOR MAJOR CONSTRUCTION ACTIVITIES WHICH WILL DISTURB SOILS FOR MAJOR PORTIONS OF THE CONSTRUCTION SITE:

STAGE I: SELECTED TREE REMOVAL. TREES ALONG BOTH THE NORTHBOUND AND SOUTHBOUND LANES WILL BE REMOVED, INCLUDING THE STUMPS.

STAGE II: PIPE UNDERDRAIN OUTLETS. APPROXIMATELY FOUR HUNDRED PIPE UNDERDRAIN OUTLETS WILL BE INSTALLED THROUGHOUT THE ENTIRE LENGTH OF THE PROJECT.

STAGE III: SHOULDER WIDENING. APPROXIMATELY 850 SQUARE YARDS OF ABBREVIATED SHOULDER WIDENING WILL OCCUR AT GUARDRAIL TERMINALS.

STAGE IV: VEGETATION AND DEBRIS REMOVAL FROM TWO CULVERTS. THE CULVERTS AT CANTEEN CREEK AND A DRAINAGE DITCH THAT ENTERS THE WENDELL BRANCH OF SILVER CREEK WILL BE CLEARED TO IMPROVE CAPACITY AND FLOW CONDITIONS.

D. THE TOTAL AREA OF THE CONSTRUCTION SITE IS ESTIMATED TO BE APPROXIMATELY TWO HUNDRED AND SEVENTY (270) ACRES.

THE TOTAL AREA OF THE SITE THAT IS ESTIMATED WILL BE DISTURBED BY EXCAVATION, GRADING OR OTHER ACTIVITIES IS APPROXIMATELY SEVEN (7) ACRES.

- E. THE FOLLOWING IS A WEIGHTED AVERAGE OF THE RUNOFF COEFFICIENT FOR THIS PROJECT AFTER CONSTRUCTION ACTIVITIES ARE COMPLETED: 0.65
- F. THE FOLLOWING IS A DESCRIPTION OF THE SOIL TYPES FOUND AT THE PROJECT SITE FOLLOWED BY INFORMATION REGARDING THEIR EROSIVITY:

SEVENTEEN SOIL TYPES HAVE BEEN IDENTIFIED WITHIN THE PROJECT SITE. APPROXIMATELY 70% OF THE PROJECT SITE CONSISTS OF TWO SOIL TYPES: ORTHENTS SILT AND MENFRO SILT LOAM.

ORTHENTS SILT (801D)--A SOMEWHAT POORLY DRAINED SOIL WITH MODERATE PERMEABILITY. THIS DISTURBED SOIL HAS BEEN USED AS ROAD FILL FOR I-70, ITS RAMPS AND OTHER ROADS IN MADISON COUNTY. THIS SOIL HAS A SLIGHT SUSCEPTIBILITY TO WATER AND WIND EROSION BASED ON ITS PRESENT SLOPES.

MENFRO SILT LOAM (79B)--A GENERALLY WELL DRAINED SOIL WITH MODERATE PERMEABILITY. THIS DISTURBED SOIL HAS IDENTICAL VALUES TO ORTHENTS SILT FOR WATER AND WIND EROSION SUSCEPTIBILITY.

APPROXIMATELY 30% OF THE PROJECT SITE CONTAINS THE FOLLOWING SOILS.

WILBUR SILT LOAM (3336A)--A MODERATELY WELL DRAINED SILTY ALLUVIUM WITH MODERATE PERMEABILITY. THIS SOIL IS TYPICALLY FOUND IN FLOOD PLAINS.

CASEYVILLE SILT LOAM (267A)--A SOMEWHAT POORLY DRAINED SOIL WITH MODERATE PERMEABILITY. THIS SOIL IS TYPICALLY FOUND ON NEARLY LEVEL SUMMITS.

