

Information for File #MVP-2014-02015-JWD: Wisconsin Southern Railroad, Prairie Du Chien Yard Expansion

APPLICANT: Wisconsin Southern Railroad (WSR), Timothy Karp
1890 East Johnson Street, Madison, Wisconsin 53704

Corps Contact: John W. Derinzy

Corps Address: Southwest Section Field Office
1114 South Oak Street
La Crescent, Minnesota 55947

E-Mail: John.W.Derinzy@usace.army.mil

Phone: (651) 290-5905

Primary County: Crawford County

Project Location: NE ¼ of NE ¼ of Section 36, Township 07 North, Range 07 West

Information Complete On: August 5, 2014

Posting Expires On: September 15, 2014

Authorization Type: LOP-06-WI

This application is being reviewed in accordance with the practices for documenting Corps jurisdiction under Sections 9 & 10 of the Rivers and Harbor Act of 1899 and Section 404 of the Clean Water Act identified in Regulatory Guidance Letter 07-01. We have made a preliminary determination that the aquatic resources that would be impacted by the proposed project are regulated by the Corps of Engineers under Section 404 of the Clean Water Act. Our jurisdictional review and final jurisdictional determination could result in modifications to the scope of the project's regulated waterbody/wetland impacts and compensatory mitigation requirements identified above. An approved jurisdictional determination will be made prior to reaching a permit decision, and will be posted on the St. Paul District web page at <http://www.mvp.usace.army.mil/>.

PROJECT DESCRIPTION and PURPOSE:

The applicant, Wisconsin Southern Railroad (WSR), is proposing to construct new storage tracks at the transloader yard in Prairie Du Chien, directly south of eastbound U.S. Highway 18 (USH-18) and west of Main Street. These new tracks will be in a ladder formation consisting of 6 new lines and upgrading an existing transload facility.

This is a new project that proposes to discharge fill material into approximately 1.83-acres of wetlands. Wetlands will be impacted by discharging fill material consisting of base material and soil to form the foundation for the rail lines.

The primary purpose of the transloading facility is for transfer of goods from trucks onto railcars for distribution to end users throughout the country. The demand for sand used in the fracking industry has increased immensely from 350 railcars being shipped annually in 2009 to a projected 5000 railcars annually in 2015. Due to this rise in demand, the existing tracks and loading facility lack the capacity to load a standard 100 railcar unit train.

Current operations require railcars to be stored on St Feriole Island, 0.5-mile to the north of existing transloading facility while eight railcars at a time can be loaded. The full and empty railcars must be shuttled back and forth and staged on St Feriole Island during the loading, shuttling, cleaning and maintenance of the rest of the 100 railcar unit until the entire train line can be moved on for delivery of products. As a result of current operations, WSR is unable to access and service several customers while loading the 100 railcar unit train.

While assembling the unit trains, the train repeatedly blocks several road crossings on the island that receives heavy tourist and local traffic. Blockage of the access roads creates a logistical problem for emergency vehicle access (when needed), cuts off access for recreational use, and is the only access road to the City of Prairie Du Chien's water treatment plant.

The purpose of the proposed project would be to provide for more staging and storage area for the 100 railcar unit train.

The project does not impact any listed threatened and endangered species or their preferred habitat. The entire project site is located within the FEMA 100-year floodplain.

There are no tribal trusts involved and an archaeological survey has been conducted of the site resulting in no findings of archaeological or cultural resources.

NAME, AREA, and TYPES of WATERS (INCLUDING WETLANDS) SUBJECT to LOSS: Wetland Area 1 is a wet meadow wetland consisting of 1.65-acres and Wetland Area 2 is a floodplain forest wetland consisting of 0.18-acre.

ALTERNATIVES CONSIDERED: Alternative sites that were considered for the project needed to meet the following conditions:

- a) Located along the WSR rail line,
- b) Large enough to store at least 136 railcars, and
- c) Located within between Prairie du Chien and Boscobel, WI to maintain a reasonable trucking distance from the sand mine.

Fourteen (14) off-site locations were considered for the trans loading facility. Characteristics that were considered in determining the feasibility of the site include but are not limited to: trucking distance from the existing sand mine, wetlands, floodplain, topographic challenges, acreage available, and historical restrictions. All of the off-site locations were rejected by the applicant due to various reasons. A copy of the alternative analysis report may be obtained by contacting the Corps.

Four (4) on-site alternatives for the rail storage tracks were considered based on practicability and avoidance and minimization of wetland impacts to the maximum extent feasible, yet still meeting the purpose and need of the project. The “no-build” option was one of the alternatives considered.

No-build Alternative (Option 1)

The no-build alternative would not construct the rail siding and trans loading facility. Not constructing the facility would not address the railcar storage needs. The no-build alternative does not meet the project purpose and need, and therefore was rejected by the applicant.

Alternative Layout (Option 2)

Option 2 proposes to construct the six rail storage tracks directly adjacent to the Main Street road right-of-way. By positioning the rail tracks and toe of slope directly adjacent to the right-of-way, the western-most portion of the delineated wetland would remain undisturbed. Though utilizing this alignment, the rail tracks would need to be designed longer in order to maintain the desired rail storage capacity, and hence would result in additional wetland impacts to the north. Since this layout option does not significantly decrease the overall wetland impacts, and would increase the distance of rail, and hence construction costs, that would be required to reach the eastern-most track, which would not be useable for storage, Option 2 was rejected by the applicant.

