

Local Public Agency Formal Contract Proposal

PROPOSAL SUBMITTED BY

Contractor's Name

			Street		P.O. Box
			City	State	Zip Code
O.T.	ATE OF 11	LLINOIC	Oity	Otato	Zip Gode
	ATE OF II				
COUNTY OF	CHAMP.	AIGN OWNSHIP			
(Name of City					
FOR ¹					
FOR THE IMPROVEMENT OF STREET NAME OR ROUTE NO. TR 251					
SECTION NO.		1-00-BR			
TYPES OF FUNDS			ECT		
SPECIFICATIONS (required)	u irod)				
△ SPECIFICATIONS (required) △ PLANS (rec	luirea)				
For Municipal Projects			Department of Tran	sportation	
Submitted/Approved/Passed			Released for bid based	on limited revi	ew
			Regional Engin		
☐ Mayor ☐ President of Board of Trustees ☐ Municipal Official	aı		Regional Engin	eer	
Date			Date		
For County and Road District Projects					
Submitted/Approved					
Highway Commissioner					
• •					
Date					
Submitted/Approved					
County Engineer/Superintendent of Highways	_				
Date					

Note: All proposal documents, including Proposal Guaranty Checks or Proposal Bid Bonds, should be stapled together to prevent loss when bids are processed.

County	CHAMPAIGN
Local Public Agency	TOLONO TOWNSHIP
Section Number	19-29081-00-BR
Route	TR 251

NOTICE TO BIDDEPS	<u> </u>	
NOTICE TO BIDDERS	Section Number	19-29081-00-BR
	Route	TR 251
Sealed proposals for the improvement described below will be rece	ived at the office of Count	y Engineer,
1605 E. Main Street, Urbana, IL 61802	until10:00 AM	on
Address	Time	Date
Sealed proposals will be opened and read publicly at the office of	County Engineer	
1605 E. Main Street, Urbana, IL 618026	at 10:00 AM	on
Address	Time	Date
DESCRIPTION O	F WORK	
Name TR 251 over Two Mile Slough	Length:540.0	00_ feet (0.10 miles)
Location Tolono Township		
Proposed Improvement Remove existing bridge and replace with a sin	ngle-span tub girder bridge	
on concrete pile bent abutments and other collateral work.		
Plans and proposal forms will be available in the office of	nty Engineer	
1605 E. Main Street, U	Jrbana, IL 618026	
Addres	SS	

2. Prequalification

If checked, the 2 low bidders must file within 24 hours after the letting an "Affidavit of Availability" (Form BC 57), in duplicate, showing all uncompleted contracts awarded to them and all low bids pending award for Federal, State, County, Municipal and private work. One original shall be filed with the Awarding Authority and one original with the IDOT District Office.

- 3. The Awarding Authority reserves the right to waive technicalities and to reject any or all proposals as provided in BLRS Special Provision for Bidding Requirements and Conditions for Contract Proposals.
- 4. The following BLR Forms shall be returned by the bidder to the Awarding Authority:
 - a. BLR 12200: Local Public Agency Formal Contract Proposal
 - b. BLR 12200a Schedule of Prices
 - c. BLR 12230: Proposal Bid Bond (if applicable)
 - d. BLR 12325: Apprenticeship or Training Program Certification (do not use for federally funded projects)
 - e. BLR 12326: Affidavit of Illinois Business Office
- 5. The quantities appearing in the bid schedule are approximate and are prepared for the comparison of bids. Payment to the Contractor will be made only for the actual quantities of work performed and accepted or materials furnished according to the contract. The scheduled quantities of work to be done and materials to be furnished may be increased, decreased or omitted as hereinafter provided.
- Submission of a bid shall be conclusive assurance and warranty the bidder has examined the plans and understands all requirements for the performance of work. The bidder will be responsible for all errors in the proposal resulting from failure or neglect to conduct an in depth examination. The Awarding Authority will, in no case be responsible for any costs, expenses, losses or changes in anticipated profits resulting from such failure or neglect of the bidder.
- 7. The bidder shall take no advantage of any error or omission in the proposal and advertised contract.
- If a special envelope is supplied by the Awarding Authority, each proposal should be submitted in that envelope furnished by the Awarding Agency and the blank spaces on the envelope shall be filled in correctly to clearly indicate its contents. When an envelope other than the special one furnished by the Awarding Authority is used, it shall be marked to clearly indicate its contents. When sent by mail, the sealed proposal shall be addressed to the Awarding Authority at the address and in care of the official in whose office the bids are to be received. All proposals shall be filed prior to the time and at the place specified in the Notice to Bidders. Proposals received after the time specified will be returned to the bidder unopened.
- Permission will be given to a bidder to withdraw a proposal if the bidder makes the request in writing or in person before the time for opening proposals.

PROPOSAL

specified in the Schedule for Multiple Bids below.

 County
 CHAMPAIGN

 Local Public Agency
 TOLONO TOWNSHIP

 Section Number
 19-29081-00-BR

 Route
 TR 251

1.	Proposal of
	for the improvement of the above section by the construction of removal of existing subject structure over Two Mile Slough
	and replace with a single-span tub girder bridg at Sta. 10+00. Beginning at Sta. 7+30 and
	ending at Sta. 12+70.
	a total distance of540.00 feet, of which a distance of540.00 feet, (0.102 miles) are to be improved.
2.	The plans for the proposed work are those prepared by WHKS & Co.,3695 6th St Frontage Rd West, Suite A Spfld
	and approved by the Department of Transportation on
3.	The specifications referred to herein are those prepared by the Department of Transportation and designated as "Standard Specifications for Road and Bridge Construction" and the "Supplemental Specifications and Recurring Special Provisions" thereto, adopted and in effect on the date of invitation for bids.
4.	The undersigned agrees to accept, as part of the contract, the applicable Special Provisions indicated on the "Check Sheet for Recurring Special Provisions" contained in this proposal.
5.	The undersigned agrees to complete the work within 35 working days or by unless additional time is granted in accordance with the specifications.
6.	A proposal guaranty in the proper amount, as specified in BLRS Special Provision for Bidding Requirements and Conditions for Contract Proposals, will be required. Bid Bonds will be allowed as a proposal guaranty. Accompanying this proposal is either a bid bond if allowed, on Department form BLR 12230 or a proposal guaranty check, complying with the specifications, made payable to:
	Champaign County Treasurer of
	The amount of the check is().
7.	In the event that one proposal guaranty check is intended to cover two or more proposals, the amount must be equal to the sum of the proposal guaranties, which would be required for each individual proposal. If the proposal guaranty check is placed in another proposal, it will be found in the proposal for: Section Number
8.	The successful bidder at the time of execution of the contract be required to deposit a contract bond for the full amount of the award. When a contract bond is not required, the proposal guaranty check will be held in lieu thereof. If this proposal is accepted and the undersigned fails to execute a contract and contract bond as required, it is hereby agreed that the Bid Bond or check shall be forfeited to the Awarding Authority.
9.	Each pay item should have a unit price and a total price. If no total price is shown or if there is a discrepancy between the product of the unit price multiplied by the quantity, the unit price shall govern. If a unit price is omitted, the total price will be divided by the quantity in order to establish a unit price.
10.	A bid will be declared unacceptable if neither a unit price nor a total price is shown.
11.	The undersigned submits herewith the schedule of prices on BLR 12200a covering the work to be performed under this contract.
12.	The undersigned further agrees that if awarded the contract for the sections contained in the combinations on

BLR 12200a, the work shall be in accordance with the requirements of each individual proposal for the multiple bid



SCHEDULE OF PRICES

Schedule for Multiple Bids

Combination Letter	Sections Included in Combinations	Total

Schedule for Single Bid

(For complete information covering these items, see plans and specifications)

Bidder's Proposal for making Entire Improvements

Item No.	Items	Unit	Quantity	Unit Price	Total
1	EARTH EXCAVATION	CU YD	82		
2	CHANNEL EXCAVATION	CU YD	260		
3	FURNISHED EXCAVATION	CU YD	821		
4	TEMPORARY EROSION CONTROL SEEDING	POUND	84		
5	TEMPORARY DITCH CHECKS	FOOT	16		
6	INLET AND PIPE PROTECTION	EACH	4		
7	AGGREGATE BASE COURSE, TYPE B	TON	511		
8	AGGREGATE SHOULDERS, TYPE B	TON	181		
9	REMOVAL OF EXISTING STRUCTURES	EACH	1		
10	PIPE CULVERT REMOVAL	FOOT	123		
11	STRUCTURE EXCAVATION	CU YD	78		
12	CONCRETE STRUCTURES	CU YD	25		
13	REINFORCEMENT BARS, EPOXY COATED	POUND	3030		
14	FURNISHING METAL SHELL PILES 12" X 0.250"	FOOT	315		
15	DRIVING PILES	FOOT	315		
16	TEST PILE METAL SHELLS	EACH	1		
17	NAME PLATES	EACH	1		
18	PIPE CULVERTS, CLASS D, TYPE 1 18"	FOOT	40		
19	PIPE CULVERTS, CLASS D, TYPE 1 24"	FOOT	46		
20	GEOCOMPOSITE WALL DRAIN	SQ YD	40.1		
21	CONTROLLED LOW-STRENGTH MATERIAL	CU YD	56.7		
22	PIPE DRAINS 15"	FOOT	40		
23	TERMINAL MARKER - DIRECT APPLIED	EACH	4		
24	SEEDING, CLASS 2 (SPECIAL)	ACRE	0.5		
25	TRAF CONT-PROT BLR 21	L SUM	1		
26	GROUTED RIPRAP	SQ YD	560		
27	ERECTING SUPERSTRUCTURE	L SUM	1		
28	MGS RAILING	FOOT	114		
29	CONCRETE CUT-OFF WALL	CU YD	5.3		
30	BRIDGE DECK THIN POLYMER OVERLAY 3/8"	SQ YD	169		
31	PIPE UNDERDRAINS FOR STRUCTURES 4"	FOOT	109		

CONTRACTOR CERTIFICATIONS

 County
 CHAMPAIGN

 Local Public Agency
 TOLONO TOWNSHIP

 Section Number
 19-29081-00-BR

 Route
 TR 251

The certifications hereinafter made by the bidder are each a material representation of fact upon which reliance is placed should the Department enter into the contract with the bidder.

- 1. **Debt Deliquency.** The bidder or contractor or subcontractor, respectively, certifies that it is not delinquent in the payment of any tax administered by the Department of Revenue unless the individual or other entity is contesting, in accordance with the procedures established by the appropriate revenue Act, its liability for the tax or the amount of tax. Making a false statement voids the contract and allows the Department to recover all amounts paid to the individual or entity under the contract in a civil action.
- 2. **Bid-Rigging or Bid Rotating.** The bidder or contractor or subcontractor, respectively, certifies that it is not barred from contracting with the Department by reason of a violation of either 720 ILCS 5/33E-3 or 720 ILCS 5/33E-4.

A violation of Section 33E-3 would be represented by a conviction of the crime of bid-rigging which, in addition to Class 3 felony sentencing, provides that any person convicted of this offense or any similar offense of any state or the United States which contains the same elements as this offense shall be barred for 5 years from the date of conviction from contracting with any unit of State or local government. No corporation shall be barred from contracting with any unit of State or local government as a result of a conviction under this Section of any employee or agent of such corporation if the employee so convicted is no longer employed by the corporation and: (1) it has been finally adjudicated not guilty or (2) if it demonstrates to the governmental entity with which it seeks to contract and that entity finds that the commission of the offense was neither authorized, requested, commanded, nor performed by a director, officer or a high managerial agent in behalf of the corporation.

A violation of Section 33E-4 would be represented by a conviction of the crime of bid-rotating which, in addition to Class 2 felony sentencing, provides that any person convicted of this offense or any similar offense of any state or the United States which contains the same elements as this offense shall be permanently barred from contracting with any unit of State or local government. No corporation shall be barred from contracting with any unit of State or local government as a result of a conviction under this Section of any employee or agent of such corporation if the employee so convicted is no longer employed by the corporation and: (1) it has been finally adjudicated not guilty or (2) if it demonstrates to the governmental entity with which it seeks to contract and that entity finds that the commission of the offense was neither authorized, requested, commanded, nor performed by a director, officer or a high managerial agent in behalf of the corporation.

- 3. **Bribery.** The bidder or contractor or subcontractor, respectively, certifies that it has not been convicted of bribery or attempting to bribe an officer or employee of the State of Illinois or any unit of local government, nor has the firm made an admission of guilt of such conduct which is a matter of record, nor has an official, agent, or employee of the firm committed bribery or attempted bribery on behalf of the firm and pursuant to the direction or authorization of a responsible official of the firm.
- 4. **Interim Suspension or Suspension.** The bidder or contractor or subcontractor, respectively, certifies that it is not currently under a suspension as defined in Subpart I of Title 44 Subtitle A Chapter III Part 6 of the Illinois Administrative Code. Furthermore, if suspended prior to completion of this work, the contract or contracts executed for the completion of this work may be cancelled.

County <u>CHAMPAIGN</u>

SIGNATURES	Local Public Agency	TOLONO TOWNSHIP
SIGNATURES	Section Number	19-29081-00-BR
	Route	TR 251
(If an individual)		
Signature of Bidder __		
Business Address _		
(If a partnership) Firm Name		
Signed By _		
Business Address _		
-		
Inset Names and Addressed of All Partners		
(If a corporation)		
Signed By _	D	resident
Business Address _		
<u>-</u>		
President _		
Insert Names of Officers Secretary		
Insert Names of Officers President _ Secretary _ Treasurer _		
Attest:		
Secretary		



Local Agency Proposal Bid Bond

			Route	TR 251
			County	CHAMPAIGN
	RETURN WITH	BID	Local Agency	TOLONO TOWNSHIP
			Section	19-29081-00-BR
WE	PAPER I			as PRINCIPAL,
				0.105777
are held jointly, severally and firmly be the amount specified in the proposal executors, administrators, successor	documents in effect on the date of	invitation for bid	ls whichever is the lesser su	
WHEREAS THE CONDITION OF through its awarding authority for the		,		itting a written proposal to the LA acting
	ard enter into a formal contract, fur all as provided in the "Standard Spe	nish surety guar ecifications for F	anteeing the faithful perform Road and Bridge Construction	signated section and the PRINCIPAL nance of the work, and furnish evidence n" and applicable Supplemental
		shall immediate		any requirements set forth in the full penal sum set out above, together
IN TESTIMONY WHEREOF, the	said PRINCIPAL and the said SUR	ETY have cause	ed this instrument to be sign	ed by their
respective officers this	day of		_	
		Principal		
(Company	Name)		(Com	pany Name)
Ву:		Ву:		
·	ure and Title)	,	(Signat	ure and Title)
(If PRINCIPLE is a joint venture o	f two or more contractors, the comp	oany names, an	d authorized signatures of e	ach contractor must be affixed.)
		Surety		
		Ву:		
(Name of S	Surety)		(Signature o	f Attorney-in-Fact)
STATE OF ILLINOIS,				
COUNTY OF	, a Not	arv Public in a	nd for said county	
I do hereby certify that	, a Not	ary r abile irra	ind for said obuilty,	
	(Insert names	of individuals signi	ing on behalf of PRINCIPAL & S	URETY)
who are each personally known to m SURETY, appeared before me this d voluntary act for the uses and purpos	lay in person and acknowledged re			
Given under n	ny hand and notarial seal this		day of	
My commission expires			(Notary F	Public)
	FI FCTR	ONIC BID BO	` •	-ubile)
Electronic bid bond is allow The Principal may submit an ele an electronic bid bond ID code a the Principal and Surety are firm venture of two or more contractor contractor in the venture.) Electronic Bid Bond ID Code	wed (box must be checked by ctronic bid bond, in lieu of comp nd signing below, the Principal ly bound unto the LA under the	/ LA if electro bleting the abo is ensuring the conditions of ode, company/	onic bid bond is allowed ove section of the Propos e identified electronic bid the bid bond as shown a	al Bid Bond Form. By providing bond has been executed and bove. (If PRINCIPAL is a joint

(Signature and Title)

Date



Apprenticeship or Training Program Certification

		Return with Bid		Route County	TR 251 CHAMPAIGN
				Local Agency	TOLONO TOWNSHIP
				Section	19-29081-00-BR
All co	ontractors	s are required to con	nplete the foll	owing certificati	on:
⊠ For	this contra	ct proposal or for all gro	oups in this deliv	er and install propo	osal.
□ For	the followi	ng deliver and install gro	oups in this mate	erial proposal:	
require approv require (1) app (2) app	es this cont val by the D es all bidde proved by a	tract to be awarded to the Department. In addition are and all bidders' subcound registered with the Uthe work of the above in	ne lowest respor to all other respontractors to dis Jnited States De	nsive and responsib consibility factors, the close participation epartment of Labor'	e provisions of the Illinois Highway Code, ble bidder. The award decision is subject to his contract or deliver and install proposal in apprenticeship or training programs that are is Bureau of Apprenticeship and Training, and refore, all bidders are required to complete the
I.	individua		rogram, in an ap	proved apprentices	certifies that it is a participant, either as an ship or training program applicable to each rees.
II.	submitted or trainin	d for approval either (A) g program; or (B) will, pr	is, at the time o	f such bid, participa cement of performa	y subcontract that each of its subcontractors ating in an approved, applicable apprenticeship nce of work pursuant to this contract, establish licable to the work of the subcontract.
III.	sponsor participal subcontr	holding the Certificate of nt and that will be perfor acted shall be included a	f Registration fo med with the bi and listed as su	r all of the types of dder's employees. bcontract work. Th	certifies the official name of each program work or crafts in which the bidder is a Types of work or craft that will be list shall also indicate any type of work or training program available.

	contract or deliver and install proposal solely by individual whom the payment of prevailing rates of wages wou owner/operator workforce and positions of ownerships and positions of ownerships and positions of ownerships are the contract of the payment of the p	ld be require	
certificat and shallisted. T Certificat and any applicab	uirements of this certification and disclosure are a mation provision to be included in all approved subcontrol II make certain that each type of work or craft job cato The Department at any time before or after award matter of Registration issued by the United States Depart or all of its subcontractors. In order to fulfill the particle program sponsor be currently taking or that it will the performance of the work of this contract or deliver	racts. The begory that was require the tment of Labicipation require applica	idder is responsible for making a complete report vill be utilized on the project is accounted for and a production of a copy of each applicable por evidencing such participation by the contractor uirement, it shall not be necessary that any tions for apprenticeship, training or employment
Bidder:		By: Title:	(Signature)

Except for any work identified above, any bidder or subcontractor that shall perform all or part of the work of the

IV.



Affidavit of Illinois Business Office

		County	CHAMPAIGN
		Local Public Agency	TOLONO TOWNSHIP
		Section Number	19-29081-00-BR
		Route	TR 251
State	of)		
Coun	,		
I,	(Name of Affiant)	(City of Affiant)	(State of Affiant
being	first duly sworn upon oath, states as follows:		
•	•	of	
•••	That I am the officer or position		bidder
2.	That I have personal knowledge of the facts he	erein stated.	
3.	That, if selected under this proposal,		, will maintain a
		(bidder)	
bu	siness office in the State of Illinois which will be	located in	County, Illinois.
4.	That this business office will serve as the prima construction contemplated by this proposal.	ary place of employment	for any persons employed in the
5.	That this Affidavit is given as a requirement of separate Procurement Code.	state law as provided in S	Section 30-22(8) of the Illinois
			(Signature)
			(Print Name of Affiant)
This i	nothing out was a sky suited and hafers are an		
11115 1	nstrument was acknowledged before me on	day of	, ·
(SEA	L)		
			(Signature of Notary Public)

Printed 3/3/2020 BLR 12326 (01/08/14)

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SPECIAL PROVISIONS

CONTRACT SPECIFICATIONS

The following Special Provisions supplement the "Standard Specifications for Road and Bridge Construction", adopted April 1, 2016; the latest edition of the "Illinois Manual of Uniform Traffic Control Devices for Streets and Highways" and the "Manual of Test Procedures for Materials" in effect on the date of invitation for bids, and the Supplemental Specifications adopted January 1, 2020 and the Recurring Special Provisions indicated on the Check Sheet included herein which apply to and govern the construction of TR 251 (820E, 800N) over Two Mile Slough in Champaign County, Section 19-29081-00-BR, and in case of conflict with any part, or parts, of said specifications, the Special Provisions shall take precedence and shall govern.

DESCRIPTION OF WORK

The work included in this contract consists of: (1) The complete removal and replacement of the existing single-span structure, (2) Aggregate Base Course approach roadway, (3) Grouted Riprap with filter fabric and (4) Seeding and other collateral work necessary to complete the improvement in accordance with the plans and as specified herein.

START OF CONSTRUCTION

The Contractor shall not start construction activities prior to April 1, 2021.

PREVAILING WAGE

The Contractor, for this work, will pay prevailing wages in accordance with the Illinois Revised Statutes and any applicable Federal Laws.

PROJECT MAINTENANCE

Should the County determine that an unsafe condition exists within the scope of this project; the County will attempt to contact the Contractor to resolve the unsafe condition. However, if the County is unable to contact the Contractor's designated representative or if the Contractor fails to respond within a four (4) hour period, the County may perform the necessary operations and the cost for time and materials will be deducted from the contract.

CONTRACTOR AVAILABILITY

At all times when work is being performed (by Contractor or subcontractor), the prime Contractor shall have on the job site someone in his/her direct employ who is capable of meeting with the Engineer and making decisions. If authorized by the Engineer, this condition may be satisfied by

having a telephone number of someone who satisfies the above requirements.

CONTRACTOR RESPONSIBILITY

The contract plans indicate the location and elevations of the proposed work. Minor changes in the locations and elevations may be directed by the Engineer. Minor changes requested by the Engineer will be made without additional compensation to the Contractor.

Any inconveniences, delays or additional expenses incurred by the Contractor in complying with Special Provisions shall not be a basis for additional payment, and shall be considered included in the contract.

UTILITIES

The Contractor shall take all precautions necessary to protect the property of the various public and private utilities which may be located underground or above ground, at or adjacent to the site of this improvement. The Contractor shall repair or replace at his/her own expense, or bear the cost to repair or replace, any utility property that has been damaged through his/her actions. The procedures and specifications of repair will be in accordance with the regulation of and/or policy of the affected utility.

The adjustment and/or relocation of the private utilities will be the responsibility of the utility companies involved. It is possible that such adjustments may be underway during the construction of this contract. In such an event, the Contractor shall cooperate with the various agencies involved in accordance with Article 105.07 of the Standard Specifications.

The Contractor's attention is directed to the fact that there exists within the State of Illinois Joint Utility Locating Information for Excavators (J.U.L.I.E.) System. All utility companies and municipalities, which have gas mains, and a number of others, are a part of this system.

The Contractor shall contact the Joint Utility Locating Information for Excavators System (J.U.L.I.E.) (800) 892-0123 a minimum of forty-eight hours in advance of any excavation work. The political name of the township where the work is located, as shown on the cover sheet, along with other location information such as the land section and quarter section will be required by J.U.L.I.E. at the time of the call.

It is understood and agreed the Contractor has considered in his bid all the permanent and temporary utility appurtenances in their present or relocated positions.

STATUS OF UTILITIES

Name and Contact of Utility	Туре	Location	Estimated Date Relocation Complete
Eastern Illini Electric Cooperative 330 W. Ottawa PO Box 96 Paxton, IL 60957 Phone: 217-379-2131 Ext. 121 Contact: Brian J. Ronna	Overhead Power	North side	During Construction
J.U.L.I.E. 1-800-892-0123			

The above represents the best information of the Department and is included solely for the convenience of the bidder. The applicable provisions of Articles 105.07 and 107.20 of the Standard Specifications for Road and Bridge Construction shall apply.

The Contractor should notify the Engineer, in writing, of any utility adjustment or removal, which has not been completed as required for the Contractor's operations. A request, for an extension of time only, will be considered to the extent the Contractor's operations were affected.

PROTECTION AND RESTORATION OF TRAFFIC SIGNS

The work of this item shall be performed in accordance with Article 107.25 of the Standard Specifications and the following provisions:

Replace the second sentence in the second paragraph with the following:

Signs that are not to be re-erected shall become the property of the Champaign County and shall be stored in a secure location on the jobsite for removal by Township / County forces.

PIPE CULVERT REMOVAL

This work shall consist of the removal of the existing pipe culverts at locations shown on the plans and as directed by the Engineer, and shall be done in accordance with the applicable portions of Section 501 of the Standard Specifications.

The removal and disposal of existing concrete headwalls at locations shown on the plans and as directed by the engineer will not be measured and paid for separately but will be included in the cost of PIPE CULVERT REMOVAL for the pipe being removed.

Method of Measurement and Payment: This work shall be paid for at the contract unit price per FOOT for PIPE CULVERT REMOVAL, which price shall include all labor, equipment and materials

necessary to complete the work. No additional compensation will be allowed due to the various sizes, types, or lengths. The sizes, types and lengths shown in the plans are for information only and shall be verified by the contractor prior to bidding.

REMOVAL OF EXISTING STRUCTURES

The work for this item shall be performed in accordance with Section 501 of the Standard Specifications and as directed by the Engineer.

The existing structure to be removed consists of: a single span precast slab bridge on concrete stub abutments with timber lagging and wings. Removal of the existing structure shall include removal of all attached guardrail, signs and appurtenances. Additional payment will not be allowed.

The existing structures shall be disposed of by the Contractor, in accordance with all applicable State and Federal laws and at a site outside the Right-of-Way in accordance with Section 501 of the Standard Specifications.

The work for this item, including excavation and utility coordination, will not be paid for separately but shall be considered as included in the contract unit price per EACH for REMOVAL OF EXISTING STRUCTURES and no additional compensation will be allowed.

TEMPORARY STREAM CROSSING

Should the Contractor elect to construct a temporary stream crossing of any nature, the Contractor shall adhere to all applicable permit and certificate requirements and conditions as well as the conditions contained in Check Sheet Item 8 of the Illinois Department of Transportation Supplemental Specifications and Recurring Special Provisions adopted January 1, 2020.

No additional time will be allowed under the contract for the work of this item.

This work will not be paid for separately but shall be considered as included in the contract unit prices of the various pay items in the contract.

REMOVAL OF UNCLASSIFIED MATERIALS

Unclassified materials shall be removed at the locations shown on the plans or designated by the Engineer. The removed materials shall be disposed of outside the Right-Of-Way in accordance with Article 202.03 of the Standard Specifications and as directed by the Engineer.

This work will not be paid for separately but shall be considered as included in the contract unit price per CUBIC YARD for EARTH EXCAVATION.

GROUTED RIPRAP

Gradation: The gradation or size of the stone shall conform to gradation 3 of Article 281.04 of the Standard Specifications or to the following gradation or size:

	RANGE (PERCENT)	
<u>SIZE</u>	MAX. SIZE 150 LBS.	
50-150 Lbs. per piece	15 ± 7	
20-50	30 ± 15	
5- 20	40 ± 15	
Less than 5	15 ± 15	

Construction Method: Foundation preparation and placing shall be done in accordance with Articles 281.03 and 281.04 of the Standard Specifications. The riprap shall be a minimum of 18 inches thick and placed on filter fabric. A bedding layer will not be required. A cement grout shall be placed in such a manner as to form a stable mat between the individual stone riprap and pieces to a height of within one (1) inch to the top of the riprap. This grout shall consist of a mixture of Portland Cement, sand 5/8 inch (maximum size) pea gravel and water so proportioned and mixed to provide a readily workable slurry. The cement content of grout shall not be less than five (5) bags per cubic yard and the hardened grout shall have a minimum compressive strength of 2,000 pounds per square inch at 28 days. The estimated quantity of grout is one (1) cubic yard per twelve (12) square yards of riprap surface.

Basis of Payment: This work will be paid for at the contract unit price per ton for GROUTED RIPRAP, said price shall include all materials including excavation, filter fabric, grout and labor necessary to complete the work.

Filter Fabric. This work shall be done in accordance with Section 282 of the Standard Specifications. This work will be incidental to the cost of GROUTED RIPRAP, will not be measured for payment and no additional compensation will be allowed.

PIPE CULVERTS, CLASS D

This work shall be performed in accordance with Section 542 except as follows:

The pipe material shall be Corrugated Steel Culvert Pipe.

Add the following sentence to the sixth paragraph of Article 542.04(d): "All connecting bands shall be a minimum of 24."

Trench Backfill will not be measured and paid for separately but shall be included in the cost of the PIPE CULVERT, CLASS D if required.

This work shall be paid for at the contract unit price per FOOT for PIPE CULVERT, CLASS D for the size specified, which price shall include all labor, equipment and materials necessary to

complete the work.

SEEDING, CLASS 2 (SPECIAL)

The work shall be performed in accordance with Section 250 and 251 of the Standard Specifications and the following provisions.

Replace the third paragraph of Article 250.04 with the following:

"Fertilizer nutrients shall be applied at a rate of 420 lb of actual fertilizer nutrients per acre. The fertilizer shall be applied at the rate of 1:4:2 as follows:

Nitrogen Fertilizer Nutrients 60 lb/Ac Phosphorus Fertilizer Nutrients 240 lb/Ac Potassium Fertilizer Nutrients 120 lb/Ac

Revise the first sentence of the first paragraph of Article 1081.08 to read as follows:

"The fertilizer furnished shall be a ready mixed material having a ratio of (1-4-2)."

Revise the sixth sentence of the first paragraph of Article 250.06 to read as follows:

"When seed or fertilizer is applied with a hydraulic seeder the rate of application shall not be less than 570 gallons of slurry per acre."

Under Article 250.07 – Seeding Mixtures

For the purpose of this contract, no seeding will be permitted when the ground is frozen, wet or in any otherwise untillable condition.

Mulching seeded areas shall be performed in accordance with Article 251.03 (b) Method 2.

Revise Articles 250.10 and 251.06 so that the following applies:

This work shall be paid for at the contract unit price per acre for SEEDING, CLASS 2 (SPECIAL). The items of Mulch and Fertilizer Nutrients will not be paid for separately but shall be considered as included to the contract unit price per acre for SEEDING CLASS 2 (SPECIAL).

MEASUREMENTS OF GRANULAR MATERIALS

When any granular material is to be measured in tons in the plans or specifications, it will be mandatory for the Contractor to furnish truck scale tickets. All granular materials shall be weighed on certified scales.

Any costs incurred due to furnishing approved scales and weighing the various aggregates as described herein will not be paid for separately, but shall be considered as included in the contract unit price per ton for the various items in which the granular material is incorporated.

TRAFFIC CONTROL PLAN

Traffic Control shall be in accordance with the applicable sections of the Standard Specifications for Road and Bridge Construction, the applicable guidelines contained in the Illinois Manual on Uniform Traffic Control Devices for Streets and Highways, these special provisions, and any special details and Highway Standards contained herein and in the plans. Layout and maintenance of the traffic control devices shall be the responsibility of the Contractor. The appropriate traffic control devices shall be utilized for the various construction activities being performed by the Contractor.

Special attention is called to Articles 107.09 and 107.14 and Section 701 of the Standard Specifications for Road and Bridge Construction, other special provisions relating to traffic control and the following Highway Standards:

Standard 701901 Standard BLR-21

TR 251 (820E, 800N) shall be closed to all traffic at the east and west project limits. Local residents shall be allowed access in accordance with the provisions of Articles 107.09 and 107.14 of the Standard Specifications.

All advance warning signs shall be in new or like new condition at the start of the project.

The contractor shall be responsible for the condition and placement of traffic control devices at all times during construction activities and throughout shutdown periods.

Type III barricades conforming to Standard 701901 shall be erected pursuant to Standard BLR 21 and shall extend from shoulder break to shoulder break at the construction limits of the closed area as directed by the Engineer except that two (2) Type A Flashing Lights shall be located above each Type III barricade. Advance warning signs conforming to Standard 701901 shall be erected pursuant to Standard BLR 21 as directed by the Engineer except that One (1) Type A Flashing Light shall be located above each advance warning sign.

The Contractor shall be responsible for preventing public use of any temporary low water crossings.

This work will not be paid for separately but shall be considered in the contract unit price, LUMP SUM, for TRAFFIC CONTROL AND PROTECTION, STANDARD, BLR 21, which includes all labor, equipment and materials necessary to perform the work for the duration of the project.

STANDARDS IN THE PLANS

The standards with revision number listed on the cover sheet of the Plans shall hold precedence over revision numbers listed in these Special Provisions.

RIGHT-OF-WAY

Any fences, enclosures, buildings or other structures on the existing right-of-way shall be removed by the Contractor, as directed by the Engineer, and disposed of by the Contractor at his expense unless noted otherwise in the plans. This work shall be considered as included in the contract and no additional compensation shall be allowed.

If the Engineer directs the Contractor to construct any temporary or permanent fences or enclosures, the work shall be performed by agreed unit price or extra work in accordance with Article 109.04 of the Standard Specifications.

ROADWAY SCARIFICATION

This work consists of preparing the existing roadway surface transitioning from the existing section to the proposed typical section shown in the plans, as directed by the Engineer, according to the applicable portions of section 357 of the standard specification. Surface to be scarified and reshaped under this item consists of bituminous surface treatment as shown on the plans. This work will not be paid for separately but shall be included with EARTH EXCAVATION and no additional compensation will be allowed.

CONRETE CUT-OFF WALL

A three foot (3') deep by twelve inch (12") wide concrete cut-off wall shall be poured directly below the abutment cap as shown on the plans. After the abutment piles are driven, a three foot (3) deep by twelve inch (12") wide trench shall be excavated between piles and for the full length of the abutment cap directly below the excavation for the abutment cap. The wall shall be poured in the trench with the top elevation of the cut-off wall equal to the bottom elevation of the abutment cap. The concrete strength shall be greater than or equal to 3000 psi at 28 days.

Contract Quantities shall conform to Article 202.07(a) of the Standard Specifications. The concrete cut-off wall will be measured for payment and computed in cubic yards. The dimensions used will be those shown on the plans or ordered in writing by the Engineer. Increased quantities resulting from the Contractor's operations will not be measured for payment.

This work shall be paid for at the contract unit price per cubic yard for CONCRETE CUT-OFF WALL and no additional compensation will be allowed.

FURNISHING SUPERSTRUCTURE (FOR INFORMATION ONLY)

a. **Description.** This work shall consist of the design, load rating, fabrication, manufacture, and delivery of the prefabricated superstructure units that include galvanized steel Press Brake Formed Tub Girders (PBFTG), precast concrete deck panels and backwalls, mechanical connectors, grout, bearing assembly, and protective coat according to the plans, Illinois Department of Transportation (IDOT) Standard Specifications for Road and Bridge Construction (Standard Specifications), and the provisions contained herein. The individual superstructure units shall be manufactured and assembled at an off-site location so that the delivered product can be set in place and the deck and backwalls joined with closure pour

material to form a complete superstructure system. The individual, firm, partnership, joint venture, or corporation contracted with to supply the individual superstructure units is herein referred to as the Fabricator.

Submittals indicated herein to be sent to WHKS shall be sent to the following address with an allowance of 30 calendar days for review:

WHKS & Co. Attention: Mark Leighton, P.E. 3695 6th Street Frontage Road West, Suite A Springfield, IL 62703

b. Design. The Fabricator shall retain the services of an Illinois Licensed Structural Engineer (Fabricator's SE) to design and detail the prefabricated superstructure system in accordance with the AASHTO LRFD Bridge Design Specifications and IDOT Bridge Design Manual. The design live loading and allowance for future wearing surface shall be as indicated on the plans. The design shall be accompanied with all required plan details and may be part of the shop drawings.

The superstructure details indicated in the plans are conceptual and the Fabricator's SE may propose modifications and alternate configurations of the PBFTG. However the superstructure design must satisfy the bridge width, bridge deck cross slope, span length, concrete deck thickness, and not exceed the superstructure depth indicated in the plans.

The Fabricator's SE shall be responsible for the following design items:

1. PBFTG including determining material requirements and all dimensions and details including the need for any stiffeners, closure plates, etc. The PBFTG shall be designed to be composite with the concrete deck and include shear stud design. The slab may either be cast directly onto the PBFTG or precast and connected to the PBFTG with shear studs using formed holes filled with nonshrink grout. If used, properties for the nonshrink grout shall be specified. Covered access holes shall be provided in the PBFTG to allow future video inspection inside the beam.

When determining the capacity of the composite section, the top half inch of the bridge deck shall be considered sacrificial. In addition, the top of deck (prior to placement of the overlay) shall conform to the lines and grades indicated in the plans once the prefabricated superstructure units are erected. As such, consideration shall be given to dead load deflection and the need to camber the PBFTG or specifying other provisions for adjusting the top of bridge deck.

2. The reinforcement required in the bridge deck using the clear cover indicated in the plans. Reinforcement required for the precast backwall including attachment to the bridge deck is also included. A minimum clear cover of 2 inches shall be used for the precast backwall and the backwall shall extend vertically to the bottom of the top bearing plate. All reinforcement shall be epoxy coated.

- 3. The bridge deck and backwall reinforced joints used to join the individual units and form a complete superstructure system. The Bridge Deck Joint Detail shown in the plans with reinforcement extending into the joint is conceptual and shall be designed and proportioned by the Fabricator's SE. A similar joint shall be designed for the vertical backwall joints. The joints shall be cast in the field using a closure pour material determined and specified by the Fabricator's SE as part of the joint design. See Closure Pour Material special provision for additional information.
- 4. Bearings provided beneath each of the PBFTG and anchor bolts. The bearings shall consist of a steel top bearing plate connected to the PBFTG and lower steel reinforced elastomeric bearing pad. In addition, the top bearing plate shall be connected to the abutments with at least one anchor bolt on each side of each PBFTG. The abutments have been detailed assuming a total bearing height of 2 inches. If the total designed bearing height varies from 2 inches, the Fabricator's SE shall determine the necessary adjustment to the abutment details shown in the plans.
- 5. Bridge deck design for connection of the 31-inch Midwest Guardrail System Bridge Rail to the deck. The bridge rail system and deck design for the railing connection shall satisfy AASHTO TL-3 safety requirements. Certifications shall be provided indicating that the deck design and railing connection satisfies this requirement. The vertical posts for the bridge rail are required to be located outside of the bridge deck. Post spacing shall be specified in accordance with the railing requirements.
- 6. Determine and specify the lifting locations for setting the prefabricated units at the project site. Specify the lifting reactions and any rigging configuration assumed in the analysis. Any required temporary bracing that is needed to ensure stability of the erected individual prefabricated superstructure units until the bridge deck and backwall closure joints have been completed shall also be specified.

A lifting/handling analysis shall also be performed for the precast concrete components if not cast directly on the PBFTG. The lifting/handling analysis shall be in accordance with the latest edition of the Precast/Prestressed Concrete Institute Design Handbook.

Regardless of how the precast concrete components are constructed, any minimum concrete strength requirements that are necessary prior to handling or shipping shall be specified.

7. Verify that the designed beam reactions do not exceed the reactions indicated in the plans for the abutment design. If the indicated reactions are exceeded, verify the adequacy of the abutment design indicated in the plans or modify the abutment design as required. Calculations and plan details (2 copies) with the required seals shall be submitted to WHKS for review and approval. The submittal shall be made prior to ordering material or starting construction.

- **c. Rating.** The Fabricator's SE shall provide a Load Ratings submittal for the prefabricated bridge superstructure according to AASHTO Manual of Bridge Evaluation, Section 6, and IDOT Circular Letter 2017-16. The following ratings should be calculated:
 - 1. Design Vehicle (Inventory & Operating Rating Factors)
 - 2. Illinois Routine Permit Vehicles (Operating Rating Factor) See IDOT Structural Services Manual Figure 4.5-1
 - 3. Illinois Posting Vehicles (Operating Factor) See IDOT Structural Services Manual Figures 4.4-6 for Single Unit Vehicles & 4.4-7 for Combination Vehicles
 - 4. Emergency Vehicles (Operating Rating Factor with Single Lane Live Load Distribution Factor) EV2 and EV3 as indicated below:
 - Type EV2 single rear axle emergency vehicles Front Single Axle: 24,000 pounds Rear Single Axle: 33,500 pounds

Wheelbase: 15 ft

Type EV3 – tandem rear axle emergency vehicles

Front Single Axle: 24,000 pounds

Rear Tandem Axle: 62,000 pounds (two 31,000 pound axles spaced at 4 ft) Wheelbase: 17 ft (distance from front axle to the centerline of the rear

tandem axle)

Perform the above Load Ratings using as-designed conditions and assuming the future wearing surface has been placed. IDOT prefers that the rating be performed using the "AASHTOWare Bridge Rating Software". However if this is not an option, an Excel spreadsheet should be created that facilitates a rating check using the composite PBFTG flexural and shear capacities.

The items indicated below shall be submitted to the IDOT Local Bridge Unit using the following email address: DOT.LocalBridgeUnit@illinois.gov.

- SE Sealed Final Plans/As-Built Plans/Shop Drawings (each document should bear the seal of the SE responsible for the submitted item)
- Fabricator SE sealed Structure Load Rating Summary IDOT Form 2795
- AASHTOWare BrR Model input file (with .xml extension) or Excel spreadsheet

Note: The spreadsheet supplied to IDOT will need the option to account for future deterioration so that the reduced flexural and shear capacity can be calculated. IDOT also requires indicating the design live load distribution factors to facilitate the comparison of applied moments and shears for other live load configurations to the allowable moment and shear loading.

- Any other load rating documentation needed to clarify modeling and analysis of the composite PBFTG including but not limited to:
 - Analysis software models
 - Software output in pdf format
 - o Hand calculation in pdf format
 - Spreadsheets in pdf format
 - Any other supporting documentation in pdf format.

The rating information shall be submitted to IDOT after the design items and shop drawings have been approved. If structural modifications are made during construction that affect the load carrying capacity of the structure, revised rating information shall be submitted to IDOT.

d. Shop Drawings. Shop drawings shall be submitted according the applicable portions of 505.03, 509.04, and 1042.03(b) of the Standard Specifications. Shop drawings shall be submitted for all components of the prefabricated superstructure units including the PBFTG beams, precast deck and backwalls, and bearings (including anchor bolts). Shop drawings shall indicate all physical dimensions, methods of fabrication and manufacture not covered by the Standard Specifications, material properties, method of connecting the precast concrete elements to the PBFTG, lifting locations and rigging configuration limitations, and all relevant information pertaining to the method of joining the individual prefabricated bridge superstructure elements at the project site. Items required in the previous sections to be determined by the Fabricator's SE but not being supplied by the Fabricator shall be clearly noted in the shop drawings as being supplied by others. Submit 2 copies of the shop drawings to WHKS for review and approval. Shop drawings shall be sealed by the Fabricator's SE. Fabrication shall not begin until written approval of the shop drawings has been received from WHKS.

e. Materials.

- 1. Concrete. Concrete shall satisfy the minimum material requirements in Section 504 of the Standard Specifications.
- 2. Structural Steel and Fasteners. All structural steel for the PBFTG beams shall be AASHTO M 270, of the Grade specified by the Contractor's SE, in accordance with subsection 1006.04 of the Standard Specifications. The steel used to form the PBFTG shall conform to Impact Testing Requirement, Zone 2. Any required fasteners for the PBFTG shall be ASTM F 3125, Grade 325 Type 1. All structural steel for the PBFTG and fasteners shall be galvanized in accordance with the Hot Dip Galvanizing for Structural Steel special provision.

Structural steel and fasteners for the bridge railing shall be in accordance with material required for the AASHTO TL-3 safety rating. All steel components and fasteners for the bridge railing shall be galvanized in accordance with AASHTO M 111 and AASHTO M 232, as applicable.

- 3. Shear Studs. Shear connector studs shall be in accordance with subsections 505.08(m) and 1006.32 of the Standard Specifications.
- 4. Reinforcement Bars. Reinforcement shall be ASTM A 706 Grade 60 deformed steel reinforcement bars in accordance with Section 508 and subsection 1006.10 of the Standard Specifications. All reinforcement shall be epoxy coated.
- Anchor Bolts. Anchor bolts shall conform to the material requirements indicated in the plans or as indicated by the Fabricator's SE and the applicable portions of Article 521.06 of the Standard Specifications. Anchor bolts and components shall be galvanized in accordance with AASHTO M 111 AND AASHTO M 132 as applicable.
- 6. Nonshrink Grouts. Nonshrink grout material requirements shall be specified by the Fabricator's SE and chosen from IDOT's qualified product list.
- 7. Elastomeric Bearing Pad. Elastomeric bearing pads shall be in accordance with Section 1083 of the Standard Specifications.
- 8. Closure Pour Material. Transpo T 17, Kwik Bond PPC, Ductal Ultra High Performance Concrete or other similar material shall be specified by the Fabricator's SE for the closure pour material for the precast concrete bridge deck and backwall joints. See Closure Pour Material special provision for additional details. Any closure pour material requirements not covered by the special provision shall be specified by the Fabricator's SE.

f. Fabrication and Manufacture.

Fabrication and manufacture of the prefabricated superstructure units shall be in accordance with the Standard Specifications, plan details, and as specified herein.

1. The steel PBFTG shall be produced by a fabricator that has prior PBFTG experience and AISC Bridge Fabricator – Simple (SBR) certification. Evidence of certification and prior experience shall be provided upon request.

Fabrication shall be done in accordance with applicable portions of Section 505 of the Standard Specifications except as specified herein. Any required welding shall be done in the fabrication shop and clearly indicated in the shop drawings. No field welding will be allowed.

2. The manufacturer for the precast concrete elements shall be chosen from IDOT's Qualified Producer List of Certified Precast Concrete Producers. The precast concrete

elements shall be manufactured in accordance with applicable portions of Section 503 and 504 of the Standard Specifications, the approved shop drawings, and according to IDOT's latest Policy Memorandum "Quality Control/Quality Assurance Program for Precast Products".

The top surface finish of the bridge deck shall be suitable for application of the bridge deck thin polymer overlay at the project site. See Bridge Deck Thin Polymer Overlay special provision for surface preparation requirements. The shop drawings shall indicate the method that will be used for achieving the required surface finish.

3. Lifting/Handling, Storing, and Transporting/Shipping. In addition to all other requirements, precast concrete components and prefabricated bridge superstructure units shall be handled/lifted as specified by the Fabricator's SE and indicated in the shop drawings. Holes required for handling/lifting shall be cast and not drilled or cored. Shop drawings shall indicate holes to be filled with non-shrink, cementitious grout specified by the Fabricator's SE once the units are set in final position.

Except as specified herein, lifting/handling, storing, and transporting requirements shall be in accordance with applicable portions of Sections 504 and 505 of the Standard Specifications.

4. Protective Coat. A protective coat shall be applied to portions of the precast concrete surfaces of the prefabricated superstructure units prior to being shipped to the jobsite. See Precast Concrete Protective Coat (Special) special provision for details. The protective coat shall not be applied until the top surface finish of the bridge deck has been prepared in accordance with the requirements for the bridge deck thin polymer overlay.

Completed work includes all labor, equipment, and material necessary to design, fabricate, galvanize, manufacture, and deliver the prefabricated bridge superstructure units, along with any required modifications to the contract plans (design, plan details, quantities, and pay items) to accommodate the selected prefabricated unit. This work also includes furnishing elastomeric pads for the bridge bearings. Payment is limited to the quantity shown on the plans, or as approved by the Engineer. This pay item does not include installation of any kind at the project site.

The information provided in this special provision will not be paid for but is supplied to the Contractor to communicate the superstructure materials that will be provided by the Fabricator in coordination with Champaign County.

ERECTING SUPERSTRUCTURE

a. Description. This work shall consist of the responsibility of the Contractor to erect the prefabricated superstructure units delivered to the site and all associated work to form a complete superstructure system per the contract documents and approved shop drawings. This includes all labor and equipment necessary to furnish and install the anchor bolts and erect the prefabricated superstructure units and bearings. All labor, equipment, and material necessary to temporarily brace the erected individual prefabricated superstructure units, form and cast the bridge deck and backwall joints with closure pour material, and conduct the necessary trial batches and testing is also included. See Closure Pour Material special provision for additional information.

See shop drawings and Furnishing Superstructure special provision for information pertaining to prefabricated bridge superstructure units and bearings to be supplied by others. Anchor bolts shall be furnished and installed in accordance with Article 521.06 of the Standard Specifications. Anchor bolts shall be of the size and material indicated in the shop drawings.

Shipping coordination for the prefabricated bridge superstructure units shall be in accordance with applicable portions of Article 505.09 of the Standard Specifications. Erection shall be in accordance with applicable portions or Article 505.08 of the Standard Specifications except as mentioned herein. The rigging used to lift the individual prefabricated bridge superstructure units shall be in accordance with the approved shop drawings. The prefabricated superstructure units shall not be placed until they are inspected for damage at the jobsite by the Engineer. The units shall be inspected for damage again after being set in place and prior to installing forms for the bridge deck and backwall joints. Damage noted by the Engineer shall be repaired by the Contractor to the satisfaction of the Engineer at no additional cost to the project.

After completion of erection, nonshrink grout shall be furnished and cast into any formed holes provided in the bridge deck to accommodate rigging used to facilitate lifting the prefabricated bridge superstructure units. The nonshrink grout shall conform to the requirement listed in the shop drawings.

b. Basis of Payment. The completed work will be paid for at the contract unit price, LUMP SUM for ERECTING SUPERSTRUCTURE, which includes all labor, equipment, materials, and testing necessary to complete the described work.

PRECAST CONCRETE PROTECTIVE COAT (SPECIAL)

- **a. Description.** This work shall consist of applying Chem-Crete Pavix CCC100 Protective Coat as specified below.
- **b. Application.** The Chem-Crete protective coat shall be applied in accordance with the manufacturer's specifications to all surfaces of the precast bridge deck and backwalls except for the portion of the bridge deck and backwall joints that will be in contact with the closure pour material. The Chem-Crete protective coat should only be applied after the concrete has met its specified strength.

The Chem-Crete protective coat will be applied by the Fabricator prior to the prefabricated superstructure units being shipped to the job site. If the closure pour material cast for the bridge

deck joints requires grinding of the top surface, Chem-Crete protective coat shall be reapplied in the field by the Contractor to the ground areas of the precast concrete deck. The Contractor shall allow sufficient time for the sealant to cure prior to applying the bridge deck thin polymer overlay.

c. Storage and Handling. Recommended material storage air temperature is 70°F. Handle products to avoid damage to container. Do not store for long periods in direct sunlight. Do not allow product to freeze.

d. Job Conditions.

- 1) Environmental Conditions:
 - 1. Do not proceed with application of materials when concrete temperature is less than 40°F.
 - 2. Do not apply unless surface to receive material is clean, dry, and sound.
- 2) Safety and Health Conditions:
 - 1. During coating application, the maximum effort must be made to protect the applicator and others near the workplace from coming in contact with material on skin or eyes.
 - 2. Use proper safety clothing, eye protection, and gloves.
- 3) Protection:
 - 1. Keep products away from heat.
 - 2. Minimize or exclude all personnel not directly involved with the application process from the area.
 - 3. Protective Coat must be allowed to dry/cure for a period of at least 1 hour before concrete surface is allowed to be handled.
- **e.** Basis of Payment. This work will not be paid for separately but is included in the cost of FURNISHING SUPERSTRUCTURE and ERECTING SUPERSTRUCTURE, as applicable, and includes all labor, equipment, and materials to complete the work.

CLOSURE POUR MATERIAL

a. Description. This work consists of providing and casting closure pour material into the bridge deck and backwall joints of the prefabricated bridge superstructure units to form a complete superstructure system. The material shall be as specified in the shop drawings by the Fabricator's SE. The work also includes furnishing the specified material for test specimens and job site trial batches that simulate field casting the material. Work for the trial batches shall be done at least three (3) weeks prior to erecting the prefabricated bridge superstructure units at the project site. The following information pertaining to materials, equipment, and construction data shall be submitted for review and approval a minimum of 90 days prior to the estimated date for casting the joints of the prefabricated units.

- **b. Materials Data.** Provide manufacturer's specifications, material properties, and/or mix design for the chosen material.
- **c. Equipment Data.** Specify size and type of equipment that will be used to mix and place the material.

d. Construction Data.