EDWARDSVILLE SILT LOAM (384A)--A SOMEWHAT POORLY DRAINED SOIL WITH MODERATE PERMEABILITY. THIS SOIL

MASCOUTAH SILTY CLAY LOAM (385A)—A POORLY DRAINED SOIL WITH A MODERATE PERMEABILITY. THIS SOIL IS THE ONLY SOIL IN THE PROJECT SITE THAT MEETS THE DEFINITION OF A HYDRIC SOIL. THIS SOIL IS TYPICALLY FOUND IN AREAS BETWEEN TWO DRAINAGEWAYS THAT SHEDS WATER TO THOSE DRAINAGEWAYS. HOWEVER, NO WETLAND IS ASSOCIATED WITH THIS SOIL IN ITS LOCATION TO THE PROJECT SITE.

WINFIELD-ORTHENTS-URBAN LAND COMPLEX (2477B)--A MODERATELY WELL DRAINED SOIL WITH MODERATE PERMEABILITY THAT HAS BEEN ALTERED THROUGH CUT AND FILL ACTIVITY.

ORION SILT LOAM (3415A)--A SOMEWHAT POORLY DRAINED SOIL WITH MODERATE PERMEABILITY THAT IS TYPICALLY FOUND IN FLOOD PLAINS.

WINFIELD SILT LOAM (477B)--A MODERATELY WELL DRAINED SOIL WITH MODERATE PERMEABILITY. THIS SOIL IS TYPICALLY FOUND WHERE EROSIONAL SIDE SLOPES ARE PRESENT.

WINFIELD SILTY CLAY LOAM (477D3)--LIKE WINFIELD SILT LOAM, THIS SOIL IS MODERATELY WELL DRAINED WITH MODERATE PERMEABILITY THAT CAN TYPICALLY BE FOUND WHERE EROSIONAL SIDE SLOPES ARE PRESENT.

SYLVAN-BOLD SILT LOAM (962D2)--A WELL DRAINED SOIL WITH MODERATE PERMEABILITY. THIS SOIL IS USUALLY FOUND ON HILL SLOPES.

SYLVAN BOLD SILT LOAM (962F2)--VIRTUALLY IDENTICAL TO SYLVAN-BOLD SILT LOAM 962D2 DESCRIBED ABOVE.

MENFRO SILT LOAM (79C2)-- A WELL DRAINED SOIL WITH MODERATE PERMEABILITY THAT IS TYPICALLY FOUND ON SUMMITS, SLOPES AND BACKSLOPES.

MENFRO SILTY CLAY LOAM (79D3)--A WELL DRAINED SOIL WITH MODERATE PERMEABILITY THAT IS USUALLY FOUND ON EROSIONAL SIDE SLOPES.

MENFRO SILT LOAM (79F)--LIKE THE OTHER MENFRO SILTS, THIS IS A WELL DRAINED SOIL WITH MODERATE PERMEABILITY. THIS SOIL IS USUALLY FOUND ON SIDE SLOPES.

DOWNSOUTH SILT LOAM (283B)--A MODERATELY WELL DRAINED SOIL WITH MODERATE PERMEABILITY THAT IS TYPICALLY FOUND ON SUMMITS, SLOPES AND BACKSLOPES.

ORTHENTS SILTY UNDULATING (801B)--A SOMEWHAT POORLY DRAINED SOIL TYPICALLY FOUND ON TILL PLAINS. PERMEABILTY FOR THIS SOIL RANGES FROM MODERATELY SLOW TO MODERATE.

G. THE FOLLOWING IS A DESCRIPTION OF POTENTIALLY EROSIVE AREAS ASSOCIATED WITH THIS PROJECT:

AREAS MOST SUSCEPTIBLE TO EROSION ON THIS PROJECT ARE WHERE TWO WINFIELD SILT LOAMS, TWO SYLVAN-BOLD SILT LOAMS, AND TWO MENFRO SILT LOAMS ARE PRESENT AT SLOPES THAT EXCEED 2 PERCENT. THE CUMULATIVE LINEAR AREA WHERE THESE SOILS ARE FOUND IS LESS THAN 1 1/2 MILES LOCATED BETWEEN 1.0 MILE NORTH OF IL 157 AND 1.0 MILE EAST OF THE 1L 159 INTERCHANGE.