- 1. **Storage.** Indicate storage requirement of constituent materials, fibers, and additives as required by the manufacturer's specifications in order to protect materials against exposure to moisture and loss of physical and mechanical properties.
- 2. **Temperature Limitations.** Indicate ambient air and concrete substrate temperature requirements necessary for placing the material.
- 3. **Mixing Protocol.** Specify a mixing protocol that provides direction for any required sequence of mixing together the material components.
- 4. **Forms.** Specify any formwork requirements including the need to be watertight, coated to prevent absorption of water, and/or resistance needed for the hydraulic pressure of the mix.
- 5. **Quality Control.** Submit a copy of a quality control plan for the material. Quality control records shall be submitted to the Engineer within 24 hours after the date of material placement covered by the record.
- 6. **Compression Testing Requirements.** A minimum of three sets of compressive strength test samples shall be made for each day of placement. Test sample requirements and method for conducting the compression test shall be specified. Each set shall consist of at least three samples. All test samples must be cured using the same method of curing as outlined in the quality control plan. The compressive strength tests must be conducted on a minimum of three samples.
- 7. **Casting Process.** Specify any casting requirements such as pouring the material in incremental lifts, pour length limitations, vibrating the material, surface finish, and/or the need to pour thicker/higher than the adjacent concrete. If the material is required to be poured thicker/higher than the adjacent concrete, specifications shall also be provided for grinding the top of the bridge deck joints flush with the top of the precast bridge decks. Consideration shall also be given to final surface preparation requirements indicated below.
- 8. **Curing.** Specify curing requirements including the use and/or suitability of curing compounds, curing blankets, and/or moisture requirements. The timing and duration of the required curing shall also be specified.

9. **Final Surface Preparation.** Specify final surface preparation of the bridge deck joints required following curing and prior to placement of the Bridge Deck Thin Polymer Overlay (see special provision).

The trial batch shall consist of the Contractor building two (2) forms on-site and out of the influence area of active construction where the closure pour material trial batch can be placed for curing and testing. The forms shall simulate the field casting that will be required for the prefabricated superstructure units.

- 1. Form 1 shall be a minimum 3 ft long representation of the longitudinal joint between the precast deck panels.
- 2. Form 2 shall be a minimum 3 ft long representation of the vertical keyway joint between the precast concrete backwall units.

The forms shall be built on a flat surface. The top concrete surface shall be hand troweled smooth immediately after pouring. All exposed concrete surfaces shall have standard curing compound applied after pouring and finishing. In lieu of building the forms onsite, the forms may be precast and shipped to the project site.

Perform the trial batch under similar ambient conditions (e.g. time of day, weather, etc.) as anticipated during construction. Include documentation of ambient conditions at the time of the trial batch and anticipated ambient conditions at time of trial placement with the submittal to the Engineer.

Prepare compression testing samples and test samples per compression testing requirements. Provide the results of temperature, slump, density (unit weight), and compressive strength testing at 4 and 7 days (at a minimum). Each compressive strength test must be conducted according to subsection d.6 of this special provision. Submit the results of all tests above to the Engineer for review and approval a minimum of 10 calendar days prior to casting the closure pour material into the bridge deck and backwall joints. The Engineer will perform Quality Assurance testing over the course of 21 days after the casting is completed. The trial placement must be witnessed by the Engineer.

The trial placement must use the same equipment, forming, casting, and curing procedures that will be used during construction.

To be considered a successful trial batch, the compressive strength must meet the values specified in the shop drawings by the Fabricator's SE and manufacturer at 4 days and 7 days and there must also be no segregation of the closure pour material and no visible voids when the forms are removed. If the trial batch does not meet these requirements, discard the material and repeat the trial batch.

Once the testing is complete, it will be the Contractor's responsibility to remove and dispose of the test members off-site as part of this pay item.

e. Basis of Payment. This work will not be paid for separately but shall be included in the cost of ERECTING SUPERSTRUCTURE and includes all labor, equipment, and materials to complete the described work including performing one (1) trial batch at the job site to the satisfaction of the Engineer. No additional compensation will be provided if additional trial batches are required.

MGS RAILING

a. Description. This work shall consist of furnishing and installing a 31-inch Midwest Guardrail System (MGS) bridge rail along each exterior edge of the bridge as detailed in the plans and indicated herein. The bridge rail system and connection to the deck shall satisfy AASHTO TL-3 safety requirements and have curled end sections as indicated in the plans. Certifications shall be provided indicating the bridge rail system and connection to the deck satisfy this criteria. The vertical posts for the bridge rail are required to be located outside of the bridge deck. Post spacing shall be specified in accordance with the railing requirements. End to end of the railing/curled end sections shall extend from back to back of abutments.

Shop drawings for the railing shall be prepared and submitted for review and approval by the Engineer. Shop drawing details for the railing shall be coordinated with the bridge deck connection details indicated in the approved shop drawings for the prefabricated superstructure units.

- **b. Materials.** Structural steel and fasteners for the bridge railing shall be in accordance with material required for the AASHTO TL-3 safety rating. All steel components and fasteners for the bridge railing shall be galvanized in accordance with AASHTO M 111 and AASHTO M 232, as applicable.
- **c. Method of Measurement.** This work will be measured for payment in place in feet. The length measured will be the overall length along the top longitudinal railing through all posts and gaps.
- **c.** Basis of Payment. The completed work will be paid for at the contract unit price per foot for MGS RAILING which includes all labor, equipment, and materials necessary to complete the described work.



DEPARTMENT OF THE ARMY U.S. ARMY CORPS OF ENGINEERS, ST. LOUIS DISTRICT 1222 SPRUCE STREET ST. LOUIS, MISSOURI 63103-2833

REPLY TO ATTENTION OF:

February 13, 2020

Regulatory Branch

File Number: MVS-2020-33

Jeff Blue, P.E Champaign County Highway Department 1605 East Main Street Urbana, Illinois 61802

Dear Mr. Blue:

This correspondence is in regard to the project known as Champaign County-TR 251 over Two Mile Slough. Champaign County Highway Department is seeking authorization for the complete replacement of the existing bridge structure. The structure will be replaced with a single span precast slab bridge on concrete abutments. The roadway approach will be widened to match the bridge width. The proposed side slopes on the roadway embankment will be 3:1 and transition to match existing contours. Stone riprap will be placed in the streambed as an erosion countermeasure. The proposed project will impact approximately 100 linear feet of Two Mile Slough, a perennial stream. More specifically, the project is located in Section 28, Township 18 North, Range 8 East of the 3rd Principal Meridian, Champaign County, Illinois.

The Corps of Engineers has determined that this activity is authorized under Section 404 of the Clean Water Act by existing Department of the Army nationwide permits for Linear Transportation Projects, Notice (82 FR 1985), Appendix A (B) (14). This NWP verification is valid until March 18, 2022, unless the District Engineer modifies, suspends, or revokes the nationwide permit authorization in accordance with 33 CFR 330.5(d). If you commence, or are under contract to commence, this activity before the nationwide permit expires, you will have 12 months from that date to complete the activity under the present terms and conditions of this NWP. Enclosed is a copy of the nationwide permit and conditions and management practices with which you must comply. The District Engineer has further conditioned this permit to include the following special conditions:

- 1. That the Permittee notify the Corps should any change in size, location of methods to accomplish the work occur. Changes could potentially require additional authorizations from the Corps as well as other federal, state or local agencies.
- 2. Temporary construction access, structures or fills shall be removed once the maintenance activity is complete and the site shall be restored to pre-project conditions including elevations, soil substrate, and vegetation.
- 3. All unused excavated material shall be placed on an upland site and should not impact any jurisdictional waters of the United States. If you believe you may

impact any wetlands or jurisdictional waters with the remaining excavated material you shall contact our office prior to completing the work.

In accordance with General Condition number 30 of the Nationwide Permit, a compliance certification (Attachment A of this package) must be completed within 30 days of project completion or the permit issuance may be revoked and considered null and void.

The Illinois Environmental Protection Agency Division of Water Pollution Control (IEPA/WPC) has conditionally issued general Section 401 Water Quality Certification for this nationwide permit, subject to the special conditions and three general conditions (see enclosure). These conditions are part of the Corps permit. If you have any questions regarding the water quality certification conditions, you may call Mr. Darin LeCrone, IEPA/WPC, at 217-782-0610.

This review is applicable only to the permit program administered by the Corps of Engineers. It does not eliminate the need to obtain other federal, state or local approvals before beginning work. This permit does not convey property rights, nor authorize any injury to property or invasion of other rights.

You are reminded that the permit is based on submitted plans. Variations from these plans shall constitute a violation of Federal law and may result in the revocation of the permit. If this nationwide permit is modified, reissued, or revoked during this period, the provisions described at 33 CFR 330.6(b) will apply.

If you have any questions, please contact Katie Steinmetz at (314) 331-8593. Please refer to file number MVS-2020-33. The St. Louis District Regulatory Branch is committed to providing quality and timely service to our customers. In an effort to improve customer service, please take a moment to go to our Customer Service Survey found on our web site at http://corpsmapu.usace.army.mil/cm_apex/f?p=regulatory_survey.

Sincerely,

Tyson Zobrist Illinois Project Manager Regulatory Branch

Copies Furnished: (electronically)

Milner, IDNR Tinch, IDNR LeCrone, IEPA Kruchten, IL SHPO

ATTACHMENT A

COMPLETED WORK CERTIFICATION

Date of Issuance: February 13, 2020
File Number: MVS-2020-33
Name of Permittee: Champaign County Highway Department
River Basin/County/State: Kaskaskia/Champaign/Illinois
Project Manager: Katie Steinmetz
Upon completion of this activity authorized by this permit and any mitigation required by the permit, sign this certification and return it to the following address: U.S. Army Corps of Engineers Attn: Regulatory Branch (OD-F) 1222 Spruce Street St. Louis, Missouri 63103-2833
(Please note that your permitted activity is subject to a compliance inspection by a U.S. Army Corps of Engineers representative. If you fail to comply with this permit, you are subject to permit suspension, modification or revocation.) I hereby certify that the work authorized by the above referenced permit has been completed in accordance with the terms and conditions of the said permit, and required mitigation was completed in accordance with the permit conditions.
Signature of Permittee Date



US Army Corps of Engineers Rock Island District

FACT SHEET NO. 8(IL)

NATIONWIDE PERMITS IN ILLINOIS

EFFECTIVE DATE: MARCH 19, 2017

On January 6, 2017, the Corps of Engineers published in the Federal Register (82 FR 1860), the Final Rule for the Nationwide Permits Program under the Rivers and Harbors Act of 1899; the Clean Water Act; and the Marine Protection, Research and Sanctuaries Act. These Nationwide Permits became effective on March 19, 2017.

The Nationwide Permit Program is an integral part of the Corps' Regulatory Program. The Nationwide Permits are a form of general permits issued by the Chief of Engineers and are intended to apply throughout the entire United States and its territories. A listing of the nationwide permits and general conditions is included herein. We encourage prospective permit applicants to consider the advantages of nationwide permit authorization during the preliminary design of their projects. Assistance and further information regarding all aspects of the Corps of Engineers Regulatory Program may be obtained by contacting the appropriate Corps of Engineers District at the address and/or telephone number listed on the last page of this Fact Sheet.

To ensure projects authorized by a Nationwide Permit will result in minimal adverse effects to the aquatic environment, the following Regional Conditions were developed for projects proposed within the state of Illinois (See NOTE regarding the Chicago District):

- 1. Stormwater management facilities shall not be located within a stream, except for NWPs 21, 44, 49, or 50.
- 2. For newly constructed channels through areas that are unvegetated, native grass filter strips, or a riparian buffer with native trees or shrubs, a minimum of 25 feet wide from the top of bank must be planted along both sides of the new channel. A survival rate of 80 percent of desirable native species with aerial coverage of at least 50 percent shall be achieved within 3 years of establishment of the buffer strip.
- 3. Side slopes of a newly constructed channel will be no steeper than 2:1 and planted to permanent, perennial, native vegetation if not armored.
- 4. For a single family residence authorized under Nationwide Permit No. 29, the permanent loss of waters of the United States (including jurisdictional wetlands) must not exceed 1/4 acre.
- 5. For NWP 46, the discharge of dredged or fill material into ditches and canals that would sever the jurisdiction of an upstream water of the United States from a downstream water of the United States is not allowed.
- 6. For NWP 52, no project will be authorized within Lake Michigan. An individual permit will be required.
- 7. Any bank stabilization activity involving a method that protrudes from the bank contours, such as jetties, stream barbs, and/or weirs, will require a pre-construction notification in accordance with General Condition 32.
- 8. Mitigation shall be constructed prior to, or concurrent with, the discharge of dredged or fill material into waters of the United States unless an alternate timeline is specifically approved in the authorization.
- 9. Operation of heavy equipment within the stream channel should be avoided. If in-stream work is unavoidable, it shall be performed in such a manner as to minimize the duration of the disturbance, turbidity increases, substrate disturbance, bank disturbance, and disturbance to riparian vegetation. This condition does not further restrict otherwise authorized drainage ditch maintenance activities.

NOTE: The Chicago District has suspended many of the Nationwide Permits and established regional permits for work in McHenry, Kane, Lake, DuPage, Will and Cook Counties in Illinois. Information regarding Chicago District requirements can be accessed through their website at http://www.lrc.usace.army.mil/Missions/Regulatory.aspx. If you have any questions regarding the Chicago District program, please contact the Regulatory Office by telephone at 312/846-5530, or e-mail lrcregweb@usace.army.mil.

Permits, issued by the Corps of Engineers, under the authority of Section 404 of the Clean Water Act may not be issued until the state (where the discharge will occur) certifies, under Section 401 of the Act, that the discharge will comply with the water quality standards of the State. On February 27, 2017, the Illinois Environmental Protection Agency (IEPA) issued their final Section 401 Water Quality Certification decision.

DENIED NATIONWIDE PERMITS

The IEPA did not issue a generic water quality certification for the following nationwide permits which are listed by subject only:

- 21. Surface Coal Mining Activities
- 23. Approved Categorical Exclusions
- 31. Maintenance of Existing Flood Control Facilities
- 34. Cranberry Production Activities
- 37. Emergency Watershed Protection and Rehabilitation
- 48. Commercial Shellfish Aquaculture Activities
- 49. Coal Remining Activities
- 50. Underground Coal Mining Activities

Since Nationwide Permits 21, 23, 31, 37, 48, 49, and 50 are applicable under both Section 10 and 404, the State Section 401 certification is only required for discharges of pollutants under these nationwide permits. Section 10 work not involving discharges of dredged or fill material continues to be authorized under these nationwide permits.

Authorization for discharges covered by all the above nationwide permits is denied without prejudice. Applicants wishing to conduct such discharges must first obtain either an individual water quality certification or waiver from:

ILLINOIS ENVIRONMENTAL PROTECTION AGENCY
1021 NORTH GRAND AVENUE EAST
POST OFFICE BOX 19276
SPRINGFIELD, ILLINOIS 62794-9276

If the state certifying agency fails to act on an application for water quality certification within 60 days after receipt, the certification requirement is presumed to be waived. The applicant must furnish the District Engineer (at the appropriate address listed on the last page of the Fact Sheet) with a copy of the certification or proof of waiver. The discharge may proceed upon receipt of the District Engineer's determination that the discharge qualifies for authorization under this nationwide permit. Details of this procedure are contained in 33 CFR 330.4, a copy of which is available upon request.

Under certain circumstances, Nationwide Permits 3, 7, 8, 12, 13, 14, 17, 18, 21, 22, 23, 27, 29, 31, 33, 34, 36, 37, 38, 39, 40, 42, 43, 44, 45, 46, 48, 49, 50, 51, 52, 53 and 54 require that the permittee notify the District Engineer at least 45 days prior to performing the discharge under certain circumstances. Specific instructions for these notifications are contained in General condition 32, a copy of which is included.

For all other Nationwide Permits, the IEPA issued Section 401 Water Quality Certification with conditions. General Conditions 1, 2, and 3 apply to all nationwide permits for which certification was not denied and activities require authorization under Section 404 of the Clean Water Act. Other conditions specific to a Nationwide Permit are listed at the end of the subject nationwide permit.

<u>General Condition 1:</u> An individual 401 water quality certification will be required for any activities permitted under these Nationwide Permits for discharges to waters designated by the State of Illinois as Outstanding Resource Waters under 35 Ill. Adm. Code 302.105(b).

General Condition 2: Projects requiring authorization under Section 404 of the Clean Water Act must implement Best Management Practices (BMPs) to protect water quality, preserve natural hydrology and minimize the overall impacts to aquatic resources during and after construction. Projects that include a discharge of pollutants to waters that have impaired water quality according to the Illinois Environmental Protection Agency's Section 303(d) list or for which there is an approved Total Maximum Daily Load (TMDL) allocation for any parameter, additional planning will be necessary to ensure that no further degradation of water quality will occur. The TMDL program information and the Agency's 303(d) list of impaired waters are available at http://www.epa.illinois.gov/topics/water-quality/watershed-management/tmdls/index. For waters that include an approved TMDL the applicant shall incorporate into their plans and BMPs any measures that ensure consistency with the assumptions and requirements of the TMDL within any timeframes established in the TMDL. The applicant must carefully document the justifications for all plans and BMPs, and install, implement and maintain BMPs that are consistent with all relevant pollutant load allocations and conditions in the TMDL implementation plan. If a TMDL has not yet been approved to address water quality impairments that are documented in the Agency's 303(d)

General Condition 3: Prior to proceeding with any work in accordance with any Nationwide Permit, potential impacts to threatened or endangered species shall be identified through use of the State's Ecological Compliance Assessment Tool (EcoCAT) at http://dnrecocat.state.il.us/ecopublic/. If potential impacts to State threatened or endangered species are identified, the Illinois Department of Natural Resources shall be consulted with.

Nationwide Permits and Conditions

The following is a list of the nationwide permits, authorized by the Chief of Engineers, and published in the Federal Register (82 FR 1860). Permittees wishing to conduct activities under the nationwide permits must comply with the conditions published in Section C. The Nationwide

Permit General Conditions found in Section C have been reprinted at the end of this Fact Sheet. The parenthetical references (Section 10, Section 404) following each nationwide permit indicate the specific authorities under which that permit is issued.

B. Nationwide Permits

- 1. Aids to Navigation. The placement of aids to navigation and regulatory markers that are approved by and installed in accordance with the requirements of the U.S. Coast Guard (see 33 CFR, chapter I, subchapter C, part 66).(Authority: Section 10 of the Rivers and Harbors Act of 1899 (Section 10))
- 2. Structures in Artificial Canals. Structures constructed in artificial canals within principally residential developments where the connection of the canal to a navigable water of the United States has been previously authorized (see 33 CFR 322.5(g)). (Authority: Section 10)
- 3. Maintenance. (a) The repair, rehabilitation, or replacement of any previously authorized, currently serviceable structure or fill, or of any currently serviceable structure or fill authorized by 33 CFR 330.3, provided that the structure or fill is not to be put to uses differing from those uses specified or contemplated for it in the original permit or the most recently authorized modification. Minor deviations in the structure's configuration or filled area, including those due to changes in materials, construction techniques, requirements of other regulatory agencies, or current construction codes or safety standards that are necessary to make the repair, rehabilitation, or replacement are authorized. This NWP also authorizes the removal of previously authorized structures or fills. Any stream channel modification is limited to the minimum necessary for the repair, rehabilitation, or replacement of the structure or fill; such modifications, including the removal of material from the stream channel, must be immediately adjacent to the project. This NWP also authorizes the removal of accumulated sediment and debris within, and in the immediate vicinity of, the structure or fill. This NWP also authorizes the repair, rehabilitation, or replacement of those structures or fills destroyed or damaged by storms, floods, fire or other discrete events, provided the repair, rehabilitation, or replacement is commenced, or is under contract to commence, within two years of the date of their destruction or damage. In cases of catastrophic events, such as hurricanes or tornadoes, this two-year limit may be waived by the district engineer, provided the permittee can demonstrate funding, contract, or other similar delays.
- (b) This NWP also authorizes the removal of accumulated sediments and debris outside the immediate vicinity of existing structures (e.g., bridges, culverted road crossings, water intake structures, etc.). The removal of sediment is limited to the minimum necessary to restore the waterway in the vicinity of the structure to the approximate dimensions that existed when the structure was built, but cannot extend farther than 200 feet in any direction from the structure. This 200 foot limit does not apply to maintenance dredging to remove accumulated sediments blocking or restricting outfall and intake structures or to maintenance dredging to remove accumulated sediments from canals associated with outfall and intake structures. All dredged or excavated materials must be deposited and retained in an area that has no waters of the United States unless otherwise specifically approved by the district engineer under separate authorization.
- (c) This NWP also authorizes temporary structures, fills, and work, including the use of temporary mats, necessary to conduct the maintenance activity. Appropriate measures must be taken to maintain normal downstream flows and minimize flooding to the maximum extent practicable, when temporary structures, work, and discharges, including cofferdams, are necessary for construction activities, access fills, or dewatering of construction sites. Temporary fills must consist of materials, and be placed in a manner, that will not be eroded by expected high flows. After conducting the maintenance activity, temporary fills must be removed in their entirety and the affected areas returned to Pre-construction elevations. The areas affected by temporary fills must be revegetated, as appropriate.
- (d) This NWP does not authorize maintenance dredging for the primary purpose of navigation. This NWP does not authorize beach restoration. This NWP does not authorize new stream channelization or stream relocation projects.

Notification: For activities authorized by paragraph (b) of this NWP, the permittee must submit a pre-construction notification to the district engineer prior to commencing the activity (see general condition 32). The pre-construction notification must include information regarding the original design capacities and configurations of the outfalls, intakes, small impoundments, and canals. (Authorities: Section 10 of the Rivers and Harbors Act of 1899 and Section 404 of the Clean Water Act (Sections 10 and 404))

Note: This NWP authorizes the repair, rehabilitation, or replacement of any previously authorized structure or fill that does not qualify for the Clean Water Act Section 404(f) exemption for maintenance

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 3. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 3 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, as determined by the Illinois EPA.

- 3. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. The applicant for Nationwide Permit 3 shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
- 5. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant for Nationwide Permit 3 shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant for Nationwide Permit 3 shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 6. The applicant for Nationwide 3 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 7. Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed of clean coarse aggregate or non-erodible non-earthen fill material that will not cause siltation. Sandbags, pre-fabricated rigid materials, sheet piling, inflatable bladders and fabric lined basins may be used for temporary facilities.
- 8. The applicant for Nationwide 3 that uses temporary work pads, cofferdams, access roads and other temporary fills in order to perform work in creeks, streams, or rivers shall maintain flow in these waters by utilizing dam and pumping, fluming, culverts or other such techniques.
- 4. Fish and Wildlife Harvesting, Enhancement, and Attraction Devices and Activities. Fish and wildlife harvesting devices and activities such as pound nets, crab traps, crab dredging, eel pots, lobster traps, duck blinds, and clam and oyster digging, fish aggregating devices, and small fish attraction devices such as open water fish concentrators (sea kites, etc.). This NWP does not authorize artificial reefs or impoundments and semi-impoundments of waters of the United States for the culture or holding of motile species such as lobster, or the use of covered oyster trays or clam racks. (Authorities: Sections 10 and 404)
- 5. Scientific Measurement Devices. Devices, whose purpose is to measure and record scientific data, such as staff gages, tide and current gages, meteorological stations, water recording and biological observation devices, water quality testing and improvement devices, and similar structures. Small weirs and flumes constructed primarily to record water quantity and velocity are also authorized provided the discharge is limited to 25 cubic yards. Upon completion of the use of the device to measure and record scientific data, the measuring device and any other structures or fills associated with that device (e.g., foundations, anchors, buoys, lines, etc.) must be removed to the maximum extent practicable and the site restored to pre-construction elevations. (Authorities: Sections 10 and 404)
- 6. Survey Activities. Survey activities, such as core sampling, seismic exploratory operations, plugging of seismic shot holes and other exploratory-type bore holes, exploratory trenching, soil surveys, sampling, sample plots or transects for wetland delineations, and historic resources surveys. For the purposes of this NWP, the term 'exploratory trenching' means mechanical land clearing of the upper soil profile to expose bedrock or substrate, for the purpose of mapping or sampling the exposed material. The area in which the exploratory trench is dug must be restored to its pre-construction elevation upon completion of the work and must not drain a water of the United States. In wetlands, the top 6 to 12 inches of the trench should normally be backfilled with topsoil from the trench. This NWP authorizes the construction of temporary pads, provided the discharge does not exceed 1/10-acre in waters of the U.S. Discharges and structures associated with the recovery of historic resources are not authorized by this NWP. Drilling and the discharge of excavated material from test wells for oil and gas exploration are not authorized by this NWP; the plugging of such wells is authorized. Fill placed for roads and other similar activities is not authorized by this NWP. The NWP does not authorize any permanent structures. The discharge of drilling mud and cuttings may require a permit under section 402 of the Clean Water Act. (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 6. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 6 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control
 - Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 6 shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
- 3. Material resulting from trench excavation within surface waters of the State may betemporarily sidecast adjacent to the trench excavation provided that:
 - A. Sidecast material is not placed within a creek, stream, river or other flowing water body such that material dispersion could occur;

- B. Sidecast material is not placed within ponds or other water bodies other than wetlands; and
- C. Sidecast material is not placed within a wetland for a period longer than twenty (20) calendar days. Such sidecast material shall either be removed from the site, or used as backfill (refer to Condition 4 and 5).
- 4. Backfill used within trenches passing through surface water of the State, except wetland areas, shall be clean course aggregate, gravel or other material which will not cause siltation. Excavated material may be used only if:
 - A. Particle size analysis is conducted and demonstrates the material to be at least 80% sand or larger size material, using a #230 U.S. sieve; or
 - B. Excavation and backfilling are done under dry conditions.
- 5. Backfill used within trenches passing through wetland areas shall consist of clean material which will not cause siltation. Excavated material shall be used to the extent practicable, with the upper six (6) to twelve (12) inches backfilled with the topsoil obtained during trench excavation.
- 6. Temporary work pads shall be constructed of clean coarse aggregate or non-erodible non-earthen fill material that will not cause siltation. Sandbags, pre-fabricated rigid materials, sheet piling, inflatable bladders and fabric lined basins may be used for temporary facilities.
- 7. The applicant for Nationwide Permit 6 that uses temporary work pads in order to perform work in creeks, streams, or rivers shall maintain flow in the these waters by utilizing dam and pumping, fluming, culverts or other such techniques.
- 7. Outfall Structures and Associated Intake Structures. Activities related to the construction or modification of outfall structures and associated intake structures, where the effluent from the outfall is authorized, conditionally authorized, or specifically exempted by, or otherwise in compliance with regulations issued under the National Pollutant Discharge Elimination System Program (section 402 of the Clean Water Act). The construction of intake structures is not authorized by this NWP, unless they are directly associated with an authorized outfall structure

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10 and 404)

8. Oil and Gas Structures on the Outer Continental Shelf. Structures for the exploration, production, and transportation of oil, gas, and minerals on the outer continental shelf within areas leased for such purposes by the Department of the Interior, Bureau of Ocean Energy Management. Such structures shall not be placed within the limits of any designated shipping safety fairway or traffic separation scheme, except temporary anchors that comply with the fairway regulations in 33 CFR 322.5(1). The district engineer will review such proposals to ensure compliance with the provisions of the fairway regulations in 33 CFR 322.5(1). Any Corps review under this NWP will be limited to the effects on navigation and national security in accordance with 33 CFR 322.5(f), as well as 33 CFR 322.5(1) and 33 CFR part 334. Such structures will not be placed in established danger zones or restricted areas as designated in 33 CFR part 334, nor will such structures be permitted in EPA or Corps-designated dredged material disposal areas.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authority: Section 10)

- **9. Structures in Fleeting and Anchorage Areas.** Structures, buoys, floats, and other devices placed within anchorage or fleeting areas to facilitate moorage of vessels where such areas have been established for that purpose. (Authority: Section 10)
 - 10. Mooring Buoys. Non-commercial, single-boat, mooring buoys. (Authority: Section 10)
- 11. Temporary Recreational Structures. Temporary buoys, markers, small floating docks, and similar structures placed for recreational use during specific events such as water skiing competitions and boat races or seasonal use, provided that such structures are removed within 30 days after use has been discontinued. At Corps of Engineers reservoirs, the reservoir managers must approve each buoy or marker individually. (Authority: Section 10)
- 12. Utility Line Activities. Activities required for the construction, maintenance, repair, and removal of utility lines and associated facilities in waters of the United States, provided the activity does not result in the loss of greater than 1/2-acre of waters of the United States for each single and complete project. Utility lines: This NWP authorizes discharges of dredged or fill material into waters of the United States and structures or work in navigable waters for crossings of those waters associated with the construction, maintenance, or repair of utility lines, including outfall and intake structures. There must be no change in pre-construction contours of waters of the United States. A ''utility line'' is defined as any pipe or pipeline for the transportation of any gaseous, liquid, liquescent, or slurry substance, for any purpose, and any cable, line, or wire for the transmission for any purpose of electrical energy, telephone, and telegraph messages, and internet, radio, and television communication. The term "utility line" does not include activities that drain a water of the United States, such as drainage tile or french drains, but it does apply to pipes conveying drainage from another area. Material resulting from trench excavation may be temporarily sidecast into waters of the United States for no more than three months, provided the material is not placed in such a manner that it is dispersed by currents or other forces. The district engineer may extend the period of temporary side casting for no more than a total of 180 days, where appropriate. In wetlands, the top 6 to 12 inches of the trench should normally be backfilled with topsoil from the trench. The trench cannot be constructed or backfilled in such a manner as to drain waters of the United States (e.g., backfilling with extensive gravel layers, creating a french drain effect). Any

exposed slopes and stream banks must be stabilized immediately upon completion of the utility line crossing of each waterbody.

Utility line substations: This NWP authorizes the construction, maintenance, or expansion of substation facilities associated with a power line or utility line in non-tidal waters of the United States, provided the activity, in combination with all other activities included in one single and complete project, does not result in the loss of greater than 1/2-acre of waters of the United States. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters of the United States to construct, maintain, or expand substation facilities. Foundations for overhead utility line towers, poles, and anchors: This NWP authorizes the construction or maintenance of foundations for overhead utility line towers, poles, and anchors in all waters of the United States, provided the foundations are the minimum size necessary and separate footings for each tower leg (rather than a larger single pad) are used where feasible.

Access roads: This NWP authorizes the construction of access roads for the construction and maintenance of utility lines, including overhead power lines and utility line substations, in non-tidal waters of the United States, provided the activity, in combination with all other activities included in one single and complete project, does not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters for access roads. Access roads must be the minimum width necessary (see Note 2, below). Access roads must be constructed so that the length of the road minimizes any adverse effects on waters of the United States and must be as near as possible to pre-construction contours and elevations (e.g., at grade corduroy roads or geotextile/gravel roads). Access roads constructed above pre-construction contours and elevations in waters of the United States must be properly bridged or culverted to maintain surface flows.

This NWP may authorize utility lines in or affecting navigable waters of the United States even if there is no associated discharge of dredged or fill material (See 33 CFR part 322). Overhead utility lines constructed over Section 10 waters and utility lines that are routed in or under Section 10 waters without a discharge of dredged or fill material require a Section 10 permit.

This NWP authorizes, to the extent that Department of the Army authorization is required, temporary structures, fills, and work necessary for the remediation of inadvertent returns of drilling fluids to waters of the United States through sub-soil fissures or fractures that might occur during horizontal directional drilling activities conducted for the purpose of installing or replacing utility lines. These remediation activities must be done as soon as practicable, to restore the affected waterbody. District engineers may add special conditions to this NWP to require a remediation plan for addressing inadvertent returns of drilling fluids to waters of the United States during horizontal directional drilling activities conducted for the purpose of installing or replacing utility lines.

This NWP also authorizes temporary structures, fills, and work, including the use of temporary mats, necessary to conduct the utility line activity. Appropriate measures must be taken to maintain normal downstream flows and minimize flooding to the maximum extent practicable, when temporary structures, work, and discharges, including cofferdams, are necessary for construction activities, access fills, or dewatering of construction sites. Temporary fills must consist of materials, and be placed in a manner, that will not be eroded by expected high flows. After construction, temporary fills must be removed in their entirety and the affected areas returned to pre-construction elevations. The areas affected by temporary fills must be revegetated, as appropriate.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if any of the following criteria are met: (1) The activity involves mechanized land clearing in a forested wetland for the utility line right-of-way; (2) a Section 10 permit is required; (3) the utility line in waters of the United States, excluding overhead lines, exceeds 500 feet; (4) the utility line is placed within a jurisdictional area (i.e., water of the United States), and it runs parallel to or along a stream bed that is within that jurisdictional area; (5) discharges that result in the loss of greater than 1/10-acre of waters of the United States; (6) permanent access roads are constructed above grade in waters of the United States for a distance of more than 500 feet; or (7) permanent access roads are constructed in waters of the United States with impervious materials. (See general condition 32.) (Authorities: Sections 10 and 404)

Note 1: Where the utility line is constructed or installed in navigable waters of the United States (i.e., Section 10 waters) within the coastal United States, the Great Lakes, and United States territories, a copy of the NWP verification will be sent by the Corps to the National Oceanic and Atmospheric Administration (NOAA), National Ocean Service (NOS), for charting the utility line to protect navigation.

Note 2: For utility line activities crossing a single waterbody more than one time at separate and distant locations, or multiple waterbodies at separate and distant locations, each crossing is considered a single and complete project for purposes of NWP authorization. Utility line activities must comply with 33 CFR 330.6(d).

Note 3: Utility lines consisting of aerial electric power transmission lines crossing navigable waters of the United States (which are defined at 33 CFR part 329) must comply with the applicable minimum clearances specified in 33 CFR 322.5(i).

Note 4: Access roads used for both construction and maintenance may be authorized, provided they meet the terms and conditions of this NWP. Access roads used solely for construction of the utility line must be removed upon completion of the work, in accordance with the requirements for temporary fills.

Note 5: Pipes or pipelines used to transport gaseous, liquid, liquescent, or slurry substances over navigable waters of the United States are considered to be bridges, not utility lines, and may require a permit from the U.S. Coast Guard pursuant to section 9 of the Rivers and Harbors Act of 1899. However, any discharges of dredged or fill material into waters of the United States associated with such pipelines will require a Section 404 permit (see NWP 15).

Note 6: This NWP authorizes utility line maintenance and repair activities that do not qualify for the Clean Water Act Section 404(f) exemption for maintenance of currently serviceable fills or fill structures.

Note 7: For overhead utility lines authorized by this NWP, a copy of the PCN and NWP verification will be provided to the Department of Defense Siting Clearinghouse, which will evaluate potential effects on military activities.

Note 8: For NWP 12 activities that require pre-construction notification, the PCN must include any other NWP(s), regional general permit(s), or individual permit(s) used or intended to be used to authorize any part of the proposed project or any related activity, including other separate and distant crossings that require Department of the Army authorization but do not require pre-construction notification (see paragraph (b) of general condition 32). The district engineer will evaluate the PCN in accordance with Section D, ''District Engineer's Decision.''
The district engineer may require mitigation to ensure that the authorized activity results in no more than minimal individual and cumulative adverse environmental effects (see general condition

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 12. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 12 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. Case-specific water quality certification from the Illinois EPA will be required for:
 - A. activities in the following waters:
 - Lake Calumet
 - Fox River (including the Fox Chain of Lakes) ii.
 - iii. Lake Michigan
 - iv. Chicago Sanitary and Ship Canal
 - v. Calumet-Sag Channel
 - vi. Little Calumet River
 - vii. Grand Calumet River
 - viii. Calumet River
 - ix. Pettibone Creek (in Lake County)
 - South Branch of the Chicago River (including the South Fork)
 - хi. North Branch of the Chicago River (including the East and West Forks and the Skokie Lagoons)
 - xii. Chicago River (Main Stem)
 - xiii. Des Plaines River
 - xiv. Kankakee
 - All Public and Food Processing Water Supplies with surface intake facilities. The Illinois EPA's Division of Public Water Supply at 217/782-1020 may be contacted for information on these water supplies.
 - B. activities in the following waters if material is sidecast into waters of the State or wetlands:
 - Saline River (in Hardin County) i.
 - Richland Creek (in St. Clair and Monroe Counties) ii.
 - iii. Rock River (in Winnebago County)
 - Illinois River upstream of mile 229.6 (Illinois Route 178 bridge)
 - Illinois River between mile 140.0 and 182.0
 - vi. DuPage River (including the East and West Branches) vii. Salt Creek (Des Plaines River Watershed)
 - viii. Waukegan River (including the South Branch)
- Section 401 water quality certification is hereby issued for all other waters, with the following conditions:

 - A. The applicant for Nationwide Permit 12 shall not cause:

 i. violation of applicable provisions of the Illinois Environmental Protection Act;
 - ii. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - iii. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - interference with water use practices near public recreation areas or water supply intakes.
 - B. The applicant for Nationwide Permit 12 shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
 - Material resulting from trench excavation within surface waters of the State may be temporarily sidecast adjacent to the trench excavation provided that:
 - Sidecast material is not placed within a creek, stream, river or other flowing water body such that material dispersion could occur;
 - Side cast material is not placed within ponds or other water bodies other than wetlands; and
 - iii. Sidecast material is not placed within a wetland for a period longer than twenty (20) calendar days. Such sidecast material shall either be removed from the site (refer to Condition 2.F), or used as backfill (refer to Condition 2.D and 2.E).
 - D. Backfill used within trenches passing through surface water of the State, except wetland areas, shall be clean course aggregate, gravel or other material which will not cause siltation, pipe damage during placement, or chemical corrosion in place. Excavated material may be used only if:
 - Particle size analysis is conducted and demonstrates the material to be at least 80% sand or larger size material, using a #230 U.S. sieve; or
 - Excavation and backfilling are done under dry conditions.
 - E. Backfill used within trenches passing through wetland areas shall consist of clean material which will not cause siltation, pipe damage during placement, or chemical corrosion in place. Excavated material shall be used to the extent practicable, with the upper six (6) to twelve (12) inches backfilled with the topsoil obtained during trench excavation.

- F. All material excavated which is not being used as backfill as stipulated in Condition 2.D and 2.E shall be stored or disposed in self-contained areas with no discharge to waters of the State. Material shall be disposed of appropriately under the regulations at 35 Il. Adm. Code Subtitle G.
- G. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant for Nationwide Permit 12 shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant for Nationwide Permit 12 shall be responsible for obtaining an NPDES Storm Water Permit required by the federal Clean Water Act prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- H. The applicant for Nationwide Permit 12 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- I. The use of directional drilling to install utility pipelines below surface waters of the State is hereby certified provided that:
 - i. All pits and other construction necessary for the directional drilling process are located outside of surface waters of the State;
 - ii. All drilling fluids shall be adequately contained such that they cannot cause a discharge to surface waters of the State. Such fluids shall be treated as stipulated in Condition 2.F; and
 - iii. Erosion and sediment control is provided in accordance with Conditions 2.B, 2.G, and 2.H.
- J. Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed of clean coarse aggregate or non-erodible non-earthen fill material that will not cause siltation. Material excavated or dredged from the surface water or wetland shall not be used to construct the temporary facility. Sandbags, pre-fabricated rigid materials, sheet piling, inflatable bladders and fabric lined basins may be used for temporary facilities.
- K. The applicant for Nationwide Permit 12 that uses temporary work pads, cofferdams, access roads or other temporary fills in order to perform work in creeks, streams, or rivers for construction activities shall maintain flow in the these waters during such construction activity by utilizing dam and pumping, fluming, culverts or other such techniques.
- L. Permanent access roads shall be constructed of clean coarse aggregate or non-erodible nonearthen fill material that will not cause siltation. Material excavated or dredged from the surface water or wetland shall not be used to construct the access road in waters of the state. The applicant for Nationwide Permit 12 that constructs access roads shall maintain flow in creeks, streams and rivers by installing culverts, bridges or other such techniques.
- 13. Bank Stabilization. Bank stabilization activities necessary for erosion control or prevention, such as vegetative stabilization, bioengineering, sills, rip rap, revetment, gabion baskets, stream barbs, and bulkheads, or combinations of bank stabilization techniques, provided the activity meets all of the following criteria:
 - (a) No material is placed in excess of the minimum needed for erosion protection;
 - (b) The activity is no more than 500 feet in length along the bank, unless the district engineer waives this criterion by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects (an exception is for bulkheads—the district engineer cannot issue a waiver for a bulkhead that is greater than 1,000 feet in length along the bank);
 - (c) The activity will not exceed an average of one cubic yard per running foot, as measured along the length of the treated bank, below the plane of the ordinary high water mark or the high tide line, unless the district engineer waives this criterion by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects;
 - (d) The activity does not involve discharges of dredged or fill material into special aquatic sites, unless the district engineer waives this criterion by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects;
 - (e) No material is of a type, or is placed in any location, or in any manner, that will impair surface water flow into or out of any waters of the United States;
 - (f) No material is placed in a manner that will be eroded by normal or expected high flows (properly anchored native trees and treetops may be used in low energy areas);
 - (g) Native plants appropriate for current site conditions, including salinity, must be used for bioengineering or vegetative bank stabilization;
 - (h) The activity is not a stream channelization activity; and
 - The activity must be properly maintained, which may require repairing it after severe storms or erosion events. This NWP authorizes those maintenance and repair activities if they require authorization. This NWP also authorizes temporary structures, fills, and work, including the use of temporary mats, necessary to construct the bank stabilization activity. Appropriate measures must be taken to maintain normal downstream flows and minimize flooding to the maximum extent practicable, when temporary structures, work, and discharges, including cofferdams, are necessary for construction activities, access fills, or dewatering of construction sites. Temporary fills must consist of materials, and be placed in a manner, that will not be eroded by expected high

flows. After construction, temporary fills must be removed in their entirety and the affected areas returned to Pre-construction elevations. The areas affected by temporary fills must be revegetated, as appropriate.

Invasive plant species shall not be used for bioengineering or vegetative bank stabilization. Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if the bank stabilization activity: (1) Involves discharges into special aquatic sites; or (2) is in excess of 500 feet in length; or (3) will involve the discharge of greater than an average of one cubic yard per running foot as measured along the length of the treated bank, below the plane of the ordinary high water mark or the high tide line. (See general condition 32.) (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 13. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 13 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The bank stabilization activities shall not exceed 1000 linear feet.
- 2. Asphalt, bituminous material and concrete with protruding material such as reinforcing bars or mesh shall not be:
 - A. used for backfill;
 - B. placed on shorelines/streambanks; or
 - C. placed in waters of the State.
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, as determined by the Illinois EPA.
- 4. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 5. The applicant shall consider installing bioengineering practices in lieu of structural practices of bank stabilization to minimize impacts to the lake, pond, river or stream and enhance aquatic habitat. The applicant shall document the selection process for the bank stabilization technique(s) and the basis for the selection of the bank stabilization practices. Bioengineering techniques may include, but are not limited to:
 - A. adequately sized riprap or A-Jack structures keyed into the toe of the slope with native plantings on the banks above;
 - B. vegetated geogrids;
 - C. coconut fiber (coir) logs;
 - D. live, woody vegetative cuttings, fascines or stumps; E. brush layering; and

 - F. soil lifts.

14. Linear Transportation Projects. Activities required for crossings of waters of the United States associated with the construction, expansion, modification, or improvement of linear transportation projects (e.g., roads, highways, railways, trails, airport runways, and taxiways) in waters of the United States. For linear transportation projects in non-tidal waters, the discharge cannot cause the loss of greater than 1/2-acre of waters of the United States. For linear transportation projects in tidal waters, the discharge cannot cause the loss of greater than 1/3-acre of waters of the United States. Any stream channel modification, including bank stabilization, is limited to the minimum necessary to construct or protect the linear transportation project; such modifications must be in the immediate vicinity of the project.

This NWP also authorizes temporary structures, fills, and work, including the use of temporary mats, necessary to construct the linear transportation project. Appropriate measures must be taken to maintain normal downstream flows and minimize flooding to the maximum extent practicable, when temporary structures, work, and discharges, including cofferdams, are necessary for construction activities, access fills, or dewatering of construction sites. Temporary fills must consist of materials, and be placed in a manner, that will not be eroded by expected high flows. Temporary fills must be removed in their entirety and the affected areas returned to Preconstruction elevations. The areas affected by temporary fills must be revegetated, as appropriate.

This NWP cannot be used to authorize non-linear features commonly associated with transportation projects, such as vehicle maintenance or storage buildings, parking lots, train stations, or aircraft hangars.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if: (1) The loss of waters of the United States exceeds 1/10-acre; or (2) there is a discharge in a special aquatic site, including wetlands. (See general condition 32.) (Authorities: Sections 10 and 404)

Note 1: For linear transportation projects crossing a single waterbody more than one time at separate and distant locations, or multiple waterbodies at separate and distant locations, each crossing is considered a single and complete project for purposes of NWP authorization. Linear transportation projects must comply with 33 CFR 330.6(d).

Note 2: Some discharges for the construction of farm roads or forest roads, or temporary roads for moving mining equipment, may qualify for an exemption under Section 404(f) of the Clean Water Act (see 33 CFR 323.4).

Note 3: For NWP 14 activities that require pre-construction notification, the PCN must include any other NWP(s), regional general permit(s), or individual permit(s) used or intended to be used to authorize any part of the proposed project or any related activity, including other separate and distant crossings that require Department of the Army authorization but do not require pre-construction notification (see paragraph (b) of general condition 32). The district engineer will evaluate the PCN in accordance with Section D, ''District Engineer's Decision.''
The district engineer may require mitigation to ensure that the authorized activity results in no more than minimal individual and cumulative adverse environmental effects (see general condition 23).

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 14. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 14 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The affected area of the stream channel shall not exceed 300 linear feet, as measured along the stream corridor.
- 2. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, as determined by the Illinois EPA.
- 3. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 5. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- The applicant for Nationwide Permit 14 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
 Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed
- 7. Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed of clean coarse aggregate or non-erodible non-earthen fill material that will not cause siltation. Sandbags, pre-fabricated rigid materials, sheet piling, inflatable bladders and fabric lined basins may be used for temporary facilities.
- 8. The applicant for Nationwide Permit 14 that uses temporary work pads, cofferdams, access roads and other temporary fills in order to perform work in creeks, streams, or rivers shall maintain flow in these waters by utilizing dam and pumping, fluming, culverts or other such techniques.
- 15. U.S. Coast Guard Approved Bridges. Discharges of dredged or fill material incidental to the construction of a bridge across navigable waters of the United States, including cofferdams, abutments, foundation seals, piers, and temporary construction and access fills, provided the construction of the bridge structure has been authorized by the U.S. Coast Guard under Section 9 of the Rivers and Harbors Act of 1899 or other applicable laws. Causeways and approach fills are not included in this NWP and will require a separate Section 404 permit. (Authority: Section 404 of the Clean Water Act (Section 404))

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 15. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 15 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2011).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 16. Return Water From Upland Contained Disposal Areas. Return water from an upland contained dredged material disposal area. The return water from a contained disposal area is administratively defined as a discharge of dredged material by 33 CFR 323.2(d), even though the disposal itself occurs in an area that has no waters of the United States and does not require a

section 404 permit. This NWP satisfies the technical requirement for a section 404 permit for the return water where the quality of the return water is controlled by the state through the section 401 certification procedures. The dredging activity may require a section 404 permit (33 CFR 323.2(d)), and will require a Section 10 permit if located in navigable waters of the United States. (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 16. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 16 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. Applicants shall obtain a Subtitle C State Construction and Operating Permit for construction and operation of any dredge material disposal facility or upland contained disposal facility.
- 2. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 3. The applicant for Nationwide Permit 16 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 4. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 17. Hydropower Projects. Discharges of dredged or fill material associated with hydropower projects having: (a) Less than 5000 kW of total generating capacity at existing reservoirs, where the project, including the fill, is licensed by the Federal Energy Regulatory Commission (FERC) under the Federal Power Act of 1920, as amended; or (b) a licensing exemption granted by the FERC pursuant to section 408 of the Energy Security Act of 1980 (16 U.S.C. 2705 and 2708) and section 30 of the Federal Power Act, as amended.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 17. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 17 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;

 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- The applicant for Nationwide Permit 17 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- An individual Section 401 water quality certification will be required for any project that is not previously approved by a Section 401 water quality certification issued by the Illinois EPA for a Federal Energy Regulatory Commission license or permit.
- 18. Minor Discharges. Minor discharges of dredged or fill material into all waters of the United States, provided the activity meets all of the following criteria:
 - The quantity of discharged material and the volume of area excavated do not exceed 25 cubic yards below the plane of the ordinary high water mark or the high tide line:
 - (b) The discharge will not cause the loss of more than 1/10-acre of waters of the United States: and
 - The discharge is not placed for the purpose of a stream diversion.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if: (1) The discharge or the volume of area excavated exceeds 10 cubic yards below the plane of the ordinary high water mark or the high tide line, or (2) the discharge is in a special aquatic site, including wetlands. (See general condition 32.) (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 18. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 18 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;

- B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
- C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
- D. interference with water use practices near public recreation areas or water supply intakes.
- Any spoil material excavated, dredged or otherwise produced must not be returned to the
 waterway but must be deposited in a self-contained area in compliance with all state
 statutes, regulations and permit requirements with no discharge to waters of the State unless
 a permit has been issued by this Agency. Any backfilling must be done with clean material and
 placed in a manner to prevent violation of applicable water quality standards.
 The applicant for Nationwide Permit 18 shall implement erosion control measures consistent
- 3. The applicant for Nationwide Permit 18 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 19. Minor Dredging. Dredging of no more than 25 cubic yards below the plane of the ordinary high water mark or the mean high water mark from navigable waters of the United States (i.e., Section 10 waters). This NWP does not authorize the dredging or degradation through siltation of coral reefs, sites that support submerged aquatic vegetation (including sites where submerged aquatic vegetation is documented to exist but may not be present in a given year), anadromous fish spawning areas, or wetlands, or the connection of canals or other artificial waterways to navigable waters of the United States (see 33 CFR 322.5(g)). All dredged material must be deposited and retained in an area that has no waters of the United States unless otherwise specifically approved by the district engineer under separate authorization. (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 19. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 19 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 19 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. Dredging shall be done by mechanical means and material shall not be discharged to Waters of the State.
- 20. Response Operations for Oil and Hazardous Substances. Activities conducted in response to a discharge or release of oil or hazardous substances that are subject to the National Oil and Hazardous Substances Pollution Contingency Plan (40 CFR part 300) including containment, cleanup, and mitigation efforts, provided that the activities are done under either: (1) The Spill Control and Countermeasure Plan required by 40 CFR 112.3; (2) the direction or oversight of the federal on- scene coordinator designated by 40 CFR part 300; or (3) any approved existing state, regional or local contingency plan provided that the Regional Response Team (if one exists in the area) concurs with the proposed response efforts. This NWP also authorizes activities required for the cleanup of oil releases in waters of the United States from electrical equipment that are governed by EPA's polychlorinated biphenyl spill response regulations at 40 CFR part 761. This NWP also authorizes the use of temporary structures and fills in waters of the U.S. for spill response training exercises. (Authorities: Sections 10 and 404)
- *** 21. Surface Coal Mining Activities. Discharges of dredged or fill material into waters of the United States associated with surface coal mining and reclamation operations, provided the following criteria are met:
 - (a) The activities are already authorized, or are currently being processed by states with approved programs under Title V of the Surface Mining Control and Reclamation Act of 1977 or as part of an integrated permit processing procedure by the Department of the Interior, Office of Surface Mining Reclamation and Enforcement;
 - (b) The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal individual and cumulative adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges into tidal waters or non-tidal wetlands adjacent to tidal waters; and
 - (c) The discharge is not associated with the construction of valley fills. A 'valley fill' is a fill structure that is typically constructed within valleys associated with steep, mountainous terrain, associated with surface coal mining activities.

Notification: The permittee must submit a pre-construction notification to the district engineer and receive written authorization prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10 and 404)

22. Removal of Vessels. Temporary structures or minor discharges of dredged or fill material required for the removal of wrecked, abandoned, or disabled vessels, or the removal of man-made obstructions to navigation. This NWP does not authorize maintenance dredging, shoal removal, or riverbank snagging.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if: (1) The vessel is listed or eligible for listing in the National Register of Historic Places; or (2) the activity is conducted in a special aquatic site, including coral reefs and wetlands. (See General Condition 32.) If condition 1 above is triggered, the permittee cannot commence the activity until informed by the district engineer that compliance with the ''Historic Properties'' general condition is completed. (Authorities: Sections 10 and 404)

Note 1: If a removed vessel is disposed of in waters of the United States, a permit from the U.S. EPA may be required (see 40 CFR 229.3). If a Department of the Army permit is required for vessel disposal in waters of the United States, separate authorization will be required.

Note 2: Compliance with general condition 18, Endangered Species, and general condition 20, Historic Properties, is required for all NWPs. The concern with historic properties is emphasized in the notification requirements for this NWP because of the possibility that shipwrecks may be historic properties.

- *** 23. Approved Categorical Exclusions. Activities undertaken, assisted, authorized, regulated, funded, or financed, in whole or in part, by another Federal agency or department where:
 - (a) That agency or department has determined, pursuant to the Council on Environmental Quality's implementing regulations for the National Environmental Policy Act (40 CFR part 1500 et seq.), that the activity is categorically excluded from the requirement to prepare an environmental impact statement or environmental assessment analysis, because it is included within a category of actions which neither individually nor cumulatively have a significant effect on the human environment; and
 - (b) The Office of the Chief of Engineers (Attn: CECW-CO) has concurred with that agency's or department's determination that the activity is categorically excluded and approved the activity for authorization under NWP 23.

The Office of the Chief of Engineers may require additional conditions, including preconstruction notification, for authorization of an agency's categorical exclusions under this NWP.

Notification: Certain categorical exclusions approved for authorization under this NWP require the permittee to submit a pre-construction notification to the district engineer prior to commencing the activity (see general condition 32). The activities that require pre-construction notification are listed in the appropriate Regulatory Guidance Letters. (Authorities: Sections 10 and 404)

Note: The agency or department may submit an application for an activity believed to be categorically excluded to the Office of the Chief of Engineers (Attn: CECW-CO). Prior to approval for authorization under this NWP of any agency's activity, the Office of the Chief of Engineers will solicit public comment. As of the date of issuance of this NWP, agencies with approved categorical exclusions are: the Bureau of Reclamation, Federal Highway Administration, and U.S. Coast Guard. Activities approved for authorization under this NWP as of the date of this notice are found in Corps Regulatory Guidance Letter 05-07, which is available at: http://www.usace.army.mil/Portals/2/docs/civilworks/RGLS/rg105-07.pdf. Any future approved categorical exclusions will be announced in Regulatory Guidance Letters and posted on this same Web site.

24. Indian Tribe or State Administered Section 404 Programs. Any activity permitted by a state or Indian Tribe administering its own section 404 permit program pursuant to 33 U.S.C. 1344(g)-(1) is permitted pursuant to Section 10 of the Rivers and Harbors Act of 1899. (Authority: Section 10)

Note $\bar{1}$: As of the date of the promulgation of this NWP, only New Jersey and Michigan administer their own section 404 permit programs.

Note 2: Those activities that do not involve an Indian Tribe or State section 404 permit are not included in this NWP, but certain structures will be exempted by Section 154 of Public Law 94-587, 90 Stat. 2917 (33 U.S.C. 591) (see 33 CFR 322.4(b)).

25. Structural Discharges. Discharges of material such as concrete, sand, rock, etc., into tightly sealed forms or cells where the material will be used as a structural member for standard pile supported structures, such as bridges, transmission line footings, and walkways, or for general navigation, such as mooring cells, including the excavation of bottom material from within the form prior to the discharge of concrete, sand, rock, etc. This NWP does not authorize filled structural members that would support buildings, building pads, homes, house pads, parking areas, storage areas and other such structures. The structure itself may require a separate Section 10 permit if located in navigable waters of the United States. (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 25. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 25 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;

- C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
- D. interference with water use practices near public recreation areas or water supply intakes
- 2. The applicant for Nationwide Permit 25 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.

26. [Reserved]

27. Aquatic Habitat Restoration, Establishment, and Enhancement Activities. Activities in waters of the United States associated with the restoration, enhancement, and establishment of tidal and non-tidal wetlands and riparian areas, the restoration and enhancement of non-tidal streams and other non-tidal open waters, and the rehabilitation or enhancement of tidal streams, tidal wetlands, and tidal open waters, provided those activities result in net increases in aquatic resource functions and services.

To be authorized by this NWP, the aquatic habitat restoration, enhancement, or establishment activity must be planned, designed, and implemented so that it results in aquatic habitat that resembles an ecological reference. An ecological reference may be based on the characteristics of an intact aquatic habitat or riparian area of the same type that exists in the region. An ecological reference may be based on a conceptual model developed from regional ecological knowledge of the target aquatic habitat type or riparian area.

To the extent that a Corps permit is required, activities authorized by this NWP include, but are not limited to: The removal of accumulated sediments; the installation, removal, and maintenance of small water control structures, dikes, and berms, as well as discharges of dredged or fill material to restore appropriate stream channel configurations after small water control structures, dikes, and berms, are removed; the installation of current deflectors; the enhancement, rehabilitation, or re-establishment of riffle and pool stream structure; the placement of in-stream habitat structures; modifications of the stream bed and/or banks to enhance, rehabilitate, or re-establish stream meanders; the removal of stream barriers, such as undersized culverts, fords, and grade control structures; the backfilling of artificial channels; the removal of existing drainage structures, such as drain tiles, and the filling, blocking, or reshaping of drainage ditches to restore wetland hydrology; the installation of structures or fills necessary to restore or enhance wetland or stream hydrology; the construction of small nesting islands; the construction of open water areas; the construction of oyster habitat over unvegetated bottom in tidal waters; shellfish seeding; activities needed to reestablish vegetation, including plowing or discing for seed bed preparation and the planting of appropriate wetland species; re-establishment of submerged aquatic vegetation in areas where those plant communities previously existed; re-establishment of tidal wetlands in tidal waters where those wetlands previously existed; mechanized land clearing to remove non-native invasive, exotic, or nuisance vegetation; and other related activities. Only native plant species should be planted at the site.

This NWP authorizes the relocation of non-tidal waters, including non-tidal wetlands and streams, on the project site provided there are net increases in aquatic resource functions and services.

Except for the relocation of non-tidal waters on the project site, this NWP does not authorize the conversion of a stream or natural wetlands to another aquatic habitat type (e.g., the conversion of a stream to wetland or vice versa) or uplands. Changes in wetland plant communities that occur when wetland hydrology is more fully restored during wetland rehabilitation activities are not considered a conversion to another aquatic habitat type. This NWP does not authorize stream channelization. This NWP does not authorize the relocation of tidal waters or the conversion of tidal waters, including tidal wetlands, to other aquatic uses, such as the conversion of tidal wetlands into open water impoundments.

Compensatory mitigation is not required for activities authorized by this NWP since these activities must result in net increases in aquatic resource functions and services.

Reversion. For enhancement, restoration, and establishment activities conducted: (1) In accordance with the terms and conditions of a binding stream or wetland enhancement or restoration agreement, or a wetland establishment agreement, between the landowner and the U.S. Fish and Wildlife Service (FWS), the Natural Resources Conservation Service (NRCS), the Farm Service Agency (FSA), the National Marine Fisheries Service (NMFS), the National Ocean Service (NOS), U.S. Forest Service (USFS), or their designated state cooperating agencies; (2) as voluntary wetland restoration, enhancement, and establishment actions documented by the NRCS or USDA Technical Service Provider pursuant to NRCS Field Office Technical Guide standards; or (3)on reclaimed surface coal mine lands, in accordance with a Surface Mining Control and Reclamation Act permit issued by the Office of Surface Mining Reclamation and Enforcement (OSMRE) or the applicable state agency, this NWP also authorizes any future discharge of dredged or fill material associated with the reversion of the area to its documented prior condition and use (i.e., prior to the restoration, enhancement, or establishment activities). The reversion must occur within five years after expiration of a limited term wetland restoration or establishment agreement or permit, and is authorized in these circumstances even if the discharge occurs after this NWP expires. The five-year reversion limit does not apply to agreements without time limits reached between the landowner and the FWS, NRCS, FSA, NMFS, NOS, USFS, or an appropriate state cooperating agency. This NWP also authorizes discharges of dredged or fill material in waters of the United States for the reversion of wetlands that were restored, enhanced, or established on prior-converted cropland or on uplands, in accordance with a binding agreement between the landowner and NRCS, FSA, FWS, or their designated state cooperating agencies (even though the restoration, enhancement, or establishment activity did not require a section 404 permit). The prior condition will be documented in the original agreement or permit, and the determination of

return to prior conditions will be made by the Federal agency or appropriate state agency executing the agreement or permit. Before conducting any reversion activity the permittee or the appropriate Federal or state agency must notify the district engineer and include the documentation of the prior condition. Once an area has reverted to its prior physical condition, it will be subject to whatever the Corps Regulatory requirements are applicable to that type of land at the time. The requirement that the activity results in a net increase in aquatic resource functions and services does not apply to reversion activities meeting the above conditions. Except for the activities described above, this NWP does not authorize any future discharge of dredged or fill material associated with the reversion of the area to its prior condition. In such cases a separate permit would be required for any reversion.

Reporting. For those activities that do not require pre-construction notification, the permittee must submit to the district engineer a copy of: (1) The binding stream enhancement or restoration agreement or wetland enhancement, restoration, or establishment agreement, or a project description, including project plans and location map; (2) the NRCS or USDA Technical Service Provider documentation for the voluntary stream enhancement or restoration action or wetland restoration, enhancement, or establishment action; or (3) the SMCRA permit issued by OSMRE or the applicable state agency. The report must also include information on baseline ecological conditions on the project site, such as a delineation of wetlands, streams, and/or other aquatic habitats. These documents must be submitted to the district engineer at least 30 days prior to commencing activities in waters of the United States authorized by this NWP.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing any activity (see General Condition 32), except for the following activities:

- (1) Activities conducted on non-federal public lands and private lands, in accordance with the terms and conditions of a binding stream enhancement or restoration agreement or wetland enhancement, restoration, or establishment agreement between the landowner and the FWS, NRCS, FSA, NMFS, NOS, USFS or their designated state cooperating agencies;
- (2) Voluntary stream or wetlandrestoration or enhancement action, or wetland establishment action, documented by the NRCS or USDA Technical Service Provider pursuant to NRCS Field Office Technical Guide standards; or
- (3) The reclamation of surface coal mine lands, in accordance with an SMCRA permit issued by the OSMRE or the applicable state agency.

However, the permittee must submit a copy of the appropriate documentation to the district engineer to fulfill the reporting requirement. (Authorities: Sections 10 and 404)

Note: This NWP can be used to authorize compensatory mitigation projects, including mitigation banks and in-lieu fee projects. However, this NWP does not authorize the reversion of an area used for a compensatory mitigation project to its prior condition, since compensatory mitigation is generally intended to be permanent.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 27. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 27 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THIS NATIONWIDE SPECIFIC CONDITION, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. All activities conducted under NWP 27 shall be in accordance with the provisions of 35 Ill. Adm. Code 405.108. Work in reclaimed surface coal mine areas are required to obtain prior authorization from the Illinois EPA for any activities that result in the use of acid-producing mine refuse.
- 2. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 3. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section
- 28. Modifications of Existing Marinas. Reconfiguration of existing docking facilities within an authorized marina area. No dredging, additional slips, dock spaces, or expansion of any kind within waters of the United States is authorized by this NWP. (Authority: Section 10)
- 29. Residential Developments. Discharges of dredged or fill material into non-tidal waters of the United States for the construction or expansion of a single residence, a multiple unit residential development, or a residential subdivision. This NWP authorizes the construction of building foundations and building pads and attendant features that are necessary for the use of the residence or residential development. Attendant features may include but are not limited to roads, parking lots, garages, yards, utility lines, storm water management facilities, septic fields, and recreation facilities such as playgrounds, playing fields, and golf courses (provided the golf course is an integral part of the residential development).

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more

than minimal adverse environmental effects. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre.

Subdivisions: For residential subdivisions, the aggregate total loss of waters of United States authorized by this NWP cannot exceed 1/2-acre. This includes any loss of waters of the United States associated with development of individual subdivision lots.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See General Condition 32.) (Authorities: Sections 10

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 29. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 29 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 29 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant is advised that the following permit(s) must be obtained from the Illinois EPA: The applicant must obtain permits to construct sanitary sewers, water mains, and related facilities prior to construction.
- 6. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 29.
- 30. Moist Soil Management for Wildlife. Discharges of dredged or fill material into non-tidal waters of the United States and maintenance activities that are associated with moist soil management for wildlife for the purpose of continuing ongoing, site- specific, wildlife management activities where soil manipulation is used to manage habitat and feeding areas for wildlife. Such activities include, but are not limited to, plowing or discing to impede succession, preparing seed beds, or establishing fire breaks. Sufficient riparian areas must be maintained adjacent to all open water bodies, including streams, to preclude water quality degradation due to erosion and sedimentation. This NWP does not authorize the construction of new dikes, roads, water control structures, or similar features associated with the management areas. The activity must not result in a net loss of aquatic resource functions and services. This NWP does not authorize the conversion of wetlands to uplands, impoundments, or other open water bodies. (Authority: Section 404)

Note: The repair, maintenance, or replacement of existing water control structures or the repair or maintenance of dikes may be authorized by NWP 3. Some such activities may qualify for an exemption under section 404(f) of the Clean Water Act (see 33 CFR 323.4).

*** 31. Maintenance of Existing Flood Control Facilities. Discharges of dredged or fill material resulting from activities associated with the maintenance of existing flood control facilities, including debris basins, retention/ detention basins, levees, and channels that: (i) Were previously authorized by the Corps by individual permit, general permit, or 33 CFR 330.3, or did not require a permit at the time they were constructed, or (ii) were constructed by the Corps and transferred to a non-federal sponsor for operation and maintenance. Activities authorized by this NWP are limited to those resulting from maintenance activities that are conducted within the 'maintenance baseline,'' as described in the definition below. Discharges of dredged or fill materials associated with maintenance activities in flood control facilities in any watercourse that have previously been determined to be within the maintenance baseline are authorized under this NWP. To the extent that a Corps permit is required, this NWP authorizes the removal of vegetation from levees associated with the flood control project. This NWP does not authorize the removal of sediment and associated vegetation from natural water courses except when these activities have been included in the maintenance baseline. All dredged and excavated material must be deposited and retained in an area that has no waters of the United States unless otherwise specifically approved by the district engineer under separate authorization. Proper sediment controls must be used.

Maintenance Baseline: The maintenance baseline is a description of the physical characteristics (e.g., depth, width, length, location, configuration, or design flood capacity, etc.) of a flood control project within which maintenance activities are normally authorized by NWP 31, subject to any case-specific conditions required by the district engineer. The district engineer will approve the maintenance baseline based on the approved or constructed capacity of the flood control facility, whichever is smaller, including any areas where there are no constructed channels but which are part of the facility. The prospective permittee will provide documentation of the physical characteristics of the flood control facility (which will normally consist of as-built or approved drawings) and documentation of the approved and constructed design capacities of the flood control facility. If no evidence of the constructed capacity exists, the approved capacity will be used. The documentation will also include best management practices to ensure that the adverse environmental impacts caused by the maintenance activities are no more than minimal, especially in maintenance areas where there are no constructed channels. (The Corps may request maintenance records in areas where there has not been recent maintenance.) Revocation or modification of the final determination of the maintenance baseline can only be done in accordance with 33 CFR 330.5. Except in emergencies as described below, this NWP cannot be used until the district engineer approves the maintenance baseline and determines the need for mitigation and any regional or activity-specific conditions. Once determined, the maintenance baseline will remain valid for any subsequent reissuance of this NWP. This NWP does not authorize maintenance of a flood control facility that has been abandoned. A flood control facility will be considered abandoned if it has operated at a significantly reduced capacity without needed maintenance being accomplished in a timely manner. A flood control facility will not be considered abandoned if the prospective permittee is in the process of obtaining other authorizations or approvals required for maintenance activities and is experiencing delays in obtaining those authorizations or approvals.

Mitigation: The district engineer will determine any required mitigation one-time only for impacts associated with maintenance work at the same time that the maintenance baseline is approved. Such one-time mitigation will be required when necessary to ensure that adverse environmental effects are no more than minimal, both individually and cumulatively. Such mitigation will only be required once for any specific reach of a flood control project. However, if one-time mitigation is required for impacts associated with maintenance activities, the district engineer will not delay needed maintenance, provided the district engineer and the permittee establish a schedule for identification, approval, development, construction and completion of any such required mitigation. Once the one-time mitigation described above has been completed, or a determination made that mitigation is not required, no further mitigation will be required for maintenance activities within the maintenance baseline (see Note, below). In determining appropriate mitigation, the district engineer will give special consideration to natural water courses that have been included in the maintenance baseline and require mitigation and/or best management practices as appropriate.

Emergency Situations: In emergency situations, this NWP may be used to authorize maintenance activities in flood control facilities for which no maintenance baseline has been approved. Emergency situations are those which would result in an unacceptable hazard to life, a significant loss of property, or an immediate, unforeseen, and significant economic hardship if action is not taken before a maintenance baseline can be approved. In such situations, the determination of mitigation requirements, if any, may be deferred until the emergency has been resolved. Once the emergency has ended, a maintenance baseline must be established expeditiously, and mitigation, including mitigation for maintenance conducted during the emergency, must be required as appropriate.

Notification: The permittee must submit a pre-construction notification to the district engineer before any maintenance work is conducted (see general condition 32). The Pre-construction notification may be for activity-specific maintenance or for maintenance of the entire flood control facility by submitting a five-year (or less) maintenance plan. The Pre-construction notification must include a description of the maintenance baseline and the disposal site for dredged or excavated material. (Authorities: Sections 10 and 404)

Note: If the maintenance baseline was approved by the district engineer under a prior version of NWP 31, and the district engineer imposed the one-time compensatory mitigation requirement on maintenance for a specific reach of a flood control project authorized by that prior version of NWP 31, during the period this version of NWP 31 is in effect (March 19, 2017, to March 18, 2022) the district engineer will not require additional compensatory mitigation for maintenance activities authorized by this NWP in that specific reach of the flood control project.

- **32. Completed Enforcement Actions.** Any structure, work, or discharge of dredged or fill material remaining in place or undertaken for mitigation, restoration, or environmental benefit in compliance with either:
 - The terms of a final written Corps non-judicial settlement agreement resolving a violation of Section 404 of the Clean Water Act and/or Section 10 of the Rivers and Harbors Act of 1899; or the terms of an EPA 309(a) order on consent resolving a violation of section 404 of the Clean Water Act, provided that:
 - (a) The activities authorized by this NWP cannot adversely affect more than 5 acres of non-tidal waters or 1 acre of tidal waters;
 - (b) The settlement agreement provides for environmental benefits, to an equal or greater degree, than the environmental detriments caused by the unauthorized activity that is authorized by this NWP; and
 - (c) The district engineer issues a verification letter authorizing the activity subject to the terms and conditions of this NWP and the settlement agreement, including a specified completion date; or
 - The terms of a final Federal court decision, consent decree, or settlement agreement resulting from an enforcement action brought by the United States under section 404 of the Clean Water Act and/or Section 10 of the Rivers and Harbors Act of 1899; or
 - iii The terms of a final court decision, consent decree, settlement agreement, or non-judicial settlement agreement resulting from a natural resource damage claim brought by a trustee or trustees for natural resources (as defined by the National Contingency Plan at 40 CFR subpart G) under Section 311 of the Clean Water Act, Section 107 of the Comprehensive Environmental Response, Compensation and

Liability Act, Section 312 of the National Marine Sanctuaries Act, Section 1002 of the Oil Pollution Act of 1990, or the Park System Resource Protection Act at 16 U.S.C. 19jj, to the extent that a Corps permit is required.

Compliance is a condition of the NWP itself; non-compliance of the terms and conditions of an NWP 32 authorization may result in an additional enforcement action (e.q., a Class I civil administrative penalty). Any authorization under this NWP is automatically revoked if the permittee does not comply with the terms of this NWP or the terms of the court decision, consent decree, or judicial/non-judicial settlement agreement. This NWP does not apply to any activities occurring after the date of the decision, decree, or agreement that are not for the purpose of mitigation, restoration, or environmental benefit. Before reaching any settlement agreement, the Corps will ensure compliance with the provisions of 33 CFR part 326 and 33 CFR 330.6(d)(2) and (e). (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 32. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 32 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
- 3. Except as allowed under condition 9, any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by the Illinois EPA. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant for Nationwide Permit 32 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 6. The applicant is advised that the following permit(s) must be obtained from the Illinois EPA: The applicant must obtain permits to construct sanitary sewers, water mains, and related facilities prior to construction.
- 7. Backfill used in the stream-crossing trench shall be predominantly sand or larger size material, with <20% passing a #230 U.S. sieve.
- 8. Any channel relocation shall be constructed under dry conditions and stabilized to prevent erosion prior to the diversion of flow.
- 9. Backfill used within trenches passing through surface water of the State, except wetland areas, shall be clean course aggregate, gravel or other material which will not cause siltation, pipe damage during placement, or chemical corrosion in place. Excavated material may be used only if:
 - A. Particle size analysis is conducted and demonstrates the material to be at least 80% sand or larger size material, using a #230 U.S. sieve; or
 - B. Excavation and backfilling are done under dry conditions.
- 10. Backfill used within trenches passing through wetland areas shall consist of clean material which will not cause siltation, pipe damage during placement, or chemical corrosion in place. Excavated material shall be used to the extent practicable, with the upper six (6) to twelve (12) inches backfilled with the topsoil obtained during trench excavation.
- 11. Any applicant proposing activities in a mined area or previously mined area shall provide to the IEPA a written determination regarding whether the sediment and materials that will be used are considered "acid-producing material" as defined in 35 Il. Adm. Code, Subtitle D. If considered "acid-producing material," the applicant shall obtain a permit to construct pursuant to 35 Il. Adm. Code 404.101.
- 12. Asphalt, bituminous material and concrete with protruding material such as reinforcing bar or mesh shall not be 1) used for backfill, 2) placed on shorelines/stream banks, or 3) placed in waters of the State.
- 33. Temporary Construction, Access, and Dewatering. Temporary structures, work, and discharges, including cofferdams, necessary for construction activities or access fills or dewatering of construction sites, provided that the associated primary activity is authorized by the Corps of Engineers or the U.S. Coast Guard. This NWP also authorizes temporary structures, work, and discharges, including cofferdams, necessary for construction activities not otherwise subject to the Corps or U.S. Coast Guard permit requirements. Appropriate measures must be taken to maintain near normal downstream flows and to minimize flooding. Fill must consist of materials, and be placed in a manner, that will not be eroded by expected high flows. The use of dredged material may be allowed if the district engineer determines that it will not cause more than minimal adverse environmental effects. Following completion of construction, temporary fill

must be entirely removed to an area that has no waters of the United States, dredged material must be returned to its original location, and the affected areas must be restored to preconstruction elevations. The affected areas must also be revegetated, as appropriate. This permit does not authorize the use of cofferdams to dewater wetlands or other aquatic areas to change their use. Structures left in place after construction is completed require a separate Section 10 permit if located in navigable waters of the United States. (See 33 CFR part 322.)

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if the activity is conducted in navigable waters of the United States (i.e., Section 10 waters) (see general condition 32). The pre-construction notification must include a restoration plan showing how all temporary fills and structures will be removed and the area restored to pre- project conditions. (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 33. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 33 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, as determined by the Illinois EPA.
- 2. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 3. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant for Nationwide Permit 33 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).6. Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed
- 6. Temporary work pads, cofferdams, access roads and other temporary fills shall be constructed of clean coarse aggregate or non-erodible non-earthen fill material that will not cause siltation. Sandbags, pre-fabricated rigid materials, sheet piling, inflatable bladders and fabric lined basins may be used for temporary facilities.
- 7. The applicant for Nationwide Permit 33 who uses temporary work pads, cofferdams, access roads and other temporary fills in order to perform work in creeks, streams, or rivers shall maintain flow in these waters by utilizing dam and pumping, fluming, culverts or other such techniques.
- 8. During dewatering of the coffered work area, all sediment-laden water shall have adequate sediment removed such that water quality standards, including preventing unnatural turbidity, are met in the receiving stream.
- *** 34. Cranberry Production Activities. Discharges of dredged or fill material for dikes, berms, pumps, water control structures or leveling of cranberry beds associated with expansion, enhancement, or modification activities at existing cranberry production operations. The cumulative total acreage of disturbance per cranberry production operation, including but not limited to, filling, flooding, ditching, or clearing, must not exceed 10 acres of waters of the United States, including wetlands. The activity must not result in a net loss of wetland acreage. This NWP does not authorize any discharge of dredged or fill material related to other cranberry production activities such as warehouses, processing facilities, or parking areas. For the purposes of this NWP, the cumulative total of 10 acres will be measured over the period that this NWP is valid.

Notification: The permittee must submit a pre-construction notification to the district engineer once during the period that this NWP is valid, and the NWP will then authorize discharges of dredge or fill material at an existing operation for the permit term, provided the 10-acre limit is not exceeded. (See general condition 32.) (Authority: Section 404)

- 35. Maintenance Dredging of Existing Basins. The removal of accumulated sediment for maintenance of existing marina basins, access channels to marinas or boat slips, and boat slips to previously authorized depths or controlling depths for ingress/egress, whichever is less. All dredged material must be deposited and retained in an area that has no waters of the United States unless otherwise specifically approved by the district engineer under separate authorization. Proper sediment controls must be used for the disposal site. (Authority: Section 10)
- **36. Boat Ramps.** Activities required for the construction of boat ramps, provided the activity meets all of the following criteria:
 - (a) The discharge into waters of the United States does not exceed 50 cubic yards of concrete, rock, crushed stone or gravel into forms, or in the form of precast concrete planks or slabs, unless the district engineer waives the 50

- cubic yard limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects; The boat ramp does not exceed 20 feet in width, unless the district engineer (b) waives this criterion by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects;
- The base material is crushed stone, gravel or other suitable material; (c)
- The excavation is limited to the area necessary for site preparation and all (d) excavated material is removed to an area that has no waters of the United
- No material is placed in special aquatic sites, including wetlands. (e)

The use of unsuitable material that is structurally unstable is not authorized. If dredging in navigable waters of the United States is necessary to provide access to the boat ramp, the dredging must be authorized by another NWP, a regional general permit, or an individual permit.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if: (1) The discharge into waters of the United States exceeds 50 cubic yards, or (2) the boat ramp exceeds 20 feet in width. (See general condition 32.) (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 36. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 36 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 36 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.

*** 37. Emergency Watershed Protection and Rehabilitation. Work done by or funded by:

- The Natural Resources Conservation Service for a situation requiring immediate (a) action under its emergency Watershed Protection Program (7 CFR part 624);
- (b) The U.S. Forest Service under its Burned-Area Emergency Rehabilitation
- Handbook (FSH 2509.13);
- The Department of the Interior for wildland fire management burned area (c) emergency stabilization and rehabilitation (DOI Manual part 620, Ch. 3);
- (d) The Office of Surface Mining, or states with approved programs, for abandoned mine land reclamation activities under Title IV of the Surface Mining Control and Reclamation Act (30 CFR subchapter R), where the activity does not involve coal extraction; or
- (e) The Farm Service Agency under its Emergency Conservation Program (7 CFR part 701).

In general, the prospective permittee should wait until the district engineer issues an NWP verification or 45 calendar days have passed before proceeding with the watershed protection and rehabilitation activity. However, in cases where there is an unacceptable hazard to life or a significant loss of property or economic hardship will occur, the emergency watershed protection and rehabilitation activity may proceed immediately and the district engineer will consider the information in the pre-construction notification and any comments received as a result of agency coordination todecide whether the NWP 37 authorization should be modified, suspended, or revoked in accordance with the procedures at 33 CFR 330.5.

Notification: Except in cases where there is an unacceptable hazard to life or a significant loss of property or economic hardship will occur, the permittee must submit a pre-construction notification to the district engineer prior to commencing the activity (see general condition 32). (Authorities: Sections 10 and 404)

38. Cleanup of Hazardous and Toxic Waste. Specific activities required to effect the containment, stabilization, or removal of hazardous or toxic waste materials that are performed, ordered, or sponsored by a government agency with established legal or regulatory authority. Court ordered remedial action plans or related settlements are also authorized by this NWP. This NWP does not authorize the establishment of new disposal sites or the expansion of existing sites used for the disposal of hazardous or toxic waste.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10

Note: Activities undertaken entirely on a Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA) site by authority of CERCLA as approved or required by EPA, are not required to obtain permits under Section 404 of the Clean Water Act or Section 10 of the Rivers and Harbors Act.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 38. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 38 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes
- 2. In addition to any actions required of the NWP applicant with respect to the "Notification" General Condition 32, the applicant shall notify the Illinois EPA, Bureau of Water, of the specific activity. This notification shall include information concerning the orders and approvals that have been or will be obtained from the Illinois EPA Bureau of Land (BOL), for all cleanup activities under BOL jurisdiction or for which authorization or approval is sought from BOL for no further remedial action.
- 3. An individual Section 401 water quality certification will be required for activities that do not require or will not receive authorization or approval from the BOL.
- 39. Commercial and Institutional Developments. Discharges of dredged or fill material into non-tidal waters of the United States for the construction or expansion of commercial and institutional building foundations and building pads and attendant features that are necessary for the use and maintenance of the structures. Attendant features may include, but are not limited to, roads, parking lots, garages, yards, utility lines, storm water management facilities, wastewater treatment facilities, and recreation facilities such as playgrounds and playing fields. Examples of commercial developments include retail stores, industrial facilities, restaurants, business parks, and shopping centers. Examples of institutional developments include schools, fire stations, government office buildings, judicial buildings, public works buildings, libraries, hospitals, and places of worship. The construction of new golf courses and new ski areas is not authorized by this NWP.

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed $1\!\!/\,2 ext{-acre.}$ This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10 and 404

Note: For any activity that involves the construction of a wind energy generating structure, solar tower, or overhead transmission line, a copy of the PCN and NWP verification will be provided to the Department of Defense Siting Clearinghouse, which will evaluate potential effects on military activities.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 39. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 39 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 39 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be

- obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant is advised that the following permit(s) must be obtained from the Illinois EPA: The applicant must obtain permits to construct sanitary sewers, water mains, water treatment plants, wastewater treatment plants and related facilities prior to construction.
- 6. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 39.
- 7. For construction of oil and gas wells, the impacted waters of the State shall be restored to pre-construction conditions within six months after construction is started. For purposes of this condition, restoration includes stabilization and seeding or planting of vegetation on the disturbed areas that were vegetated prior to construction.
- **40. Agricultural Activities.** Discharges of dredged or fill material into non-tidal waters of the United States for agricultural activities, including the construction of building pads for farm buildings. Authorized activities include the installation, placement, or construction of drainage tiles, ditches, or levees; mechanized land clearing; land leveling; the relocation of existing serviceable drainage ditches constructed in waters of the United States; and similar activities.

This NWP also authorizes the construction of farm ponds in non-tidal waters of the United States, excluding perennial streams, provided the farm pond is used solely for agricultural purposes. This NWP does not authorize the construction of aquaculture ponds.

This NWP also authorizes discharges of dredged or fill material into non-tidal waters of the United States to relocate existing serviceable drainage ditches constructed in non-tidal streams. The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States.

The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authorities: Section 404) Note: Some discharges for agricultural activities may qualify for an exemption under Section 404(f) of the Clean Water Act (see 33 CFR 323.4). This NWP authorizes the construction of farm ponds that do not qualify for the Clean Water Act section 404(f)(1)(C) exemption because of the recapture provision at section 404(f)(2).

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 40. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 40 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes
- 2. The applicant for Nationwide Permit 40 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 41. Reshaping Existing Drainage Ditches. Discharges of dredged or fill material into nontidal waters of the United States, excluding non-tidal wetlands adjacent to tidal waters, to modify the cross-sectional configuration of currently serviceable drainage ditches constructed in waters of the United States, for the purpose of improving water quality by regrading the drainage ditch with gentler slopes, which can reduce erosion, increase growth of vegetation, and increase uptake of nutrients and other substances by vegetation. The reshaping of the ditch cannot increase drainage capacity beyond the original as-built capacity nor can it expand the area drained by the ditch as originally constructed (i.e., the capacity of the ditch must be the same as originally constructed and it cannot drain additional wetlands or other waters of the United States). Compensatory mitigation is not required because the work is designed to improve water quality.

This NWP does not authorize the relocation of drainage ditches constructed in waters of the United States; the location of the centerline of the reshaped drainage ditch must be

approximately the same as the location of the centerline of the original drainage ditch. This NWP does not authorize stream channelization or stream relocation projects. (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 41. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 41 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - violation of applicable provisions of the Illinois Environmental Protection Act;
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 41 shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by the Illinois EPA. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant for Nationwide Permit 41 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 6. The applicant is advised that the following permit(s) must be obtained from the Agency: permits to construct sanitary sewers, water mains and related facilities prior to construction.
- 7. The proposed work shall be constructed with adequate erosion control measures (i.e., silt fences, etc.) to prevent transport of sediment and materials to the adjoining wetlands and/or streams.
- 42. Recreational Facilities. Discharges of dredged or fill material into non-tidal waters of the United States for the construction or expansion of recreational facilities. Examples of recreational facilities that may be authorized by this NWP include playing fields (e.g., football fields, baseball fields), basketball courts, tennis courts, hiking trails, bike paths, golf courses, ski areas, horse paths, nature centers, and campgrounds (excluding recreational vehicle parks). This NWP also authorizes the construction or expansion of small support facilities, such as maintenance and storage buildings and stables that are directly related to the recreational activity, but it does not authorize the construction of hotels, restaurants, racetracks, stadiums, arenas, or similar facilities.

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 42. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 42 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 42 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken

and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.

- 5. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 42.
- 43. Stormwater Management Facilities. Discharges of dredged or fill material into non-tidal waters of the United States for the construction of stormwater management facilities, including stormwater detention basins and retention basins and other stormwater management facilities; the construction of water control structures, outfall structures and emergency spillways; the construction of low impact development integrated management features such as bioretention facilities (e.g., rain gardens), vegetated filter strips, grassed swales, and infiltration trenches; and the construction of pollutant reduction green infrastructure features designed to reduce inputs of sediments, nutrients, and other pollutants into waters to meet reduction targets established under Total Daily Maximum Loads set under the Clean Water Act.

This NWP authorizes, to the extent that a section 404 permit is required, discharges of dredged or fill material into non-tidal waters of the United States for the maintenance of stormwater management facilities, low impact development integrated management features, and pollutant reduction green infrastructure features. The maintenance of stormwater management facilities, low impact development integrated management features, and pollutant reduction green infrastructure features that are not waters of the United States does not require a section 404 permit.

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges of dredged or fill material for the construction of new stormwater management facilities in perennial streams.

Notification: For discharges into non-tidal waters of the United States for the construction of new stormwater management facilities or pollutant reduction green infrastructure features, or the expansion of existing stormwater management facilities or pollutant reduction green infrastructure features, the permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) Maintenance activities do not require pre-construction notification if they are limited to restoring the original design capacities of the stormwater management facility or pollutant reduction green infrastructure feature. (Authority: Section 404))

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 43. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 43 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- The Agency hereby issues Section 401 water quality certification of Nationwide Permit 43 exclusively for the construction and maintenance of pollutant reduction green infrastructure features designed to reduce inputs of sediments, nutrients, and other pollutants into waters to meet reduction targets established under Total Daily Maximum Loads set under the Clean Water Act. All other activities authorized under this Nationwide Permit are denied Section 401 water quality certification. For purposes of this water quality certification green infrastructure means wet weather management approaches and technologies that utilize, enhance or mimic the natural hydrologic cycle processes of infiltration, evapotranspiration and reuse. Green infrastructure approaches currently in use include green roofs, trees and tree boxes, rain gardens, vegetated swales, pocket wetlands, infiltration planters, porous and permeable pavements, porous piping systems, dry wells, vegetated median strips, reforestation/revegetation, rain barrels and cisterns and protection and enhancement of riparian buffers and floodplains. Material excavated, dredged or produced from the maintenance of green infrastructure features shall not be discharged to waters of the State.
 The applicant for Nationwide Permit 43 shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 3. The applicant for Nationwide Permit 43 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 4. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 5. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The

applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.

- **44. Mining Activities.** Discharges of dredged or fill material into non-tidal waters of the United States for mining activities, except for coal mining activities, provided the activity meets all of the following criteria:
 - (a) For mining activities involving discharges of dredged or fill material into non-tidal wetlands, the discharge must not cause the loss of greater than 1/2-acre of non-tidal wetlands;
 - (b) For mining activities involving discharges of dredged or fill material in nontidal open waters (e.g., rivers, streams, lakes, and ponds) the mined area, including permanent and temporary impacts due to discharges of dredged or fill material into jurisdictional waters, must not exceed 1/2-acre; and
 - (c) The acreage loss under paragraph (a) plus the acreage impact under paragraph (b) does not exceed 1/2-acre.

The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects.

The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed $1\!\!/\,2\text{-acre.}$

This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters. Notification: The permittee must submit a pre-construction-notification to the district engineer prior to commencing the activity. (See general condition 32.) If reclamation is required by other statutes, then a copy of the final reclamation plan must be submitted with the pre-construction notification. (Authorities: Sections 10 and 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 44. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 44 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 44 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. The facility shall be covered by either a Subtitle D NPDES mining permit or a Subtitle D State Construction and Operating Permit for mining activities.
- 5. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 44.
- 45. Repair of Uplands Damaged by Discrete Events. This NWP authorizes discharges of dredged or fill material, including dredging or excavation, into all waters of the United States for activities associated with the restoration of upland areas damaged by storms, floods, or other discrete events. This NWP authorizes bank stabilization to protect the restored uplands. The restoration of the damaged areas, including any bank stabilization, must not exceed the contours, or ordinary high water mark, that existed before the damage occurred. The district engineer retains the right to determine the extent of the pre-existing conditions and the extent of any restoration work authorized by this NWP. The work must commence, or be under contract to commence, within two years of the date of damage, unless this condition is waived in writing by the district engineer. This NWP cannot be used to reclaim lands lost to normal erosion processes over an extended period.

This NWP does not authorize beach restoration or nourishment.

Minor dredging is limited to the amount necessary to restore the damaged upland area and should not significantly alter the pre-existing bottom contours of the waterbody.

Notification: The permittee must submit a pre-construction notification to the district engineer (see general condition 32) within 12 months of the date of the damage; for major storms, floods, or other discrete events, the district engineer may waive the 12- month limit for submitting a pre-construction notification if the permittee can demonstrate funding, contract, or other similar delays. The pre-construction notification must include documentation, such as a recent topographic survey or photographs, to justify the extent of the proposed restoration. (Authority: Sections 10 and 404)

Note: The uplands themselves that are lost as a result of a storm, flood, or other discrete event can be replaced without a section 404 permit, if the uplands are restored to the ordinary high water mark (in non-tidal waters) or high tide line (in tidal waters). (See also 33 CFR 328.5.) This NWP authorizes discharges of dredged or fill material into waters of the United States associated with the restoration of uplands

46. Discharges in Ditches. Discharges of dredged or fill material into non-tidal ditches that are: (1) Constructed in uplands, (2) receive water from an area determined to be a water of the United States prior to the construction of the ditch, (3) divert water to an area determined to be a water of the United States prior to the construction of the ditch, and (4) determined to be waters of the United States. The discharge must not cause the loss of greater than one acre of waters of the United States.

This NWP does not authorize discharges of dredged or fill material into ditches constructed in streams or other waters of the United States, or in streams that have been relocated in uplands. This NWP does not authorize discharges of dredged or fill material that increase the capacity of the ditch and drain those areas determined to be waters of the United States prior to construction of the ditch.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authority: Section 404)

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 46. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 46 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit shall provide adequate planning and supervision during the project construction period for implementing construction methods, processes and cleanup procedures necessary to prevent water pollution and control erosion.
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by the Illinois EPA. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. The applicant for Nationwide Permit 46 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 6. The applicant is advised that the following permit(s) must be obtained from the Agency: permits to construct sanitary sewers, water mains and related facilities prior to construction.
- 7. The proposed work shall be constructed with adequate erosion control measures (i.e., silt fences, etc.) to prevent transport of sediment and materials to the adjoining wetlands and/or
- 8. The applicant shall not sever the connection between upstream and downstream surface waters of the State by the discharge of dredged or fill material into ditches.

47. [Reserved]

*** 48. Commercial Shellfish Aquaculture Activities. Discharges of dredged or fill material into waters of the United States or structures or work in navigable waters of the United States necessary for new and continuing commercial shellfish aquaculture operations in authorized project areas. For the purposes of this NWP, the project area is the area in which the operator is authorized to conduct commercial shellfish aquaculture activities, as identified through a lease or permit issued by an appropriate state or local government agency, a treaty, or any easement, lease, deed, contract, or other legally binding agreement that establishes an enforceable property interest for the operator. A 'new commercial shellfish aquaculture operation'' is an operation in a project area where commercial shellfish aquaculture activities have not been conducted during the past 100 years.

This NWP authorizes the installation of buoys, floats, racks, trays, nets, lines, tubes, containers, and other structures into navigable waters of the United States. This NWP also authorizes discharges of dredged or fill material into waters of the United States necessary for shellfish seeding, rearing, cultivating, transplanting, and harvesting activities. Rafts and other floating structures must be securely anchored and clearly marked.

This NWP does not authorize:

- The cultivation of a nonindigenous species unless that species has been previously (a) cultivated in the waterbody;
- The cultivation of an aquatic nuisance species as defined in the Nonindigenous Aquatic Nuisance Prevention and Control Act of 1990;
- Attendant features such as docks, piers, boat ramps, stockpiles, or staging areas, (c) or the deposition of shell material back into waters of the United States as

(d) Activities that directly affect more than 1/2-acre of submerged aquatic vegetation beds in project areas that have not been used for commercial shellfish aquaculture activities during the past 100 years.

Notification: The permittee must submit a pre-construction notification to the district engineer if: (1) The activity will include a species that has never been cultivated in the waterbody; or (2) the activity occurs in a project area that has not been used for commercial shellfish aquaculture activities during the past 100 years. If the operator will be conducting commercial shellfish aquaculture activities in multiple contiguous project areas, he or she can either submit one PCN for those contiguous project areas or submit a separate PCN for each project area. (See general condition 32.)

In addition to the information required by paragraph (b) of general condition 32, the preconstruction notification must also include the following information: (1) A map showing the boundaries of the project area(s), with latitude and longitude coordinates for each corner of each project area; (2) the name(s) of the species that will be cultivated during the period this NWP is in effect; (3) whether canopy predator nets will be used; (4) whether suspended cultivation techniques will be used; and (5) general water depths in the project area(s) (a detailed survey is not required). No more than one pre-construction notification per project area or group of contiguous project areas should be submitted for the commercial shellfish operation during the effective period of this NWP. The pre-construction notification should describe all species and culture activities the operator expects to undertake in the project area or group of contiguous project areas during the effective period of this NWP. If an operator intends to undertake unanticipated changes to the commercial shellfish aquaculture operation during the effective period of this NWP, and those changes require Department of the Army authorization, the operator must contact the district engineer to request a modification of the NWP verification; a new Pre-construction notification does not need to be submitted (Authorities: Sections 10 and 404)

Note 1: The permittee should notify the applicable U.S. Coast Guard office regarding the project.

Note 2: To prevent introduction of aquatic nuisance species, no material that has been taken from a different waterbody may be reused in the current project area, unless it has been treated in accordance with the applicable regional aquatic nuisance species management plan.

Note 3: The Nonindigenous Aquatic Nuisance Prevention and Control Act of 1990 defines ''aquatic nuisance species'' as ''a nonindigenous species that threatens the diversity or abundance of native species or the ecological stability of infested waters, or commercial, agricultural, aquacultural, or recreational activities dependent on such waters.''

*** 49. Coal Remining Activities. Activities. Discharges of dredged or fill material into non-tidal waters of the United States associated with the remining and reclamation of lands that were previously mined for coal. The activities must already be authorized, or they must currently be in process as part of an integrated permit processing procedure, by the Department of the Interior Office of Surface Mining Reclamation and Enforcement, or by states with approved programs under Title IV or Title V of the Surface Mining Control and Reclamation Act of 1977 (SMCRA). Areas previously mined include reclaimed mine sites, abandoned mine land areas, or lands under bond forfeiture contracts.

As part of the project, the permittee may conduct new coal mining activities in conjunction with the remining activities when he or she clearly demonstrates to the district engineer that the overall mining plan will result in a net increase in aquatic resource functions. The Corps will consider the SMCRA agency's decision regarding the amount of currently undisturbed adjacent lands needed to facilitate the remining and reclamation of the previously mined area. The total area disturbed by new mining must not exceed 40 percent of the total acreage covered by both the remined area and the additional area necessary to carry out the reclamation of the previously mined area.

The permittee must submit a pre-construction notification and a document describing how the overall mining plan will result in a net increase in aquatic resource functions to the district engineer and receive written authorization prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10 and 404)

*** 50. Underground Coal Mining Activities. Discharges of dredged or fill material into non-tidal waters of the United States associated with underground coal mining and reclamation operations provided the activities are authorized, or are currently being processed as part of an integrated permit processing procedure, by the Department of the Interior, Office of Surface Mining Reclamation and Enforcement, or by states with approved programs under Title V of the Surface Mining Control and Reclamation Act of 1977.

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters. This NWP does not authorize coal preparation and processing activities outside of the mine site.

Notification: The permittee must submit a pre-construction notification to the district engineer and receive written authorization prior to commencing the activity. (See general condition 32.) If reclamation is required by other statutes, then a copy of the reclamation plan must be submitted with the pre-construction notification. (Authorities: Sections 10 and 404)

Note: Coal preparation and processing activities outside of the mine site may be authorized by NWP 21.

51. Land-Based Renewable Energy Generation Facilities. Discharges of dredged or fill material into non-tidal waters of the United States for the construction, expansion, or modification of land-based renewable energy production facilities, including attendant features. Such facilities include infrastructure to collect solar (concentrating solar power and photovoltaic), wind,

biomass, or geothermal energy. Attendant features may include, but are not limited to roads, parking lots, and stormwater management facilities within the land- based renewable energy generation facility.

The discharge must not cause the loss of greater than 1/2-acre of non-tidal waters of the United States. The discharge must not cause the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed 1/2-acre. This NWP does not authorize discharges into non-tidal wetlands adjacent to tidal waters.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity if the discharge results in the loss of greater than 1/10-acre of waters of the United States. (See general condition 32.) (Authorities: Sections 10

Note 1: Utility lines constructed to transfer the energy from the land-based renewable energy generation facility to a distribution system, regional grid, or other facility are generally considered to be linear projects and each separate and distant crossing of a waterbody is eligible for treatment as a separate single and complete linear project. Those utility lines may be authorized by NWP 12 or another Department of the Army authorization.

Note 2: If the only activities associated with the construction, expansion, or modification of a land-based renewable energy generation facility that require Department of the Army authorization are discharges of dredged or fill material into waters of the United States to construct, maintain, repair, and/or remove utility lines and/or road crossings, then NWP 12 and/or NWP 14 shall be used if those activities meet the terms and conditions of NWPs 12 and 14, including any applicable regional conditions and any case-specific conditions imposed by the district engineer.

Note 3: For any activity that involves the construction of a wind energy generating structure, solar tower, or overhead transmission line, a copy of the PCN and NWP verification will be provided to the Department of Defense Siting Clearinghouse, which will evaluate potential effects on military activities.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 51. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 51 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:

 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply
- 2. The applicant for Nationwide Permit 51 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 51.
- 52. Water-Based Renewable Energy Generation Pilot Projects. Structures and work in navigable waters of the United States and discharges of dredged or fill material into waters of the United States for the construction, expansion, modification, or removal of water-based wind, water-based solar, wave energy, or hydrokinetic renewable energy generation pilot projects and their attendant features. Attendant features may include, but are not limited to, land-based collection and distribution facilities, control facilities, roads, parking lots, and stormwater management facilities.

For the purposes of this NWP, the term ''pilot project'' means an experimental project where the water- based renewable energy generation units will be monitored to collect information on their performance and environmental effects at the project site.

The discharge must not cause the loss of greater than 1/2-acre of waters of the United States, including the loss of more than 300 linear feet of stream bed, unless for intermittent and ephemeral stream beds the district engineer waives the 300 linear foot limit by making a written determination concluding that the discharge will result in no more than minimal adverse environmental effects. The loss of stream bed plus any other losses of jurisdictional wetlands and waters caused by the NWP activity cannot exceed $1\sqrt{2}$ -acre.

The placement of a transmission $\bar{1}$ ine on the bed of a navigable water of the United States from the renewable energy generation unit(s) to a land-based collection and distribution facility is considered a structure under Section 10 of the Rivers and Harbors Act of 1899 (see 33 CFR

322.2(b)), and the placement of the transmission line on the bed of a navigable water of the United States is not a loss of waters of the United States for the purposes of applying the 1/2-acre or 300 linear foot limits.

For each single and complete project, no more than 10 generation units (e.g., wind turbines, wave energy devices, or hydrokinetic devices) are authorized. For floating solar panels in navigable waters of the United States, each single and complete project cannot exceed 1/2- acre in water surface area covered by the floating solar panels.

This NWP does not authorize activities in coral reefs. Structures in an anchorage area established by the U.S. Coast Guard must comply with the requirements in 33 CFR 322.5(1)(2). Structures may not be placed in established danger zones or restricted areas designated in 33 CFR part 334, Federal navigation channels, shipping safety fairways or traffic separation schemes established by the U.S. Coast Guard (see 33 CFR 322.5(1)(1)), or EPA or Corps designated open water dredged material disposal areas.

Upon completion of the pilot project, the generation units, transmission lines, and other structures or fills associated with the pilot project must be removed to the maximum extent practicable unless they are authorized by a separate Department of the Army authorization, such as another NWP, an individual permit, or a regional general permit. Completion of the pilot project will be identified as the date of expiration of the Federal Energy Regulatory Commission (FERC) license, or the expiration date of the NWP authorization if no FERC license is required.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.) (Authorities: Sections 10 and 404)

Note 1: Utility lines constructed to transfer the energy from the land-based collection facility to a distribution system, regional grid, or other facility are generally considered to be linear projects and each separate and distant crossing of a waterbody is eligible for treatment as a separate single and complete linear project. Those utility lines may be authorized by NWP 12 or another Department of the Army authorization.

Note 2: An activity that is located on an existing locally or federally maintained U.S. Army Corps of Engineers project requires separate approval from the Chief of Engineers or District Engineer under 33 U.S.C. 408.

Note 3: If the pilot project generation units, including any transmission lines, are placed in navigable waters of the United States (i.e., Section 10 waters) within the coastal United States, the Great Lakes, and United States territories, copies of the NWP verification will be sent by the Corps to the National Oceanic and Atmospheric Administration, National Ocean Service, for charting the generation units and associated transmission line(s) to protect navigation.

Note 4: Hydrokinetic renewable energy generation projects that require authorization by the Federal Energy Regulatory Commission under the Federal Power Act of 1920 do not require separate authorization from the Corps under Section 10 of the Rivers and Harbors Act of 1899.

Note 5: For any activity that involves the construction of a wind energy generating structure, solar tower, or overhead transmission line, a copy of the PCN and NWP verification will be provided to the Department of Defense Siting Clearinghouse, which will evaluate potential effects on military activities.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 52. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 52 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 2. The applicant for Nationwide Permit 52 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 3. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 4. All areas affected by construction shall be mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- 5. An individual Section 401 water quality certification will be required for any project where the District Engineer waives the stream length limitation of NWP 52.
- 6. An individual Section 401 water quality certification will be required for any hydrokinetic project that is not previously approved by a Section 401 water quality certification issued by the Illinois EPA for a Federal Energy Regulatory Commission license or permit.
- **53. Removal of Low-Head Dams.** Structures and work in navigable waters of the United States and discharges of dredged or fill material into waters of the United States associated with the removal of low-head dams.