H. THE FOLLOWING IS A DESCRIPTION OF SOIL DISTURBING ACTIVITIES, THEIR LOCATIONS, AND THEIR EROSIVE FACTORS (E.G. STEEPNESS OF SLOPES, LENGTH OF SLOPES, ETC):

TWO TYPES OF SOIL DISTURBING ACTIVITIES WILL OCCUR ON THIS PROJECT: 1) RIPRAP PLACEMENT, AND 2) PIPE UNDERDRAIN INSTALLATION. APPROXIMATELY 250 SQUARE YARDS OF RIPRAP WILL BE PLACED ON A 2:1 SLOPE NEAR THE MARYVILLE WEIGH STATION. AT LOCATIONS WHERE APPROXIMATELY 400 PIPE UNDERDRAINS ARE INSTALLED, APPROXIMATELY TEN (10) FEET OF PIPE WILL BE PLACED IN TRENCHES THAT ARE APPROXIMATELY FOUR TO EIGHT INCHES WIDE.

TREE REMOVAL COULD POTENTIALLY POSE A THIRD TYPE OF SOIL DISTURBING ACTIVITY IF TREE STUMPS ARE CUT OUT OR PULLED OUT OF THE GROUND. THERE ARE 6.82 ACRES OF TREE REMOVAL INCLUDED IN THIS PROJECT.

THE PROJECT HAS NO OFF-SITE SOIL DISTURBING CONSTRUCTION ACTIVITY.

- I. SEE THE EROSION CONTROL PLANS AND/OR DRAINAGE PLANS FOR THIS CONTRACT FOR INFORMATION REGARDING DRAINAGE PATTERNS, APPROXIMATE SLOPES ANTICIPATED BEFORE AND AFTER MAJOR GRADING ACTIVITIES, LOCATIONS WHERE VEHICLES ENTER OR EXIT THE SITE AND CONTROLS TO PREVENT OFF SITE SEDIMENT TRACKING (TO BE ADDED AFTER CONTRACTOR IDENTIFIES LOCATIONS), AREAS OF SOIL DISTURBANCE, THE LOCATION OF MAJOR STRUCTURAL AND NON-STRUCTURAL CONTROLS IDENTIFIED IN THE PLAN, THE LOCATION OF AREAS WHERE STABILIZATION PRACTICES ARE EXPECTED TO OCCUR, SURFACE WATERS (INCLUDING WETLANDS) AND LOCATIONS WHERE STORM WATER IS DISCHARGED TO SURFACE WATER INCLUDING WETLANDS.
- J. THE FOLLOWING IS A LIST OF RECEIVING WATER(S) AND THE ULTIMATE RECEIVING WATER(S), AND AERIAL EXTENT OF WETLAND ACREAGE AT THE SITE. THE LOCATION OF THE RECEIVING WATERS CAN BE FOUND ON THE EROSION AND SEDIMENT CONTROL PLANS:

CANTEEN CREEK AND A DRAINAGE DITCH THAT EMPTIES INTO THE WENDELL BRANCH OF SILVER CREEK. NO WETLANDS ARE PRESENT ON THIS PROJECT SITE.

K. THE FOLLOWING POLLUTANTS OF CONCERN WILL BE ASSOCIATED WITH THIS CONSTRUCTION PROJECT: (CHECK ALL THAT APPLY)

☐ PETROLEUM (GAS, DIESEL, OIL, KEROSENE, HYDRAULIC OIL/FLUIDS) SOIL SEDIMENT ☐ CONCRETE CI ANTIFREEZE / COOL ANTS CONCRETE TRUCK WASTE ☐ WASTE WATER FROM CLEANING CONSTRUCTION EQUIPMENT OTHER (SPECIFY)_____ ☐ CONCRETE CURING COMPOUNDS ☐ SOLID WASTE DEBRIS □ OTHER (SPECIFY)_____ ☐ PAINTS OTHER (SPECIFY) OTHER (SPECIFY)_____ ☐ SOLVENTS ☐ FERTILIZERS / PESTICIDES □ OTHER (SPECIFY)__