For the purposes of this NWP, the term 'low-head dam'' is defined as a dam built across a stream to pass flows from upstream over all, or nearly all, of the width of the dam crest on a

continual and uncontrolled basis. (During a drought, there might not be water flowing over the dam crest.) In general, a low-head dam does not have a separate spillway or spillway gates but it may have an uncontrolled spillway. The dam crest is the top of the dam from left abutment to right abutment, and if present, an uncontrolled spillway. A low-head dam provides little storage function.

The removed low-head dam structure must be deposited and retained in an area that has no waters of the United States unless otherwise specifically approved by the district engineer under separate authorization.

Because the removal of the low-head dam will result in a net increase in ecological functions and services provided by the stream, as a general rule compensatory mitigation is not required for activities authorized by this NWP. However, the district engineer may determine for a particular low-head dam removal activity that compensatory mitigation is necessary to ensure the authorized activity results in no more than minimal adverse environmental effects.

Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the activity. (See general condition 32.)
(Authorities: Sections 10 and 404)

Note: This NWP does not authorize discharges of dredged or fill material into waters of the United States or structures or work in navigable waters to restore the stream in the vicinity of the low-head dam, including the former impoundment area. Nationwide permit 27 or other Department of the Army permits may authorize such activities. This NWP does not authorize discharges of dredged or fill material into waters of the United States or structures or work in navigable waters to stabilize stream banks. Bank stabilization activities may be authorized by NWP 13 or other Department of the Army permits.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 53. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 53 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. The applicant shall implement the following Best Management Practices and Material Testing:
 - A. Sediments and river bottom material are excavated and removed to upland areas to minimize sediment transport downstream, minimize downcutting and protect water quality; or
 - B. measures shall be implemented to minimize sediment transport downstream; or
 - C. the sediments and river bottom materials that will be transported downstream are determined to have less than 20 percent passing a #230 U.S. Sieve based on representative sampling and analysis of the sediments and river bottom materials; or
 - D. a combination of the above practices to protect water quality; and sediments and river bottom materials shall not be pollutional if released to downstream waters
- 2. Best Management Practices shall be implemented to minimize sediment transport downstream, minimize downcutting of sediment and river bottom materials and protect water quality.
- 3. The project shall be required to obtain individual 401 water quality certification if a public or food processing surface water intake is located within the upstream pool of the dam to be removed.
- 4. The applicant shall notify downstream surface water supplies of the proposed dam removal. The applicant shall implement practices to prevent interference with Public and Food Processing Water Supply intakes. The Illinois EPA's Division of Public Water Supply may be contacted at 217/782-1020 for information on the Public and Food Processing Water Supplies.
- 5. The applicant for Nationwide Permit 53 shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- 6. The applicant for Nationwide Permit 53 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 7. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 8. All areas affected by construction shall be stabilized or mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosionduring construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.
- **54. Living Shorelines.** Structures and work in navigable waters of the United States and discharges of dredged or fill material into waters of the United States for the construction and maintenance of living shorelines to stabilize banks and shores in coastal waters, which includes the Great Lakes, along shores with small fetch and gentle slopes that are subject to low- to mid-energy waves. A living shoreline has a footprint that is made up mostly of native material. It incorporates vegetation or other living, natural ''soft'' elements alone or in combination with some type of harder shoreline structure (e.g., oyster or mussel reefs or rock

sills) for added protection and stability. Living shorelines should maintain the natural continuity of the land-water interface, and retain or enhance shoreline ecological processes. Living shorelines must have a substantial biological component, either tidal or lacustrine fringe wetlands or oyster or mussel reef structures. The following conditions must be met:

- (a) The structures and fill area, including sand fills, sills, breakwaters, or reefs, cannot extend into the waterbody more than 30 feet from the mean low water line in tidal waters or the ordinary high water mark in the Great Lakes, unless the district engineer waives this criterion by making a written determination concluding that the activity will result in no more than minimal adverse environmental effects;
- (b) The activity is no more than 500 feet in length along the bank, unless the district engineer waives this criterion by making a written determination concluding that the activity will result in no more than minimal adverse environmental effects;
- (c) Coir logs, coir mats, stone, native oyster shell, native wood debris, and other structural materials must be adequately anchored, of sufficient weight, or installed in a manner that prevents relocation in most wave action or water flow conditions, except for extremely severe storms;
- (d) For living shorelines consisting of tidal or lacustrine fringe wetlands, native plants appropriate for current site conditions, including salinity, must be used if the site is planted by the permittee;
- (e) Discharges of dredged or fill material into waters of the United States, and oyster or mussel reef structures in navigable waters, must be the minimum necessary for the establishment and maintenance of the living shoreline;
- (f) If sills, breakwaters, or other structures must be constructed to protect fringe wetlands for the living shoreline, those structures must be the minimum size necessary to protect those fringe wetlands;
- (g) The activity must be designed, constructed, and maintained so that it has no more than minimal adverse effects on water movement between the waterbody and the shore and the movement of aquatic organisms between the waterbody and the shore; and
- (h) The living shoreline must be properly maintained, which may require periodic repair of sills, breakwaters, or reefs, or replacing sand fills after severe storms or erosion events. Vegetation may be replanted to maintain the living shoreline. This NWP authorizes those maintenance and repair activities, including any minor deviations necessary to address changing environmental conditions.

This NWP does not authorize beach nourishment or land reclamation activities. Notification: The permittee must submit a pre-construction notification to the district engineer prior to commencing the construction of the living shoreline. (See general condition 32.) The pre-construction notification must include a delineation of special aquatic sites (see paragraph (b) (4) of general condition 32). Pre-construction notification is not required for maintenance and repair activities for living shorelines unless required by applicable NWP general conditions or regional conditions. (Authorities: Sections 10 and 404)

Note: In waters outside of coastal waters, nature-based bank stabilization techniques, such as bioengineering and vegetative stabilization, may be authorized by NWP 13.

NOTE: THE IEPA HAS CONDITIONED SECTION 401 WATER QUALITY CERTIFICATION APPLICABLE TO NATIONWIDE PERMIT 54. DEPARTMENT OF THE ARMY AUTHORIZATION PURSUANT TO SECTION 404 OF THE CLEAN WATER ACT (33 U.S.C. 1344) UNDER NATIONWIDE PERMIT 54 WILL BE SUBJECT TO THE THREE GENERAL IEPA CONDITIONS, THESE NATIONWIDE SPECIFIC CONDITIONS, AND THE CONDITIONS PUBLISHED IN SECTION C.

- 1. An individual Section 401 water quality certification shall be required for any project that exceeds 1000 feet as measured along the bank and or when the District Engineer waives the limitation of 30 feet as measured from the mean high water line.
- 2. The applicant shall not cause:
 - A. violation of applicable provisions of the Illinois Environmental Protection Act;
 - B. water pollution defined and prohibited by the Illinois Environmental Protection Act;
 - C. violation of applicable water quality standards of the Illinois Pollution Control Board, Title 35, Subtitle C: Water Pollution Rules and Regulation; or
 - D. interference with water use practices near public recreation areas or water supply intakes.
- The applicant for Nationwide Permit 54 shall implement erosion control measures consistent with the "Illinois Urban Manual" (IEPA/USDA, NRCS; 2016).
- 4. Any spoil material excavated, dredged or otherwise produced must not be returned to the waterway but must be deposited in a self-contained area in compliance with all state statutes, regulations and permit requirements with no discharge to waters of the State unless a permit has been issued by this Agency. Any backfilling must be done with clean material and placed in a manner to prevent violation of applicable water quality standards.
- 5. All areas affected by construction shall be stabilized or mulched and seeded as soon after construction as possible. The applicant shall undertake necessary measures and procedures to reduce erosion during construction. Interim measures to prevent erosion during construction shall be taken and may include the installation of sedimentation basins and temporary mulching. All construction within the waterway shall be conducted during zero or low flow conditions. The applicant shall be responsible for obtaining an NPDES Storm Water Permit prior to initiating construction if the construction activity associated with the project will result in the disturbance of 1 (one) or more acres, total land area. An NPDES Storm Water Permit may be obtained by submitting a properly completed Notice of Intent (NOI) form by certified mail to the Agency's Division of Water Pollution Control, Permit Section.

C. Nationwide Permit General Conditions

To qualify for NWP authorization, the prospective permittee must comply with the following general conditions, as applicable, in addition to any regional or case-specific conditions imposed by the division engineer or district engineer. Prospective permittees should contact the appropriate Corps district office to determine if regional conditions have been imposed on an NWP. Prospective permittees should also contact the appropriate Corps district office to determine the status of Clean Water Act Section 401 water quality certification and/or Coastal Zone Management Act consistency for an NWP. Every person who may wish to obtain permit authorization under one or more NWPs, or who is currently relying on an existing or prior permit authorization under one or more NWPs, has been and is on notice that all of the provisions of 33 CFR 330.1 through 330.6 apply to every NWP authorization. Note especially 33 CFR 330.5 relating to the modification, suspension, or revocation of any NWP authorization.

- 1. Navigation. (a) No activity may cause more than a minimal adverse effect on navigation.
 - (b) Any safety lights and signals prescribed by the U.S. Coast Guard, through regulations or otherwise, must be installed and maintained at the permittee's expense on authorized facilities in navigable waters of the United States.
 - (c) The permittee understands and agrees that, if future operations by the United States require the removal, relocation, or other alteration, of the structure or work herein authorized, or if, in the opinion of the Secretary of the Army or his authorized representative, said structure or work shall cause unreasonable obstruction to the free navigation of the navigable waters, the permittee will be required, upon due notice from the Corps of Engineers, to remove, relocate, or alter the structural work or obstructions caused thereby, without expense to the United States. No claim shall be made against the United States on account of any such removal or alteration.
- 2. Aquatic Life Movements. No activity may substantially disrupt the necessary life cycle movements of those species of aquatic life indigenous to the waterbody, including those species that normally migrate through the area, unless the activity's primary purpose is to impound water. All permanent and temporary crossings of waterbodies shall be suitably culverted, bridged, or otherwise designed and constructed to maintain low flows to sustain the movement of those aquatic species. If a bottomless culvert cannot be used, then the crossing should be designed and constructed to minimize adverse effects to aquatic life movements.
- 3. Spawning Areas. Activities in spawning areas during spawning seasons must be avoided to the maximum extent practicable. Activities that result in the physical destruction (e.g., through excavation, fill, or downstream smothering by substantial turbidity) of an important spawning area are not authorized.
- 4. Migratory Bird Breeding Areas. Activities in waters of the United States that serve as breeding areas for migratory birds must be avoided to the maximum extent practicable.
- 5. Shellfish Beds. No activity may occur in areas of concentrated shellfish populations, unless the activity is directly related to a shellfish harvesting activity authorized by NWPs 4 and 48, or is a shellfish seeding or habitat restoration activity authorized by NWP 27.
- 6. Suitable Material. No activity may use unsuitable material (e.g., trash, debris, car bodies, asphalt, etc.). Material used for construction or discharged must be free from toxic pollutants in toxic amounts (see section 307 of the Clean Water Act).
- 7. Water Supply Intakes. No activitymay occur in the proximity of a public water supply intake, except where the activity is for the repair or improvement of public water supply intake structures or adjacent bank stabilization.
- 8. Adverse Effects From Impoundments. If the activity creates an impoundment of water, adverse effects to the aquatic system due to accelerating the passage of water, and/or restricting its flow must be minimized to the maximum extent practicable.
- 9. Management of Water Flows. To the maximum extent practicable, the pre-construction course, condition, capacity, and location of open waters must be maintained for each activity, including stream channelization, storm water management activities, and temporary and permanent road crossings, except as provided below. The activity must be constructed to withstand expected high flows. The activity must not restrict or impede the passage of normal or high flows, unless the primary purpose of the activity is to impound water or manage high flows. The activity may alter the pre-construction course, condition, capacity, and location of open waters if it benefits the aquatic environment (e.g., stream restoration or relocation activities).
- 10. Fills Within 100-Year Floodplains. The activity must comply with applicable FEMA-approved state or local floodplain management requirements.
- 11. Equipment. Heavy equipment working in wetlands or mudflats must be placed on mats, or other measures must be taken to minimize soil disturbance.
- 12. Soil Erosion and Sediment Controls. Appropriate soil erosion and sediment controls must be used and maintained in effective operating condition during construction, and all exposed soil and other fills, as well as any work below the ordinary high water mark or high tide line, must be permanently stabilized at the earliest practicable date. Permittees are encouraged to perform work within waters of the United States during periods of low-flow or no-flow, or during low tides.
- 13. Removal of Temporary Fills. Temporary fills must be removed in their entirety and the affected areas returned to pre-construction elevations. The affected areas must be revegetated, as appropriate.
- 14. Proper Maintenance. Any authorized structure or fill shall be properly maintained, including maintenance to ensure public safety and compliance with applicable NWP general conditions, as well as any activity-specific conditions added by the district engineer to an NWP authorization.
- 15. Single and Complete Project. The activity must be a single and complete project. The same NWP cannot be used more than once for the same single and complete project.
- 16. Wild and Scenic Rivers. (a) No NWP activity may occur in a component of the National Wild and Scenic River System, or in a river officially designated by Congress as a 'study river' for possible inclusion in the system while the river is in an official study status, unless the appropriate Federal agency with direct management responsibility for such river,

has determined in writing that the proposed activity will not adversely affect the Wild and Scenic River designation or study status.

- (b) If a proposed NWP activity will occur in a component of the National Wild and Scenic River System, or in a river officially designated by Congress as a 'study river' for possible inclusion in the system while the river is in an official study status, the permittee must submit a pre-construction notification (see general condition 32). The district engineer will coordinate the PCN with the Federal agency with direct management responsibility for that river. The permittee shall not begin the NWP activity until notified by the district engineer that the Federal agency with direct management responsibility for that river has determined in writing that the proposed NWP activity will not adversely affect the Wild and Scenic River designation or study status.
- (c) Information on Wild and Scenic Rivers may be obtained from the appropriate Federal land management agency responsible for the designated Wild and Scenic River or study river (e.g., National Park Service, U.S. Forest Service, Bureau of Land Management, U.S. Fish and Wildlife Service). Information on these rivers is also available at: http://www.rivers.gov/.
- 17. Tribal Rights. No NWP activity may cause more than minimal adverse effects on tribal rights (including treaty rights), protected tribal resources, or tribal lands.
- 18. Endangered Species. (a) No activity is authorized under any NWP which is likely to directly or indirectly jeopardize the continued existence of a threatened or endangered species or a species proposed for such designation, as identified under the Federal Endangered Species Act (ESA), or which will directly or indirectly destroy or adversely modify the critical habitat of such species. No activity is authorized under any NWP which 'may affect' a listed species or critical habitat, unless ESA section 7 consultation addressing the effects of the proposed activity has been completed. Direct effects are the immediate effects on listed species and critical habitat caused by the NWP activity. Indirect effects are those effects on listed species and critical habitat that are caused by the NWP activity and are later in time, but still are reasonably certain to occur.

 (b) Federal agencies should follow their own procedures for complying with the requirements
 - (b) Federal agencies should follow their own procedures for complying with the requirements of the ESA. If pre-construction notification is required for the proposed activity, the Federal permittee must provide the district engineer with the appropriate documentation to demonstrate compliance with those requirements. The district engineer will verify that the appropriate documentation has been submitted. If the appropriate documentation has not been submitted, additional ESA section 7 consultation may be necessary for the activity and the respective federal agency would be responsible for fulfilling its obligation under section 7 of the ESA.
 - (c) Non-federal permittees must submit a pre-construction notification to the district engineer if any listed species or designated critical habitat might be affected or is in the vicinity of the activity, or if the activity is located in designated critical habitat, and shall not begin work on the activity until notified by the district engineer that the requirements of the ESA have been satisfied and that the activity is authorized. For activities that might affect Federally-listed endangered or threatened species or designated critical habitat, the pre-construction notification must include the name(s) of the endangered or threatened species that might be affected by the proposed activity or that utilize the designated critical habitat that might be affected by the proposed activity. The district engineer will determine whether the proposed activity 'may affect' or will have 'no effect' to listed species and designated critical habitat and will notify the non-federal applicant of the Corps' determination within 45 days of receipt of a complete pre-construction notification. In cases where the non-federal applicant has identified listed species or critical habitat that might be affected or is in the vicinity of the activity, and has so notified the Corps, the applicant shall not begin work until the Corps has provided notification that the proposed activity will have 'no effect' on listed species or critical habitat, or until ESA section 7 consultation has been completed. If the non-federal applicant has not heard back from the Corps within 45 days, the applicant must still wait for notification from the Corps.
 - (d) As a result of formal or informal consultation with the FWS or NMFS the district engineer may add species-specific permit conditions to the NWPs.
 - (e) Authorization of an activity by an NWP does not authorize the 'take' of a threatened or endangered species as defined under the ESA. In the absence of separate authorization (e.g., an ESA Section 10 Permit, a Biological Opinion with 'incidental take' provisions, etc.) from the FWS or the NMFS, the Endangered Species Act prohibits any person subject to the jurisdiction of the United States to take a listed species, where 'take' means to harass, harm, pursue, hunt, shoot, wound, kill, trap, capture, or collect, or to attempt to engage in any such conduct. The word 'harm' in the definition of 'take' means an act which actually kills or injures wildlife. Such an act may include significant habitat modification or degradation where it actually kills or injures wildlife by significantly impairing essential behavioral patterns, including breeding, feeding or sheltering.
 - (f) If the non-federal permittee has a valid ESA Section 10(a)(1)(B) incidental take permit with an approved Habitat Conservation Plan for a project or a group of projects that includes the proposed NWP activity, the non-federal applicant should provide a copy of that ESA Section 10(a)(1)(B) permit with the PCN required by paragraph (c) of this general condition. The district engineer will coordinate with the agency that issued the ESA Section 10(a)(1)(B) permit to determine whether the proposed NWP activity and the associated incidental take were considered in the internal ESA section 7 consultation conducted for the ESA Section 10(a)(1)(B) permit. If that coordination results in concurrence from the agency that the proposed NWP activity and the associated incidental take were considered in the internal ESA section 7 consultation for the ESA Section 10(a)(1)(B) permit, the district engineer does not need to conduct a separate ESA section 7 consultation for the proposed NWP activity. The district engineer will notify the non-federal applicant within 45 days of receipt of a complete pre-construction

- notification whether the ESA Section 10(a)(1)(B)permit covers the proposed NWP activity or whether additional ESA section 7 consultation is required.
- (g) Information on the location of threatened and endangered species and their critical habitat can be obtained directly from the offices of the FWS and NMFS or their worldwide-web pages at http://www.fws.gov/ and http://www.nmfs.noaa.gov/pr/species/esa/ respectively.
- 19. Migratory Birds and Bald and Golden Eagles. The permittee is responsible for ensuring their action complies with the Migratory Bird Treaty Act and the Bald and Golden Eagle Protection Act. The permittee is responsible for contacting appropriate local office of the U.S. Fish and Wildlife Service to determine applicable measures to reduce impacts to migratory birds or eagles, including whether 'incidental take'' permits are necessary and available under the Migratory Bird Treaty Act or Bald and Golden Eagle Protection Act for a particular activity.
- 20. Historic Properties. (a) In cases where the district engineer determines that the activity may have the potential to cause effects to properties listed, or eligible for listing, in the National Register of Historic Places, the activity is not authorized, until the requirements of Section 106 of the National Historic Preservation Act (NHPA) have been satisfied.
 - (b) Federal permittees should follow their own procedures for complying with the requirements of Section 106 of the National Historic Preservation Act. If preconstruction notification is required for the proposed NWP activity, the Federal permittee must provide the district engineer with the appropriate documentation to demonstrate compliance with those requirements. The district engineer will verify that the appropriate documentation has been submitted. If the appropriate documentation is not submitted, then additional consultation under Section 106 may be necessary. The respective federal agency is responsible for fulfilling its obligation to comply with Section 106.
 - (c) Non-federal permittees must submit a pre-construction notification to the district engineer if the NWP activity might have the potential to cause effects to any historic properties listed on, determined to be eligible for listing on, or potentially eligible for listing on the National Register of Historic Places, including previously unidentified properties. For such activities, the pre-construction notification must state which historic properties might have the potential to be affected by the proposed NWP activity or include a vicinity map indicating the location of the historic properties or the potential for the presence of historic properties. Assistance regarding information on the location of, or potential for, the presence of historic properties can be sought from the State Historic Preservation Officer, Tribal Historic Preservation Officer, or designated tribal representative, as appropriate, and the National Register of Historic Places (see 33 CFR 330.4(g)). When reviewing preconstruction notifications, district engineers will comply with the current procedures for addressing the requirements of Section 106 of the National Historic Preservation Act. The district engineer shall make a reasonable and good faith effort to carry out appropriate identification efforts, which may include background research, consultation, oral history interviews, sample field investigation, and field survey. Based on the information submitted in the PCN and these identification efforts, the district engineer shall determine whether the proposed NWP activity has the potential to cause effects on the historic properties. Section 106 consultation is not required when the district engineer determines that the activity does not have the potential to cause effects on historic properties (see 36 CFR 800.3(a)). Section 106 consultation is required when the district engineer determines that the activity has the potential to cause effects on historic properties. The district engineer will conduct consultation with consulting parties identified under 36 CFR 800.2(c) when he or she makes any of the following effect determinations for the purposes of Section 106 of the NHPA: no historic properties affected, no adverse effect, or adverse effect. Where the non-federal applicant has identified historic properties on which the activity might have the potential to cause effects and so notified the Corps, the non-federal applicant shall not begin the activity until notified by the district engineer either that the activity has no potential to cause effects to historic properties or that NHPA Section 106 consultation has been completed.
 - (d) For non-federal permittees, the district engineer will notify the prospective permittee within 45 days of receipt of a complete pre-construction notification whether NHPA Section 106 consultation is required. If NHPA Section 106 consultation is required, the district engineer will notify the non-federal applicant that he or she cannot begin the activity until Section 106 consultation is completed. If the non-federal applicant has not heard back from the Corps within 45 days, the applicant must still wait for notification from the Corps.
 - (e) Prospective permittees should be aware that section 110k of the NHPA (54 U.S.C. 306113) prevents the Corps from granting a permit or other assistance to an applicant who, with intent to avoid the requirements of Section 106 of the NHPA, has intentionally significantly adversely affected a historic property to which the permit would relate, or having legal power to prevent it, allowed such significant adverse effect to occur, unless the Corps, after consultation with the Advisory Council on Historic Preservation (ACHP), determines that circumstances justify granting such assistance despite the adverse effect created or permitted by the applicant. If circumstances justify granting the assistance, the Corps is required to notify the ACHP and provide documentation specifying the circumstances, the degree of damage to the integrity of any historic properties affected, and proposed mitigation. This documentation must include any views obtained from the applicant, SHPO/ THPO, appropriate Indian tribes if the undertaking occurs on or affects historic properties on tribal lands or affects properties of interest to those tribes, and other parties known to have a legitimate interest in the impacts to the permitted activity on historic properties.
- 21. Discovery of Previously Unknown Remains and Artifacts. If you discover any previously unknown historic, cultural or archeological remains and artifacts while accomplishing the

activity authorized by this permit, you must immediately notify the district engineer of what you have found, and to the maximum extent practicable, avoid construction activities that may affect the remains and artifacts until the required coordination has been completed. The district engineer will initiate the Federal, Tribal, and state coordination required to determine if the items or remains warrant a recovery effort or if the site is eligible for listing in the National Register of Historic Places.

- 22. Designated Critical Resource Waters. Critical resource waters include, NOAA-managed marine sanctuaries and marine monuments, and National Estuarine Research Reserves. The district engineer may designate, after notice and opportunity for public comment, additional waters officially designated by a state as having particular environmental or ecological significance, such as outstanding national resource waters or state natural heritage sites. The district engineer may also designate additional critical resource waters after notice and opportunity for public comment.
 - (a) Discharges of dredged or fill material into waters of the United States are not authorized by NWPs 7, 12, 14, 16, 17, 21, 29, 31, 35, 39, 40, 42, 43, 44, 49, 50, 51, and 52 for any activity within, or directly affecting, critical resource waters, including wetlands adjacent to such waters.
 - (b) For NWPs 3, 8, 10, 13, 15, 18, 19, 22, 23, 25, 27, 28, 30, 33, 34, 36, 37, 38, and 54, notification is required in accordance with General Condition 32, for any activity proposed in the designated critical resource waters including wetlands adjacent to those waters. The district engineer may authorize activities under these NWPs only after it is determined that the impacts to the critical resource waters will be no more than minimal.
- 23. Mitigation. The district engineer will consider the following factors when determining appropriate and practicable mitigation necessary to ensure that the individual and cumulative adverse environmental effects are no more than minimal:
 - (a) The activity must be designed and constructed to avoid and minimize adverse effects, both temporary and permanent, to waters of the United States to the maximum extent practicable at the project site (i.e., on site).
 - (b) Mitigation in all its forms (avoiding, minimizing, rectifying, reducing, or compensating for resource losses) will be required to the extent necessary to ensure that the individual and cumulative adverse environmental effects are no more than minimal.
 - (c) Compensatory mitigation at a minimum one-for-one ratio will be required for all wetland losses that exceed 1/10-acre and require Pre-construction notification, unless the district engineer determines in writing that either some other form of mitigation would be more environmentally appropriate or the adverse environmental effects of the proposed activity are no more than minimal, and provides an activity-specific waiver of this requirement. For wetland losses of 1/10-acre or less that require pre-construction notification, the district engineer may determine on a case-by-case basis that compensatory mitigation is required to ensure that the activity results in only minimal adverse environmental effects.
 - (d) For losses of streams or other open waters that require pre-construction notification, the district engineer may require compensatory mitigation to ensure that the activity results in no more than minimal adverse environmental effects. Compensatory mitigation for losses of streams should be provided, if practicable, through stream rehabilitation, enhancement, or preservation, since streams are difficult-to-replace resources (see 33 CFR 332.3(e)(3)).
 - (e) Compensatory mitigation plans for NWP activities in or near streams or other open waters will normally include a requirement for the restoration or enhancement, maintenance, and legal protection (e.g., conservation easements) of riparian areas next to open waters. In some cases, the restoration or maintenance/protection of riparian areas may be the only compensatory mitigation required. Restored riparian areas should consist of native species. The width of the required riparian area will address documented water quality or aquatic habitat loss concerns. Normally, the riparian area will be 25 to 50 feet wide on each side of the stream, but the district engineer may require slightly wider riparian areas to address documented water quality or habitat loss concerns. If it is not possible to restore or maintain/protect a riparian area on both sides of a stream, or if the waterbody is a lake or coastal waters, then restoring or maintaining/protecting a riparian area along a single bank or shoreline may be sufficient. Where both wetlands and open waters exist on the project site, the district engineer will determine the appropriate compensatory mitigation (e.g., riparian areas and/or wetlands compensation) based on what is best for the aquatic environment on a watershed basis. In cases where riparian areas are determined to be the most appropriate form of minimization or compensatory mitigation, the district engineer may waive or reduce the requirement to provide wetland compensatory mitigation for wetland losses.
 - (f) Compensatory mitigation projects provided to offset losses of aquatic resources must comply with the applicable provisions of 33 CFR part 332.
 - The prospective permittee is responsible for proposing an appropriate compensatory mitigation option if compensatory mitigation is necessary to ensure that the activity results in no more than minimal adverse environmental effects. For the NWPs, the preferred mechanism for providing compensatory mitigation is mitigation bank credits or in-lieu fee program credits (see 33 CFR 332.3(b)(2) and (3)). However, if an appropriate number and type of mitigation bank or in-lieu credits are not available at the time the PCN is submitted to the district engineer, the district engineer may approve the use of permittee-responsible mitigation.
 - (2) The amount of compensatory mitigation required by the district engineer must be sufficient to ensure that the authorized activity results in no more than minimal individual and cumulative adverse environmental effects (see 33 CFR 330.1(e)(3)). (See also 33 CFR 332.3(f)).
 - (3) Since the likelihood of success is greater and the impacts to potentially valuable uplands are reduced, aquatic resource restoration should be the first compensatory mitigation option considered for permittee-responsible mitigation.

- (4) If permittee-responsible mitigation is the proposed option, the prospective permittee is responsible for submitting a mitigation plan. A conceptual or detailed mitigation plan may be used by the district engineer to make the decision on the NWP verification request, but a final mitigation plan that addresses the applicable requirements of 33 CFR 332.4(c)(2) through (14) must be approved by the district engineer before the permittee begins work in waters of the United States, unless the district engineer determines that prior approval of the final mitigation plan is not practicable or not necessary to ensure timely completion of the required compensatory mitigation (see 33 CFR 332.3(k)(3)).
- (5) If mitigation bank or in-lieu fee program credits are the proposed option, the mitigation plan only needs to address the baseline conditions at the impact site and the number of credits to be provided.
- (6) Compensatory mitigation requirements (e.g., resource type and amount to be provided as compensatory mitigation, site protection, ecological performance standards, monitoring requirements) may be addressed through conditions added to the NWP authorization, instead of components of a compensatory mitigation plan (see 33 CFR 332.4(c)(1)(ii)).
- (g) Compensatory mitigation will not be used to increase the acreage losses allowed by the acreage limits of the NWPs. For example, if an NWP has an acreage limit of 1/2-acre, it cannot be used to authorize any NWP activity resulting in the loss of greater than 1/2-acre of waters of the United States, even if compensatory mitigation is provided that replaces or restores some of the lost waters. However, compensatory mitigation can and should be used, as necessary, to ensure that an NWP activity already meeting the established acreage limits also satisfies the no more than minimal impact requirement for the NWPs.
- (h) Permittees may propose the use of mitigation banks, in-lieu fee programs, or permitteeresponsible mitigation. When developing a compensatory mitigation proposal, the permittee must consider appropriate and practicable options consistent with the framework at 33 CFR 332.3(b). For activities resulting in the loss of marine or estuarine resources, permittee- responsible mitigation may be environmentally preferable if there are no mitigation banks or in-lieu fee programs in the area that have marine or estuarine credits available for sale or transfer to the permittee. For permittee-responsible mitigation, the special conditions of the NWP verification must clearly indicate the party or parties responsible for the implementation and performance of the compensatory mitigation project, and, if required, its long-term management.
 (i) Where certain functions and services of waters of the United States are permanently
- (i) Where certain functions and services of waters of the United States are permanently adversely affected by a regulated activity, such as discharges of dredged or fill material into waters of the United States that will convert a forested or scrub-shrub wetland to a herbaceous wetland in a permanently maintained utility line right-of-way, mitigation may be required to reduce the adverse environmental effects of the activity to the no more than minimal level.
- 24. Safety of Impoundment Structures. To ensure that all impoundment structures are safely designed, the district engineer may require non-federal applicants to demonstrate that the structures comply with established state dam safety criteria or have been designed by qualified persons. The district engineer may also require documentation that the design has been independently reviewed by similarly qualified persons, and appropriate modifications made to ensure safety.
- 25. Water Quality. Where States and authorized Tribes, or EPA where applicable, have not previously certified compliance of an NWP with CWA section 401, individual 401 Water Quality Certification must be obtained or waived (see 33 CFR 330.4(c)). The district engineer or State or Tribe may require additional water quality management measures to ensure that the authorized activity does not result in more than minimal degradation of water quality.
- 26. Coastal Zone Management. In coastal states where an NWP has not previously received a state coastal zone management consistency concurrence, an individual state coastal zone management consistency concurrence must be obtained, or a presumption of concurrence must occur (see 33 CFR 330.4(d)). The district engineer or a State may require additional measures to ensure that the authorized activity is consistent with state coastal zone management requirements.
- 27. Regional and Case-By-Case Conditions. The activity must comply with any regional conditions that may have been added by the Division Engineer (see 33 CFR 330.4(e)) and with any case specific conditions added by the Corps or by the state, Indian Tribe, or U.S. EPA in its section 401 Water Quality Certification, or by the state in its Coastal Zone Management Act consistency determination.
- 28. Use of Multiple Nationwide Permits. The use of more than one NWP for a single and complete project is prohibited, except when the acreage loss of waters of the United States authorized by the NWPs does not exceed the acreage limit of the NWP with the highest specified acreage limit. For example, if a road crossing over tidal waters is constructed under NWP 14, with associated bank stabilization authorized by NWP 13, the maximum acreage loss of waters of the United States for the total project cannot exceed 1/3-acre.
- 29. Transfer of Nationwide Permit Verifications. If the permittee sells the property associated with a nationwide permit verification, the permittee may transfer the nationwide permit verification to the new owner by submitting a letter to the appropriate Corps district office to validate the transfer. A copy of the nationwide permit verification must be attached to the letter, and the letter must contain the following statement and signature: When the structures or work authorized by this nationwide permit are still in existence at the time the property is transferred, the terms and conditions of this nationwide permit, including any special conditions, will continue to be binding on the new owner(s) of the property. To validate the transfer of this nationwide permit and the associated liabilities associated with compliance with its terms and conditions, have the transferee sign and date

(Transferee)

(Date)

- 30. Compliance Certification. Each permittee who receives an NWP verification letter from the Corps must provide a signed certification documenting completion of the authorized activity and implementation of any required compensatory mitigation. The success of any required permittee-responsible mitigation, including the achievement of ecological performance standards, will be addressed separately by the district engineer. The Corps will provide the permittee the certification document with the NWP verification letter. The certification document will include:
 - (a) A statement that the authorized activity was done in accordance with the NWP authorization, including any general, regional, or activity-specific conditions;
 - (b) A statement that the implementation of any required compensatory mitigation was completed in accordance with the permit conditions. If credits from a mitigation bank or in-lieu fee program are used to satisfy the compensatory mitigation requirements, the certification must include the documentation required by 33 CFR 332.3(1)(3) to confirm that the permittee secured the appropriate number and resource type of credits; and
 - (c) The signature of the permittee certifying the completion of the activity and mitigation. The completed certification document must be submitted to the district engineer within 30 days of completion of the authorized activity or the implementation of any required compensatory mitigation, whichever occurs later.
- 31. Activities Affecting Structures or Works Built by the United States. If an NWP activity also requires permission from the Corps pursuant to 33 U.S.C. 408 because it will alter or temporarily or permanently occupy or use a U.S. Army Corps of Engineers (USACE) federally authorized Civil Works project (a 'USACE project'), the prospective permittee must submit a pre-construction notification. See paragraph (b) (10) of General Condition 32. An activity that requires section 408 permission is not authorized by NWP until the appropriate Corps office issues the section 408 permission to alter, occupy, or use the USACE project, and the district engineer issues a written NWP verification.
- 32. Pre-Construction Notification. (a) Timing. Where required by the terms of the NWP, the prospective permittee must notify the district engineer by submitting a pre-construction notification (PCN) as early as possible. The district engineer must determine if the PCN is complete within 30 calendar days of the date of receipt and, if the PCN is determined to be incomplete, notify the prospective permittee within that 30 day period to request the additional information necessary to make the PCN complete. The request must specify the information needed to make the PCN complete. As a general rule, district engineers will request additional information necessary to make the PCN complete only once. However, if the prospective permittee does not provide all of the requested information, then the district engineer will notify the prospective permittee that the PCN is still incomplete and the PCN review process will not commence until all of the requested information has been received by the district engineer. The prospective permittee shall not begin the activity until either:
 - (1) He or she is notified in writing by the district engineer that the activity may proceed under the NWP with any special conditions imposed by the district or division engineer; or
 - 45 calendar days have passed from the district engineer's receipt of the complete PCN and the prospective permittee has not received written notice from the district or division engineer. However, if the permittee was required to notify the Corps pursuant to general condition 18 that listed species or critical habitat might be affected or are in the vicinity of the activity, or to notify the Corps pursuant to general condition 20 that the activity might have the potential to cause effects to historic properties, the permittee cannot begin the activity until receiving written notification from the Corps that there is ''no effect'' on listed species or "no potential to cause effects" on historic properties, or that any consultation required under Section 7 of the Endangered Species Act (see 33 CFR 330.4(f)) and/or Section 106 of the National Historic Preservation Act (see 33 CFR 330.4(g)) has been completed. Also, work cannot begin under NWPs 21, 49, or 50 until the permittee has received written approval from the Corps. If the proposed activity requires a written waiver to exceed specified limits of an NWP, the permittee may not begin the activity until the district engineer issues the waiver. If the district or division engineer notifies the permittee in writing that an individual permit is required within 45 calendar days of receipt of a complete PCN, the permittee cannot begin the activity until an individual permit has been obtained. Subsequently, the permittee's right to proceed under the NWP may be modified, suspended, or revoked only in accordance with the procedure set forth in 33 CFR 330.5(d)(2).
 - (b) Contents of pre-Construction Notification: The PCN must be in writing and include the following information:
 - (1) Name, address and telephone numbers of the prospective permittee;
 - (2) Location of the proposed activity;
 - (3) Identify the specific NWP or NWP(s) the prospective permittee wants to use to authorize the proposed activity;
 - (4) A description of the proposed activity; the activity's purpose; direct and indirect adverse environmental effects the activity would cause, including the anticipated amount of loss of wetlands, other special aquatic sites, and other waters expected to result from the NWP activity, in acres, linear feet, or other appropriate unit of measure; a description of any proposed mitigation measures intended to reduce the adverse environmental effects caused by the proposed activity; and any other NWP(s), regional general permit(s), or individual permit(s) used or intended to be used to authorize any part of the proposed project or any related activity, including other separate and distant crossings for linear projects that require Department of the Army authorization but do not require pre-construction notification. The description of the proposed activity and any proposed mitigation measures should be sufficiently detailed to allow

the district engineer to determine that the adverse environmental effects of the activity will be no more than minimal and to determine the need for compensatory mitigation or other mitigation measures. For single and complete linear projects, the PCN must include the quantity of anticipated losses of wetlands, other special aquatic sites, and other waters for each single and complete crossing of those wetlands, other special aquatic sites, and other waters. Sketches should be provided when necessary to show that the activity complies with the terms of the NWP. (Sketches usually clarify the activity and when provided results in a quicker decision. Sketches should contain sufficient detail to provide an illustrative description of the proposed activity (e.g., a conceptual plan), but do not need to be detailed engineering plans);

- (5) The PCN must include a delineation of wetlands, other special aquatic sites, and other waters, such as lakes and ponds, and perennial, intermittent, and ephemeral streams, on the project site. Wetland delineations must be prepared in accordance with the current method required by the Corps. The permittee may ask the Corps to delineate the special aquatic sites and other waters on the project site, but there may be a delay if the Corps does the delineation, especially if the project site is large or contains many wetlands, other special aquatic sites, and other waters. Furthermore, the 45 day period will not start until the delineation has been submitted to or completed by the Corps, as appropriate;
- (6) If the proposed activity will result in the loss of greater than 1/10-acre of wetlands and a PCN is required, the prospective permittee must submit a statement describing how the mitigation requirement will be satisfied, or explaining why the adverse environmental effects are no more than minimal and why compensatory mitigation should not be required. As an alternative, the prospective permittee may submit a conceptual or detailed mitigation plan.
- For non-federal permittees, if any listed species or designated critical habitat might be affected or is in the vicinity of the activity, or if the activity is located in designated critical habitat, the PCN must include the name(s) of those endangered or threatened species that might be affected by the proposed activity or utilize the designated critical habitat that might be affected by the proposed activity. For NWP activities that require pre-construction notification, Federal permittees must provide documentation demonstrating compliance with the Endangered Species Act;
- (8) For non-federal permittees, if the NWP activity might have the potential to cause effects to a historic property listed on, determined to be eligible for listing on, or potentially eligible for listing on, the National Register of Historic Places, the PCN must state which historic property might have the potential to be affected by the proposed activity or include a vicinity map indicating the location of the historic property. For NWP activities that require pre-construction notification, Federal permittees must provide documentation demonstrating compliance with Section 106 of the National Historic Preservation Act;
- (9) For an activity that will occur in a component of the National Wild and Scenic River System, or in a river officially designated by Congress as a ''study river'' for possible inclusion in the system while the river is in an official study status, the PCN must identify the Wild and Scenic River or the ''study river'' (see general condition 16); and
- (10) For an activity that requires permission from the Corps pursuant to 33 U.S.C.
 408 because it will alter or temporarily or permanently occupy or use a U.S.
 Army Corps of Engineers federally authorized civil works project, the preconstruction notification must include a statement confirming that the project proponent has submitted a written request for section 408 permission from the Corps office having jurisdiction over that USACE project.

 (c) Form of Pre-Construction Notification: The standard individual permit application form
- (c) Form of Pre-Construction Notification: The standard individual permit application form (Form ENG 4345) may be used, but the completed application form must clearly indicate that it is an NWP PCN and must include all of the applicable information required in paragraphs (b)(1) through (10) of this general condition. A letter containing the required information may also be used. Applicants may provide electronic files of PCNs and supporting materials if the district engineer has established tools and procedures for electronic submittals.
- (d) Agency Coordination: (1) The district engineer will consider any comments from Federal and state agencies concerning the proposed activity's compliance with the terms and conditions of the NWPs and the need for mitigation to reduce the activity's adverse environmental effects so that they are no more than minimal.
 - (2) Agency coordination is required for: (i) All NWP activities that require preconstruction notification and result in the loss of greater than 1/2-acre of waters of the United States; (ii) NWP 21, 29, 39, 40, 42, 43, 44, 50, 51, and 52 activities that require pre-construction notification and will result in the loss of greater than 300 linear feet of stream bed; (iii) NWP 13 activities in excess of 500 linear feet, fills greater than one cubic yard per running foot, or involve discharges of dredged or fill material into special aquatic sites; and (iv) NWP 54 activities in excess of 500 linear feet, or that extend into the waterbody more than 30 feet from the mean low water line in tidal waters or the ordinary high water mark in the Great Lakes.
 - When agency coordination is required, the district engineer will immediately provide (e.g., via email, facsimile transmission, overnight mail, or other expeditious manner) a copy of the complete PCN to the appropriate Federal or state offices (FWS, state natural resource or water quality agency, EPA, and, if appropriate, the NMFS). With the exception of NWP 37, these agencies will have 10 calendar days from the date the material is transmitted to notify the district engineer via telephone, facsimile transmission, or email that they intend to provide substantive, site-specific comments. The comments must explain

why the agency believes the adverse environmental effects will be more than minimal. If so contacted by an agency, the district engineer will fully consider agency comments received within the specified time frame concerning the proposed activity's compliance with the terms and conditions of the NWPs, including the need for mitigation to ensure the net adverse environmental effects of the proposed activity are no more than minimal. The district engineer will provide no response to the resource agency, except as provided below. The district engineer will indicate in the administrative record associated with each preconstruction notification that the resource agencies' concerns were considered. For NWP 37, the emergency watershed protection and rehabilitation activity may proceed immediately in cases where there is an unacceptable hazard to life or a significant loss of property or economic hardship will occur. The district engineer will consider any comments received to decide whether the NWP 37 authorization should be modified, suspended, or revoked in accordance with the procedures at 33 CFR 330.5.

- (4) In cases of where the prospective permittee is not a Federal agency, the district engineer will provide a response to NMFS within 30 calendar days of receipt of any Essential Fish Habitat conservation recommendations, as required by section 305(b)(4)(B) of the Magnuson-Stevens Fishery Conservation and Management Act.
- (5) Applicants are encouraged to provide the Corps with either electronic files or multiple copies of preconstruction notifications to expedite agency coordination.

D. District Engineer's Decision

1. In reviewing the PCN for the proposed activity, the district engineer will determine whether the activity authorized by the NWP will result in more than minimal individual or cumulative adverse environmental effects or may be contrary to the public interest. If a project proponent requests authorization by a specific NWP, the district engineer should issue the NWP verification for that activity if it meets the terms and conditions of that NWP, unless he or she determines, after considering mitigation, that the proposed activity will result in more than minimal individual and cumulative adverse effects on the aquatic environment and other aspects of the public interest and exercises discretionary authority to require an individual permit for the proposed activity. For a linear project, this determination will include an evaluation of the individual crossings of waters of the United States to determine whether they individually satisfy theterms and conditions of the NWP(s), as well as the cumulative effects caused by all of the crossings authorized by NWP. If an applicant requests a waiver of the 300 linear foot limit on impacts to streams or of an otherwise applicable limit, as provided for in NWPs 13, 21, 29, 36, 39, 40, 42, 43, 44, 50, 51, 52, or 54, the district engineer will only grant the waiver upon a written determination that the NWP activity will result in only minimal individual and cumulative adverse environmental effects. For those NWPs that have a waivable 300 linear foot limit for losses of intermittent and ephemeral stream bed and a 1/2-acre limit (i.e., NWPs 21, 29, 39, 40, 42, 43, 44, 50, 51, and 52), the loss of intermittent and ephemeral stream bed, plus any other losses of jurisdictional waters and wetlands, cannot exceed 1/2-acre. 2. When making minimal adverse environmental effects determinations the district engineer will consider the direct and indirect effects caused by the NWP activity. He or she will also consider the cumulative adverse environmental effects caused by activities authorized by NWP and whether those cumulative adverse environmental effects are no more than minimal. The district engineer will also consider site specific factors, such as the environmental setting in the vicin $\acute{ ext{i}}$ ty of the NWP activity, the type of resource that will be affected by the NWP activity, the functions provided by the aquatic resources that will be affected by the NWP activity, the degree or magnitude to which the aquatic resources perform those functions, the extent that aquatic resource functions will be lost as a result of the NWP activity (e.g., partial or complete loss), the duration of the adverse effects (temporary or permanent), the importance of the aquatic resource functions to the region (e.g., watershed or ecoregion), and mitigation required by the district engineer. If an appropriate functional or condition assessment method is available and practicable to use, that assessment method may be used by the district engineer to assist in the minimal adverse environmental effects determination. The district engineer may add case-specific special conditions to the NWP authorization to address site-specific environmental concerns. 3. If the proposed activity requires a PCN and will result in a loss of greater than 1/10-acre of wetlands, the prospective permittee should submit a mitigation proposal with the PCN. Applicants may also propose compensatory mitigation for NWP activities with smaller impacts, or for impacts to other types of waters (e.g., streams). The district engineer will consider any proposed compensatory mitigation or other mitigation measures the applicant has included in the proposal in determining whether the net adverse environmental effects of the proposed activity are no more than minimal. The compensatory mitigation proposal may be either conceptual or detailed. If the district engineer determines that the activity complies with the terms and conditions of the NWP and that the adverse environmental effects are no more than minimal, after considering mitigation, the district engineer will notify the permittee and include any activity-specific conditions in the NWP verification the district engineer deems necessary. Conditions for compensatory mitigation requirements must comply with the appropriate provisions at 33 CFR 332.3(k). The district engineer must approve the final mitigation plan before the permittee commences work in waters of the United States, unless the district engineer determines that prior approval of the final mitigation plan is not practicable or not necessary to ensure timely completion of the required compensatory mitigation. If the prospective permittee elects to submit a compensatory mitigation plan with the PCN, the district engineer will expeditiously review the proposed compensatory mitigation plan. The district engineer must review the proposed compensatory mitigation plan within 45 calendar days of receiving a complete PCN and determine whether the proposed mitigation would ensure the NWP activity results in no more than minimal adverse environmental effects. If the net adverse environmental effects of the NWP activity (after consideration of the mitigation proposal) are determined by the district engineer to be no more than minimal, the district engineer will provide a timely written response to the applicant. The response will state that the NWP activity can proceed under the terms and conditions of the

NWP, including any activity-specific conditions added to the NWP authorization by the district engineer.

4. If the district engineer determines that the adverse environmental effects of the proposed activity are more than minimal, then the district engineer will notify the applicant either: (a) That the activity does not qualify for authorization under the NWP and instruct the applicant on the procedures to seek authorization under an individual permit; (b) that the activity is authorized under the NWP subject to the applicant's submission of a mitigation plan that would reduce the adverse environmental effects so that they are no more than minimal; or (c) that the activity is authorized under the NWP with specific modifications or conditions. Where the district engineer determines that mitigation is required to ensure no more than minimal adverse environmental effects, the activity will be authorized within the 45-day PCN period (unless additional time is required to comply with general conditions 18, 20, and/or 31, or to evaluate PCNs for activities authorized by NWPs 21, 49, and 50), with activity-specific conditions that state the mitigation requirements. The authorization will include the necessary conceptual or detailed mitigation plan or a requirement that the applicant submit a mitigation plan that would reduce the adverse environmental effects so that they are no more than minimal. When compensatory mitigation is required, no work in waters of the United States may occur until the district engineer has approved a specific mitigation plan or has determined that prior approval of a final mitigation plan is not practicable or not necessary to ensure timely completion of the required compensatory mitigation.

E. Further Information

- 1. District Engineers have authority to determine if an activity complies with the terms and conditions of an NWP.
- $2.\ \text{NWPs}$ do not obviate the need to obtain other federal, state, or local permits, approvals, or authorizations required by law.
- 3. NWPs do not grant any property rights or exclusive privileges.
- 4. NWPs do not authorize any injury to the property or rights of others.
- 5. NWPs do not authorize interference with any existing or proposed Federal project (see General condition 32).

F. Definitions

Best management practices (BMPs): Policies, practices, procedures, or structures implemented to mitigate the adverse environmental effects on surface water quality resulting from development. BMPs are categorized as structural or non-structural.

Compensatory mitigation: The restoration (re-establishment or rehabilitation), establishment (creation), enhancement, and/or in certain circumstances preservation of aquatic resources for the purposes of offsetting unavoidable adverse impacts which remain after all appropriate and practicable avoidance and minimization has been achieved.

Currently serviceable: Useable as is or with some maintenance, but not so degraded as to essentially require reconstruction.

Direct effects: Effects that are caused by the activity and occur at the same time and place.

Discharge: The term ''discharge'' means any discharge of dredged or fill material into waters of the United States.

Ecological reference: A model used to plan and design an aquatic habitat and riparian area restoration, enhancement, or establishment activity under NWP 27. An ecological reference may be based on the structure, functions, and dynamics of an aquatic habitat type or a riparian area type that currently exists in the region where the proposed NWP 27 activity is located. Alternatively, an ecological reference may be based on a conceptual model for the aquatic habitat type or riparian area type to be restored, enhanced, or established as a result of the proposed NWP 27 activity. An ecological reference takes into account the range of variation of the aquatic habitat type or riparian area type in the region.

Enhancement: The manipulation of the physical, chemical, or biological characteristics of an aquatic resource to heighten, intensify, or improve a specific aquatic resource function(s). Enhancement results in the gain of selected aquatic resource function(s), but may also lead to a decline in other aquatic resource function(s). Enhancement does not result in a gain in aquatic resource area.

Ephemeral stream: An ephemeral stream has flowing water only during, and for a short duration after, precipitation events in a typical year. Ephemeral stream beds are located above the water table year-round. Groundwater is not a source of water for the stream. Runoff from rainfall is the primary source of water for stream flow.

Establishment (creation): The manipulation of the physical, chemical, or biological characteristics present to develop an aquatic resource that did not previously exist at an upland site. Establishment results in a gain in aquatic resource area.

High Tide Line: The line of intersection of the land with the water's surface at the maximum height reached by a rising tide. The high tide line may be determined, in the absence of actual data, by a line of oil or scum along shore objects, a more or less continuous deposit of fine shell or debris on the foreshore or berm, other physical markings or characteristics, vegetation lines, tidal gages, or other suitable means that delineate the general height reached by a rising tide. The line encompasses spring high tides and other high tides that occur with periodic frequency but does not include storm surges in which there is a departure from the normal or

predicted reach of the tide due to the piling up of water against a coast by strong winds such as those accompanying a hurricane or other intense storm.

Historic Property: Any prehistoric or historic district, site (including archaeological site), building, structure, or other object included in, or eligible for inclusion in, the National Register of Historic Places maintained by the Secretary of the Interior. This term includes artifacts, records, and remains that are related to and located within such properties. The term includes properties of traditional religious and cultural importance to an Indian tribe or Native Hawaiian organization and that meet the National Register criteria (36 CFR part 60).