II. CONTROL

THIS SECTION OF THE PLAN ADDRESSES THE CONTROLS THAT WILL BE IMPLEMENTED FOR EACH OF THE MAJOR CONSTRUCTION ACTIVITIES DESCRIBED IN I.C. ABOVE AND FOR ALL USE AREAS, BORROW SITES, AND WASTE SITES. FOR EACH MEASURE DISCUSSED, THE CONTRACTOR WILL BE RESPONSIBLE FOR ITS IMPLEMENTATION AS INDICATED. THE CONTRACTOR SHALL PROVIDE TO THE RESIDENT ENGINEER A PLAN FOR THE IMPLEMENTATION OF THE MEASURES INDICATED. THE CONTRACTOR, AND SUBCONTRACTORS, WILL NOTIFY THE RESIDENT ENGINEER OF ANY PROPOSED CHANGES, MAINTENANCE, OR MODIFICATIONS TO KEEP CONSTRUCTION ACTIVITIES COMPLIANT WITH THE PERMIT. EACH SUCH CONTRACTOR HAS SIGNED THE REQUIRED CERTIFICATION ON FORMS WHICH WILL BE PROVIDED AT THE PRE-CONSTRUCTION CONFERENCE, AND ARE A PART OF, THIS PLANS

SCALE:

A. EROSION AND SEDIMENT CONTROL

- 1. STABILIZED PRACTICES: PROVIDED BELOW IS A DESCRIPTION OF INTERIM AND PERMANENT STABILIZATION PRACTICES, INCLUDING SITE SPECIFIC SCHEDULING OF THE IMPLEMENTATION OF THE PRACTICES. SITE PLANS WILL ENSURE THAT EXISTING VECETATION IS PRESERVED WHERE ATTAINABLE AND DISTURBED PORTIONS OF THE SITE WILL BE STABILIZED. STABILIZATION PRACTICES MAY INCLUDE BUT ARE NOT LIMITED TO: TEMPORARY SEEDING, PERMANENT SEEDING, MULCHING, GEOTEXTILES, SODDING, VEGETATIVE BUFFER STRIPS, PROTECTION OF TREES, PRESERVATION OF MATURE VEGETATION, AND OTHER APPROPRIATE MEASURES. EXCEPT AS PROVIDED BELOW IN II(A)(I/A) AND II(A)(3), STABILIZATION MEASURES SHALL BE INITIATED AS SOON AS PRACTICABLE IN PORTIONS OF THE SITE WHERE CONSTRUCTION ACTIVITIES HAVE TEMPORARILY OR PERMANENTLY CEASED, BUT IN NO CASE MORE THAN 14 DAYS AFTER THE CONSTRUCTION ACTIVITY IN THAT PORTION OF THE SITE HAS TEMPORARILY OR PERMANENTLY CEASED, ON ALL DISTURBED PORTIONS OF THE SITE WHERE CONSTRUCTION WILL NOT OCCUR FOR A PERIOD OF 21 OR MORE CALENDAR DAYS.
- d. WHERE THE INITIATION OF STABILIZATION MEASURES BY THE 14TH DAY AFTER CONSTRUCTION ACTIVITY TEMPORARILY OR PERMANENTLY CEASES IS PRECLUDED BY SNOW COVER, STABILIZATION MEASURES SHALL BE INITIATED AS SOON AS PRACTICABLE THEREAFTER.

THE FOLLOWING STABILIZATION PRACTICES WILL BE USED FOR THIS PROJECT: (CHECK ALL THAT APPLY)

☐ PRESERVATION OF MATURE VEGETATION	☑ EROSION CONTROL BLANKET / MULCHING
☐ VEGETATED BUFFER STRIPS	☐ SODDING
☐ PROTECTION OF TREES	☐ GEOTEXTILES
☑ TEMPORARY EROSION CONTROL SEEDING	☐ OTHER (SPECIFY)
☐ TEMPORARY TURF (SEEDING, CLASS 7)	□ OTHER (SPECIFY)
☐ TEMPORARY MULCHING	☐ OTHER (SPECIFY)
☑ PERMANENT SEEDING	□ OTHER (SPECIFY)

DESCRIBE HOW THE STABILIZATION PRACTICES LISTED ABOVE WILL BE UTILIZED:

TEMPORARY EROSION CONTROL SEEDING--THIS WILL BE APPLIED TO ALL BARE AREAS, AS DETERMINED BY THE ENGINEER, TO MINIMIZE THE AMOUNT OF EXPOSED SURFACE AREA.