Independent utility: A test to determine what constitutes a single and complete non-linear project in the Corps Regulatory Program. A project is considered to have independent utility if it would be constructed absent the construction of other projects in the project area. Portions of a multi-phase project that depend upon other phases of the project do not have independent utility. Phases of a project that would be constructed even if the other phases were not built can be considered as separate single and complete projects with independent utility.

Indirect effects: Effects that are caused by the activity and are later in time or farther removed in distance, but are still reasonably foreseeable.

Intermittent stream: An intermittent stream has flowing water during certain times of the year, when groundwater provides water for stream flow. During dry periods, intermittent streams may not have flowing water. Runoff from rainfall is a supplemental source of water for stream flow.

Loss of waters of the United States: Waters of the United States that are permanently adversely affected by filling, flooding, excavation, or drainage because of the regulated activity. Permanent adverse effects include permanent discharges of dredged or fill material that change an aquatic area to dry land, increase the bottom elevation of a waterbody, or change the use of a waterbody. The acreage of loss of waters of the United States is a threshold measurement of the impact to jurisdictional waters for determining whether a project may qualify for an NWP; it is not a net threshold that is calculated after considering compensatory mitigation that may be used to offset losses of aquatic functions and services. The loss of stream bed includes the acres or linear feet of stream bed that are filled or excavated as a result of the regulated activity. Waters of the United States temporarily filled, flooded, excavated, or drained, but restored to pre-construction contours and elevations after construction, are not included in the measurement of loss of waters of the United States. Impacts resulting from activities that do not require Department of the Army authorization, such as activities eligible for exemptions under Section 404(f) of the Clean Water Act, are not considered when calculating the loss of waters of the United States.

Navigable waters: Waters subject to Section 10 of the Rivers and Harbors Act of 1899. These waters are defined at 33 CFR part 329.

Non-tidal wetland: A non-tidal wetland is a wetland that is not subject to the ebb and flow of tidal waters. Non-tidal wetlands contiguous to tidal waters are located landward of the high tide line (i.e., spring high tide line).

Open water: For purposes of the NWPs, an open water is any area that in a year with normal patterns of precipitation has water flowing or standing above ground to the extent that an ordinary high water mark can be determined. Aquatic vegetation within the area of flowing or standing water is either non-emergent, sparse, or absent. Vegetated shallows are considered to be open waters. Examples of 'open waters'' include rivers, streams, lakes, and ponds.

Ordinary High Water Mark: An ordinary high water mark is a line on the shore established by the fluctuations of water and indicated by physical characteristics, or by other appropriate means that consider the characteristics of the surrounding areas.

Perennial stream: A perennial stream has flowing water year-round during a typical year. The water table is located above the stream bed for most of the year. Groundwater is the primary source of water for stream flow. Runoff from rainfall is a supplemental source of water for stream flow.

Practicable: Available and capable of being done after taking into consideration cost, existing technology, and logistics in light of overall project purposes.

Pre-construction notification: A request submitted by the project proponent to the Corps for confirmation that a particular activity is authorized by nationwide permit. The request maybe a permit application, letter, or similar document that includes information about the proposed work and its anticipated environmental effects. Pre-construction notification may be required by the terms and conditions of a nationwide permit, or by regional conditions. A pre-construction notification may be voluntarily submitted in cases where pre-construction notification is not required and the project proponent wants confirmation that the activity is authorized by nationwide permit.

Preservation: The removal of a threat to, or preventing the decline of, aquatic resources by an action in or near those aquatic resources. This term includes activities commonly associated with the protection and maintenance of aquatic resources through the implementation of appropriate legal and physical mechanisms. Preservation does not result in a gain of aquatic resource area or functions.

Protected tribal resources: Those natural resources and properties of traditional or customary religious or cultural importance, either on or off Indian lands, retained by, or reserved by or

for, Indian tribes through treaties, statutes, judicial decisions, or executive orders, including tribal trust resources.

Re-establishment: The manipulation of the physical, chemical, or biological characteristics of a site with the goal of returning natural/historic functions to a former aquatic resource. Re-establishment results in rebuilding a former aquatic resource and results in a gain in aquatic resource area and functions.

Rehabilitation: The manipulation of the physical, chemical, or biological characteristics of a site with the goal of repairing natural/historic functions to a degraded aquatic resource. Rehabilitation results in a gain in aquatic resource function, but does not result in a gain in aquatic resource area.

Restoration: The manipulation of the physical, chemical, or biological characteristics of a site with the goal of returning natural/historic functions to a former or degraded aquatic resource. For the purpose of tracking net gains in aquatic resource area, restoration is divided into two categories: Re-establishment and rehabilitation.

Riffle and pool complex: Riffle and pool complexes are special aquatic sites under the 404(b)(1) Guidelines. Riffle and pool complexes sometimes characterize steep gradient sections of streams. Such stream sections are recognizable by their hydraulic characteristics. The rapid movement of water over a course substrate in riffles results in a rough flow, a turbulent surface, and high dissolved oxygen levels in the water. Pools are deeper areas associated with riffles. A slower stream velocity, a streaming flow, a smooth surface, and a finer substrate characterize pools.

Riparian areas: Riparian areas are lands next to streams, lakes, and estuarine-marine shorelines. Riparian areas are transitional between terrestrial and aquatic ecosystems, through which surface and subsurface hydrology connects riverine, lacustrine, estuarine, and marine waters with their adjacent wetlands, non-wetland waters, or uplands. Riparian areas provide a variety of ecological functions and services and help improve or maintain local water quality. (See general condition 23.)

Shellfish seeding: The placement of shellfish seed and/or suitable substrate to increase shellfish production. Shellfish seed consists of immature individual shellfish or individual shellfish attached to shells or shell fragments (i.e., spat on shell). Suitable substrate may consist of shellfish shells, shell fragments, or other appropriate materials placed into waters for shellfish habitat.

Single and complete linear project: A linear project is a project constructed for the purpose of getting people, goods, or services from a point of origin to a terminal point, which often involves multiple crossings of one or more waterbodies at separate and distant locations. The term 'single and complete project' is defined as that portion of the total linear project proposed or accomplished by one owner/developer or partnership or other association of owners/developers that includes all crossings of a single water of the United States (i.e., a single waterbody) at a specific location. For linear projects crossing a single or multiple waterbodies several times at separate and distant locations, each crossing is considered a single and complete project for purposes of NWP authorization. However, individual channels in a braided stream or river, or individual arms of a large, irregularly shaped wetland or lake, etc., are not separate waterbodies, and crossings of such features cannot be considered separately. Single and complete non-linear project: for non-linear projects, the term 'single and complete project'' is defined at 33 CFR 330.2(i) as the total project proposed or accomplished by one owner/developer or partnership or other association of owners/developers. A single and complete non-linear project must have independent utility (see definition of 'independent utility'). Single and complete non-linear projects may not be ''piecemealed'' to avoid the limits in an NWP authorization.

Stormwater management: Stormwater management is the mechanism for controlling stormwater runoff for the purposes of reducing downstream erosion, water quality degradation, and flooding and mitigating the adverse effects of changes in land use on the aquatic environment.

Stormwater management facilities: Stormwater management facilities are those facilities, including but not limited to, stormwater retention and detention ponds and best management practices, which retain water for a period of time to control runoff and/or improve the quality (i.e., by reducing the concentration of nutrients, sediments, hazardous substances and other pollutants) of stormwater runoff.

Stream bed: The substrate of the stream channel between the ordinary high water marks. The substrate may be bedrock or inorganic particles that range in size from clay to boulders. Wetlands contiguous to the stream bed, but outside of the ordinary high water marks, are not considered part of the stream bed.

Stream channelization: The manipulation of a stream's course, condition, capacity, or location that causes more than minimal interruption of normal stream processes. A channelized stream remains a water of the United States.

Structure: An object that is arranged in a definite pattern of organization. Examples of structures include, without limitation, any pier, boat dock, boat ramp, wharf, dolphin, weir, boom, breakwater, bulkhead, revetment, riprap, jetty, artificial island, artificial reef, permanent mooring structure, power transmission line, permanently moored floating vessel, piling, aid to navigation, or any other manmade obstacle or obstruction.

Tidal wetland: A tidal wetland is a jurisdictional wetland that is inundated by tidal waters. Tidal waters rise and fall in a predictable and measurable rhythm or cycle due to the

gravitational pulls of the moon and sun. Tidal waters end where the rise and fall of the water surface can no longer be practically measured in a predictable rhythm due to masking by other waters, wind, or other effects. Tidal wetlands are located channelward of the high tide line.

Tribal lands: Any lands title to which is either: (1) Held in trust by the United States for the benefit of any Indian tribe or individual; or (2) held by any Indian tribe or individual subject to restrictions by the United States against alienation.

Tribal rights: Those rights legally accruing to a tribe or tribes by virtue of inherent sovereign authority, unextinguished aboriginal title, treaty, statute, judicial decisions, executive order or agreement, and that give rise to legally enforceable remedies.

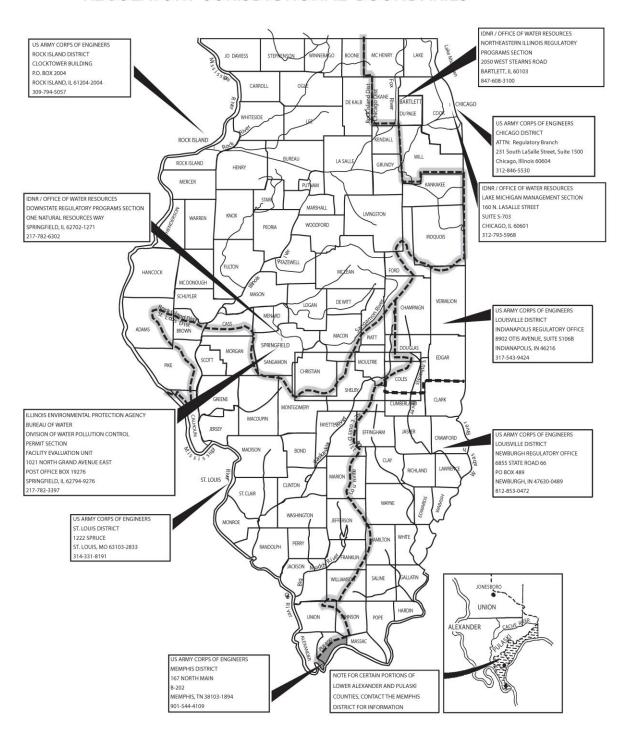
Vegetated shallows: Vegetated shallows are special aquatic sites under the 404(b)(1) Guidelines. They are areas that are permanently inundated and under normal circumstances have rooted aquatic vegetation, such as seagrasses in marine and estuarine systems and a variety of vascular rooted plants in freshwater systems.

Waterbody: For purposes of the NWPs, a waterbody is a jurisdictional water of the United States. If a wetland is adjacent to a waterbody determined to be a water of the United States, that waterbody and any adjacent wetlands are considered together as a single aquatic unit (see 33 CFR 328.4(c)(2)). Examples of 'waterbodies'' include streams, rivers, lakes, ponds, and wetlands.

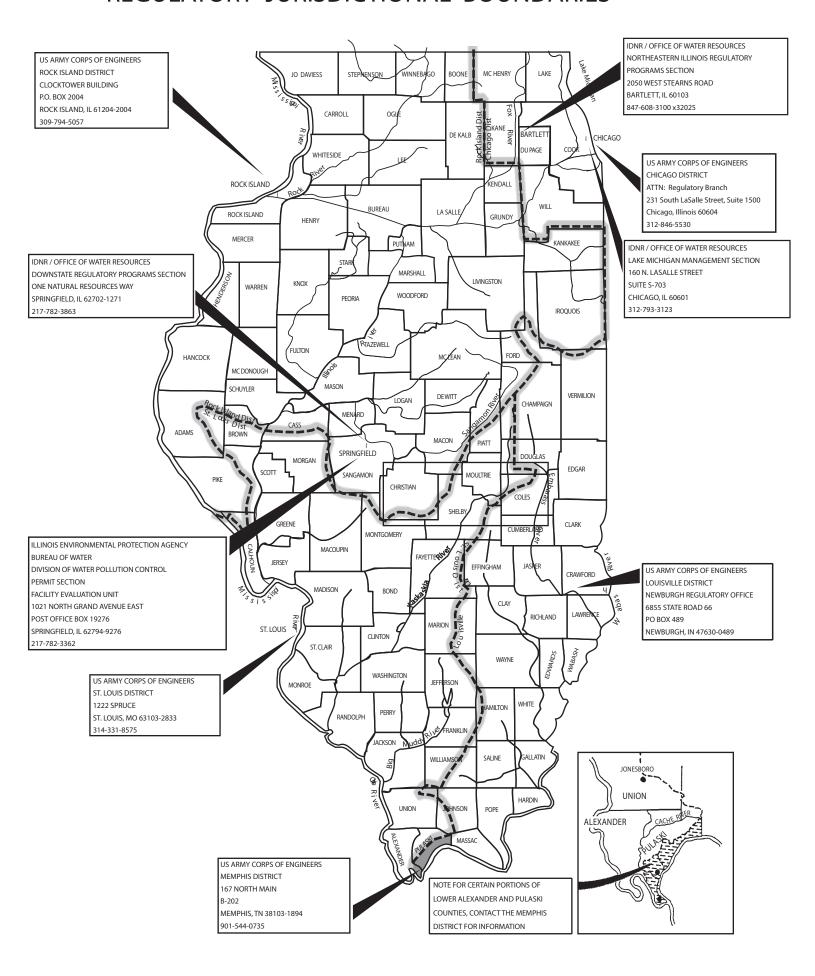
PCN - Pre-Construction Notification

*** Nationwide permit where Illinois Environmental Protection Agency has denied Section 401 Water Quality Certification.

REGULATORY JURISDICTIONAL BOUNDARIES



REGULATORY JURISDICTIONAL BOUNDARIES



Champaign County Prevailing Wage Rates posted on 7/15/2019

							Overtime							
Trade Title	Rg	Туре	С	Base	Foreman	M-F	Sa	Su	Hol	H/W	Pension	Vac	Trng	Other Ins
ASBESTOS ABT-GEN	All	BLD		32.37	33.62	1.5	1.5	2.0	2.0	6.70	16.92	0.00	0.90	
ASBESTOS ABT-MEC	All	BLD		22.40	23.40	1.5	1.5	2.0	2.0	6.80	6.55	0.00	0.50	
BOILERMAKER	All	BLD		40.50	43.50	2.0	2.0	2.0	2.0	7.07	19.17	1.50	1.19	0.40
BRICK MASON	All	BLD		32.45	34.07	1.5	1.5	2.0	2.0	9.35	14.20	0.00	0.88	
CARPENTER	All	BLD		36.58	38.83	1.5	1.5	2.0	2.0	8.65	14.50	0.00	0.55	
CARPENTER	All	HWY		37.30	39.05	1.5	1.5	2.0	2.0	8.65	15.20	0.00	0.52	
CEMENT MASON	All	BLD		33.76	36.26	1.5	1.5	2.0	2.0	9.35	10.65	0.00	0.50	
CEMENT MASON	All	HWY		34.75	36.75	1.5	1.5	2.0	2.0	9.35	11.05	0.00	0.50	
CERAMIC TILE FINISHER	All	BLD		31.65	31.65	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
ELECTRIC PWR EQMT OP	All	ALL		46.47	55.07	1.5	1.5	2.0	2.0	7.39	13.01	0.00	0.69	
ELECTRIC PWR GRNDMAN	All	ALL		31.69	55.07	1.5	1.5	2.0	2.0	6.95	8.87	0.00	0.48	
ELECTRIC PWR LINEMAN	All	ALL		51.67	55.07	1.5	1.5	2.0	2.0	7.55	14.47	0.00	0.78	
ELECTRIC PWR TRK DRV	All	ALL		33.25	55.07	1.5	1.5	2.0	2.0	7.00	9.31	0.00	0.50	
ELECTRICIAN	All	BLD		41.39	43.87	1.5	1.5	2.0	2.0	7.05	9.95	0.00	0.62	
ELECTRONIC SYSTEM TECH	All	BLD		31.31	33.31	1.5	1.5	2.0	2.0	7.05	9.24	0.00	0.40	
ELEVATOR CONSTRUCTOR	All	BLD		46.21	51.99	2.0	2.0	2.0	2.0	15.57	17.51	3.70	0.62	
FENCE ERECTOR	All	ALL		32.21	34.11	1.5	1.5	2.0	2.0	8.84	10.02	0.00	0.90	
GLAZIER	All	BLD		35.91	37.91	1.5	1.5	2.0	2.0	6.25	11.23	0.00	0.68	
HEAT/FROST INSULATOR	All	BLD		32.20	33.70	1.5	1.5	2.0	2.0	6.64	12.74	0.00	0.30	1.60
IRON WORKER	All	ALL		33.89	35.79	1.5	1.5	2.0	2.0	11.29	12.34	0.00	1.11	
LABORER	All	BLD		29.87	31.12	1.5	1.5	2.0	2.0	6.70	16.92	0.00	0.80	
LABORER	All	HWY		32.22	33.22	1.5	1.5	2.0	2.0	6.70	17.00	0.00	0.80	
LATHER	All	BLD		36.58	38.83	1.5	1.5	2.0	2.0	8.65	14.50	0.00	0.55	
MACHINIST	All	BLD		48.93	51.43	1.5	1.5	2.0	2.0	7.68	8.95	1.85	1.32	
MARBLE FINISHER	All	BLD		31.65	31.65	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
MARBLE MASON	All	BLD		33.15	33.15	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
MILLWRIGHT	All	BLD		32.53	34.78	1.5	1.5	2.0	2.0	8.65	19.01	0.00	0.55	
MILLWRIGHT	All	HWY		35.51	37.26	1.5	1.5	2.0	2.0	8.65	19.77	0.00	0.52	
OPERATING ENGINEER	All	ALL	1	41.65	42.65	1.5	1.5	2.0	2.0	9.95	10.90	0.00	1.15	
OPERATING ENGINEER	All	ALL	2	26.55	42.65	1.5	1.5	2.0	2.0	9.95	10.90	0.00	1.15	
OPERATING ENGINEER	All	ALL	3	42.65	43.65	1.5	1.5	2.0	2.0	9.95	10.90	0.00	1.15	

PAINTER	All	ALL		35.29	36.79	1.5	1.5	2.0	2.0	9.10	5.85	0.00	0.60	
PAINTER - SIGNS	All	ALL		35.29	36.79	1.5	1.5	2.0	2.0	9.10	5.85	0.00	0.60	
PILEDRIVER	All	BLD		37.58	39.83	1.5	1.5	2.0	2.0	8.65	14.50	0.00	0.55	
PILEDRIVER	All	HWY		37.30	39.05	1.5	1.5	2.0	2.0	8.65	15.20	0.00	0.52	
PIPEFITTER	All	BLD		44.45	47.21	1.5	1.5	2.0	2.0	7.40	10.25	0.00	2.00	
PLASTERER	All	BLD		33.43	35.43	1.5	1.5	2.0	2.0	9.35	12.58	0.00	0.50	
PLUMBER	All	BLD		44.45	47.21	1.5	1.5	2.0	2.0	7.40	10.25	0.00	2.00	
ROOFER	All	BLD		31.60	33.10	1.5	1.5	2.0	2.0	9.25	8.40	0.00	0.27	
SHEETMETAL WORKER	All	BLD		37.37	39.62	1.5	1.5	2.0	2.0	9.35	15.75	0.00	0.52	
SPRINKLER FITTER	All	BLD		42.87	45.62	1.5	1.5	2.0	2.0	8.67	9.55	0.00	0.52	
STONE MASON	All	BLD		32.45	34.07	1.5	1.5	2.0	2.0	9.35	14.20	0.00	0.88	
TERRAZZO FINISHER	All	BLD		31.65	31.65	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
TERRAZZO MASON	All	BLD		33.15	33.15	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
TILE MASON	All	BLD		33.15	33.15	1.5	1.5	2.0	2.0	9.35	10.40	0.00	0.20	
TRUCK DRIVER	All	ALL	1	38.06	42.18	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	ALL	2	38.61	42.18	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	ALL	3	38.87	42.18	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	ALL	4	39.23	42.18	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	ALL	5	40.27	42.18	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	O&C	1	30.45	33.74	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	O&C	2	30.89	33.74	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	O&C	3	31.10	33.74	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	O&C	4	31.38	33.74	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TRUCK DRIVER	All	O&C	5	32.22	33.74	1.5	1.5	2.0	2.0	13.00	6.37	0.00	0.25	
TUCKPOINTER	All	BLD		32.45	34.07	1.5	1.5	2.0	2.0	9.35	14.20	0.00	0.88	

<u>Legend</u>

Rg Region

Type Trade Type - All, Highway, Building, Floating, Oil & Chip, Rivers

C Class

Base Base Wage Rate

OT M-F Unless otherwise noted, OT pay is required for any hour greater than 8 worked each day, Mon through Fri. The number listed is the multiple of the base wage.

OT Sa Overtime pay required for every hour worked on Saturdays

OT Su Overtime pay required for every hour worked on Sundays

OT Hol Overtime pay required for every hour worked on Holidays

H/W Health/Welfare benefit

Vac Vacation

Trng Training

Other Ins Employer hourly cost for any other type(s) of insurance provided for benefit of worker.

Explanations CHAMPAIGN COUNTY

The following list is considered as those days for which holiday rates of wages for work performed apply: New Years Day, Memorial Day, Fourth of July, Labor Day, Thanksgiving Day, Christmas Day and Veterans Day in some classifications/counties. Generally, any of these holidays which fall on a Sunday is celebrated on the following Monday. This then makes work performed on that Monday payable at the appropriate overtime rate for holiday pay. Common practice in a given local may alter certain days of celebration. If in doubt, please check with IDOL.

Oil and chip resealing (O&C) means the application of road oils and liquid asphalt to coat an existing road surface, followed by application of aggregate chips or gravel to coated surface, and subsequent rolling of material to seal the surface.

EXPLANATION OF CLASSES

ASBESTOS - GENERAL - removal of asbestos material/mold and hazardous materials from any place in a building, including mechanical systems where those mechanical systems are to be removed. This includes the removal of asbestos materials/mold and hazardous materials from ductwork or pipes in a building when the building is to be demolished at the time or at some close future date.

ASBESTOS - MECHANICAL - removal of asbestos material from mechanical systems, such as pipes, ducts, and boilers, where the mechanical systems are to remain.

CERAMIC TILE FINISHER, MARBLE FINISHER, TERRAZZO FINISHER

Assisting, helping or supporting the tile, marble and terrazzo mechanic by performing their historic and traditional work assignments required to complete the proper installation of the work covered by said crafts. The term "Ceramic" is used for naming the classification only and is in no way a limitation of the product handled. Ceramic takes into consideration most hard tiles.

ELECTRONIC SYSTEMS TECHNICIAN

Installation, service and maintenance of low-voltage systems which utilizes the transmission and/or transference of voice, sound, vision, or digital for commercial, education, security and entertainment purposes for the following: TV monitoring and surveillance, background/foreground music, intercom and telephone interconnect, field programming, inventory control systems, microwave transmission, multi-media, multiplex, radio page, school, intercom and sound burglar alarms and low voltage master clock systems.

Excluded from this classification are energy management systems, life safety systems, supervisory controls and data acquisition systems not intrinsic with the above listed systems, fire alarm systems, nurse call systems and raceways exceeding fifteen feet in length.

TRUCK DRIVER - BUILDING, HEAVY AND HIGHWAY CONSTRUCTION Class 1. Drivers on 2 axle trucks hauling less than 9 ton. Air compressor and welding machines and brooms, including those pulled by separate units, truck driver helpers, warehouse employees, mechanic helpers, greasers and tiremen, pickup trucks when hauling materials, tools, or workers to and from and on-the-job site, and fork lifts up to 6,000 lb. capacity.

Class 2. Two or three axle trucks hauling more than 9 ton but hauling less than 16 ton. A-frame winch trucks, hydrolift trucks, vactor trucks or similar equipment when used for transportation purposes. Fork lifts over 6,000 lb. capacity, winch trucks, four

axle combination units, and ticket writers.

Class 3. Two, three or four axle trucks hauling 16 ton or more. Drivers on water pulls, articulated dump trucks, mechanics and working forepersons, and dispatchers. Five axle or more combination units.

Class 4. Low Boy and Oil Distributors.

Class 5. Drivers who require special protective clothing while employed on hazardous waste work.

TRUCK DRIVER - OIL AND CHIP RESEALING ONLY.

This shall encompass laborers, workers and mechanics who drive contractor or subcontractor owned, leased, or hired pickup, dump, service, or oil distributor trucks. The work includes transporting materials and equipment (including but not limited to, oils, aggregate supplies, parts, machinery and tools) to or from the job site; distributing oil or liquid asphalt and aggregate; stock piling material when in connection with the actual oil and chip contract. The Truck Driver (Oil & Chip Resealing) wage classification does not include supplier delivered materials.

OPERATING ENGINEERS - BUILDING, HEAVY AND HIGHWAY CONSTRUCTION Class 1. Draglines, Derricks, Shovels, Gradalls, Mechanics, Tractor Highlift, Tournadozer, Concrete Mixers with Skip, Tournamixer, Two Drum Machine, One Drum Hoist with Tower or Boom, Cableways, Tower Machines, Motor Patrol, Boom Tractor, Boom or Winch Truck, Winch or Hydraulic Boom Truck, Tournapull, Tractor Operating Scoops, Bulldozer, Push Tractor, Asphalt Planer, Finishing Machine on Asphalt, Large Rollers on Earth, Rollers on Asphalt Mix, Ross Carrier or similar Machine, Gravel Processing Machine, Asphalt Plant Engineer, Paver Operator, Dredging Equipment, or Dredge Engineer, or Dredge Operator, Central Mix Plant Engineer, CMI or similar type machine, Concrete Pump, Truck or Skid Mounted, Engineer or Rock Crusher Plant, Concrete Plant Engineer, Ditching Machine with dual attachment, Tractor Mounted Loaders, Hydro Crane, Standard or Dinkey Locomotives, Scoopmobiles, Euclid Loader, Soil Cement Machine, Back Filler, Elevating Machine, Power Blade, Drilling Machine, including Well Testing, Caissons, Shaft or any similar type drilling machines, Motor Driven Paint Machine, Pipe Cleaning Machine, Pipe Wrapping Machine, Pipe Bending Machine, Apsco Paver, Boring Machine, (Head Equipment Greaser), Barber-Greene Loaders, Formless Paver, (Well Point System), Concrete Spreader, Hydra Ax, Span Saw, Marine Scoops, Brush Mulcher, Brush Burner, Mesh Placer, Tree Mover, Helicopter Crew (3), Piledriver-Skid or Crawler, Stump Remover, Root Rake, Tug Boat Operator, Refrigerating Machine, Freezing Operator, Chair Cart- Self-Propelled, Hydra Seeder, Straw Blower, Power Sub Grader, Bull Float, Finishing Machine, Self-Propelled Pavement Breaker, Lull (or similar type Machine), Two Air Compressors, Compressors hooked in Manifold, Chip Spreader, Mud Cat, Sull-Air, Fork Lifts (except when used for landscaping work), Soil Stabilizer (Seaman Tiller, Bo Mag, Rago Gator, and similar types of equipment), Tube Float, Spray Machine, Curing Machine, Concrete or Asphalt Milling Machine, Snooper Truck-Operator, Backhoe, Farm Tractors (with attachments), 4 Point Lift System (Power Lift or similar type), Skid-Steer (Bob Cat or similar type), Wrecking Shears, Water Blaster.

Class 2. Concrete Mixers without Skips, Rock Crusher, Ditching Machine under 6', Curbing Machine, One Drum Machines without Tower or Boom, Air Tugger, Self-Propelled Concrete Saw, Machine Mounted Post Hole Digger, two to four Generators, Water Pumps or Welding Machines, within 400 feet, Air Compressor 600 cu. ft. and under, Rollers on Aggregate and Seal Coat Surfaces, Fork Lift (when used for landscaping work), Concrete and Blacktop Curb Machine, One Water Pump, Oilers, Air Valves or Steam Valves, One Welding Machine, Truck Jack, Mud Jack, Gunnite Machine, House Elevators when used for hoisting material, Engine Tenders, Fireman, Wagon Drill, Flex Plane, Conveyor, Siphons and Pulsometer, Switchman, Fireman on Paint Pots, Fireman on Asphalt Plants, Distributor Operator on Trucks, Tampers, Self-Propelled Power Broom, Striping Machine (motor driven), Form Tamper, Bulk Cement Plant, Equipment Greaser, Deck Hands, Truck Crane Oiler-Driver, Cement Blimps, Form Grader, Temporary Heat, Throttle Valve, Super Sucker (and similar type of equipment).

Class 3. Power Cranes, Truck or Crawler Crane, Rough Terrain Crane (Cherry Picker), Tower Crane, Overhead Crane.

Other Classifications of Work:

For definitions of classifications not otherwise set out, the Department generally has on file such definitions which are available. If

a task to be performed is not subject to one of the classifications of pay set out, the Department will upon being contacted state which neighboring county has such a classification and provide such rate, such rate being deemed to exist by reference in this document. If no neighboring county rate applies to the task, the Department shall undertake a special determination, such special determination being then deemed to have existed under this determination. If a project requires these, or any classification not listed, please contact IDOL at 217-782-1710 for wage rates or clarifications.

LANDSCAPING

Landscaping work falls under the existing classifications for laborer, operating engineer and truck driver. The work performed by landscape plantsman and landscape laborer is covered by the existing classification of laborer. The work performed by landscape operators (regardless of equipment used or its size) is covered by the classifications of operating engineer. The work performed by landscape truck drivers (regardless of size of truck driven) is covered by the classifications of truck driver.

INDEX FOR SUPPLEMENTAL SPECIFICATIONS AND RECURRING SPECIAL PROVISIONS

Adopted January 1, 2020

This index contains a listing of SUPPLEMENTAL SPECIFICATIONS, frequently used RECURRING SPECIAL PROVISIONS, and LOCAL ROADS AND STREETS RECURRING SPECIAL PROVISIONS.

ERRATA Standard Specifications for Road and Bridge Construction (Adopted 4-1-16) (Revised 1-1-20)

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Check Sheet for Recurring Special Provisions



The Following Recurring Special Provisions Indicated By An "X" Are Applicable To This Contract And Are Included By Reference:

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BDE SPECIAL PROVISIONS For the April 24, 2020 and June 12, 2020 Lettings

The following special provisions indicated by a "check mark" are applicable to this contract and will be included by the Project Coordination and Implementation Section of the BD&E. An * indicates a new or revised special provision for the letting.

File Name	#		Special Provision Title	Effective	Revised
* 80099	1		Accessible Pedestrian Signals (APS)	April 1, 2003	April 1, 2020
80274	2		Aggregate Subgrade Improvement	April 1, 2012	April 1, 2016
80192	3		Automated Flagger Assistance Device	Jan. 1, 2008	
80173	4		Bituminous Materials Cost Adjustments	Nov. 2, 2006	Aug. 1, 2017
80426	5		Bituminous Surface Treatment with Fog Seal	Jan. 1, 2020	
80241	6		Bridge Demolition Debris	July 1, 2009	
50261	7		Building Removal-Case I (Non-Friable and Friable Asbestos)	Sept. 1, 1990	April 1, 2010
50481			Building Removal-Case II (Non-Friable Asbestos)	Sept. 1, 1990	April 1, 2010
50491	9		Building Removal-Case III (Friable Asbestos)	Sept. 1, 1990	April 1, 2010
50531			Building Removal-Case IV (No Asbestos)	Sept. 1, 1990	April 1, 2010
80425			Cape Seal	Jan. 1, 2020	
80384	12		Compensable Delay Costs	June 2, 2017	April 1, 2019
80198			Completion Date (via calendar days)	April 1, 2008	
80199	14		Completion Date (via calendar days) Plus Working Days	April 1, 2008	
80293	15		Concrete Box Culverts with Skews > 30 Degrees and Design Fills ≤ 5 Feet	April 1, 2012	July 1, 2016
80311	16	П	Concrete End Sections for Pipe Culverts	Jan. 1, 2013	April 1, 2016
80277		П	Concrete Mix Design – Department Provided	Jan. 1, 2012	April 1, 2016
80261		П	Construction Air Quality – Diesel Retrofit	June 1, 2010	Nov. 1, 2014
80387		П	Contrast Preformed Plastic Pavement Marking	Nov. 1, 2017	,
80029		П	Disadvantaged Business Enterprise Participation	Sept. 1, 2000	March 2, 2019
80402		П	Disposal Fees	Nov. 1, 2018	,
80378	22		Dowel Bar Inserter	Jan. 1, 2017	Jan. 1, 2018
80405	23		Elastomeric Bearings	Jan. 1, 2019	
80421	24		Electric Service Installation	Jan. 1, 2020	
80415	25		Emulsified Asphalts	Aug. 1, 2019	
80423	26		Engineer's Field Office and Laboratory	Jan. 1, 2020	
80388	27		Equipment Parking and Storage	Nov. 1, 2017	
80229	28		Fuel Cost Adjustment	April 1, 2009	Aug. 1, 2017
80417	29		Geotechnical Fabric for Pipe Underdrains and French Drains	Nov. 1, 2019	-
80420	30		Geotextile Retaining Walls	Nov. 1, 2019	
80304	31		Grooving for Recessed Pavement Markings	Nov. 1, 2012	Nov. 1, 2017
80422	32		High Tension Cable Median Barrier Reflectors	Jan. 1, 2020	
80416	33		Hot-Mix Asphalt – Binder and Surface Course	July 2, 2019	Nov. 1, 2019
80398	34		Hot-Mix Asphalt – Longitudinal Joint Sealant	Aug. 1, 2018	Nov. 1, 2019
* 80406	35		Hot-Mix Asphalt – Mixture Design Verification and Production (Modified for I-FIT Data Collection)	Jan. 1, 2019	Jan. 2, 2020
80347	36		Hot-Mix Asphalt – Pay for Performance Using Percent Within Limits – Jobsite Sampling	Nov. 1, 2014	July 2, 2019
80383	37	П	Hot-Mix Asphalt – Quality Control for Performance	April 1, 2017	July 2, 2019
80411		Ħ	Luminaires, LED	April 1, 2019	ouly 2, 2010
80393		Ħ	Manholes, Valve Vaults, and Flat Slab Tops	Jan. 1, 2018	March 1, 2019
80045		Ħ	Material Transfer Device	June 15, 1999	Aug. 1, 2014
80418		Ħ	Mechanically Stabilized Earth Retaining Walls	Nov. 1, 2019	7 tag, _0
80424		Ħ	Micro-Surfacing and Slurry Sealing	Jan. 1, 2020	
* 80428		П	Mobilization	April 1, 2020	
80165		H	Moisture Cured Urethane Paint System	Nov. 1, 2006	Jan. 1, 2010
80412		Ħ	Obstruction Warning Luminaires, LED	Aug. 1, 2019	· · , · · ·
80349		Ħ	Pavement Marking Blackout Tape	Nov. 1, 2014	April 1, 2016
20010	. •		······································	· · · · · · · · · · · · · · · · · · ·	ų, – 0 . 0

	80371	47		Pavement Marking Removal	July 1, 2016	
	80389	48		Portland Cement Concrete	Nov. 1, 2017	
	80359	49		Portland Cement Concrete Bridge Deck Curing	April 1, 2015	Nov. 1, 2019
	80300	50		Preformed Plastic Pavement Marking Type D - Inlaid	April 1, 2012	April 1, 2016
	34261	51		Railroad Protective Liability Insurance	Dec. 1, 1986	Jan. 1, 2006
	80157	52		Railroad Protective Liability Insurance (5 and 10)	Jan. 1, 2006	
*	80306	53		Reclaimed Asphalt Pavement (RAP) and Reclaimed Asphalt Shingles (RAS)	Nov. 1, 2012	Jan. 2, 2020
	80407	54		Removal and Disposal of Regulated Substances	Jan. 1, 2019	Jan. 1, 2020
*	80419	55		Silt Fence, Inlet Filters, Ground Stabilization and Riprap Filter Fabric	Nov. 1, 2019	April 1, 2020
	80395	56		Sloped Metal End Section for Pipe Culverts	Jan. 1, 2018	
	80340	57		Speed Display Trailer	April 2, 2014	Jan. 1, 2017
	80127	58		Steel Cost Adjustment	April 2, 2004	Aug. 1, 2017
	80408	59		Steel Plate Beam Guardrail Manufacturing	Jan. 1, 2019	
	80413	60		Structural Timber	Aug. 1, 2019	
	80397	61		Subcontractor and DBE Payment Reporting	April 2, 2018	
	80391	62	Ш	Subcontractor Mobilization Payments	Nov. 2, 2017	April 1, 2019
	80317	63		Surface Testing of Hot-Mix Asphalt Overlays	Jan. 1, 2013	Aug. 1, 2019
	80298	64	Ш	Temporary Pavement Marking	April 1, 2012	April 1, 2017
	80403	65	Ш	Traffic Barrier Terminal, Type 1 Special	Nov. 1, 2018	
	80409	66	Ц	Traffic Control Devices - Cones	Jan. 1, 2019	
	80410	67		Traffic Spotters	Jan. 1, 2019	
	20338	68	Ш	Training Special Provisions	Oct. 15, 1975	
	80318	69	Ш	Traversable Pipe Grate for Concrete End Sections	Jan. 1, 2013	Jan. 1, 2018
*	80429	70	Щ	Ultra-Thin Bonded Wearing Course	April 1, 2020	
	80288	71	Ш	Warm Mix Asphalt	Jan. 1, 2012	April 1, 2016
	80302	72		Weekly DBE Trucking Reports	June 2, 2012	April 2, 2015
*		73		Wood Fence Sight Screen	Aug. 1, 2019	April 1, 2020
*	80427		Щ	Work Zone Traffic Control Devices	Mar. 2, 2020	
	80071	75	Ш	Working Days	Jan. 1, 2002	

The following special provisions are in the 2020 Supplemental Specifications and Recurring Special Provisions.

File Name	Special Provision Title	New Location(s)	Effective	Revised
80404	Coarse Aggregate Quality for	Article 1004.01(b)	Jan. 1, 2019	
	Micro-Surfacing and Cape Seals			
80392	Lights on Barricades	Articles 701.16, 701.17(c)(2) & 603.07	Jan. 1, 2018	
80336	Longitudinal Joint and Crack Patching	Check Sheet #36	April 1, 2014	April 1, 2016
80400	Mast Arm Assembly and Pole	Article 1077.03(b)	Aug. 1, 2018	
80394	Metal Flared End Section for Pipe Culverts	Articles 542.07(c) and 542.11	Jan. 1, 2018	April 1, 2018
80390	Payments to Subcontractors	Article 109.11	Nov. 2, 2017	

The following special provisions have been deleted from use.

<u>File Name</u>	Special Provision Title	<u>Effective</u>	Revised
80328	Progress Payments	Nov. 2, 2013	

The following special provisions require additional information from the designer. The additional information needs to be submitted as a separate document. The Project Coordination and Implementation section will then include the information in the applicable special provision.

- Bridge Demolition Debris
- Building Removal Case I
- Building Removal Case II
- Building Removal Case III
- Building Removal-Case IV
- Completion Date
- Completion Date Plus Working Days
- DBE Participation

- Material Transfer Device
- Railroad Protective Liability Insurance
- Training Special Provisions
- Working Days

WORKING DAYS (BDE)

Effective: January 1, 2002

The Contractor shall complete the work within 35 working days.

PORTLAND CEMENT CONCRETE BRIDGE DECK CURING (BDE)

Effective: April 1, 2015 Revised: November 1, 2019

Revise the following three entries and add the following footnote to the Index Table of Curing and Protection of Concrete Construction in Article 1020.13 of the Standard Specifications:

"INDEX TABLE OF CURING AND PROTECTION OF CONCRETE CONSTRUCTION							
TYPE OF CONSTRUCTION	CURING METHODS	CURING PERIOD DAYS	LOW AIR TEMPERATURE PROTECTION METHODS				
Superstructure (except deck)	1020.13(a)(1)(2)(3)(5)(6) 8/ 19/	7	1020.13(d)(1)(2)				
Superstructure (Approach Slab)	1020.13(a)(5)(6) ^{19/}	3	1020.13(d)(1)(2) 17/				
Deck	1020.13(a)(5)(6) 19/	7	1020.13(d)(1)(2) 17/				

19/ The cellulose polyethylene or synthetic fiber with polymer polyethylene blanket method shall not be used on latex modified concrete, or vertical concrete surfaces greater than 1 ft (300 mm), e.g. parapets."

Add the following to Article 1020.13(a) of the Standard Specifications.

"(6)Cellulose Polyethylene Blanket Method and Synthetic Fiber with Polymer Polyethylene Blanket Method. After the surface of concrete has been textured or finished, it shall be covered immediately with a wetted cellulose polyethylene blanket or wetted synthetic fiber with polymer polyethylene blanket. The blankets shall be installed with the white perforated polyethylene side facing up. The blanket's fiber side shall be wetted immediately prior to placement or as the blanket is being placed, and the polyethylene side shall be thoroughly soaked with a gentle spray of water immediately after placement. For bridge decks, a foot bridge shall be used to place and wet the blankets.

Adjoining blankets shall overlap a minimum of 8 in. (200 mm). Bubbles and wrinkles shall be removed with a broom, squeegee, or as recommended by the manufacturer.

The blankets shall be maintained in a wetted condition until the concrete has hardened sufficiently to place soaker hoses without indentations to the concrete surface. The soaker hoses shall be placed on top of the blankets at a maximum 4 ft (1.2 m) spacing. The blankets shall be kept wet with a continuous supply of water for the remainder of the curing period. Other continuous wetting systems may be used if approved by the Engineer.

For areas inaccessible to the blankets, curing shall be according to Article 1020.13(a)(3)."

Revise the first paragraph of Article 1022.03 of the Standard Specifications to read:

"1022.03 Waterproof Paper Blankets, White Polyethylene Sheeting, Burlap-Polyethylene Blankets, Cellulose Polyethylene Blankets, and Synthetic Fiber with Polymer Polyethylene Blankets. These materials shall be white and according to ASTM C 171.

The cellulose polyethylene blanket shall consist of a perforated white polyethylene sheeting with cellulose fiber backing and shall be limited to single use only. The cellulose polyethylene blankets shall be delivered to the jobsite unused and in the manufacturer's unopened packaging until ready for installation. Each roll shall be clearly labeled on the product with product name, manufacturer, and manufacturer's certification of compliance with ASTMC 171.

The synthetic fiber with polymer polyethylene blanket shall consist of a perforated white polyethylene sheeting with absorbent synthetic fibers and super absorbent polymer backing, and shall be limited to single use only. The synthetic fiber with polymer polyethylene blankets shall be delivered to the jobsite unused and in the manufacturer's unopened packaging until ready for installation. Each roll shall be clearly labeled on the product with product name, manufacturer, and manufacturer's certification of compliance with ASTM C 171."

COMPENSABLE DELAY COSTS (BDE)

Effective: June 2, 2017 Revised: April 1, 2019

Revise Article 107.40(b) of the Standard Specifications to read:

- "(b) Compensation. Compensation will not be allowed for delays, inconveniences, or damages sustained by the Contractor from conflicts with facilities not meeting the above definition; or if a conflict with a utility in an unanticipated location does not cause a shutdown of the work or a documentable reduction in the rate of progress exceeding the limits set herein. The provisions of Article 104.03 notwithstanding, compensation for delays caused by a utility in an unanticipated location will be paid according to the provisions of this Article governing minor and major delays or reduced rate of production which are defined as follows.
 - (1) Minor Delay. A minor delay occurs when the work in conflict with the utility in an unanticipated location is completely stopped for more than two hours, but not to exceed two weeks.
 - (2) Major Delay. A major delay occurs when the work in conflict with the utility in an unanticipated location is completely stopped for more than two weeks.
 - (3) Reduced Rate of Production Delay. A reduced rate of production delay occurs when the rate of production on the work in conflict with the utility in an unanticipated location decreases by more than 25 percent and lasts longer than seven calendar days."

Revise Article 107.40(c) of the Standard Specifications to read:

- "(c) Payment. Payment for Minor, Major, and Reduced Rate of Production Delays will be made as follows.
 - (1) Minor Delay. Labor idled which cannot be used on other work will be paid for according to Article 109.04(b)(1) and (2) for the time between start of the delay and the minimum remaining hours in the work shift required by the prevailing practice in the area.
 - Equipment idled which cannot be used on other work, and which is authorized to standby on the project site by the Engineer, will be paid for according to Article 109.04(b)(4).
 - (2) Major Delay. Labor will be the same as for a minor delay.

Equipment will be the same as for a minor delay, except Contractor-owned equipment will be limited to two weeks plus the cost of move-out to either the

Contractor's yard or another job and the cost to re-mobilize, whichever is less. Rental equipment may be paid for longer than two weeks provided the Contractor presents adequate support to the Department (including lease agreement) to show retaining equipment on the job is the most economical course to follow and in the public interest.

(3) Reduced Rate of Production Delay. The Contractor will be compensated for the reduced productivity for labor and equipment time in excess of the 25 percent threshold for that portion of the delay in excess of seven calendar days. Determination of compensation will be in accordance with Article 104.02, except labor and material additives will not be permitted.

Payment for escalated material costs, escalated labor costs, extended project overhead, and extended traffic control will be determined according to Article 109.13."

Revise Article 108.04(b) of the Standard Specifications to read:

- "(b) No working day will be charged under the following conditions.
 - (1) When adverse weather prevents work on the controlling item.
 - (2) When job conditions due to recent weather prevent work on the controlling item.
 - (3) When conduct or lack of conduct by the Department or its consultants, representatives, officers, agents, or employees; delay by the Department in making the site available; or delay in furnishing any items required to be furnished to the Contractor by the Department prevents work on the controlling item.
 - (4) When delays caused by utility or railroad adjustments prevent work on the controlling item.
 - (5) When strikes, lock-outs, extraordinary delays in transportation, or inability to procure critical materials prevent work on the controlling item, as long as these delays are not due to any fault of the Contractor.
 - (6) When any condition over which the Contractor has no control prevents work on the controlling item."

Revise Article 109.09(f) of the Standard Specifications to read:

"(f) Basis of Payment. After resolution of a claim in favor of the Contractor, any adjustment in time required for the work will be made according to Section 108. Any adjustment in the costs to be paid will be made for direct labor, direct materials, direct equipment, direct jobsite overhead, direct offsite overhead, and other direct costs allowed by the resolution. Adjustments in costs will not be made for interest charges, loss of anticipated profit, undocumented loss of efficiency, home office overhead and unabsorbed overhead

other than as allowed by Article 109.13, lost opportunity, preparation of claim expenses and other consequential indirect costs regardless of method of calculation.

The above Basis of Payment is an essential element of the contract and the claim cost recovery of the Contractor shall be so limited."

Add the following to Section 109 of the Standard Specifications.

"109.13 Payment for Contract Delay. Compensation for escalated material costs, escalated labor costs, extended project overhead, and extended traffic control will be allowed when such costs result from a delay meeting the criteria in the following table.

Contract Type	Cause of Delay	Length of Delay
Working Days	Article 108.04(b)(3) or Article 108.04(b)(4)	No working days have been charged for two consecutive weeks.
Completion Date	Article 108.08(b)(1) or Article 108.08(b)(7)	The Contractor has been granted a minimum two week extension of contract time, according to Article 108.08.

Payment for each of the various costs will be according to the following.

- (a) Escalated Material and/or Labor Costs. When the delay causes work, which would have otherwise been completed, to be done after material and/or labor costs have increased, such increases will be paid. Payment for escalated material costs will be limited to the increased costs substantiated by documentation furnished by the Contractor. Payment for escalated labor costs will be limited to those items in Article 109.04(b)(1) and (2), except the 35 percent and 10 percent additives will not be permitted.
- (b) Extended Project Overhead. For the duration of the delay, payment for extended project overhead will be paid as follows.
 - (1) Direct Jobsite and Offsite Overhead. Payment for documented direct jobsite overhead and documented direct offsite overhead, including onsite supervisory and administrative personnel, will be allowed according to the following table.

Original Contract Amount	Supervisory and Administrative Personnel
Up to \$5,000,000	One Project Superintendent
Over \$ 5,000,000 - up to \$25,000,000	One Project Manager, One Project Superintendent or Engineer, and One Clerk
Over \$25,000,000 - up to \$50,000,000	One Project Manager, One Project Superintendent, One Engineer, and

	One Clerk
Over \$50,000,000	One Project Manager,
	Two Project Superintendents,
	One Engineer, and
	One Clerk

- (2) Home Office and Unabsorbed Overhead. Payment for home office and unabsorbed overhead will be calculated as 8 percent of the total delay cost.
- (c) Extended Traffic Control. Traffic control required for an extended period of time due to the delay will be paid for according to Article 109.04.

When an extended traffic control adjustment is paid under this provision, an adjusted unit price as provided for in Article 701.20(a) for increase or decrease in the value of work by more than ten percent will not be paid.

Upon payment for a contract delay under this provision, the Contractor shall assign subrogation rights to the Department for the Department's efforts of recovery from any other party for monies paid by the Department as a result of any claim under this provision. The Contractor shall fully cooperate with the Department in its efforts to recover from another party any money paid to the Contractor for delay damages under this provision."

EQUIPMENT PARKING AND STORAGE (BDE)

Effective: November 1, 2017

Replace the first paragraph of Article 701.11 of the Standard Specifications with the following.

"701.11 Equipment Parking and Storage. During working hours, all vehicles and/or nonoperating equipment which are parked, two hours or less, shall be parked at least 8 ft (2.5 m) from the open traffic lane. For other periods of time during working and for all nonworking hours, all vehicles, materials, and equipment shall be parked or stored as follows.

- (a) When the project has adequate right-of-way, vehicles, materials, and equipment shall be located a minimum of 30 ft (9 m) from the pavement.
- (b) When adequate right-of-way does not exist, vehicles, materials, and equipment shall be located a minimum of 15 ft (4.5 m) from the edge of any pavement open to traffic.
- (c) Behind temporary concrete barrier, vehicles, materials, and equipment shall be located a minimum of 24 in. (600 mm) behind free standing barrier or a minimum of 6 in. (150 mm) behind barrier that is either pinned or restrained according to Article 704.04. The 24 in. or 6 in. measurement shall be from the base of the non-traffic side of the barrier.
- (d) Behind other man-made or natural barriers meeting the approval of the Engineer."

PORTLAND CEMENT CONCRETE (BDE)

Effective: November 1, 2017

Revise the Air Content % of Class PP Concrete in Table 1 Classes of Concrete and Mix Design Criteria in Article 1020.04 of the Standard Specifications to read:

"TABLE 1. CLASSES OF CONCRETE AND MIX DESIGN CRITERIA			
Class of Conc.	Use	Air Content %	
PP	Pavement Patching Bridge Deck Patching (10)		
	PP-1 PP-2 PP-3 PP-4 PP-5	4.0 - 8.0"	

Revise Note (4) at the end of Table 1 Classes of Concrete and Mix Design Criteria in Article 1020.04 of the Standard Specifications to read:

"(4) For all classes of concrete, the maximum slump may be increased to 7 in (175 mm) when a high range water-reducing admixture is used. For Class SC, the maximum slump may be increased to 8 in. (200 mm). For Class PS, the maximum slump may be increased to 8 1/2 in. (215 mm) if the high range water-reducing admixture is the polycarboxylate type."

SUBCONTRACTOR MOBILIZATION PAYMENTS (BDE)

Effective: November 2, 2017

Revised: April 1, 2019

Replace the second paragraph of Article 109.12 of the Standard Specifications with the following:

"This mobilization payment shall be made at least seven days prior to the subcontractor starting work. The amount paid shall be at the following percentage of the amount of the subcontract reported on form BC 260A submitted for the approval of the subcontractor's work.

Value of Subcontract Reported on Form BC 260A	Mobilization Percentage
Less than \$10,000	25%
\$10,000 to less than \$20,000	20%
\$20,000 to less than \$40,000	18%
\$40,000 to less than \$60,000	16%
\$60,000 to less than \$80,000	14%
\$80,000 to less than \$100,000	12%
\$100,000 to less than \$250,000	10%
\$250,000 to less than \$500,000	9%
\$500,000 to \$750,000	8%
Over \$750,000	7%"

SUBCONTRACTOR AND DBE PAYMENT REPORTING (BDE)

Effective: April 2, 2018

Add the following to Section 109 of the Standard Specifications.

"109.14 Subcontractor and Disadvantaged Business Enterprise Payment Reporting. The Contractor shall report all payments made to the following parties:

- (a) first tier subcontractors;
- (b) lower tier subcontractors affecting disadvantaged business enterprise (DBE) goal credit;
- (c) material suppliers or trucking firms that are part of the Contractor's submitted DBE utilization plan.

The report shall be made through the Department's on-line subcontractor payment reporting system within 21 days of making the payment."

REMOVAL AND DISPOSAL OF REGULATED SUBSTANCES (BDE)

Effective: January 1, 2019 Revised: January 1, 2020

Revise Section 669 of the Standard Specifications to read:

"SECTION 669. REMOVAL AND DISPOSAL OF REGULATED SUBSTANCES

669.01 Description. This work shall consist of the transportation and proper disposal of regulated substances. This work shall also consist of the removal, transportation, and proper disposal of underground storage tanks (UST), their contents and associated underground piping to the point where the piping is above the ground, including determining the content types and estimated quantities.

669.02 Equipment. The Contractor shall notify the Engineer of the delivery of all excavation, storage, and transportation equipment to a work area location. The equipment shall comply with OSHA and American Petroleum Institute (API) guidelines and shall be furnished in a clean condition. Clean condition means the equipment does not contain any residual material classified as a non-special waste, non-hazardous special waste, or hazardous waste. Residual materials include, but are not limited to, petroleum products, chemical products, sludges, or any other material present in or on equipment.

Before beginning any associated soil or groundwater management activity, the Contractor shall provide the Engineer with the opportunity to visually inspect and approve the equipment. If the equipment contains any contaminated residual material, decontamination shall be performed on the equipment as appropriate to the regulated substance and degree of contamination present according to OSHA and API guidelines. All cleaning fluids used shall be treated as the contaminant unless laboratory testing proves otherwise.

669.03 Pre-Construction Submittals and Qualifications. Prior to beginning this work, or working in areas with regulated substances, the Contractor shall submit a "Regulated Substances Pre-Construction Plan (RSPCP)" to the Engineer for review and approval using form BDE 2730. The form shall be signed by an Illinois licensed Professional Engineer or Professional Geologist.

As part of the RSPCP, the Contractor(s) or firm(s) performing the work shall meet the following qualifications.

(a) Regulated Substances Monitoring. Qualification for environmental observation and field screening of regulated substances work and environmental observation of UST removal shall require either pre-qualification in Hazardous Waste by the Department or demonstration of acceptable project experience in remediation and operations for contaminated sites in accordance with applicable Federal, State, or local regulatory requirements using BDE 2730.

- Qualification for each individual performing regulated substances monitoring shall require a minimum of one-year of experience in similar activities as those required for the project.
- (b) Underground Storage Tank Removal. Qualification for underground storage tank (UST) removal work shall require licensing and certification with the Office of the State Fire Marshall (OSFM) and possession of all permits required to perform the work. A copy of the permit shall be provided to the Engineer prior to tank removal.

The qualified Contractor(s) or firm(s) shall also document it does not have any current or former ties with any of the properties contained within, adjoining, or potentially affecting the work.

The Engineer will require up to 21 calendar days for review of the RSPCP. The review may involve rejection or revision and resubmittal; in which case, an additional 21 days will be required for each subsequent review. Work shall not commence until the RSPCP has been approved by the Engineer. After approval, the RSPCP shall be revised as necessary to reflect changed conditions in the field and documented using BDE 2730A "Regulated Substances Pre-Construction Plan (RSPCP) Addendum" and submitted to the Engineer for approval.

CONSTRUCTION REQUIREMENTS

- **669.04 Regulated Substances Monitoring.** Regulated substances monitoring includes environmental observation and field screening during regulated substances management activities at the contract specific work areas. As part of the regulated substances monitoring, the monitoring personnel shall perform and document the applicable duties listed on form BDE 2732 "Regulated Substances Monitoring Daily Record (RSMDR)".
 - (a) Environmental Observation. Prior to beginning excavation, the Contractor shall mark the limits of the contract specific work areas. Once work begins, the monitoring personnel shall be present on-site continuously during the excavation and loading of material.
 - (b) Field Screening. Field screening shall be performed during the excavation and loading of material from the contract specific work areas, except for material classified according to Article 669.05(b)(1) or 669.05(c) where field screening is not required.
 - Field screening shall be performed with either a photoionization detector (PID) (minimum 10.6eV lamp) or a flame ionization detector (FID), and other equipment as appropriate, to monitor for potential contaminants associated with regulated substances. The PID or FID shall be calibrated on-site, and background level readings taken and recorded daily, and as field and weather conditions change. Field screen readings on the PID or FID in excess of background levels indicates the potential presence of regulated substances requiring handling as a non-special waste, special waste, or hazardous waste. PID or FID readings may be used as the basis of increasing the limits of removal with the approval of the Engineer but shall in no case be used to decrease the limits.

669.05 Regulated Substances Management and Disposal. The management and disposal of soil and/or groundwater containing regulated substances shall be according to the following:

- (a) Soil Analytical Results Exceed Most Stringent MAC. When the soil analytical results indicate detected levels exceed the most stringent maximum allowable concentration (MAC) for chemical constituents in soil established pursuant to Subpart F of 35 III. Adm. Code 1100.605, the soil shall be managed as follows:
 - (1) When analytical results indicate inorganic chemical constituents exceed the most stringent MAC, but still considered within area background levels by the Engineer, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable. If the soils cannot be utilized within the right-of-way, they shall be managed and disposed of at a landfill as a non-special waste.
 - (2) When analytical results indicate inorganic chemical constituents exceed the most stringent MAC but do not exceed the MAC for a Metropolitan Statistical Area (MSA) County identified in 35 III. Admin. Code 742 Appendix A. Table G, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable, or managed and disposed of at a clean construction and demolition debris (CCDD) facility or an uncontaminated soil fill operation (USFO) within an MSA County provided the pH of the soil is within the range of 6.25 9.0, inclusive.
 - (3) When analytical results indicate chemical constituents exceed the most stringent MAC but do not exceed the MAC for an MSA County excluding Chicago, or the MAC within the Chicago corporate limits, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable, or managed and disposed of off-site at a CCDD facility or an USFO within an MSA County excluding Chicago or within the Chicago corporate limits provided the pH of the soil is within the range of 6.25 9.0, inclusive.
 - (4) When analytical results indicate chemical constituents exceed the most stringent MAC but do not exceed the MAC for an MSA County excluding Chicago, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable, or managed and disposed of off-site at a CCDD facility or an USFO within an MSA County excluding Chicago provided the pH of the soil is within the range of 6.25 9.0, inclusive.
 - (5) When the Engineer determines soil cannot be managed according to Articles 669.05(a)(1) through (a)(4) above and the materials do not contain special waste or hazardous waste, as determined by the Engineer, the soil shall be managed and disposed of at a landfill as a non-special waste.
 - (6) When analytical results indicate soil is hazardous by characteristic or listing pursuant to 35 III. Admin. Code 721, contains radiological constituents, or the Engineer otherwise determines the soil cannot be managed according to Articles 669.05(a)(1)

through (a)(5) above, the soil shall be managed and disposed of off-site as a special waste or hazardous waste as applicable.

- (b) Soil Analytical Results Do Not Exceed Most Stringent MAC. When the soil analytical results indicate that detected levels do not exceed the most stringent MAC, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable, or managed and disposed of off-site according to Article 202.03. However, the excavated soil cannot be taken to a CCDD facility or an USFO for any of the following reasons.
 - (1) The pH of the soil is less than 6.25 or greater than 9.0.
 - (2) The soil exhibited PID or FID readings in excess of background levels.
- (c) Soil Analytical Results Exceed Most Stringent MAC but Do Not Exceed Tiered Approach to Corrective Action Objectives (TACO) Residential. When the soil analytical results indicate that detected levels exceed the most stringent MAC but do not exceed TACO Tier 1 Soil Remediation Objectives for Residential Properties pursuant to 35 III. Admin. Code 742 Appendix B Table A, the excavated soil can be utilized within the right-of-way as embankment or fill, when suitable, or managed and disposed of off-site according to Article 202.03. However, the excavated soil cannot be taken to a CCDD facility or an USFO.
- (d) Groundwater. When groundwater analytical results indicate the detected levels are above Appendix B, Table E of 35 III. Admin. Code 742, the most stringent Tier 1 Groundwater Remediation Objectives for Groundwater Component of the Groundwater Ingestion Route for Class 1 groundwater, the groundwater shall be managed off-site as a special waste or hazardous waste as applicable. Special waste groundwater shall be containerized and trucked to an off-site treatment facility, or may be discharged to a sanitary sewer or combined sewer when permitted by the local sewer authority. Groundwater discharged to a sanitary sewer or combined sewer shall be pre-treated to remove particulates and measured with a calibrated flow meter to comply with applicable discharge limits. A copy of the permit shall be provided to the Engineer prior to discharging groundwater to the sanitary sewer or combined sewer.

Groundwater encountered within trenches may be managed within the trench and allowed to infiltrate back into the ground. If the groundwater cannot be managed within the trench, it may be discharged to a sanitary sewer or combined sewer when permitted by the local sewer authority, or it shall be containerized and trucked to an off-site treatment facility as a special waste or hazardous waste. The Contractor is prohibited from discharging groundwater within the trench through a storm sewer. The Contractor shall install backfill plugs within the area of groundwater contamination.

One backfill plug shall be placed down gradient to the area of groundwater contamination. Backfill plugs shall be installed at intervals not to exceed 50 ft (15 m). Backfill plugs are to be 4 ft (1.2 m) long, measured parallel to the trench, full trench width and depth. Backfill plugs shall not have any fine aggregate bedding or backfill, but shall be entirely cohesive

soil or any class of concrete. The Contractor shall provide test data that the material has a permeability of less than 10⁻⁷ cm/sec according to ASTM D 5084, Method A or per another test method approved by the Engineer.

The Contractor shall use due care when transferring contaminated material from the area of origin to the transporter. Should releases of contaminated material to the environment occur (i.e., spillage onto the ground, etc.), the Contractor shall clean-up spilled material and place in the appropriate storage containers as previously specified. Clean-up shall include, but not be limited to, sampling beneath the material staging area to determine complete removal of the spilled material.

The Contractor shall provide engineered barriers, when required, and shall include materials sufficient to completely line excavation surfaces, including sloped surfaces, bottoms, and sidewall faces, within the areas designated for protection.

The Contractor shall obtain all documentation including any permits and/or licenses required to transport the material containing regulated substances to the disposal facility. The Contractor shall coordinate with the Engineer on the completion of all documentation. The Contractor shall make all arrangements for collection and analysis of landfill acceptance testing. The Contractor shall coordinate waste disposal approvals with the disposal facility.

The Contractor shall provide the Engineer with all transport-related documentation within two days of transport or receipt of said document(s). For management of special or hazardous waste, the Contractor shall provide the Engineer with documentation that the Contractor is operating with a valid Illinois special waste transporter permit at least two weeks before transporting the first load of contaminated material.

Transportation and disposal of material classified according to Article 669.05(a)(5) or 669.05(a)(6) shall be completed each day so that none of the material remains on-site by the close of business, except when temporary staging has been approved.

Any waste generated as a special or hazardous waste from a non-fixed facility shall be manifested off-site using the Department's county generator number provided by the Bureau of Design and Environment. An authorized representative of the Department shall sign all manifests for the disposal of the contaminated material and confirm the Contractor's transported volume. Any waste generated as a non-special waste may be managed off-site without a manifest, a special waste transporter, or a generator number.

The Contractor shall select a landfill permitted for disposal of the contaminant within the State of Illinois. The Department will review and approve or reject the facility proposed by the Contractor to use as a landfill. The Contractor shall verify whether the selected disposal facility is compliant with those applicable standards as mandated by their permit and whether the disposal facility is presently, has previously been, or has never been, on the United States Environmental Protection Agency (U.S. EPA) National Priorities List or the Resource Conservation and Recovery Act (RCRA) List of Violating Facilities. The use of a Contractor selected landfill shall in no manner delay the construction schedule or alter the Contractor's responsibilities as set forth.

- **669.06 Non-Special Waste Certification.** An authorized representative of the Department shall sign and date all non-special waste certifications. The Contractor shall be responsible for providing the Engineer with the required information that will allow the Engineer to certify the waste is not a special waste.
 - (a) Definition. A waste is considered a non-special waste as long as it is not:
 - (1) a potentially infectious medical waste;
 - (2) a hazardous waste as defined in 35 III. Admin. Code 721;
 - (3) an industrial process waste or pollution control waste that contains liquids, as determined using the paint filter test set forth in subdivision (3)(A) of subsection (m) of 35 III. Admin. Code 811.107;
 - (4) a regulated asbestos-containing waste material, as defined under the National Emission Standards for Hazardous Air Pollutants in 40 CFR Part 61.141;
 - (5) a material containing polychlorinated biphenyls (PCB's) regulated pursuant to 40 CFR Part 761;
 - (6) a material subject to the waste analysis and recordkeeping requirements of 35 III. Admin. Code 728.107 under land disposal restrictions of 35 III. Admin. Code 728;
 - (7) a waste material generated by processing recyclable metals by shredding and required to be managed as a special waste under Section 22.29 of the Environmental Protection Act; or
 - (8) an empty portable device or container in which a special or hazardous waste has been stored, transported, treated, disposed of, or otherwise handled.
 - (b) Certification Information. All information used to determine the waste is not a special waste shall be attached to the certification. The information shall include but not be limited to:
 - (1) the means by which the generator has determined the waste is not a hazardous waste;
 - (2) the means by which the generator has determined the waste is not a liquid;
 - (3) if the waste undergoes testing, the analytic results obtained from testing, signed and dated by the person responsible for completing the analysis;
 - (4) if the waste does not undergo testing, an explanation as to why no testing is needed;

- (5) a description of the process generating the waste; and
- (6) relevant material safety data sheets.

669.07 Temporary Staging. Soil classified according to Articles 669.05(a)(2), (b)(1), or (c) may be temporarily staged at the Contractor's option. Soil classified according to Articles 669.05(a)(1), (a)(3), (a)(4), (a)(5), (a)(6), or (b)(2) shall be managed and disposed of without temporary staging to the greatest extent practicable. If circumstances beyond the Contractor's control require temporary staging of these latter materials, the Contractor shall request approval from the Engineer in writing.

Temporary staging shall be accomplished within the right-of-way and the Contractor's means and methods shall be described in the approved or amended RSPCP. Staging areas shall not be located within 200 feet (61 m) of a public or private water supply well; nor within 100 feet (30 m) of sensitive environmental receptor areas, including wetlands, rivers, streams, lakes, or designated habitat zones.

The method of staging shall consist of containerization or stockpiling as applicable for the type, classification, and physical state (i.e., liquid, solid, semisolid) of the material. Materials of different classifications shall be staged separately with no mixing or co-mingling.

When containers are used, the containers and their contents shall remain intact and inaccessible to unauthorized persons until the manner of disposal is determined. The Contractor shall be responsible for all activities associated with the storage containers including, but not limited to, the procurement, transport, and labeling of the containers. The Contractor shall not use a storage container if visual inspection of the container reveals the presence of free liquids or other substances that could cause the waste to be reclassified as a hazardous or special waste.

When stockpiles are used, they shall be covered with a minimum 20-mil plastic sheeting or tarps secured using weights or tie-downs. Perimeter berms or diversionary trenches shall be provided to contain and collect for disposal any water that drains from the soil. Stockpiles shall be managed to prevent or reduce potential dust generation.

When staging non-special waste, special waste, or hazardous waste, the following additional requirements shall apply:

- (a) Non-Special Waste. When stockpiling soil classified according to Article 669.05(a)(1) or 669.05(a)(5), an impermeable surface barrier between the materials and the ground surface shall be installed. The impermeable barrier shall consist of a minimum 20-mil plastic liner material and the surface of the stockpile area shall be clean and free of debris prior to placement of the liner. Measures shall also be taken to limit or discourage access to the staging area.
- (b) Special Waste and Hazardous Waste. Soil classified according to Article 669.05(a)(6) shall not be stockpiled but shall be containerized immediately upon generation in containers, tanks or containment buildings as defined by RCRA, Toxic Substances Control

Act (TSCA), and other applicable State or local regulations and requirements, including 35 III. Admin. Code Part 722, Standards Applicable to Generators of Hazardous Waste.

The staging area(s) shall be enclosed (by a fence or other structure) to restrict direct access to the area, and all required regulatory identification signs applicable to a staging area containing special waste or hazardous waste shall be deployed.

Storage containers shall be placed on an all-weather gravel-packed, asphalt, or concrete surface. Containers shall be in good condition and free of leaks, large dents, or severe rusting, which may compromise containment integrity. Containers must be constructed of, or lined with, materials that will not react or be otherwise incompatible with the hazardous or special waste contents. Containers used to store liquids shall not be filled more than 80 percent of the rated capacity. Incompatible wastes shall not be placed in the same container or comingled.

All containers shall be legibly labeled and marked using pre-printed labels and permanent marker in accordance with applicable regulations, clearly showing the date of waste generation, location and/or area of waste generation, and type of waste. The Contractor shall place these identifying markings on an exterior side surface of the container.

Storage containers shall be kept closed, and storage pads covered, except when access is needed by authorized personnel.

Special waste and hazardous waste shall be transported and disposed within 90 days from the date of generation.

669.08 Underground Storage Tank Removal. For the purposes of this section, an underground storage tank (UST) includes the underground storage tank, piping, electrical controls, pump island, vent pipes and appurtenances.

Prior to removing an UST, the Engineer shall determine whether the Department is considered an "owner" or "operator" of the UST as defined by the UST regulations (41 III. Adm. Code Part 176). Ownership of the UST refers to the Department's owning title to the UST during storage, use or dispensing of regulated substances. The Department may be considered an "operator" of the UST if it has control of, or has responsibility for, the daily operation of the UST. The Department may however voluntarily undertake actions to remove an UST from the ground without being deemed an "operator" of the UST.

In the event the Department is deemed not to be the "owner" or "operator" of the UST, the OSFM removal permit shall reflect who was the past "owner" or "operator" of the UST. If the "owner" or "operator" cannot be determined from past UST registration documents from OSFM, then the OSFM removal permit will state the "owner" or "operator" of the UST is the Department. The Department's Office of Chief Counsel (OCC) will review all UST removal permits prior to submitting any removal permit to the OSFM. If the Department is not the "owner" or "operator" of the UST then it will not register the UST or pay any registration fee.

The Contractor shall be responsible for obtaining permits required for removing the UST, notification to the OSFM, using an OSFM certified tank contractor, removal and disposal of the UST and its contents, and preparation and submittal of the OSFM Site Assessment Report in accordance with 41 III. Admin. Code Part 176.330.

The Contractor shall contact the Engineer and the OSFM's office at least 72 hours prior to removal to confirm the OSFM inspector's presence during the UST removal. Removal, transport, and disposal of the UST shall be according to the applicable portions of the latest revision of the "American Petroleum Institute (API) Recommended Practice 1604".

The Contractor shall collect and analyze tank content (sludge) for disposal purposes. The Contractor shall remove as much of the regulated substance from the UST system as necessary to prevent further release into the environment. All contents within the tank shall be removed, transported and disposed of, or recycled. The tank shall be removed and rendered empty according to IEPA definition.

The Contractor shall collect soil samples from the bottom and sidewalls of the excavated area in accordance with 35 III. Admin. Code Part 734.210(h) after the required backfill has been removed during the initial response action, to determine the level of contamination remaining in the ground, regardless if a release is confirmed or not by the OSFM on-site inspector.

In the event the UST is designated a leaking underground storage tank (LUST) by the OSFM's inspector, or confirmation by analytical results, the Contractor shall notify the Engineer and the District Environmental Studies Unit (DESU). Upon confirmation of a release of contaminants and notifications to the Engineer and DESU, the Contractor shall report the release to the Illinois Emergency Management Agency (IEMA) (e.g., by telephone or electronic mail) and provide them with whatever information is available ("owner" or "operator" shall be stated as the past registered "owner" or "operator", or the IDOT District in which the tank is located and the DESU Manager).

The Contractor shall perform the following initial response actions if a release is indicated by the OSFM inspector:

- (a) Take immediate action to prevent any further release of the regulated substance to the environment, which may include removing, at the Engineer's discretion, and disposing of up to 4 ft (1.2 m) of the contaminated material, as measured from the outside dimension of the tank;
- (b) Identify and mitigate fire, explosion and vapor hazards;
- (c) Visually inspect any above ground releases or exposed below ground releases and prevent further migration of the released substance into surrounding soils and groundwater; and
- (d) Continue to monitor and mitigate any additional fire and safety hazards posed by vapors and free product that have migrated from the tank excavation zone and entered into subsurface structures (such as sewers or basements).

The tank excavation shall be backfilled according to applicable portions of Sections 205, 208, and 550 with a material that will compact and develop stability. All uncontaminated concrete and soil removed during tank extraction may be used to backfill the excavation, at the discretion of the Engineer.

After backfilling the excavation, the site shall be graded and cleaned.

- **669.09 Regulated Substances Final Construction Report.** Not later than 90 days after completing this work, the Contractor shall submit a "Regulated Substances Final Construction Report (RSFCR)" to the Engineer using form BDE 2733 and required attachments. The form shall be signed by an Illinois licensed Professional Engineer or Professional Geologist.
- **669.10 Method of Measurement.** Non-special waste, special waste, and hazardous waste soil will be measured for payment according to Article 202.07(b) when performing earth excavation, Article 502.12(b) when excavating for structures, or by computing the volume of the trench using the maximum trench width permitted and the actual depth of the trench.

Groundwater containerized and transported off-site for management, storage, and disposal will be measured for payment in gallons (liters).

Backfill plugs will be measured in cubic yards (cubic meters) in place, except the quantity for which payment will be made shall not exceed the volume of the trench, as computed by using the maximum width of trench permitted by the Specifications and the actual depth of the trench, with a deduction for the volume of the pipe.

Engineered Barriers will be measured for payment in square yards (square meters).

669.11 Basis of Payment. The work of preparing, submitting and administering a Regulated Substances Pre-Construction Plan will be paid for at the contract lump sum price for REGULATED SUBSTANCES PRE-CONSTRUCTION PLAN.

Regulated substances monitoring, including completion of form BDE 2732 for each day of work, will be paid for at the contract unit price per calendar day, or fraction thereof to the nearest 0.5 calendar day, for REGULATED SUBSTANCES MONITORING.

The installation of engineered barriers will be paid for at the contract unit price per square yard (square meter) for ENGINEERED BARRIER.

The work of UST removal, soil excavation, soil and content sampling, the management of excavated soil and UST content, and UST disposal, will be paid for at the contract unit price per each for UNDERGROUND STORAGE TANK REMOVAL.

The transportation and disposal of soil and other materials from an excavation determined to be contaminated will be paid for at the contract unit price per cubic yard (cubic meter) for NON-SPECIAL WASTE DISPOSAL, SPECIAL WASTE DISPOSAL, or HAZARDOUS WASTE DISPOSAL.

The transportation and disposal of groundwater from an excavation determined to be contaminated will be paid for at the contract unit price per gallon (liter) for SPECIAL WASTE GROUNDWATER DISPOSAL or HAZARDOUS WASTE GROUNDWATER DISPOSAL. When groundwater is discharged to a sanitary or combined sewer by permit, the cost will be paid for according to Article 109.05.

Backfill plugs will be paid for at the contract unit price per cubic yard (cubic meter) for BACKFILL PLUGS.

Payment for temporary staging of soil classified according to Articles 669.05(a)(1), (a)(3), (a)(4), (a)(5), (a)(6), or (b)(2) will be paid for according to Article 109.04. The Department will not be responsible for any additional costs incurred, if mismanagement of the staging area, storage containers, or their contents by the Contractor results in excess cost expenditure for disposal or other material management requirements.

Payment for accumulated stormwater removal and disposal will be according to Article 109.04. Payment will only be allowed if appropriate stormwater and erosion control methods were used.

Payment for decontamination, labor, material, and equipment for monitoring areas beyond the specified areas, with the Engineer's prior written approval, will be according to Article 109.04.

When the waste material for disposal requires sampling for landfill disposal acceptance, the samples shall be analyzed for TCLP VOCs, SVOCs, RCRA metals, pH, ignitability, and paint filter test. The analysis will be paid for at the contract unit price per each for SOIL DISPOSAL ANALYSIS using EPA Methods 1311 (extraction), 8260B for VOCs, 8270C for SVOCs, 6010B and 7470A for RCRA metals, 9045C for pH, 1030 for ignitability, and 9095A for paint filter.

The work of preparing, submitting and administering a Regulated Substances Final Construction Report will be paid for at the contract lump sum price REGULATED SUBSTANCES FINAL CONSTRUCTION REPORT."

80407

TRAFFIC CONTROL DEVICES - CONES (BDE)

Effective: January 1, 2019

Revise Article 701.15(a) of the Standard Specifications to read:

"(a) Cones. Cones are used to channelize traffic. Cones used to channelize traffic at night shall be reflectorized; however, cones shall not be used in nighttime lane closure tapers or nighttime lane shifts."

Revise Article 1106.02(b) of the Standard Specifications to read:

"(b) Cones. Cones shall be predominantly orange. Cones used at night that are 28 to 36 in. (700 to 900 mm) in height shall have two white circumferential stripes. If non-reflective spaces are left between the stripes, the spaces shall be no more than 2 in. (50mm) in width. Cones used at night that are taller than 36 in. (900 mm) shall have a minimum of two white and two fluorescent orange alternating, circumferential stripes with the top stripe being fluorescent orange. If non-reflective spaces are left between the stripes, the spaces shall be no more than 3 in. (75 mm) in width.

The minimum weights for the various cone heights shall be 4 lb for 18 in. (2 kg for 450 mm), 7 lb for 28 in. (3 kg for 700 mm), and 10 lb for 36 in. (5 kg for 900 mm) with a minimum of 60 percent of the total weight in the base. Cones taller than 36 in. shall be weighted per the manufacturer's specifications such that they are not moved by wind or passing traffic."

80409

SILT FENCE, INLET FILTERS, GROUND STABILIZATION AND RIPRAP FILTER FABRIC (BDE)

Effective: November 1, 2019

Revised: April 1, 2020

Revise Article 280.02(m) and add Article 280.02(n) so the Standard Specifications read:

- Revise the last sentence of the first paragraph in Article 280.04(c) of the Standard Specifications to read:

"The protection shall be constructed with hay or straw bales, silt filter fence, above grade inlet filters (fitted and non-fitted), or inlet filters.

Revise the first sentence of the second paragraph in Article 280.04(c) of the Standard Specifications to read:

"When above grade inlet filters (fitted and non-fitted) are specified, they shall be of sufficient size to completely span and enclose the inlet structure."

Revise Article 1080.02 of the Standard Specifications to read:

"1080.02 Geotextile Fabric. The fabric for silt filter fence shall consist of woven fabric meeting the requirements of AASHTO M 288 for unsupported silt fence.

The fabric for ground stabilization shall consist of woven yarns or nonwoven filaments of polyolefins or polyesters. Woven fabrics shall be Class 2 and nonwoven fabrics shall be Class 1 according to AASHTO M 288.

The physical properties for silt fence and ground stabilization fabrics shall be according to the following.

PHYSICAL PROPERTIES			
	Silt Fence Woven 1/	Ground Stabilization Woven ^{2/}	Ground Stabilization Nonwoven ^{2/}
Grab Strength, lb (N) ^{3/} ASTM D 4632	123 (550) MD 101 (450) XD	247 (1100) min. 4/	202 (900) min. ^{4/}
Elongation/Grab Strain, % ASTM D 4632 4/	49 max.	49 max.	50 min.
Trapezoidal Tear Strength, lb (N) ASTM D 4533 4/		90 (400) min.	79 (350) min.

Puncture Strength, lb (N) ASTM D 6241 4/		494 (2200) min.	433 (1925) min.
Apparent Opening Size, Sieve No. (mm) ASTM D 4751 5/	n) 30 (0.60) max. 40 (0.43) max. 40 (0.4		40 (0.43) max.
Permittivity, sec ⁻¹ ASTM D 4491	0.05 min.		
Ultraviolet Stability, % retained strength after 500 hours of exposure ASTM D 4355	70 min.	50 min.	50 min.

- 1/ NTPEP results or manufacturer's certification to meet test requirements.
- 2/ NTPEP results to meet test requirements. Manufacturer shall have public release status and current reports on laboratory results in Test Data of NTPEP's DataMine.
- 3/ MD = Machine direction, XD = Cross-machine direction.
- 4/ Values represent the minimum average roll value (MARV) in the weaker principle direction, MD or XD.
- 5/ Values represent the maximum average roll value."

Revise Article 1080.03 of the Standard Specifications to read:

"1080.03 Filter Fabric. The filter fabric shall consist of woven yarns or nonwoven filaments of polyolefins or polyesters. Woven fabrics shall be Class 3 for riprap gradations RR 4 and RR 5, and Class 2 for RR 6 and RR 7 according to AASHTO M 288. Woven slit film geotextiles (i.e. geotextiles made from yarns of a flat, tape-like character) shall not be permitted. Nonwoven fabrics shall be Class 2 for riprap gradations RR 4 and RR 5, and Class 1 for RR 6 and RR 7 according to AASHTO M 288. After forming, the fabric shall be processed so that the yarns or filaments retain their relative positions with respect to each other. The fabric shall be new and undamaged.

The filter fabric shall be manufactured in widths of not less than 6 ft (2 m). Sheets of fabric may be sewn together with thread of a material meeting the chemical requirements given for the yarns or filaments to form fabric widths as required. The sheets of filter fabric shall be sewn together at the point of manufacture or another approved location.

The filter fabric shall be according to the following.

PHYSICAL PROPERTIES 1/				
	Gradation Nos. RR 4 & RR 5		Gradation Nos. RR 6 & RR 7	
	Woven	Nonwoven	Woven	Nonwoven
Grab Strength, lb (N) ASTM D 4632 ^{2/}	180 (800) min.	157 (700) min.	247 (1100) min.	202 (900) min.
Elongation/Grab Strain, % ASTM D 4632 ^{2/}	49 max.	50 min.	49 max.	50 min.
Trapezoidal Tear Strength, lb (N) ASTM D 4533 ^{2/}	67 (300) min.	56 (250) min.	90 (400) min.	79 (350) min.
Puncture Strength, lb (N) ASTM D 6241 ^{2/}	370 (1650) min.	309 (1375) min.	494 (2200) min.	433 (1925) min.
Ultraviolet Stability, % retained strength after 500 hours of exposure - ASTM D 4355	50 min.			

- 1/ NTPEP results to meet test requirements. Manufacturer shall have public release status and current reports on laboratory results in Test Data of NTPEP's DataMine.
- 2/ Values represent the minimum average roll value (MARV) in the weaker principle direction [machine direction (MD) or cross-machine direction (XD)].

As determined by the Engineer, the filter fabric shall meet the requirements noted in the following after an onsite investigation of the soil to be protected.

Soil by Weight (Mass) Passing	Apparent Opening Size,	Permittivity, sec ⁻¹
the No. 200 sieve (75 μm), %	Sieve No. (mm) - ASTM D 4751 ^{1/}	ASTM D 4491
49 max.	60 (0.25) max.	0.2 min.
50 min.	70 (0.22) max.	0.1 min.

1/ Values represent the maximum average roll value."

Revise Article 1081.15(h)(3)a of the Standard Specifications to read:

"a. Inner Filter Fabric Bag. The inner filter fabric bag shall be constructed of woven yarns or nonwoven filaments made of polyolefins or polyesters with a minimum silt and debris capacity of 2.0 cu ft (0.06 cu m). Woven fabric shall be Class 3 and nonwoven fabric shall be Class 2 according to AASHTO M 288. The fabric bag shall be according to the following.

PHYSICAL PROPERTIES				
	Woven			
Grab Strength, lb (N) ASTM D 4632 1/	180 (800) min.	157 (700) min.		
Elongation/Grab Strain, % ASTM D 4632 1/	49 max.	50 min.		
Trapezoidal Tear Strength, lb (N) ASTM D 4533 1/	67 (300) min.	56 (250) min.		
Puncture Strength, lb (N) ASTM D 6241 1/	370 (1650) min.	309 (1375) min.		
Apparent Opening Size, Sieve No. (mm) ASTM D 4751 ^{2/}	60 (0.25) max.			
Permittivity, sec ⁻¹ ASTM D 4491	2.0 min.			
Ultraviolet Stability, % retained strength after 500 hours of exposure – ASTM D 4355	70 min.			

- 1/ Values represent the minimum average roll value (MARV) in the weaker principle direction [machine direction (MD) or cross-machine direction (XD)].
- 2/ Values represent the maximum average roll value."

Revise Article 1081.15(i)(1) of the Standard Specifications to read:

- "(i) Urethane Foam/Geotextile. Urethane foam/geotextile shall be triangular shaped having a minimum height of 10 in. (250 mm) in the center with equal sides and a minimum 20 in. (500 mm) base. The triangular shaped inner material shall be a low density urethane foam. The outer geotextile fabric cover shall consist of woven yarns or nonwoven filaments made of polyolefins or polyesters placed around the inner material and shall extend beyond both sides of the triangle a minimum of 18 in. (450 mm). Woven filter fabric shall be Class 3 and nonwoven filter fabric shall be Class 2 according to AASHTO M 288.
 - (1) The geotextile shall meet the following properties.

PHYSICAL PROPERTIES				
Woven Nonwov				
Grab Strength, lb (N) ASTM D 4632 1/	180 (800) min.	157 (700) min.		
Elongation/Grab Strain, % ASTM D 4632 1/	49 max.	50 min.		
Trapezoidal Tear Strength, lb (N) ASTM D 4533 1/	67 (300) min.	56 (250) min.		
Puncture Strength, lb (N) ASTM D 6241 1/	370 (1650) min.	309 (1375) min.		

Apparent Opening Size, Sieve No. (mm) ASTM D 4751 2/	30 (0.60) max.
Permittivity, sec ⁻¹ ASTM D 4491	2.0 min.
Ultraviolet Stability, % retained strength after 500 hours of exposure – ASTM D 4355	70 min.

- 1/ Values represent the minimum average roll value (MARV) in the weaker principle direction [machine direction (MD) or cross-machine direction (XD)].
- 2/ Values represent the maximum average roll value."

Add the following to Article 1081.15(i) of the Standard Specifications.

"(3) Certification. The manufacturer shall furnish a certificate with each shipment of urethane foam/geotextile assemblies stating the amount of product furnished and that the material complies with these requirements."

Revise the title and first sentence of Article 1081.15(j) of the Standards Specifications to read:

"(j) Above Grade Inlet Filters (Fitted). Above grade inlet filters (fitted) shall consist of a rigid polyethylene frame covered with a fitted geotextile filter fabric."

Revise Article 1081.15(j)(2) of the Standard Specifications to read:

(2) Fitted Geotextile Filter Fabric. The fitted geotextile filter fabric shall consist of woven yarns or nonwoven filaments made of polyolefins or polyesters. Woven filter fabric shall be Class 3 and nonwoven filter fabric shall be Class 2 according to AASHTO M 288. The filter shall be fabricated to provide a direct fit to the frame. The top of the filter shall integrate a coarse screen with a minimum apparent opening size of 1/2 in. (13 mm) to allow large volumes of water to pass through in the event of heavy flows. The filter shall have integrated anti-buoyancy pockets capable of holding a minimum of 3.0 cu ft (0.08 cu m) of stabilization material. Each filter shall have a label with the following information sewn to or otherwise permanently adhered to the outside: manufacturer's name, product name, and lot, model, or serial number. The fitted geotextile filter fabric shall be according to the table in Article 1081.15(h)(3)a above."

Add Article 1081.15(k) to the Standard Specifications to read:

- "(k) Above Grade Inlet Filters (Non-Fitted). Above grade inlet filters (non-fitted) shall consist of a geotextile fabric surrounding a metal frame. The frame shall consist of either a) a circular cage formed of welded wire mesh, or b) a collapsible aluminum frame, as described below.
 - (1) Frame Construction.

- a) Welded Wire Mesh Frame. The frame shall consist of 6 in. x 6 in. (150 mm x 150 mm) welded wire mesh formed of #10 gauge (3.42 mm) steel conforming to ASTM A 185. The mesh shall be 30 in. (750 mm) tall and formed into a 42 in. (1.05 m) minimum diameter cylinder.
- b) Collapsible Aluminum Frame. The collapsible aluminum frame shall consist of grade 6036 aluminum. The frame shall have anchor lugs that attach it to the inlet grate, which shall resist movement from water and debris. The collapsible joints of the frame shall have a locking device to secure the vertical members in place, which shall prevent the frame from collapsing while under load from water and debris.
- (2) Geotextile Fabric. The geotextile fabric shall consist of woven yarns or nonwoven filaments made of polyolefins or polyesters. The woven filter fabric shall be a Class 3 and the nonwoven filter fabric shall be a Class 2 according to AASHTO M 288. The geotextile fabric shall be according to the table in Article 1081.15(h)(3)a above.
- (3) Geotechnical Fabric Attachment to the Frame.
 - a) Welded Wire Mesh Frame. The woven or nonwoven geotextile fabric shall be wrapped 3 in. (75 mm) over the top member of a 6 in. x 6 in. (150 mm x 150 mm) welded wire mesh frame and secured with fastening rings constructed of wire conforming to ASTM A 641, A 809, A 370, and A 938 at 6 in. (150 mm) on center. The fastening rings shall penetrate both layers of geotextile and securely close around the steel mesh. The geotextile shall be secured to the sides of the welded wire mesh with fastening rings at a spacing of 1 per sq ft (11 per sq m) and securely close around a steel member.
 - b) Collapsible Aluminum Frame. The woven or nonwoven fabric shall be secured to the aluminum frame along the top and bottom of the frame perimeter with strips of aluminum secured to the perimeter member, such that the anchoring system provides a uniformly distributed stress throughout the geotechnical fabric.
- (4) Certification. The manufacturer shall furnish a certificate with each shipment of above grade inlet filter assemblies stating the amount of product furnished and that the material complies with these requirements."

State of Illinois Department of Transportation Bureau of Local Roads and Streets

SPECIAL PROVISION FOR INSURANCE

Effective: February 1, 2007 Revised: August 1, 2007

All references to Sections or Articles in this specification shall be construed to mean specific Section or Article of the Standard Specifications for Road and Bridge Construction, adopted by the Department of Transportation.

	The Contractor shall name the following entities as additional insured under the Contractor's general liability insurance policy in accordance with Article 107.27:
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	The entities listed above and their officers, employees, and agents shall be indemnified and

The entities listed above and their officers, employees, and agents shall be indemnified and held harmless in accordance with Article 107.26.

Department of Transportation Bureau of Local Roads and Streets SPECIAL PROVISION FOR CONSTRUCTION AND MAINTENANCE SIGNS

State of Illinois

Effective: January 1, 2004 Revised: June 1, 2007

All references to Sections or Articles in this specification shall be construed to mean a specific Section or Article of the Standard Specifications for Road and Bridge Construction, adopted by the Department of Transportation.

701.14. Signs. Add the following paragraph to Article 701.14:

All warning signs shall have minimum dimensions of 1200 mm x 1200 mm (48" x 48") and have a black legend on a fluorescent orange reflectorized background, meeting, as a minimum, Type AP reflectivity requirements of Table 1091-2 in Article 1091.02.

GUIDE BRIDGE SPECIAL PROVISION INDEX/CHECK SHEETEffective as of the: November 8, 2019 Letting

$\sqrt{}$	<u>File</u> Name	<u>Title</u>	<u>Effective</u>	Revised
	GBSP4	Polymer Modified Portland Cement Mortar	Jun 7, 1994	Apr 1, 2016
	GBSP12	Drainage System	Jun 10, 1994	Jun 24, 2015
	GBSP13	High-Load Multi-Rotational Bearings	Oct 13, 1988	Apr 1, 2016
	GBSP14	Jack and Remove Existing Bearings	Apr 20, 1994	April 13, 2018
	GBSP15	Three Sided Precast Concrete Structure	Jul 12, 1994	Dec 21, 2016
	GBSP16	Jacking Existing Superstructure	Jan 11, 1993	April 13, 2018
	GBSP17	Bonded Preformed Joint Seal	Jul 12, 1994	Aug 9, 2019
	GBSP18	Modular Expansion Joint	May 19, 1994	Aug 9, 2019
	GBSP21	Cleaning and Painting Contact Surface Areas of Existing Steel Structures	Jun 30, 2003	Aug 9, 2019
	GBSP25	Cleaning and Painting Existing Steel Structures	Oct 2, 2001	Apr 22, 2016
	GBSP26	Containment and Disposal of Lead Paint Cleaning Residues	Oct 2, 2001	Apr 22, 2016
	GBSP28	Deck Slab Repair	May 15, 1995	April 13, 2018
	GBSP29	Bridge Deck Microsilica Concrete Overlay	May 15, 1995	March 1, 2019
	GBSP30	Bridge Deck Latex Concrete Overlay	May 15, 1995	Oct 20, 2017
	GBSP31	Bridge Deck High-Reactivity Metakaolin (HRM) Conc Overlay	Jan 21, 2000	March 1, 2019
	GBSP33	Pedestrian Truss Superstructure	Jan 13, 1998	Dec 29, 2014
	GBSP34	Concrete Wearing Surface	Jun 23, 1994	Oct 4, 2016
	GBSP35	Silicone Bridge Joint Sealer	Aug 1, 1995	Oct 15, 2011
	GBSP45	Bridge Deck Thin Polymer Overlay	May 7, 1997	Feb 6, 2013
	GBSP51	Pipe Underdrain for Structures	May 17, 2000	Jan 22, 2010
	GBSP53	Structural Repair of Concrete	Mar 15, 2006	Aug 9, 2019
	GBSP55	Erection of Curved Steel Structures	Jun 1, 2007	
	GBSP56	Setting Piles in Rock	Nov 14, 1996	Apr 1, 2016
	GBSP59	Diamond Grinding and Surface Testing Bridge Sections	Dec 6, 2004	Mar 29, 2017
	GBSP60	Containment and Disposal of Non-Lead Paint Cleaning Residues	Nov 25, 2004	Apr 22, 2016
	GBSP61	Slipform Parapet	Jun 1, 2007	March 1, 2019
	GBSP67	Structural Assessment Reports for Contractor's Means and Methods	Mar 6, 2009	Oct 5, 2015
	GBSP71	Aggregate Column Ground Improvement	Jan 15, 2009	Oct 15, 2011
	GBSP72	Bridge Deck Fly Ash or GGBF Slag Concrete Overlay	Jan 18, 2011	March 1, 2019
	GBSP75	Bond Breaker for Prestressed Concrete Bulb-T Beams	Apr 19, 2012	
	GBSP77	Weep Hole Drains for Abutments, Wingwalls, Retaining Walls and Culverts	Apr 19, 2012	Oct 22, 2013
	GBSP78	Bridge Deck Construction	Oct 22, 2013	Dec 21, 2016
	GBSP79	Bridge Deck Grooving (Longitudinal)	Dec 29, 2014	Mar 29, 2017
	GBSP81	Membrane Waterproofing for Buried Structures	Oct 4, 2016	March 1, 2019
	GBSP82	Metallizing of Structural Steel	Oct 4, 2016	Oct 20, 2017
	GBSP83	Hot Dip Galvanizing For Structural Steel	Oct 4, 2016	Oct 20, 2017
	GBSP85	Micropiles	Apr 19, 1996	Aug 9, 2019
	GBSP86	Drilled Shafts	Oct 5, 2015	Oct 4, 2016
	GBSP87	Lightweight Cellular Concrete Fill	Nov 11, 2001	Apr 1, 2016
	GBSP88	Corrugated Structural Plate Structures	Apr 22, 2016	April 13, 2018
	GBSP89	Preformed Pavement Joint Seal	Oct 4, 2016	March 1, 2019
	GBSP90	Three Sided Precast Concrete Structure (Special)	Dec 21, 2016	April 13, 2018
	GBSP91	Crosshole Sonic Logging Testing of Drilled Shafts	Apr 20, 2016	Aug 9, 2019
	GBSP92	Thermal Integrity Profile Testing of Drilled Shafts	Apr 20, 2016	

 <u>File</u>	<u>Title</u>	<u>Effective</u>	Revised
<u>Name</u>			
GBSP93	Preformed Bridge Joint Seal	Dec 21, 2016	March 1, 2019
GBSP94	Warranty for Cleaning and Painting Steel Structures	Mar 3, 2000	Nov 24, 2004
GBSP95	Bituminous Coated Aggregate Slopewall	April 13, 2018	
GBSP96	Erection of Bridge Girders Over or Adjacent to Railroads	Aug 9, 2019	

LIST ADDITIONAL SPECIAL PROVISIONS BELOW

The following Guide Bridge Special Provisions have been incorporated into the 2016 Standard Specifications:

File	Title	Std Spec
Name		Location
GBSP32	Temporary Sheet Piling	522
GBSP38	Mechanically Stabilized Earth Retaining Walls	522
GBSP42	Drilled Soldier Pile Retaining Wall	522
GBSP43	Driven Soldier Pile Retaining Wall	522
GBSP44	Temporary Soil Retention System	522
GBSP46	Geotextile Retaining Walls	522
GBSP57	Temporary Mechanically Stabilized Earth Retaining Walls	522
GBSP62	Concrete Deck Beams	504
GBSP64	Segmental Concrete Block Wall	522
GBSP65	Precast Modular Retaining Wall	522
GBSP73	Cofferdams	2017 Supp
GBSP74	Permanent Steel Sheet Piling (LRFD)	522
GBSP76	Granular Backfill for Structures	2017 Supp
GBSP80	Fabric Reinforced Elastomeric	1028
GBSP84	Precast, Prestressed Concrete Beams	2017 Supp

The following Guide Bridge Special Provisions have been discontinued or have been superseded:

File	Title	Disposition:
Name		-
GBSP70	Braced Excavation	Use TSRS per Sec 522
GBSP 95	Bridge Deck Concrete Sealer	Use July 1, 2012 version for Repair projects only

BRIDGE DECK THIN POLYMER OVERLAY

Effective: May 7, 1997 Revised: February 6, 2013

<u>Description</u>. This work shall consist of furnishing and applying a thin, multiple-layer polymer overlay to the bridge deck as shown on the plans. The total thickness of the overlay system shall not exceed 3/8 inch (10 mm).

This work shall also include the final surface preparation of the existing concrete deck by shotblasting after all repairs have been completed and cured as specified.

The supplier of the material shall furnish a technical representative at the job site at all times during overlay placement.

<u>Materials</u>. The manufacturer of the materials shall supply Material Safety Data Sheets (MSDS) detailing the appropriate safety and handling considerations. These MSDS shall be prominently displayed at the storage site and all workers shall be thoroughly familiar with safety precautions prior to handling the material.

(a) Epoxy Binder. The epoxy resin base and hardener shall be composed of a two-component, 100% solids, 100% reactive, thermosetting compound with the following properties:

Property	Requirements ^A	Test Method
Viscosity (Poises)	7 – 35	ASTM D 2393, Brookfield RVT, Spindle No. 3, 20 rpm
Gel Time (Minutes)	15 – 45	ASTM C 881, Paragraph 11.2, Modified ^B
7-day Tensile Strength	1,100 – 5,000	ASTM D 638
In psi (kPa)	(7,600 - 34,500)	
7-day Elongation (%)	20 – 80	ASTM D 638
7-day Max. Absorption (%)	1.5	ASTM D 570
Shore D Hardness	58 – 75	ASTM D 2240-86
28-day Max. Chloride Permeability (Coulombs)	100	AASHTO T 277
Infrared Spectrum	С	AASHTO T 237, Paragraphs 4 and 5

^ABased on specimens or samples cured or aged and tested at 75°F

(b) Aggregate. The aggregate shall contain less than 0.2 percent moisture and be clean and free of dust. The aggregate shall have a Mohs scale hardness greater than 6 and shall consist of bauxite, crushed porphyry, aluminum oxide, or other similarly hard, durable, angular shaped aggregate, as recommended by the manufacturer and approved by the Engineer. Wet bottom boiler coal slag shall not be used.

The aggregate shall conform to the following gradation:

Sieve Size	% Passing by Weight
No. 4 (4.75 mm)	100
No. 8 (2.36 mm)	30 – 75
No. 16 (1.18 mm)	0 – 5
No. 30 (0.60 mm)	0 – 1

(c) Polymer Overlay System. The polymer overlay system shall have the following properties:

Property	Requirements ^A	Test Method
Minimum Compressive Strength at 8 Hrs. psi (kPa)	1,000 (6,900)	ASTM C 579 Method B, Modified ^B
Minimum Compressive Strength at 48 Hrs. psi (kPa)	5,000 (34,500)	Same as Above
Thermal Compatibility	No Delaminations	ASTM C 884
Minimum Pull-off Strength at 24 Hours psi (kPa)	250 (1,700)	ACI 503R, Appendix A

^ABased on specimens or samples cured or aged and tested at 75°F

At the pre-construction conference, the Contractor shall provide the Engineer with the source of the material that will be used. The manufacturer shall furnish samples of resin material and aggregate as required by the Engineer.

^BUse a 70 ml sample instead of a 60 gram sample. ^CTo be established for each component by each manufacturer.

^BPlastic inserts that will provide 2 inch by 2 inch (51 mm by 51 mm) cubes shall be placed in the oversized brass

The Department will maintain an Approved List of Bridge Deck Thin Polymer Overlay Systems, and independent laboratory test results showing the product meets the Department specifications will be required.

<u>Equipment</u>. The equipment used shall be subject to the approval of the Engineer and shall meet the following requirements:

- (a) Surface Preparation Equipment. Surface preparation equipment shall be according to the applicable portions of Section 1100 and the following:
 - (1) Mechanical Scarifying Equipment. Scarifying equipment shall be a power-operated, mechanical scarifier capable of uniformly scarifying or removing the existing concrete surface and new patches to the depths required in a satisfactory manner. Other types of removal devices may be used if their operation is suitable and they can be demonstrated to the satisfaction of the Engineer.
 - (2) Shotblasting Equipment. The blasting medium shall be steel shot. The size and hardness of the shot, the flow of the shot, the forward speed, and the number of passes shall be as recommended by the manufacturer. The shotblasting equipment shall be capable of removing weak concrete at the surface, including the microfractured concrete surface layer remaining as a result of mechanical scarification, and shall have oil traps. The cleaning residue shall be contained and removed by the shotblasting equipment.
 - (3) Hand-Held Blast Cleaning Equipment. Blast cleaning using hand-held equipment shall be performed by abrasive blasting. Hand-held blast cleaning equipment shall have oil traps.
 - (4) Power-Driven Hand Tools. Power driven hand tools will be permitted. Jackhammers shall be lighter than the nominal 45 pound (20 kg) class. Jackhammers or chipping hammers shall not be operated at angles in excess of 45 degrees, measured from the surface of the slab.
- (b) Pull-off Test Equipment. Equipment used to perform pull-off testing shall be either approved by the Engineer, or obtained from one of the following approved sources:

James Equipment 007 Bond Tester 800-426-6500 Germann Instruments, Inc. BOND-TEST Pull-off System 847-329-9999

SDS Company DYNA Pull-off Tester 805-238-3229

Pull-off test equipment shall include all miscellaneous equipment and materials to perform the test and clean the equipment, as indicated in the Illinois Pull-off Test (Surface or Overlay Method). Prior to the start of testing, the Contractor shall submit to the Engineer a technical data sheet and material safety data sheet for the epoxy used to perform the testing. For solvents used to clean the equipment, a material safety data sheet shall be submitted.