PERMANENT SEEDING--SEEDING, CLASS 2, WILL BE INSTALLED PER IDOT SPECIFICATIONS.

MULCHING--MULCH WILL BE APPLIED WHEN THE PERMANENT SEEDING IS DONE, EROSION CONTROL BLANKET WILL NOT BE NEEDED.

2. STRUCTURAL PRACTICES: PROVIDED BELOW IS A DESCRIPTION OF STRUCTURAL PRACTICES THAT WILL BE IMPLEMENTED, TO THE DEGREE ATTAINABLE, TO DIVERT FLOWS FROM EXPOSED SOILS, STORE FLOWS OR OTHERWISE LIMIT RUNOFF AND THE DISCHARGE OF POLLUTANTS FROM EXPOSED AREAS OF THE SITE. SUCH PRACTICES MAY INCLUDE BUT ARE NOT LIMITED TO: PERIMETER EROSION BARRIER, EARTH DIKES, DRAINAGE SWALES, SEDIMENT TRAPS, DITCH CHECKS, SUBSURFACE DRAINS, PIPE SLOPE DRAINS, LEVEL SPREADERS, STORM DRAIN INLET PROTECTION, ROCK OUTLET PROTECTION, REINFORCED SOIL RETAINING SYSTEMS, GABIONS, AND TEMPORARY OR PERMANENT SEDIMENT BASINS. THE INSTALLATION OF THESE DEVICES MAY BE SUBJECT TO SECTION 404 OF THE CLEAN WATER ACT.

THE FOLLOWING STRUCTURAL PRACTICES WILL BE USED FOR THIS PROJECT: (CHECK ALL THAT APPLY)

☐ PERIMETER EROSION BARRIER	□ ROCK OUTLET PROTECTION
☐ TEMPORARY DITCH CHECK	☑ RIPRAP
☐ STORM DRAIN INLET PROTECTION	☐ GABIONS
☐ SEDIMENT TRAP	☐ SLOPE MATTRESS
☐ TEMPORARY PIPE SLOPE DRAIN	☐ RETAINING WALLS
☐ TEMPORARY SEDIMENT BASIN	☐ SLOPE WALLS
☐ TEMPORARY STREAM CROSSING	☐ CONCRETE REVETMENT MATS
☐ STABILIZED CONSTRUCTION EXITS	☐ LEVEL SPREADERS
☐ TURF REINFORCEMENT MATS	☐ OTHER (SPECIFY)
☐ PERMANENT CHECK DAMS	☐ OTHER (SPECIFY)
☐ PERMANENT SEDIMENT BASIN	OTHER (SPECIFY)
☐ AGGREGATE DITCH	□ OTHER (SPECIFY)
CT PAVED DITCH	CLOTHER (SPECIFY)

DESCRIBE HOW THE STRUCTURAL PRACTICES LISTED ABOVE WILL BE UTILIZED:

RIPRAP--ON THE RIGHT SIDE OF NORTHBOUND LANES AT THE MARYVILLE WEIGH STATION, APPROXIMATELY 260 SQUARE YARDS OF STONE RIPRAP WILL BE USED AS AN EROSION CONTROL TO LIMIT PRE-EXISTING SOIL EROSION PROBLEMS NOT RELATED TO THE SAFETY IMPROVMENTS THAT ARE PART OF THIS PROJECT. FILTER FABRIC WILL BE INSTALLED UNDER THE STONE RIPRAP.

• 60-(7,8,9,10)RS, 60-(8,9,10)Bf

COUNTY | TOTAL | SHEET | SHEET | NO.

MADISON 150

CONTRACT NO. 76A73

STATE OF ILLINOIS
DEPARTMENT OF TRANSPORTATION