(c) Overlay Application Equipment. For mechanical applications, the equipment shall consist of an epoxy distribution system, aggregate dispersing equipment, sweeper broom or vacuum truck, and a source of lighting if work is to be performed at night. The epoxy distribution system shall thoroughly blend the epoxy components so that the resulting product has the same material properties as certified in the Materials section. The Engineer reserves the right to sample from the epoxy distribution system at any time during placement operations. The aggregate spreader shall be propelled in such a manner as to uniformly apply the aggregate so that 100 percent of the epoxy material is covered to excess. The sweeper broom or vacuum truck shall be self-propelled. Equipment shall provide compressed air that is free from oil and water.

For hand applications, the equipment shall consist of calibrated containers, a paddle-type mixer, squeegees or rollers, and a broom. All equipment shall be suitable for mixing and placement according to the epoxy manufacturer's recommendations.

<u>Construction</u>. All hot-mix asphalt removal and deck repairs shall be performed and cured according to the Special Provision for "Deck Slab Repair" prior to any surface preparation operations. The thin polymer overlay shall not be placed on any concrete surface that is less than 28 days old.

(a) Surface Preparation.

(1) Bridge Deck Scarification. When specified, concrete bridge deck scarification shall be performed to the depth noted on the plans. Sidewalks, curbs, drains, reinforcement, and/or existing transverse and longitudinal joints that are to remain in place shall be protected from damage during scarification and cleaning operations. All damage caused by the Contractor shall be corrected at the Contractor's expense, to the satisfaction of the Engineer.

The scarification work shall consist of removing the designated concrete deck surface using mechanical scarifying equipment. In areas of the deck that are not accessible to the scarifying equipment, power-driven hand tools will be permitted.

A trial section located on the existing deck surface will be designated by the Engineer. The Contractor shall demonstrate that the equipment, personnel, and methods of operation are capable of producing results that are satisfactory to the Engineer. The trial section will consist of an area of approximately 30 sq. ft. (3 sq m).

Once the settings are established, they shall not be changed without the permission of the Engineer. The removal shall be verified, as necessary, at least every 16 ft. (5 m) along the cutting path. If concrete is being removed below the desired depth, the equipment shall be reset or recalibrated.

All areas designated to be scarified shall be scarified uniformly to the depth as specified on the plans, but shall not exceed 1 in. (25 mm). Concrete removal below the specified depth shall be replaced at the Contractor's expense, to the satisfaction of the Engineer.

(2) Deck Patching. After bridge deck scarification, the deck shall be thoroughly cleaned of broken concrete and other debris. The Engineer will sound the scarified deck and all unsound areas will be marked for removal and repairs. All designated patching shall be completed according to the Special Provision for "Deck Slab Repair."

Patching shall be completed prior to final surface preparation. Patches shall be struck off and then roughened with a suitable stiff bristled broom or wire brush to provide a rough texture design to promote bonding to the overlay. Hand finishing of the patch surface shall be kept to a minimum to prevent overworking of the surface.

(3) Final Surface Preparation. Final surface preparation shall consist of the operation of shotblasting equipment to remove any weak concrete at the surface, including the microfractured concrete surface layer remaining as a result of mechanical scarification. Any areas determined by the Engineer to be inaccessible to the shotblasting equipment shall be thoroughly blast cleaned with hand-held equipment.

Final surface preparation shall also include the cleaning of all dust, debris, and concrete fines from the deck surface including vertical faces of curbs and barrier walls up to a height of 1 in. (25 mm) above the overlay. Compressed air shall be used for this operation. When using compressed air, the air stream must be free of oil. Any grease, oil, or other foreign matter that rests on or has absorbed into the concrete shall be removed completely.

After the final surface preparation has been completed and before placement of the overlay, the prepared deck surface will be tested by the Engineer according to the Illinois Pull-off Test (Surface Method). The Contractor shall provide the test equipment.

a. Start-up Testing. Prior to the first overlay placement, the Engineer will evaluate the shotblasting method. The start-up area shall be a minimum of 600 sq. ft. (56 sq. m). After the area has been prepared, six random test locations will be determined by the Engineer, and tested according to the Illinois Pull-off Test (Surface Method).

The average of the six tests shall be a minimum of 175 psi (1,200 kPa) and each individual test shall have a minimum strength of 160 psi (1,100 kPa). If the criteria are not met, the Contractor shall adjust the shotblasting method. Start-up testing will be repeated until satisfactory results are attained.

Once an acceptable shotblasting procedure (speed, size of shot, etc.) is established, it shall be continued for the balance of the work. The Contractor may, with permission of the Engineer, change the shotblasting procedure or equipment, in which case additional start-up testing will be required.

b. Lot Testing. After start-up testing has been completed, the following testing frequency will be used. For each structure, each stage will be divided into lots of not more than 4500 sq. ft. (420 sq m). Three random test locations will be determined by the Engineer, and tested according to the Illinois Pull-off Test (Surface Method).

The average of the three tests shall be a minimum of 175 psi (1,200 kPa) and each individual test shall have a minimum strength of 160 psi (1,100 kPa). In the case of a failing individual test or a failing average of three tests, the Engineer will determine the area that requires additional surface preparation by the Contractor. Additional test locations will be determined by the Engineer.

In addition to start-up and lot testing, the Department may require surface pull-off testing of areas inaccessible to shotblasting equipment and blast cleaned with hand-held equipment. The Engineer will determine each test location, and each individual test shall have a minimum strength of 175 psi (1,200 kPa).

(b) Application of Overlay

(1) Overlay Placement. The handling and mixing of the epoxy resin and hardening agent shall be performed in a safe manner to achieve the desired results according to the manufacturer's written recommendations. Overlay materials shall not be placed when ambient air temperatures are below 55°F (13°C) or above 90°F (32°C), or when deck temperature is below 60°F (16°C). All components shall have a temperature no less than 60°F (16°C) immediately before mixing and placement. Overlay materials shall not be placed when rain is forecast within 24 hours of application.

There shall be no visible moisture present on the surface of the concrete at the time of application of the thin polymer overlay. A plastic sheet left taped in place for a minimum of two hours, according to ASTM D 4263, shall be used to identify moisture in the deck.

Construction traffic shall not be allowed on any portion of the deck that has been shotblasted or on the overlay without approval from the Engineer. Overlay placement shall begin as soon as possible after the surface preparation operation. In no case shall the time between surface preparation and application of the first lift exceed 24 hours.

The polymer overlay shall consist of a two-course application of epoxy and aggregate. Each of the two courses shall consist of a layer of epoxy covered with a layer of aggregate in sufficient quantity to completely cover the epoxy. The total thickness of the overlay shall not be less than 1/4 inch (6 mm). The dry aggregate shall be applied in such a manner as to cover the epoxy mixture completely within five minutes of application. The dry aggregate shall be sprinkled or dropped vertically in a manner such that the level of the epoxy mixture is not disturbed. First course applications that do not receive enough aggregate prior to gel shall be removed and replaced. A second course applied with insufficient aggregate may be left in place, but will require additional applications before opening to traffic.

The preceding course of thin polymer overlay shall be cured until brooming or vacuuming can be performed without tearing or otherwise damaging the surface prior to application of succeeding courses. No traffic or equipment shall be permitted on the overlay surface during the curing period.

After the curing period, all loose aggregate shall be removed by brooming or vacuuming before the next overlay course is applied. This procedure is repeated until the minimum overlay thickness is achieved.

Unless otherwise specified, the thin polymer overlay courses may be applied over the expansion joints and joint seals of the bridge deck. The expansion joints and joint seals shall be protected by a bond breaker. Prior to opening any application to traffic, the overlay over each joint shall be removed.

Before opening to traffic, at least one pull-off test location per lane, per 100 feet (30 m) of bridge length will be designated by the Engineer. Pull-off testing shall be performed according to the Illinois Pull-off Test (Overlay Method). The Contractor shall provide the test equipment. Each individual test shall have a minimum strength of 150 psi (1,000 kPa). Unacceptable test results will require removal and replacement of the overlay at the Contractor's expense, and the locations will be determined by the Engineer.

The thickness of the overlay shall be verified to be at least 1/4 inch (6 mm) thick, as measured from the deck surface to the top of the resin. Cores from pull-off tests shall be used to determine overlay thickness. Thin areas shall be re-coated and re-tested at no additional cost to the Department.

If additional applications are required due to deficient thickness or insufficient aggregate, the Engineer may require additional pull-off strength tests to verify the Contractor's procedures.

Pull-off test locations, thickness test locations, and any debonded areas shall be repaired before final acceptance.

- (2) Curing. The Contractor shall plan and prosecute the work so as to provide at least eight hours of curing or the minimum cure as prescribed by the manufacturer prior to opening that section to public or construction traffic.
- (3) Storage and Handling. Resin materials shall be stored in their original containers inside a heated warehouse in a dry area. Storage temperatures shall be maintained between 60 90°F (16 32°C)

The resin material shall be stored on the job site in a trailer, protected from moisture, and maintained within a temperature range of $60 - 90^{\circ}F$ ($16 - 32^{\circ}C$).

Protective gloves and goggles shall be provided by the Contractor to workers that are directly exposed to the resin material. Product Safety Data Sheets from the manufacturer shall be provided for all workers by the Contractor.

All aggregates shall be stored in a dry environment and shall be protected from contaminants on the job site. Aggregate that is exposed to rain or other moisture shall be rejected.

<u>Method of Measurement</u>. The area of scarification on the bridge deck will be measured for payment in square yards (square meters).

The area of thin polymer overlay will be measured in square yards (square meters) of horizontal deck area, completed and accepted.

<u>Basis of Payment</u>. This work shall be paid for at the contract unit price per square yard (square meter) for BRIDGE DECK THIN POLYMER OVERLAY of the thickness specified.

The concrete bridge deck scarification will be paid for at the contract unit price per square yard (square meter) for CONCRETE BRIDGE DECK SCARIFICATION of the thickness specified.

PIPE UNDERDRAINS FOR STRUCTURES

Effective: May 17, 2000 Revised: January 22, 2010

<u>Description</u>. This work shall consist of furnishing and installing a pipe underdrain system as shown on the plans, as specified herein, and as directed by the Engineer.

<u>Materials</u>. Materials shall meet the requirements as set forth below:

The perforated pipe underdrain shall be according to Article 601.02 of the Standard Specifications. Outlet pipes or pipes connecting to a separate storm sewer system shall not be perforated.

The drainage aggregate shall be a combination of one or more of the following gradations, FA1, FA2, CA5, CA7, CA8, CA11, or CA13 thru 16, according to Sections 1003 and 1004 of the Standard Specifications.

The fabric surrounding the drainage aggregate shall be Geotechnical Fabric for French Drains according to Article 1080.05 of the Standard Specifications.

<u>Construction Requirements.</u> All work shall be according to the applicable requirements of Section 601 of the Standard Specifications except as modified below.

The pipe underdrains shall consist of a perforated pipe drain situated at the bottom of an area of drainage aggregate wrapped completely in geotechnical fabric and shall be installed to the lines and gradients as shown on the plans.

<u>Method of Measurement.</u> Pipe Underdrains for Structures shall be measured for payment in feet (meters), in place. Measurement shall be along the centerline of the pipe underdrains. All connectors, outlet pipes, elbows, and all other miscellaneous items shall be included in the measurement. Concrete headwalls shall be included in the cost of Pipe Underdrains for Structures, but shall not be included in the measurement for payment.

<u>Basis of Payment.</u> This work will be paid for at the contract unit price per foot (meter) for PIPE UNDERDRAINS FOR STRUCTURES of the diameter specified. Furnishing and installation of the drainage aggregate, geotechnical fabric, forming holes in structural elements and any excavation required, will not be paid for separately, but shall be included in the cost of the pipe underdrains for structures.

HOT DIP GALVANIZING FOR STRUCTURAL STEEL

Effective: June 22, 1999 Revised: October 20, 2017

<u>Description</u>. This work shall consist of surface preparation and hot dip galvanizing all structural steel specified on the plans and painting of galvanized structural steel when specified on the plans.

<u>Materials</u>. Fasteners shall be ASTM F 3125, Grade 325, Type 1, High Strength bolts with matching nuts and washers.

<u>Fabrication Requirements</u>. Hot-dip galvanizing shall be indicated on the shop drawings. The fabricator shall coordinate with the galvanizer to incorporate additional steel details required to facilitate galvanizing of the steel. These additional details shall be indicated on the shop drawings.

To insure identification after galvanizing, piece marks shall be supplemented with metal tags for all items where fit-up requires matching specific pieces.

After fabrication (cutting, welding, drilling, etc.) is complete, all holes shall be deburred and all fins, scabs or other surface/edge anomalies shall be ground or repaired per ASTM A6. The items shall then be cleaned per Steel Structures Painting Council's Surface Preparation Specification SSPC-SP1 (Solvent Cleaning) and SSPC-SP6 (Commercial Blast Cleaning). All surfaces shall be inspected to verify no fins, scabs or other similar defects are present.

The Contractor shall consult with the galvanizer to insure proper removal of grease, paint and other deleterious materials prior to galvanizing.

Surface Preparation and Hot Dip Galvanizing

<u>General</u>. Surfaces of the structural steel specified on the plans shall be prepared and hot dip galvanized as described herein.

<u>Cleaning Structural Steel.</u> If rust, mill scale, dirt, oil, grease or other foreign substances have accumulated prior to galvanizing, steel surfaces shall be cleaned by a combination of caustic cleaning and cleaning according to SSPC-SP8 (Pickling).

Special attention shall be given to the cleaning of corners and reentrant angles.

<u>Surface Preparation</u>. A flux shall be applied to all steel surfaces to be galvanized. Any surfaces which will receive field-installed stud shear connectors shall not be galvanized within 2 in. (50 mm) of the stud location. Either the entire area receiving studs or just individual stud locations may be left ungalvanized. The following steel surfaces of bearings shall not be galvanized: stainless steel surfaces, surfaces which will be machined (except for fixed bearing sole plates), and surfaces which will have TFE, elastomer, or stainless steel parts bonded to them.

The cleaned surfaces shall be galvanized within 24 hours after cleaning, unless otherwise authorized by the Engineer.

<u>Application of Hot Dip Galvanized Coating</u>. Steel members, fabrications and assemblies shall be galvanized by the hot dip process in the shop according to AASHTO M 111.

Bolts, nuts, and washers shall be galvanized according to ASTM F 2329.

All steel shall be safeguarded against embrittlement according to ASTM A 143. Water quenching or chromate conversion coating shall not be used on any steel work that is to be painted. All galvanized steel work shall be handled in such a manner as to avoid any mechanical damage and to minimize distortion.

Beams and girders shall be handled, stored and transported with their webs vertical and with proper cushioning to prevent damage to the member and coating. Members shall be supported and externally stiffened during galvanizing to prevent permanent distortion.

Hot Dip Galvanized Coating Requirements. Coating weight, surface finish, appearance and adhesion shall conform to requirements of ASTM A 385, ASTM F2329, AASHTO M 111 or AASHTO M 232, as appropriate.

Any high spots of zinc coating, such as metal drip lines and rough edges, left by the galvanizing operation in areas that are to be field connected or in areas that are to be painted shall be removed by cleaning per SSPC-SP2 (Hand Tool Cleaning) or SSPC-SP3 (Power Tool Cleaning). The zinc shall be removed until it is level with the surrounding area, leaving at least the minimum required zinc thickness.

Shop assemblies producing field splices shall provide 1/8 in. (3 mm) minimum gaps between ends of members to be galvanized. At field splices of beams or girders, galvanizing exceeding 0.08 in. (2 mm) on the cross-sectional (end) face shall be partially removed until it is 0.04 in. to 0.08 in. (1 to 2 mm) thick.

<u>Testing of Hot Dip Galvanized Coating</u>. Inspection and testing of hot dip galvanized coatings shall follow the guidelines provided in the American Galvanizers Association publication "Inspection of Products Hot Dip Galvanized After Fabrication". Sampling, inspection, rejection and retesting for conformance with requirements shall be according to AASHTO M 111 or AASHTO M 232, as applicable. Coating thickness shall be measured according to AASHTO M 111, for magnetic thickness gage measurement or AASHTO M 232, as applicable.

All steel shall be visually inspected for finish and appearance.

Bolts, nuts, washers, and steel components shall be packaged according to ASTM F 2329. Identity of bolts, nuts and washers shall be maintained for lot-testing after galvanizing according to Article 505.04(f)(2) for high strength steel bolts.

A notarized certificate of compliance with the requirements listed herein shall be furnished. The certificate shall include a detailed description of the material processed and a statement that the processes used met or exceeded the requirements for successful galvanizing of the surface, where applicable. The certificate shall be signed by the galvanizer.

Repair of Hot Dip Galvanized Coating. Surfaces with inadequate zinc thickness shall be repaired in the shop according to ASTM A 780 and AASHTO M 111.

Surfaces of galvanized steel that are damaged after the galvanizing operation shall be repaired according to ASTM A 780 whenever damage exceeds 3/16 in. (5 mm) in width and/or 4 in. (100 mm) in length. Damage that occurs in the shop shall be repaired in the shop. Damage that occurs during transport or in the field shall be repaired in the field.

<u>Connection Treatment.</u> After galvanizing and prior to shipping, contact surfaces for any bolted connections shall be roughened by hand wire brushing or according to SSPC-SP7 (Brush-Off Blast Cleaning). Power wire brushing is not allowed.

All bolt holes shall be reamed or drilled to their specified diameters after galvanizing. All bolts shall be installed after galvanizing.

Surface Preparation and Painting

<u>Surface Preparation.</u> When galvanized steel surfaces are specified to be painted they shall be clean and free of oil, grease, and other foreign substances. Surface preparation necessary to provide adequate adhesion of the coating shall be performed according to ASTM D6386. Surface preparation shall include, but not be limited to the following:

- All galvanized steel surfaces that are to be painted shall be cleaned according to SSPC-SP1 (Solvent Cleaning). After cleaning, all chemicals shall be thoroughly rinsed from the surface with a suitable solvent. The steel shall be allowed to completely dry prior to coating application.
- All galvanized steel surfaces that are to be painted shall be checked for the presence of chromate conversion coating according to ASTM D 6386 Appendix X1. Surfaces where chromate conversion coating is found shall be cleaned according to the same appendix and blown down with clean, compressed air according to ASTM D 6386 Section 6.1.
- All galvanized steel surfaces that are to be painted shall be checked for the presence of wet storage stain. Surfaces where wet storage stain is found shall be cleaned, rinsed and completely dried according to ASTM D 6386 Section 6.2.
- Following galvanizing, thickness readings shall verify the acceptable thickness of the galvanizing according to AASHTO M111/ASTM A123.

<u>Paint Requirements.</u> The paint materials (epoxy intermediate coat and aliphatic urethane finish coat) shall meet the requirements of the Articles 1008.05(d) and (e) of the Standard Specification.

All paint materials for the shop and field shall be supplied by the same manufacturer, and samples of components submitted for approval by the Department, before use.

Paint storage, mixing, and application shall be according to Section 506 of the Standard Specifications and the paint manufacturer's written instructions and product data sheets. In the event of a conflict the Contractor shall advise the Engineer and comply with the Engineer's written resolution. Until a resolution is provided, the most restrictive conditions shall apply.

Shop Application of the Paint System. The areas to be painted shall receive one full coat of an epoxy intermediate coat and one full coat of an aliphatic urethane finish coat. The film thickness of each coat shall be according to Article 506.09(f)(2).

<u>Construction Requirements</u>. The contact surfaces of splice flange connections (mating flange faces and areas under splice bolt heads and nuts) shall be free of paint prior to assembly. If white rust is visible on the mating flange surfaces, the steel shall be prepared by hand wire brushing or brush-off blasting according to SSPC-SP7. Power wire brushing is not allowed.

After field erection, the following areas shall be prepared by cleaning according to SSPC-SP1 (Solvent Cleaning), tie- or wash-coated if applicable, and then painted or touched up with the paint specified for shop application (the intermediate coat and/or the finish coat):

- exposed unpainted areas at bolted connections
- areas where the shop paint has been damaged
- any other unpainted, exposed areas as directed by the Engineer.

<u>Special Instructions</u>. Painting Date/System Code. At the completion of the work, the Contractor shall stencil in contrasting color paint the date of painting the bridge and the paint type code from the Structure Information and Procedure Manual for the system used according to Article 506.10(i). The code designation for galvanizing is "V". If painting of the structural steel is not specified then the word "PAINTED" may be omitted, the month and year shall then correspond to the date the stencil is applied.

<u>Basis of Payment</u>. The cost of all surface preparation, galvanizing, painting and all other work described herein shall be considered as included in the unit price bid for the applicable pay items to be galvanized and painted, according to the Standard Specifications.

ABV	ABOVE	CU YD	CUBIC YARD	HATCH	HATCHING	PM	PAVEMENT MARKING	STD	STANDARD
A/C	ACCESS CONTROL	CULV	CULVERT	HD	HEAD	PED	PEDESTAL	SBI	STATE BOND ISSUE
AC	ACRE	C&G	CURB & GUTTER	HDW	HEADWALL	PNT	POINT	SR	STATE ROUTE
ADJ	ADJUST	D	DEGREE OF CURVE	HDUTY	HEAVY DUTY	PC	POINT OF CURVATURE	STA	STATION
AS	AERIAL SURVEYS	DC	DEPRESSED CURVE	ha	HECTARE	PI	POINT OF INTERSECTION OF HORIZONTAL	SPBGR	STEEL PLATE BEAM GUARDRAIL
AGG	AGGREGATE	DET	DETECTOR	HMA	HOT MIX ASPHALT		CURVE	SS	STORM SEWER
АН	AHEAD	DIA	DIAMETER	HWY	HIGHWAY	PRC	POINT OF REVERSE CURVE	STY	STORY
APT	APARTMENT	DIST	DISTRICT	HORIZ	HORIZONTAL	PT	POINT OF TANGENCY	ST	STREET
ASPH	ASPHALT	DOM	DOMESTIC	HSE	HOUSE	POT	POINT ON TANGENT	STR	STRUCTURE
AUX	AUXILIARY	DBL	DOUBLE	ΙL	ILLINOIS	POLYETH	POLYETHYLENE	е	SUPERELEVATION RATE
AGS	AUXILIARY GAS VALVE (SERVICE)	DSEL	DOWNSTREAM ELEVATION	IMP	IMPROVEMENT	PCC	PORTLAND CEMENT CONCRETE	S.E. RUN.	SUPERELEVATION RUNOFF LENGTH
AVE	AVENUE	DSFL	DOWNSTREAM FLOWLINE	in dia	INCH DIAMETER	PP	POWER POLE OR PRINCIPAL POINT	SURF	SURFACE
AX	AXIS OF ROTATION	DR	DRAINAGE OR DRIVE	INL	INLET	PRM	PRIME	SMK	SURVEY MARKER
BK	BACK	DI	DRAINAGE INLET OR DROP INLET	INST	INSTALLATION	PE	PRIVATE ENTRANCE	Т	TANGENT DISTANCE
B-B	BACK TO BACK	DRV	DRIVEWAY	IDS	INTERSECTION DESIGN STUDY	PROF	PROFILE	T.R.	TANGENT RUNOUT DISTANCE
BKPL	BACKPLATE	DCT	DUCT	INV	INVERT	PGL	PROFILE GRADELINE	TEL	TELEPHONE
В	BARN	EA	EACH	ΙP	IRON PIPE	PROJ	PROJECT	TB	TELEPHONE BOX
BARR	BARRICADE	EB	EASTBOUND	IR	IRON ROD	P.C.	PROPERTY CORNER	TP	TELEPHONE POLE
BL	BASELINE	EOP	EDGE OF PAVEMENT	JT	JOINT	PL	PROPERTY LINE	TEMP	TEMPORARY
BGN	BEGIN	E-CL	EDGE TO CENTERLINE	kg	KILOGRAM	PR	PROPOSED	TBM	TEMPORARY BENCH MARK
ВМ	BENCHMARK	E-E	EDGE TO EDGE	km	KILOMETER	R	RADIUS or RESIDENTUAL	TD	TILE DRAIN
BIND	BINDER	ELEC	ELECRICAL	LS	LANDSCAPING	RR	RAILROAD	TBE	TO BE EXTENDED
BIT	BITUMINOUS	EL	ELEVATION	LN	LANE	RRS	RAILROAD SPIKE	TBR	TO BE REMOVED
BTM	BOTTOM	ENTR	ENTRANCE	LT	LEFT	RPS	REFERENCE POINT STAKE	TBS	TO BE SAVED
BLVD	BOULEVARD	EXC	EXCAVATION	LIDAR	LIGHT DETECTION AND RANGING	REF	REFLECTIVE	TWP	TOWNSHIP
BRK	BRICK	EX	EXISTING	LP	LIGHT POLE	RCCP	REINFORCED CONCRETE CULVERT PIPE	TR	TOWNSHIP ROAD
BBOX	BUFFALO BOX	EXPWAY	EXPRESSWAY	LGT	LIGHTING	REINF	REINFORCEMENT	TS	TRAFFIC SIGNAL
BLDG	BUILDING	Е	EXTERNAL DISTANCE OF HORIZONTAL CURVE	LF	LINEAL FEET OR LINEAR FEET	REM	REMOVAL	TSCB	TRAFFIC SIGNAL CONTROL BOX
CATV	CABLE	Е	OFFSET DISTANCE TO VERTICAL CURVE	L	LITER OR CURVE LENGTH	RC	REMOVE CROWN	TSC	TRAFFIC SYSTEMS CENTER
CIP	CAST IRON PIPE	F-F	FACE TO FACE	LC	LONG CHORD	REP	REPLACEMENT	TRVS	TRANSVERSE
СВ	CATCH BASIN	FA	FEDERAL AID	LNG	LONGITUDINAL	REST	RESTAURANT	TRVL	TRAVEL
C-C	CENTER TO CENTER	FAI	FEDERAL AID INTERSTATE	L SUM	LUMP SUM	RESURF	RESURFACING	TRN	TURN
CL	CENTERLINE OR CLEARANCE	FAP	FEDERAL AID PRIMARY	MACH	MACHINE	RET	RETAINING	TY	TYPE
CL-E	CENTERLINE TO EDGE	FAS	FEDERAL AID SECONDARY	MB	MAIL BOX	RT	RIGHT	T-A	TYPE A
CL-F	CENTERLINE TO FACE	FAUS	FEDERAL AID URBAN SECONDARY	MH	MANHOLE	ROW	RIGHT-OF-WAY	TYP	TYPICAL
CTS	CENTERS	FP	FENCE POST	MATL	MATERIAL	RD	ROAD	UNDGND	UNDERGROUND
CERT	CERTIFIED	OPT	FIBER OPTIC	MED	MEDIAN	RDWY	ROADWAY	USGS	U.S. GEOLOGICAL SURVEY
CHSLD	CHISELED	FE	FIELD ENTRANCE	m	METER	RTE	ROUTE	USEL	UPSTREAM ELEVATION
CS	CITY STREET	FH	FIRE HYDRANT	METH	METHOD	SAN	SANITARY	USFL	UPSTREAM FLOWLINE
CP	CLAY PIPE	FL	FLOW LINE	M	MID-ORDINATE	SANS	SANITARY SEWER	UTIL	UTILITY
CLSD	CLOSED	FB	FOOT BRIDGE	mm	MILLIMETER	SEC	SECTION	VBOX	VALVE BOX
CLID	CLOSED LID	FDN	FOUNDATION		MILLIMETER DIAMETER	SEED	SEEDING	VV	VALVE VAULT
CT	COADINATION	FR	FRAME C. CRATE	MIX	MIXTURE	SHAP	SHAPING	VLT	VAULT
COMB	COMBINATION	F&G	FRAME & GRATE	MBH	MOBILE HOME	S	SHED	VEH	VEHICLE
C	COMMERCIAL BUILDING	FRWAY	FREEWAY	MOD	MODIFIED	SH	SHEET	VP	VENT PIPE
CE	COMMERCIAL ENTRANCE	GAL	GALLON	MFT	MOTOR FUEL TAX	SHLD	SHOULDER	VERT	VERTICAL CLIPVE
CONC	CONCRETE	GALV	GALVANIZED		NAIL & BOTTLE CAP	SW	SIDEWALK OR SOUTHWEST	VC	VERTICAL CURVE
	CONSTRUCT	G	GARAGE		NAIL & CAP	SIG	SIGNAL	VPC	VERTICAL POINT OF CURVATURE
	CONTINUED	GM	GAS METER		NAIL & WASHER	SOD	SODDING	VPI	VERTICAL POINT OF INTERSECTION
CONT	CONTINUOUS	GV	GAS VALVE	NC	NORMAL CROWN	SM	SOLID MEDIAN	VPT	VERTICAL POINT OF TANGENCY
COR	CORNER	GIS	GEOGRAPHICAL INFORMATION SYSTEM	NB	NORTHEAGT	SB	SOUTHBOUND	WM	WATER METER
CORR	CORRUGATED METAL DIDE	GRAN	GRANULAR	NE	NORTHEAST	SE	SOUTHEAST	WV	WATER MAIN
CMP	COUNTY	GR	GRAVEL	NW	NORTHWEST	SPL	SPECIAL DITCH	WMAIN	WATER MAIN
CNTY	COUNTY HIGHWAY	GRVL	GRAVEL	0/S	OFFSET	SD SO ET	SPECIAL DITCH	WB WILDFL	WESTBOUND WILDELOWERS
CH CSE	COURSE	GND	GROUND	0&C	OIL AND CHIP	SQ FT m ²	SQUARE FEET	WILDFL	WILDFLOWERS WITH
	COURSE	GUT	GUTTER	OLID	OPEN LID	2	SQUARE METER SQUARE MILLIMETER	WO	WITHOUT
	CROSS SECTION	CP	CLIV DOLE						
XSECT	CROSS SECTION	GP GW	GUY MURE	PAT	PATTERN PAVED	mm² SO YD	· ·	VVO	WITHOUT
	CROSS SECTION CUBIC METER CUBIC MILLIMETER	GP GW HH	GUY POLE GUY WIRE HANDHOLE	PVD PVMT	PATTERN PAVED PAVEMENT	SQ YD STB	SQUARE YARD STABILIZED	WO	WITHOUT

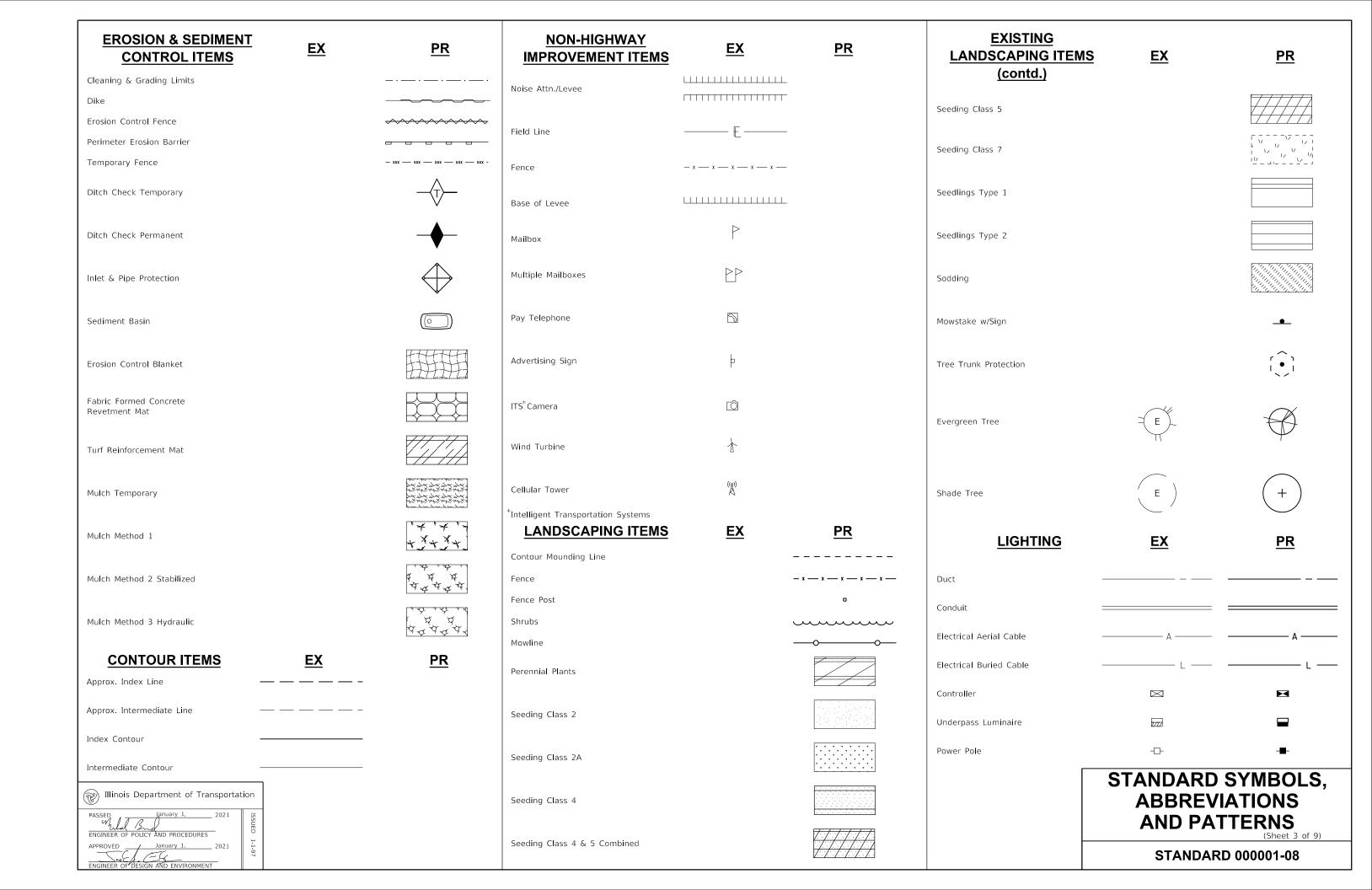
Illinois	Department of T	ransportat	ion
PASSED While ENGINEER OF F	January 1, POLICY AND PROCEDURI	2021 	ISSUED
APPROVED	January 1,	2021	1-1-97

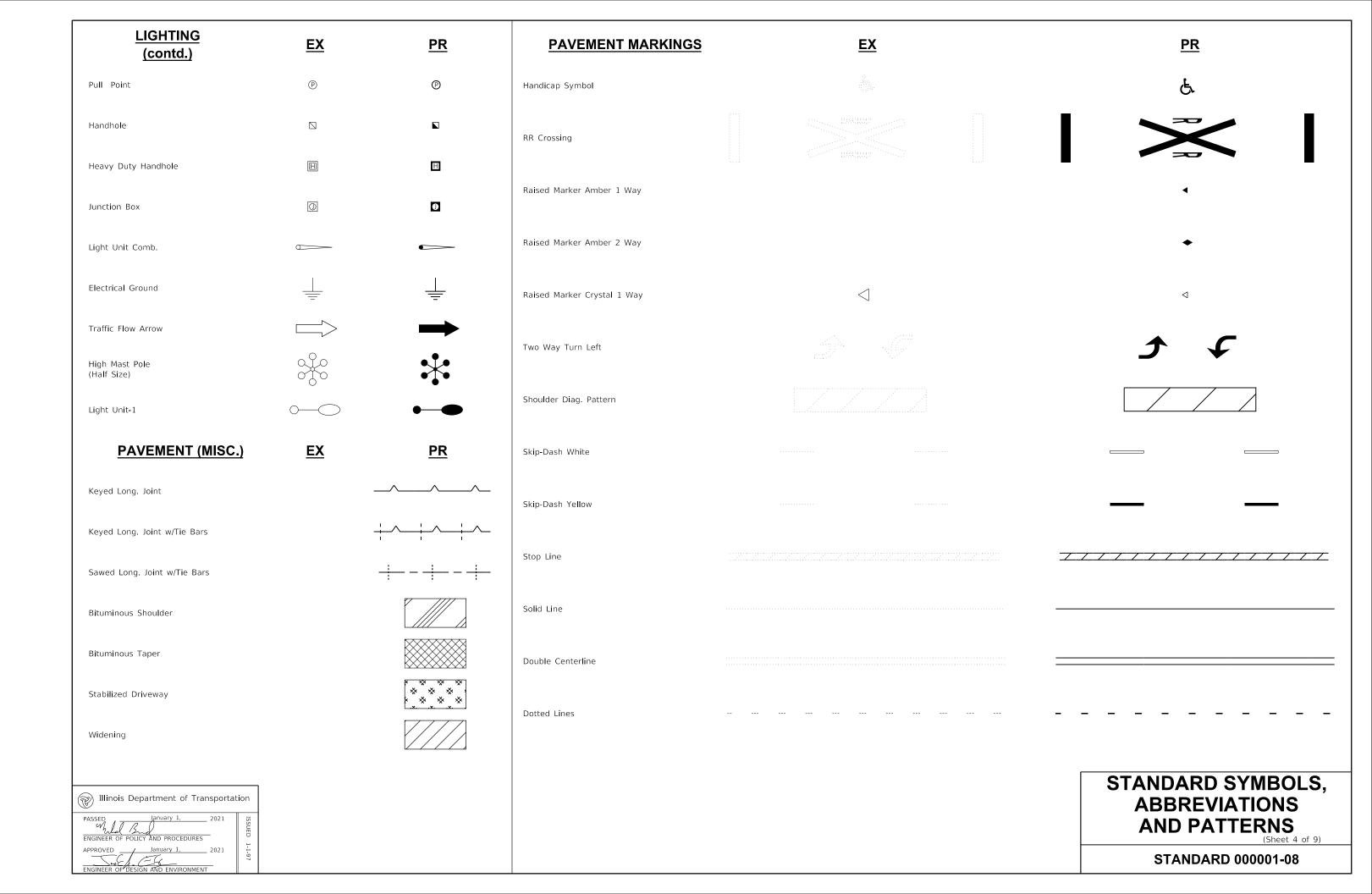
DATE	REVISIONS	
1-1-21	Updated fonts, abbreviations	
	and symbols.	1
1-1-19	Added new symbols.	
		1

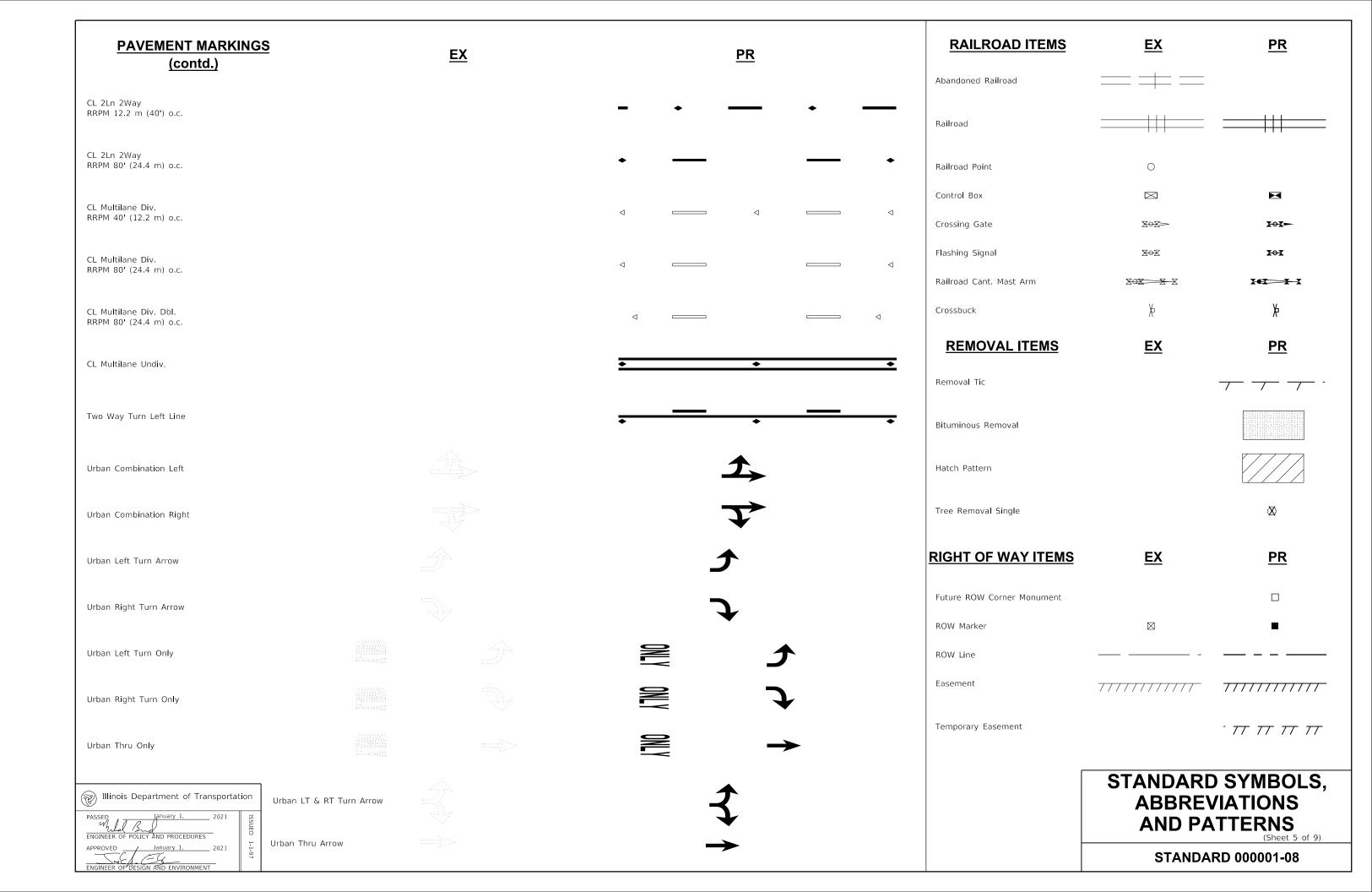
STANDARD SYMBOLS, **ABBREVIATIONS** AND PATTERNS (Sheet 1 of 9)

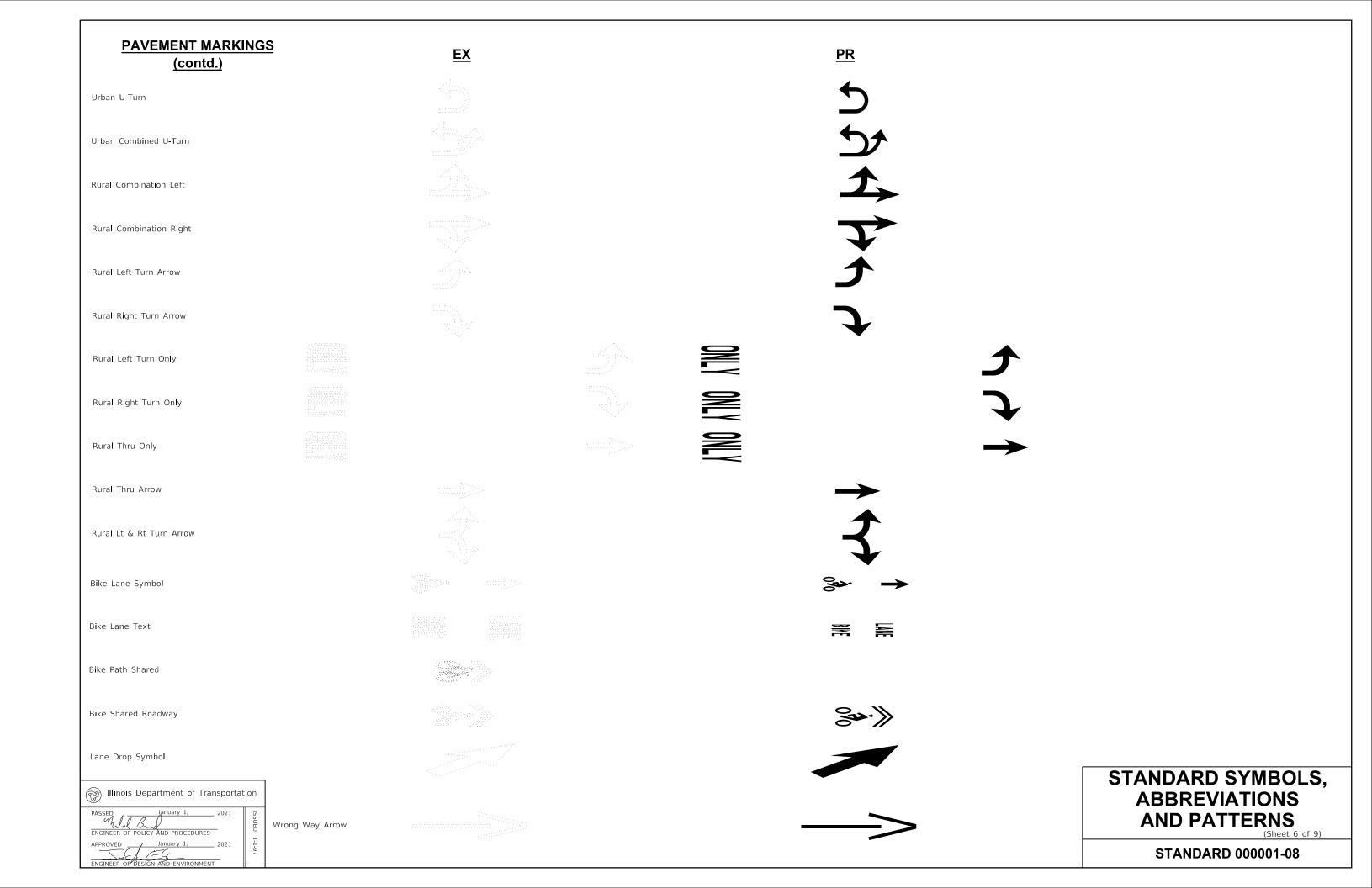
STANDARD 000001-08

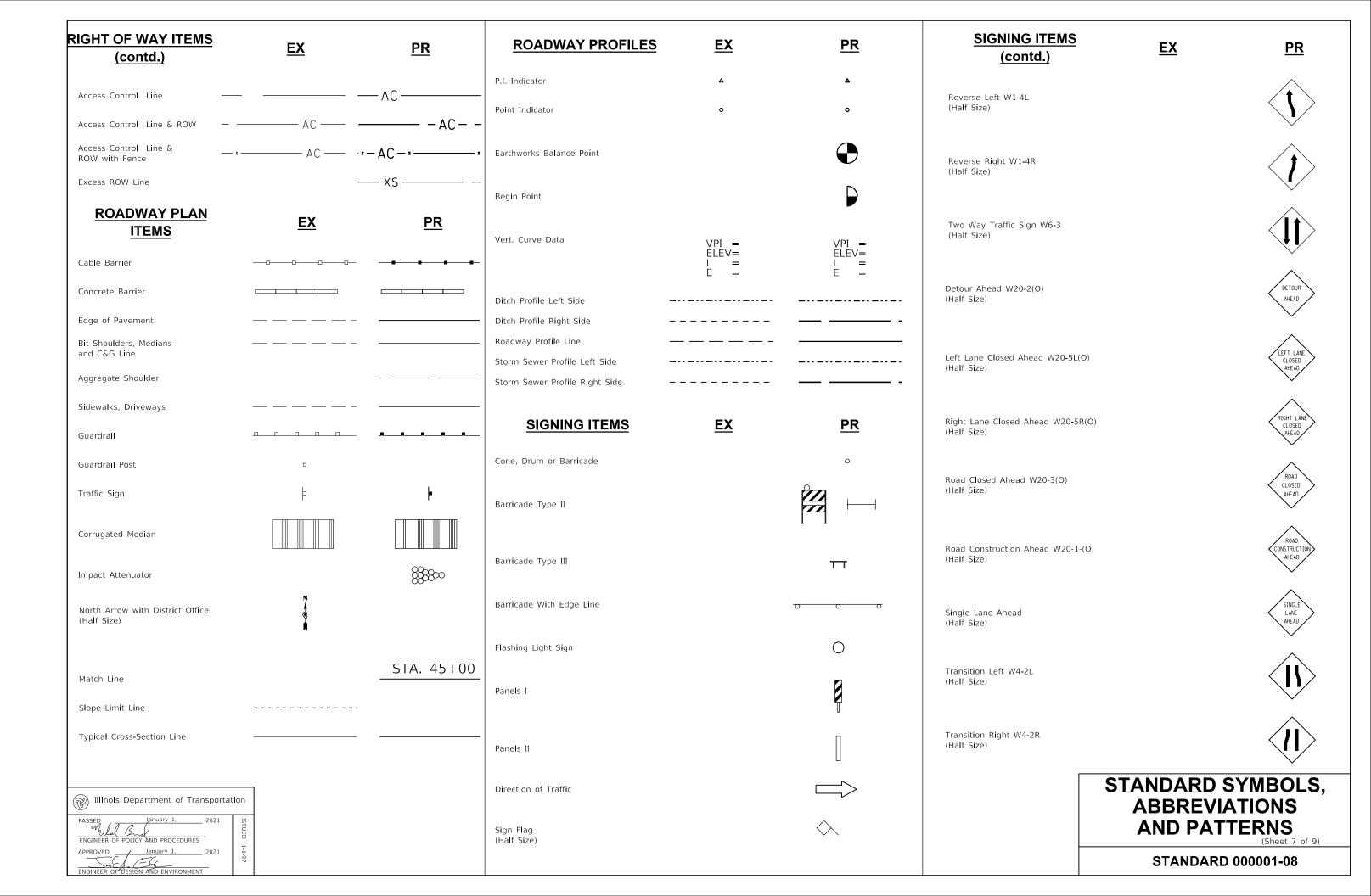
ADJUSTMENT ITEMS EX	<u>PR</u>	ALIGNMENT ITEMS	EX	PR	DRAINAGE ITEMS	<u>EX</u>	<u>PR</u>
Structure To Be Adjusted	ADJ	Baseline –			Channel or Stream Line		
		Centerline –			Culvert Line	HI	
Structure To Be Cleaned	С	Centerline Break Circle	0	\odot	Grading & Shaping Ditches		
Main Structure To Be Filled	FM	Baseline Symbol	屘	B	Drainage Boundary Line	_////	_////
		Centerline Symbol		Q.	Paved Ditch	A CONTRACTOR ASSESSMENT OF THE PROPERTY OF THE	ALAGED AND ALGED
Structure To Be Filled	F	PI Indicator	Δ	Δ	Aggregate Ditch		Pires of Pires of Pries of
Structure To Be Filled Special	FSP	Point Indicator	0	0	Pipe Underdrain		
Structure To Be Removed	R	Horizontal Curve Data (Half Size)	EX. CURVE P.I. STA= Δ=	CURVE P.I. STA= Δ=	Storm Sewer		
		(ridii 3120)	D= R= T=	D = R= T=	Flowline	ŧ.	ŧ
Structure To Be Reconstructed	REC		L= E= e= T.R.=	L = E = e= T.R.=	Ditch Check	→	→
Structure To Be Reconstructed Special	RSP		S.E. RUN= P.C. STA= P.T. STA=	S.E. RUN= P.C. STA= P.T. STA=	Headwall	_	$\overline{}$
		BOUNDARIES ITEMS	<u>EX</u>	<u>PR</u>	Inlet		-
Frame and Grate To Be Adjusted	А		<u> </u>	<u></u>	Manhole	©	•
Frame and Lid To Be Adjusted	A	Solid Property/Lot Line –			Summit	\longleftrightarrow	\longleftrightarrow
	\wedge	Section/Grant Line –			Roadway Ditch Flow	$-\sim \Rightarrow$	-√→
Domestic Service Box To Be Adjusted	<a>>	Quarter Section Line —			Swale	→	→
Valve Vault To Be Adjusted	A	Quarter/Quarter Section Line —			Catch Basin	0	•
Consider Additional Ad		County/Township Line –			Culvert End Section	⊲	•
Special Adjustment	SP	State Line -			Water Surface Indicator	$\overline{\underline{\bigcirc}}$	
Item To Be Abandoned	АВ	Chiseled Square Found			Riprap		1 00000 200001 1200020
Item To Be Moved	M	Iron Pipe Found	0		HYDRAULICS ITEMS	<u>EX</u>	<u>PR</u>
		Iron Pipe Set	•		Overflow		
Item To Be Relocated	REL	Survey Marker	•				
Pavement Removal and Replacement		Property Line Symbol	PL T		Sheet Flow		
	<u> </u>	Same Ownership Symbol (Half Size)			Hydrant Outlet	-	
		Northwest Quarter Corner (Half Size)	N/R/R			STANDARD	SYMBOLS.
Illinois Department of Transportation						ABBREVI	ATIONS
PASSED January 1, 2021 S S S S S S S S S S S S S S S S S S S		Section Corner (Half Size)				AND PAT	TERNS (Sheet 2 of 9)
APPROVED January 1, 2021 F. S.		Southeast Quarter Corner (Half Size)	NR FI			STANDARI	

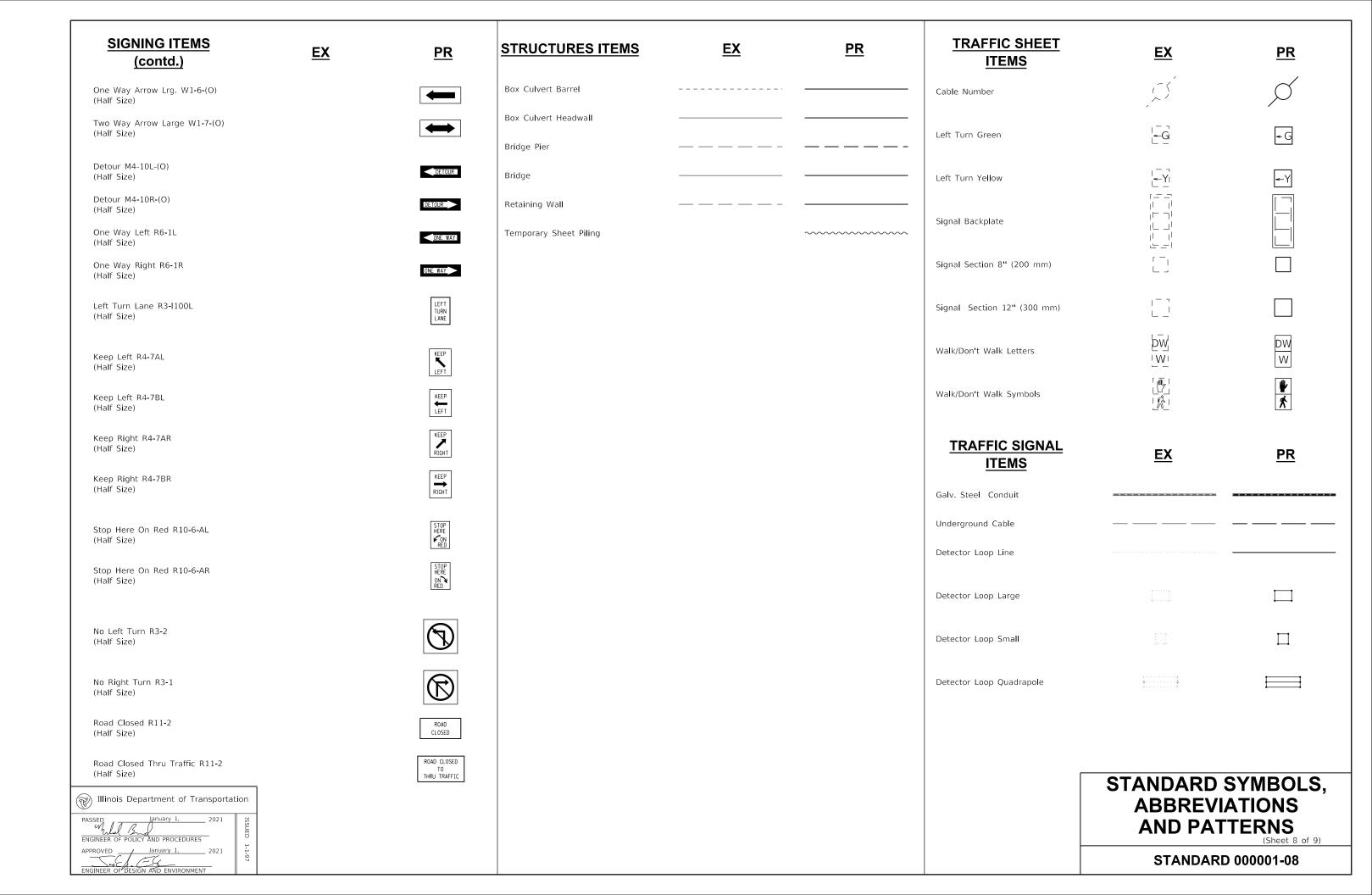












TRAFFIC SIGNAL ITEMS (contd.)	EX	PR	UNDERGROUND UTILITY ITEMS EX	<u>PR</u>	ABANDONED	UTILITY ITEMS (contd.)	EX	<u>PR</u>
Detector Raceway	"E"		Cable TV ——— CTV ———	CTV	CTV	Traffic Signal	Ф	•
Jessello Macona,			Electric Cable ————————————————————————————————————	— ——Е——	/E/-	Traffic Signal Control Box	×	
Aluminum Mast Arm	0		Fiber Optic ——— F0 ———	— F0 ——	/ F0/_	Water Meter	\forall	
Steel Mast Arm	0	•	Gas Pipe ————————————————————————————————————	— G —	- -/ G	Water Meter Valve Box	0	•
	· ·		Oil Pipe ———— () ———	— — · 0 · — ·		Profile Line		
Veh. Detector Magnetic	—	-	Sanitary Sewer —)——)——	·		Aerial Power Line	—— А ———— А	A
Conduit Splice	•	•	Telephone Cable — T —	— — T—	-	VEGETATION ITEM	S EX	PR
Controller	\bowtie		Water Pipe	— W —	— / W I / /	VEGETATIONTIEN	<u>LX</u>	<u> </u>
Gulfbox Junction	0	0				Deciduous Tree	©	
Wood Pole	\otimes	•	<u>UTILITIES ITEMS</u>	EX	<u>PR</u>	Bush or Shrub	0	
Temp. Signal Head		>-	Controller	\boxtimes	\blacksquare	Evergreen Tree	©	
Handhole			Double Handhole		KN	Stump	<u> </u>	
Double Handhole			Fire Hydrant	Ø	*	Orchard/Nursery Line		
Heavy Duty Handhole	H	H	GuyWire or Deadman Anchor	\rightarrow		Vegetation Line		
Junction Box		•	Handhole			Woods & Bush Line		
Ped. Pushbutton Detector	•	•	Heavy Duty Handhole		H	<u>WATER FEATURE</u> ITEMS	<u>EX</u>	<u>PR</u>
Ped. Signal Head	-0	-1	Junction Box		0	Stream or Drainage Ditch		
Power Pole Service	-0-	-	Light Pole	¤	*	Waters Edge		
Priority Veh. Detector	\bowtie	•	Manhole	0	⊙	Water Surface Indicator	<u></u>	
Signal Head	>	-	Monitoring Well (Gasoline)	(419)		Water Point	<u> </u>	
Signal Head w/Backplate	+->	+►	Pipeline Warning Sign	þ		Disappearing Ditch	- <	
Signal Post	0	•	Power Pole	-0-	•	Marsh	بيبلند	
Closed Circuit TV	Ch		Power Pole with Light	ф		Marsh/Swamp Boundary		
Video Detector System	(V)	\(\sum_{\psi}\)	Sanitary Sewer Cleanout			, , , , , , , , , , , , , , , , , , ,		
	\neg		Splice Box Above Ground		•		STANDARD SY	MBOLS,
PASSED January 1. 2021	n		Telephone Splice Box Above Ground	⊞			ABBREVIAT	IONS
ENGINEER OF POLICY AND PROCEDURES	SSUPD 1		Telephone Pole	-0-	-		AND PATTE	RNS (Sheet 9 of 9)
APPROVED January 1, 2021 ENGINEER OF DESIGN AND ENVIRONMENT							STANDARD 000	0001-08

	REINFORCEMENT BARS - ENGLISH (METRIC)																
Bar Size	Dia.	Cross- Sectional	Weight		SPACING, in. (mm)												
	in.	Area	lbs./ft.	4 (100)	4½ (115)	5 (125)	5½ (140)	6 (150)	6½ (165)	7 (175)	7½ (190)	8 (200)	8½ (215)	9 (225)	10 (250)	11 (275)	12 (300)
English (metric)	mm	sq. in. (sq. mm)	kg/m					ARE	A OF STEEL	PER FOOT (METER), sq.	in. (sq. mm)				
3	0.375	0.110	0.376	0.330	0.293	0.264	0.240	0.220	0.203	0.189	0.176	0.165	0.155	0.147	0.132	0.120	0.110
(10)	(9.5)	(71)	(0.560)	(710)	(617)	(568)	(507)	(473)	(430)	(406)	(374)	(355)	(330)	(316)	(284)	(258)	(237)
4	0.500	0.196	0.668	0.588	0.523	0.470	0.428	0.392	0.362	0.336	0.314	0.294	0.277	0.261	0.235	0.214	0.196
(13)	(12.7)	(129)	(0.944)	(1290)	(1122)	(1032)	(921)	(860)	(782)	(737)	(679)	(645)	(600)	(573)	(516)	(469)	(430)
5	0.625	0.307	1.043	0.921	0.819	0.737	0.670	0.614	0.567	0.526	0.491	0.461	0.433	0.409	0.368	0.335	0.307
(16)	(15.9)	(199)	(1.552)	(1990)	(1730)	(1592)	(1421)	(1327)	(1206)	(1137)	(1047)	(995)	(926)	(884)	(796)	(724)	(663)
6	0.750	0.442	1.502	1.326	1.179	1.061	0.964	0.884	0.816	0.758	0.707	0.663	0.624	0.589	0.530	0.482	0.442
(19)	(19.1)	(284)	(2.235)	(2840)	(2470)	(2272)	(2029)	(1893)	(1721)	(1623)	(1495)	(1420)	(1321)	(1262)	(1136)	(1033)	(947)
7	0.875	0.601	2.044	1.803	1.603	1.442	1.311	1.202	1.110	1.030	0.962	0.902	0.848	0.801	0.721	0.656	0.601
(22)	(22.2)	(387)	(3.042)	(3870)	(3365)	(3096)	(2764)	(2580)	(2345)	(2211)	(2037)	(1935)	(1800)	(1720)	(1548)	(1407)	(1290)
8	1.000	0.785	2.670	2.355	2.093	1.884	1.713	1.570	1.449	1.346	1.256	1.178	1.108	1.047	0.942	0.856	0.785
(25)	(25.4)	(510)	(3.973)	(5100)	(4435)	(4080)	(3543)	(3400)	(3091)	(2914)	(2684)	(2550)	(2372)	(2267)	(2040)	(1855)	(1700)
9	1.128	1.000	3.400	3.000	2.667	2.400	2.182	2.000	1.846	1.714	1.600	1.500	1.412	1.333	1.200	1.091	1.000
(29)	(28.7)	(645)	(5.060)	(6450)	(5609)	(5160)	(4607)	(4300)	(3909)	(3686)	(3395)	(3225)	(3000)	(2867)	(2580)	(2345)	(2150)
10	1.270	1.267	4.303	3.801	3.379	3.041	2.764	2.534	2.339	2.172	2.027	1.901	1.789	1.689	1.520	1.382	1.267
(32)	(32.3)	(819)	(6.404)	(8190)	(7122)	(6552)	(5850)	(5460)	(4964)	(4680)	(4311)	(4095)	(3809)	(3640)	(3276)	(2978)	(2730)
11	1.410	1.561	5.313	4.683	4.163	3.746	3.406	3.122	2.882	2.676	2.498	2.342	2.204	2.081	1.873	1.703	1.561
(36)	(35.8)	(1006)	(7.907)	(10060)	(8748)	(8048)	(7186)	(6707)	(6097)	(5749)	(5295)	(5030)	(4679)	(4471)	(4024)	(3658)	(3353)

Illinois Department of Transportation								
PASSED January 1, 2009 Satt Sa X ENGINEER OF POLICY AND PROCEDURES	ISSUED							
APPROVED January 1, 2009	1-1-9							

DATE	REVISIONS	
1-1-09	Switched units to	1
	English (metric).	
1-1-07	Deleted metric table.	_
	Soft converted English	
	table.	

AREAS OF REINFORCEMENT BARS

STANDARD 001001-02

							DECIMAL OF A	AN INCH	AND OF	A FOOT							
	А	В		Α	В		Α	В		А	В		А	В		А	В
1∕64	0.0052 0.0104 0.015625 0.0208	1/16 1/8 3/16 1/4	¹ ½ ₄	0.171875 0.1771 0.1823 0.1875	2½6 2½8 2¾6 2¼	11/32	0.3385 0.34375 0.3490 0.3542	4½6 4½ 4¾ 4¾6 4¼	33/64	0.5052 0.5104 0.515625 0.5208	6½6 6½ 6¾6 6¼	11/16	0.671875 0.6771 0.6823 0.6875	8½ 8½ 8¾ 8¾ 8¼	27/32	0.8385 0.84375 0.8490 0.8542	10⅓ ₁₆ 10⅓ 10¾ ₁₆ 10⅓
⅓₂	0.0260 0.03125 0.0365 0.0417	₹ ₁₆ ₹ ₈ ₹ ₁₆ ₹ ₂	13/64	0.1927 0.1979 0.203125 0.2083	2½ 2¾ 2½ 2½	²³ / ₆₄	0.359375 0.3646 0.3698 0.3750	4½ 4½ 4½ 4½	17/32	0.5260 0.53125 0.5365 0.5417	6½ 6¾ 6½ 6½	45/64	0.6927 0.6979 0.703125 0.7083	8½ 8¾ 8½ 8½	55/ ₆₄	0.859375 0.8646 0.8698 0.8750	10½ 10¾ 10½ 10½
¾ ₆₄	0.046875 0.0521 0.0573 0.0625	9/16 5/8 11/16 3/4	⅓₃₂	0.2135 0.21875 0.2240 0.2292	2 ⁹ / ₁₆ 2 ⁵ / ₈ 2 ¹ / ₁₆ 2 ³ / ₄	²⁵ / ₆₄	0.3802 0.3854 0.390625 0.3958	4% 4% 4 ¹ 1/ ₁₆ 4 ³ / ₄	³⁵ / ₆₄	0.546875 0.5521 0.5573 0.5625	6% 6% 6 ¹ / ₁₆ 6 ³ / ₄	23/32	0.7135 0.71875 0.7240 0.7292	8½6 8½8 8½16 8¾	57/64	0.8802 0.8854 0.890625 0.8958	$ \begin{array}{c} 10\%_{16} \\ 10\%_{8} \\ 10^{1}\%_{16} \\ 10\%_{4} \end{array} $
5⁄ ₆₄	0.0677 0.0729 0.078125 0.0833	13/ ₁₆ 7/ ₈ 15/ ₁₆ 1	15/64	0.234375 0.2396 0.2448 0.2500	2 ¹³ / ₁₆ 2 ^{1/8} 2 ¹⁵ / ₁₆ 3	13/32	0.4010 0.40625 0.4115 0.4167	4 ¹³ / ₁₆ 4 ⁷ / ₈ 4 ¹⁵ / ₁₆ 5	37/64	0.5677 0.5729 0.578125 0.5833	6 ¹³ / ₁₆ 6 ⁷ / ₈ 6 ¹⁵ / ₁₆ 7	47/ ₆₄	0.734375 0.7396 0.7448 0.7500	8 ¹³ / ₁₆ 8 ⁷ / ₈ 8 ¹⁵ / ₁₆ 9	29/32	0.9010 0.90625 0.9115 0.9167	$ \begin{array}{c} 10^{13}/_{16} \\ 10\frac{7}{8} \\ 10^{15}/_{16} \\ 11 \end{array} $
¾₂	0.0885 0.09375 0.0990 0.1042	1½6 1½ 1¾16 1¼16	17/64	0.2552 0.2604 0.265625 0.2708	3½6 3½8 3¾6 3¼	²⁷ / ₆₄	0.421875 0.4271 0.4323 0.4375	5½ 5½ 5¾ 5¼	19/32	0.5885 0.59375 0.5990 0.6042	7½6 7½ 7¾6 7¼	4%4	0.7552 0.7604 0.765625 0.7708	9½6 9½ 9¾6 9¼	5%4 15/16	0.921875 0.9271 0.9323 0.9375	$ \begin{array}{c} 11\frac{1}{16} \\ 11\frac{1}{8} \\ 11\frac{3}{16} \\ 11\frac{1}{4} \end{array} $
% ₄ ⅓	0.109375 0.1146 0.1198 0.1250	1½6 1¾ 1½6 1½	Ŷ ₃₂	0.2760 0.28125 0.2865 0.2917	3½ 3¾ 3½ 3½	²⁹ ⁄ ₆₄	0.4427 0.4479 0.453125 0.4583	5½ 5½ 5½	³ %4	0.609375 0.6146 0.6198 0.6250	7½ 7¾ 7½ 7½	25/32	0.7760 0.78125 0.7865 0.7917	9½ 9¾ 9¾ 9½	61/64	0.9427 0.9479 0.953125 0.9583	11½6 11¾8 11½6 11½
% ₄	0.1302 0.1354 0.140625 0.1458	1% ₁₆ 1% 1½ 1½ ₁₆ 1¾	19 ₆₄	0.296875 0.3021 0.3073 0.3125	3 ⁹ / ₁₆ 3 ⁵ / ₈ 3 ¹ / ₁₆ 3 ³ / ₄	15/32	0.4635 0.46875 0.4740 0.4792	5% 5% 5 ¹ 1/ ₁₆ 5 ³ / ₄	41/64	0.6302 0.6354 0.640625 0.6458	7% ₁₆ 7% ₈ 7 ¹ ½ ₁₆ 7¾	51/ ₆₄	0.796875 0.8021 0.8073 0.8125	9% 9% 91% 934	31/32	0.9635 0.96875 0.9740 0.9792	$\begin{array}{c} 11\%_{16} \\ 11\%_{8} \\ 11^{1}\%_{16} \\ 11\%_{4} \end{array}$
5⁄ ₃₂	0.1510 0.15625 0.1615 0.1667	1 ¹³ / ₁₆ 1½ 1 ¹⁵ / ₁₆ 2	21/64	0.3177 0.3229 0.328125 0.3333	3 ¹³ / ₁₆ 3 ⁷ / ₈ 3 ¹⁵ / ₁₆ 4	³ ½	0.484375 0.4896 0.4948 0.5000	5 ¹³ / ₁₆ 5 ⁷ / ₈ 5 ¹⁵ / ₁₆ 6	21/32	0.6510 0.65625 0.6615 0.6667	7 ¹³ / ₁₆ 7 ⁷ / ₈ 7 ¹⁵ / ₁₆ 8	53/64	0.8177 0.8229 0.828125 0.8333	9 ¹³ / ₁₆ 9 ^{7/8} 9 ¹⁵ / ₁₆ 10	63/64	0.984375 0.9896 0.9948 1.0000	$ \begin{array}{c} 11^{13}/_{16} \\ 11\frac{7}{8} \\ 11^{15}/_{16} \\ 12 \end{array} $



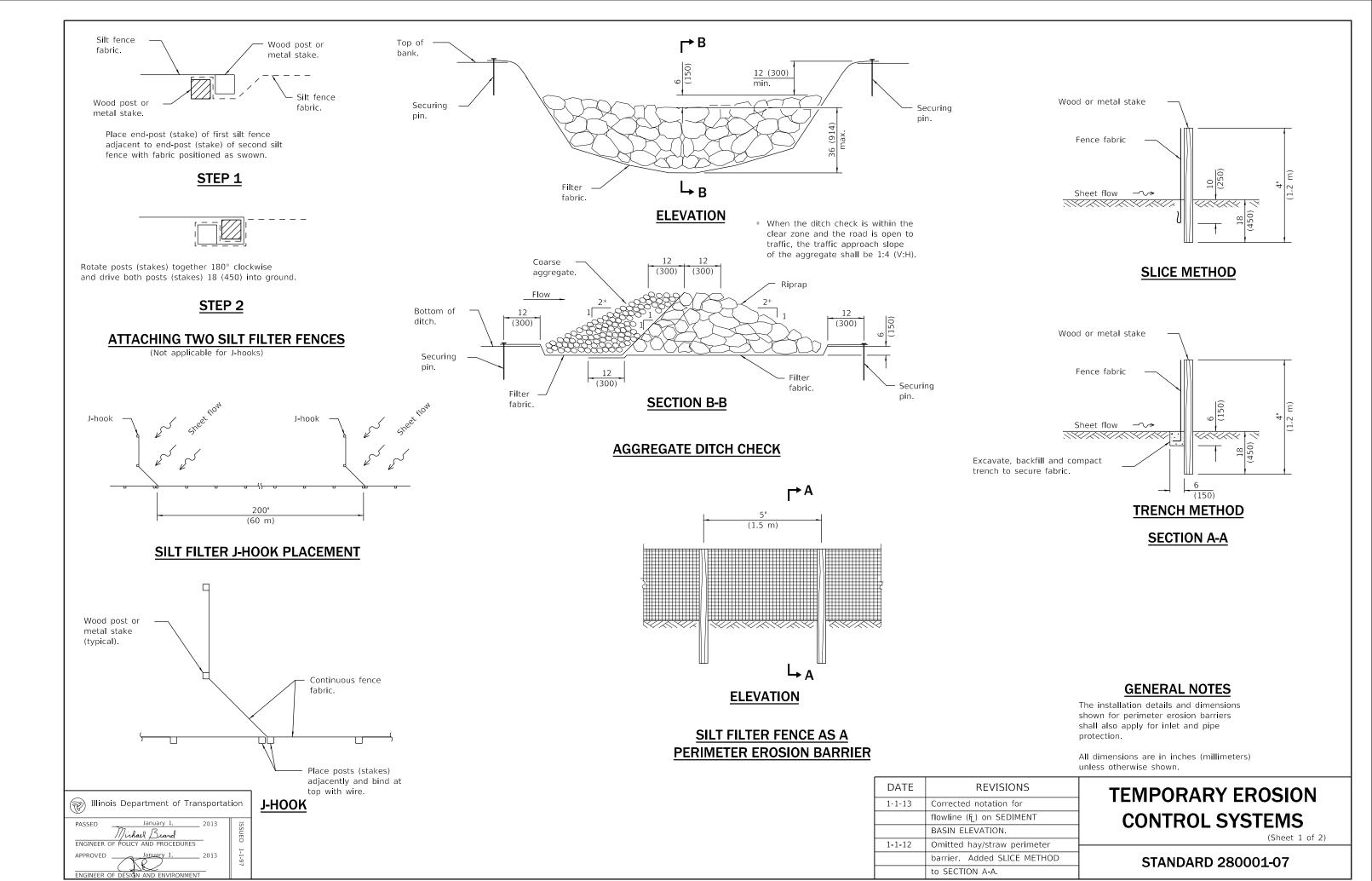
A = Fractions of Inch or Foot

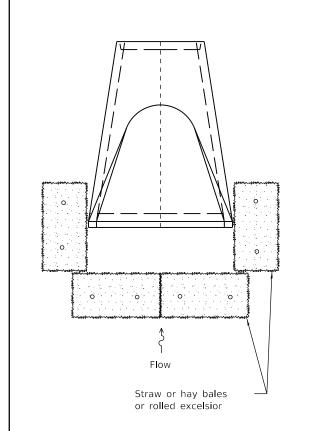
B = Inch Equivalents to Foot Fractions

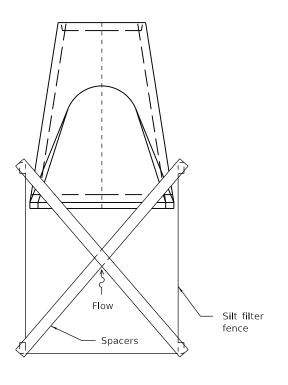
DATE	REVISIONS	
1-1-97	New Standard.	

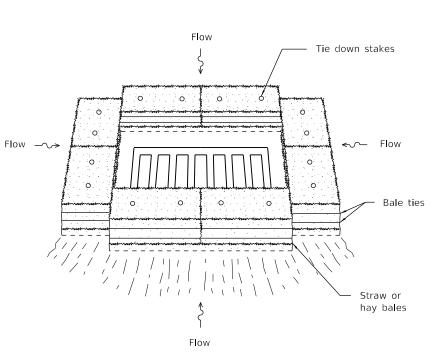
DECIMAL OF AN INCH AND OF A FOOT

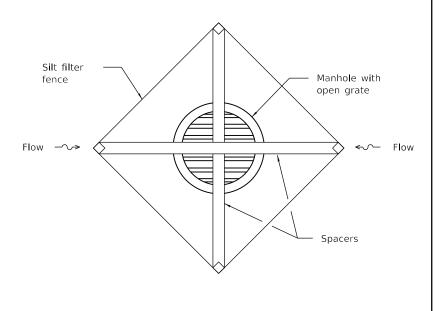
STANDARD 001006



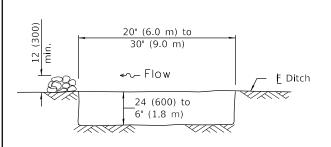




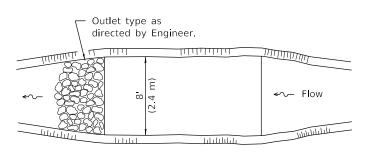




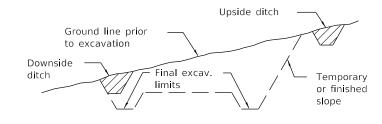
INLET AND PIPE PROTECTION



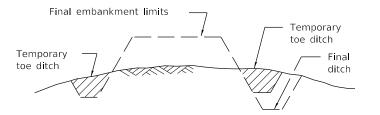
The performance of the basin will improve if put into a series.



The long dimension should be parallel with the direction of the flow. Accumulated silt shall be removed anytime the basins become 75% filled.



TYPICAL CUT CROSS-SECTION



TYPICAL FILL CROSS-SECTION

ELEVATION

<u>PLAN</u>

SEDIMENT BASIN

TEMPORARY DITCHES FOR CUT & FILL SECTIONS

PASSED January 1. 2013

PASSED January 1. 2013

Michael Brand

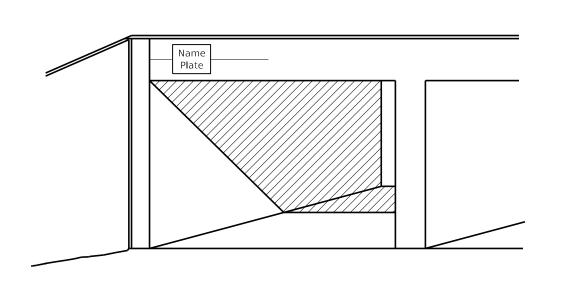
ENGINEER OF POLICY AND PROCEDURES

APPROVED January 1, 2013

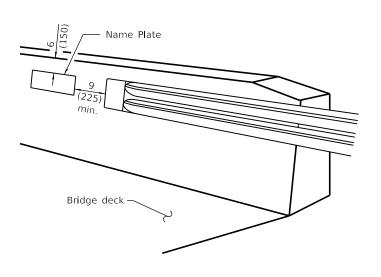
TEMPORARY EROSION CONTROL SYSTEMS

(Sheet 2 of 2)

STANDARD 280001-07



Bridge deck Approach slab



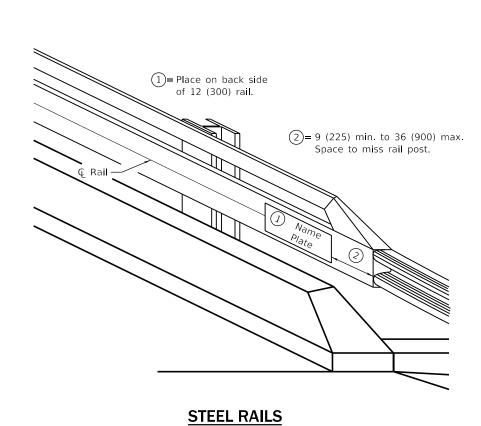
MULTI-SPAN CULVERTS

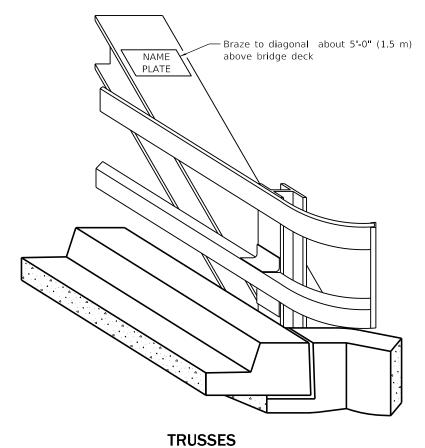
(Unless otherwise noted on the plans, name plates are not required for stuctures less than 20' (6.1 m) in length)

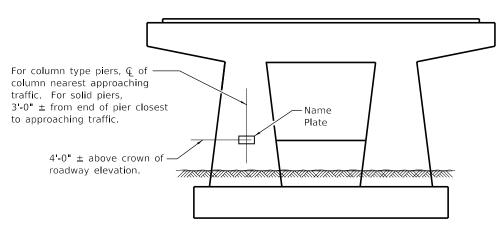


<u>PARAPET</u>

(Terminated at end of bridge)







PIERS ON FAI ROUTES

GENERAL NOTES

On one-way traffic structures, place name plate on right side of approach end. On two-way traffic structures, place name plate on right side of approach end while looking in the direction of increasing stationing.

All dimensions are in inches (millimeters) unless otherwise shown.

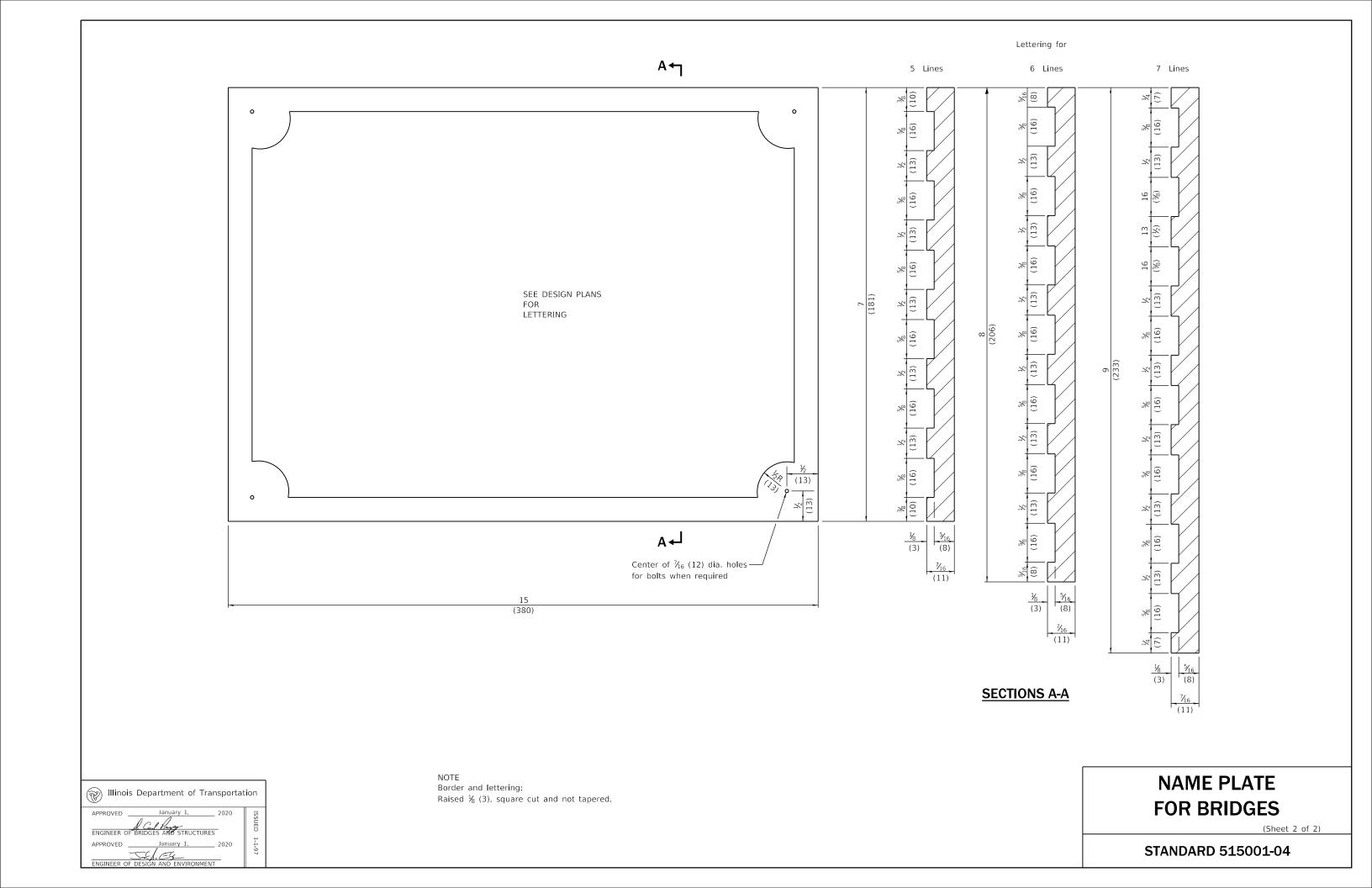
Illinois Department of Transportat	ion
APPROVED January 1, 2020 Of Long- ENGINEER OF BRIDGES AND STRUCTURES	ISSUED
APPROVED January 1, 2020 ENGINEER OF DESIGN AND ENVIRONMENT	1-1-97

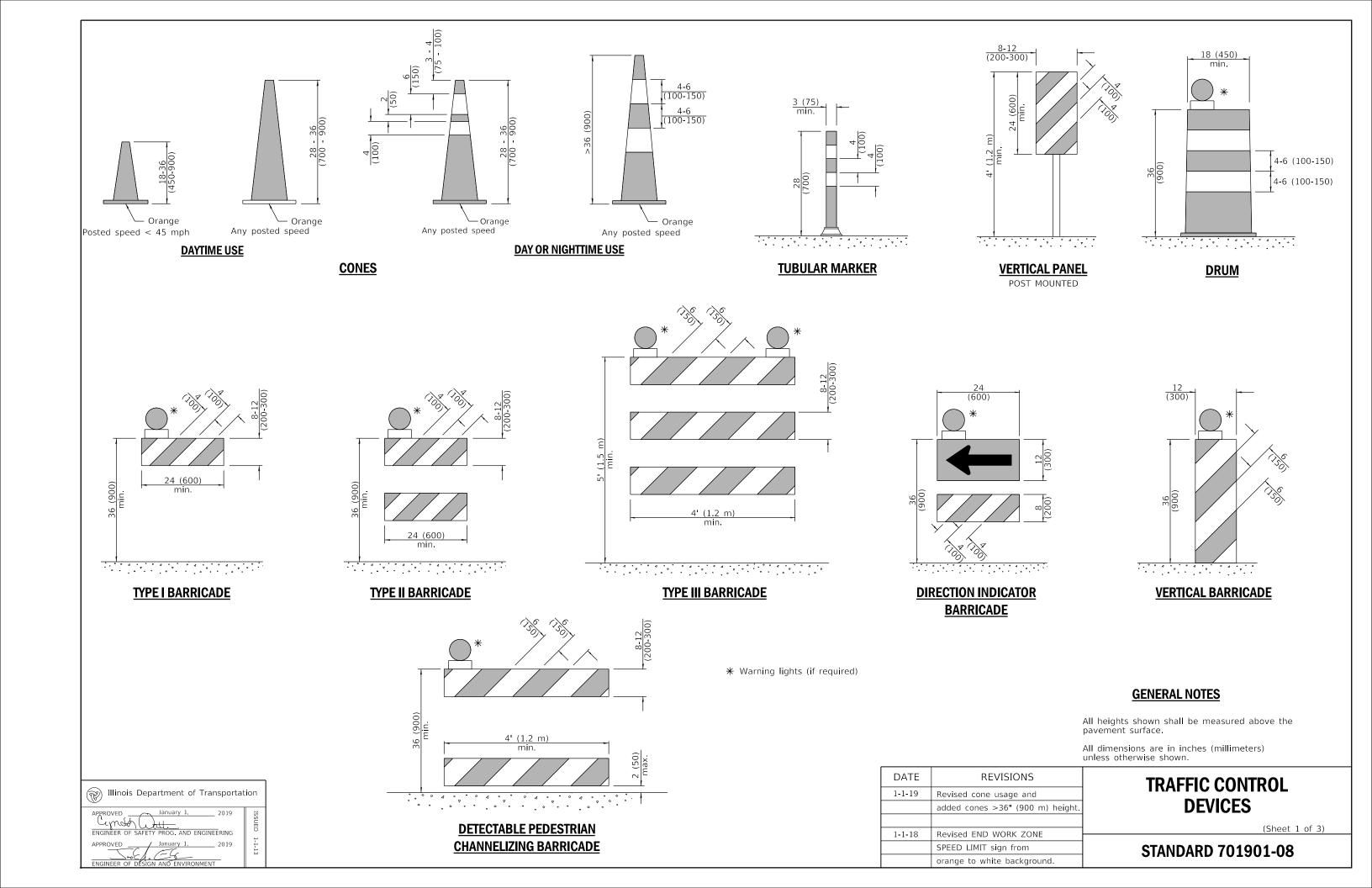
DATE	REVISIONS	
1-1-20	Revised F-shape to constant slope	
	parapet.	
1-1-09	Switched units to English (metric).	
	Added pier detail.	
1-1-02	Removed Placing: note on sht. 2.	
	Added braze note on sht. 1.	

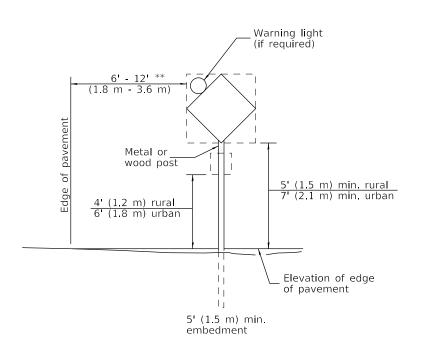
NAME PLATE FOR BRIDGES

(Sheet 1 of 2)

STANDARD 515001-04

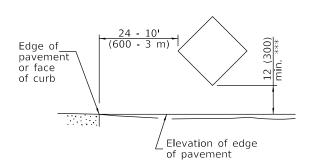






POST MOUNTED SIGNS

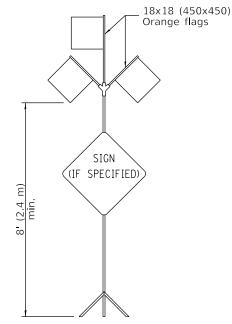
** When curb or paved shoulder are present this dimension shall be 24 (600) to the face of curb or 6' (1.8 m) to the outside edge of the paved shoulder.



SIGNS ON TEMPORARY SUPPORTS

*** When work operations exceed four days, this dimension shall be 5' (1.5 m) min. If located behind other devices, the height shall be sufficient to be seen completely above the devices.

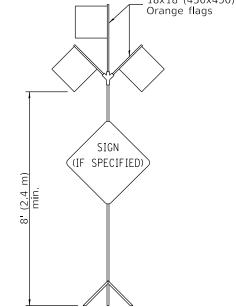
8 (200) Federal series C

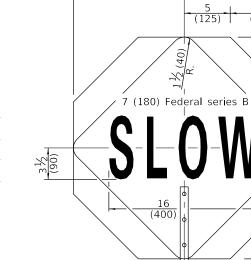


HIGH LEVEL WARNING DEVICE

5 (125)

(175)





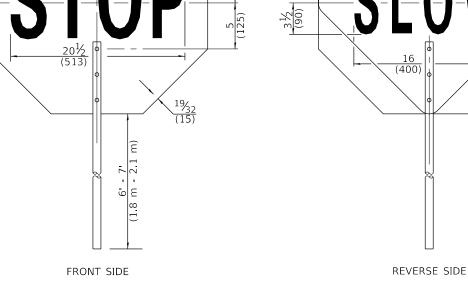
(600)



W12-I103-4848

WIDTH RESTRICTION SIGN

XX'-XX" width and X miles are variable.



FLAGGER TRAFFIC CONTROL SIGN

ROAD CONSTRUCTION NEXT X MILES

END CONSTRUCTION

G20-I104(0)-6036

G20-I105(0)-6024

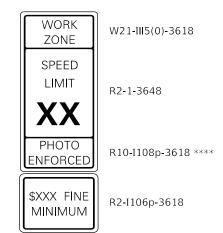
This signing is required for all projects 2 miles (3200 m) or more in length.

ROAD CONSTRUCTION NEXT X MILES sign shall be placed 500' (150 m) in advance of pro-

END CONSTRUCTION sign shall be erected at the end of the job unless another job is within 2 miles (3200 m).

Dual sign displays shall be utilized on multilane highways.

WORK LIMIT SIGNING



Sign assembly as shown on Standards or as allowed by District Operations.



This sign shall be used when the above sign assembly is used.

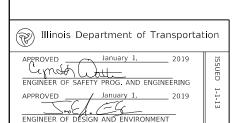
HIGHWAY CONSTRUCTION SPEED ZONE SIGNS

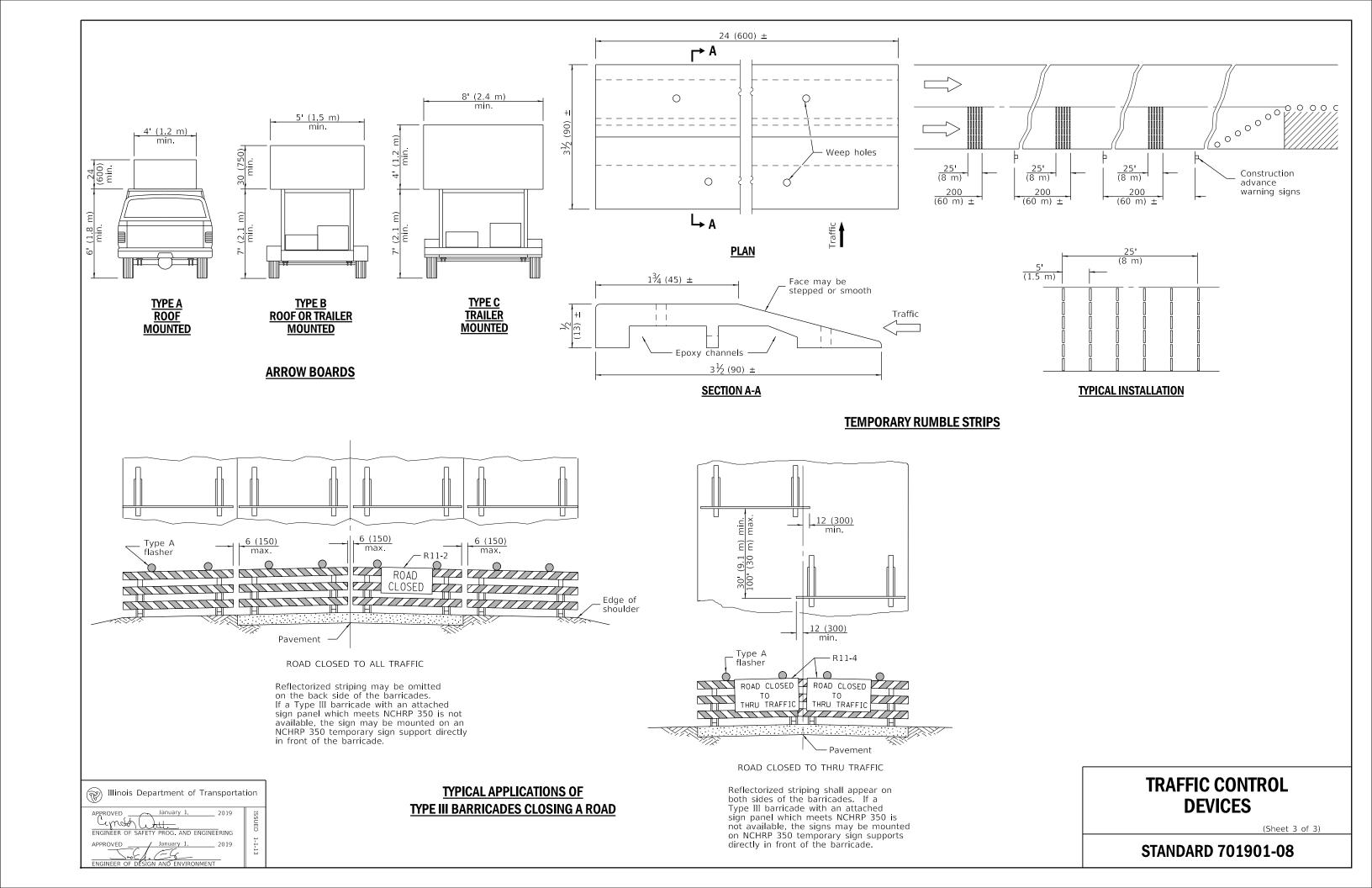
**** R10-I108p shall only be used along roadways under the juristiction of the State.

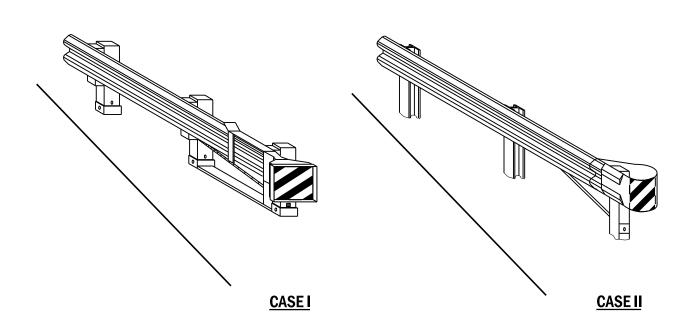
TRAFFIC CONTROL **DEVICES**

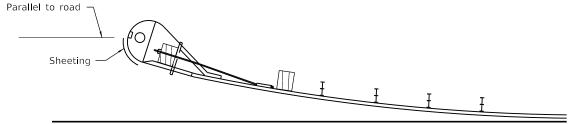
(Sheet 2 of 3)

STANDARD 701901-08

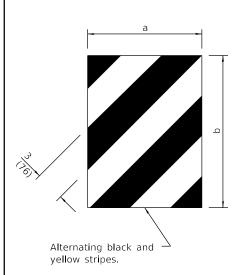


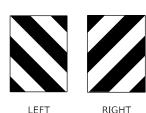






SHEETING POSITION: CASE II





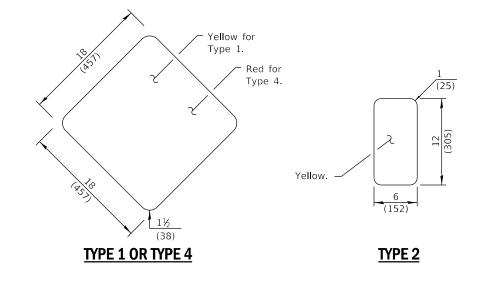
DIMENSION	CASE I	CASE II
а	*	18 (450)
b	*	16 (406)

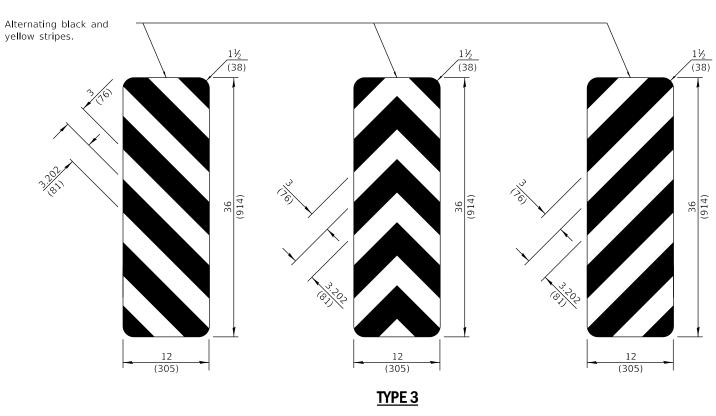
DIRECT APPLIED

TERMINAL MARKER DETAILS

POST MOUNTED

* The width and height (a, b) of the terminal marker shall be within approximately 1 (25) of the outer edge of the terminal end.





GENERAL NOTES

See detail on Standard 729001 for mounting markers to posts.

All dimensions are in inches (millimeters) unless otherwise shown.

DATE	REVISIONS	
1-1-17	Omitted minimum reflective	
	area requirement for	
	terminal marker.	
4-1-16	Renumbered standard from	
	635006.	

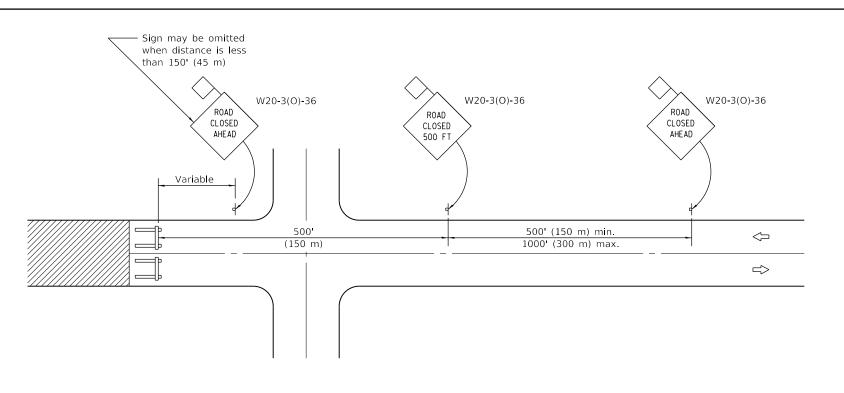
OBJECT MARKER DETAILS

OBJECT AND TERMINAL MARKERS

STANDARD 725001-01

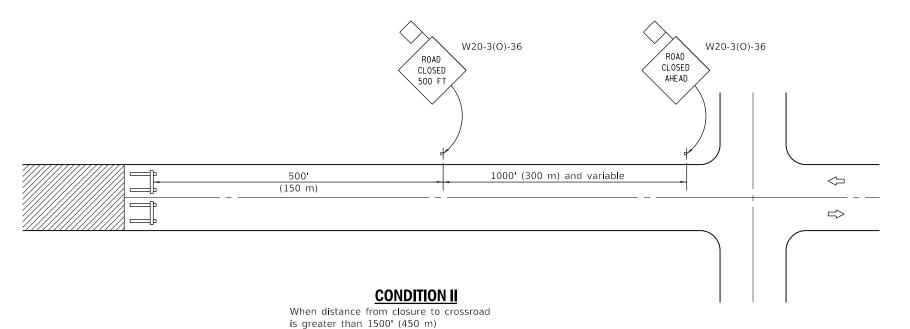
Color:	Black	/ Yellow	reflectorize

Illinois Department of Transportation ENGINEER OF OPERATIONS APPROVED



CONDITION I

When distance from closure to crossroad is less than 1500' (450 m)



SYMBOLS



Work area



Type III Barricade



Sign with 18x18 (450x450) min. orange flag attached

Type III Barricades and R11-2-4830 signs shall be positioned as shown in "Road Closed To All Traffic" detail on Highway Standard 701901.

GENERAL NOTES

Two Type A Low Intensity Flashing Lights shall be used on each approach in advance of the work area during hours of darkness. One light shall be installed above the barricades and the other above the first advance warning sign.

All warning signs shall have minimum dimensions of $36 \times 36 \ (900 \times 900)$ and have a black legend on an orange reflectorized background.

When fluorescent signs are used, orange flags are not required.

Longitudinal dimensions may be adjusted to fit field conditions.

When the distance between the barricade and the intersection is between 1500' (450 m) and 2000' (600 m), the advance sign shall be placed at the intersection. When the distance between the barricade and the intersection is over 2000' (600 m), an additional sign shall be placed at the intersection. The additional sign shall give the distance to the barricade in miles or fractions of a mile.

All dimensions are in inches (millimeters) unless otherwise shown.

DATE	REVISIONS	
1-1-12	Omitted two notes from	
	GENERAL NOTES.	
1-1-09	Switched units to	
	English (metric).	

TYPICAL APPLICATION OF TRAFFIC CONTROL DEVICES FOR CONSTRUCTION ON RURAL LOCAL HIGHWAYS

STANDARD B.L.R. 21-9