Alternative Layout (Option 3)

Option 3 proposes to construct the rail side slopes at a 3:1 slope ratio. Reducing the side slopes from the preferred 4:1 ratio narrows the slope intercepts and therefore reduces wetland impacts by approximately five feet on each side of the rail, considered in cross-sectional view. Utilizing the 3:1 side slopes would reduce wetland impacts by approximately 0.18 acres (8,000 square feet) compared to use of 4:1 slopes. Wetland impacts could be further reduced if designed with a 2:1 slope

ratio, therefore Option 3 was therefore rejected by the applicant, as it does not reduce wetland impacts to the maximum extent practicable.

Applicant Proposed Layout (Option 4)

The applicant proposed rail layout is a six-track ladder configuration with the longest track being a nearly straight line from the existing main line, with the remaining tracks tapering in length to the east. The longest track is approximately 1,000 track feet in length with the shortest being approximately 600 track feet. The side slopes of the rail embankment have been designed with 2:1 slopes from the rail shoulder. This slope narrows the slope intercepts and reduces wetland impacts by approximately an additional 8,000 square feet (0.18 acres) as compared to the 3:1 side-slopes in Option 3. Wetland impacts associated with Option 4 totals 1.83 acres of impact due to the new rail storage. The impacts will be in areas classified as Type 2 fresh (wet) meadow (PEMB/E2K) and Type 1 floodplain forest (PFO1A/T3K).

COMPENSATORY MITIGATION: Replacement is proposed at 1.45:1 (1.45 acres of mitigation for each 1 acre of wetland impact), for impacts that are “in-kind” and “out of place” in relation to the mitigation bank. WSR proposes to satisfy its compensatory wetland mitigation requirement for the 1.83 acres of unavoidable wetland loss in the Upper Mississippi-Maquoketa-Plum Bank Service Area (BSA) by purchasing 2.65 bank credits. Since there are no mitigation banks within the BSA where impacts are proposed, credits are proposed to be purchased from a bank outside of the BSA, but still within the Mississippi River Basin. The wetland replacement is considered “out of place” because the impact site will not be within the same BSA as the mitigation bank site, therefore the base ratio of 1.2:1 was increased by 0.25, resulting in the proposed 1.45:1 mitigation ratio. WSR entered into an agreement to purchase 1.75 bank credits from Tallgrass Land Conservation – Bass Creek Wetland Mitigation, LLC (TLC – Bass Creek), located in the Rock BSA of the Mississippi River Basin. All 1.75 credits are of Floodplain Forest community type, and considered “inkind” for the proposed impacts to Hardwood Swamp community. Since Floodplain Forest community type is an increase in wetland functionality from the proposed impacts Fresh Wet Meadow impacts, it is proposed that the “out-of-kind” mitigation ratio increase be waived. Since no other bank credits are available for purchase in the Mississippi River Watershed, WSR proposes to purchase the 0.9 deficient bank credits as soon as they become available.

DRAWINGS: See attached drawings titled “MVP-2014-02015-JWD: WSR-PDC Yard Expansion, Pages 1-9 of 9”.



Sources: Esri, DeLorme, HERE, TomTom, Intermap, increment P Corp., GEBCO, USGS, FAO, NPS, NRCAN, GeoBase, IGN, Kadaster NL, Ordnance Survey, Esri Japan, METI, Esri China (Hong Kong), swisstopo, and the GIS User Community

Path: P:\UZ\W\waps11286763-env-stud-reg\31-env-rt\Maps\Permit Maps\Fig 1 - Topo.mxd



10 North Bridge Street
 Chippewa Falls, WI 54729-2550
 PHONE: 715.720.6200
 Toll Free: 800.472.5881
 Fax: 888.908.8166
 www.sehinc.com

Project: WATPS 128676
 Print Date: 8/1/2014
 Map by: rbeduhn
 Projection: NAD83_UTM_Zone_15N
 Source: SEH, ESRI, Bing

Site Location
 PdC Unit Train Sand Transload Facility
 Crawford Co, WI

Figure
 1

This map is neither a legally recorded map nor a survey map and is not intended to be used as one. This map is a compilation of records, information, and data gathered from various sources listed on this map and is to be used for reference purposes only. SEH does not warrant that the Geographic Information System (GIS) Data used to prepare this map are error free, and SEH does not represent that the GIS Data can be used for navigational, tracking, or any other purpose requiring exacting measurement of distance or direction or precision in the depiction of geographic features. The user of this map acknowledges that SEH shall not be liable for any damages which arise out of the user's access or use of data provided.



Path: P:\UZ\W\atps\1128676\3-env-stud-reg\31-env-rt\Maps\Fig 2- Aerial Photo.mxd

Source: Esri, DigitalGlobe, GeoEye, i-cubed, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community

	<p>10 North Bridge Street Chippewa Falls, WI 54729-2550 PHONE: 715.720.6200 Toll Free: 800.472.5881 Fax: 888.908.8166 www.sehinc.com</p>	<p>Project: WATPS 128676 Print Date: 7/16/2014 Map by: rbeduhn Projection: NAD83_UTM_Zone_15N Source: SEH, ESRI, Bing</p>	<p>2012 Aerial Photography PdC Unit Train Sand Transload Facility Crawford Co, WI</p>	<p>Figure 2</p>
---	--	---	--	------------------------

This map is neither a legally recorded map nor a survey map and is not intended to be used as one. This map is a compilation of records, information, and data gathered from various sources listed on this map and is to be used for reference purposes only. SEH does not warrant that the Geographic Information System (GIS) Data used to prepare this map are error free, and SEH does not represent that the GIS Data can be used for navigational, tracking, or any other purpose requiring exacting measurement of distance or direction or precision in the depiction of geographic features. The user of this map acknowledges that SEH shall not be liable for any damages which arise out of the user's access or use of data provided.



	Acreage
Project Area	9.07
Wetland Area	3.97
Forested	1.35
Meadow	2.62

Path: P:\UZ\W\wps\1286763-env-stud-reg\31-env-tp\Maps\Permit Maps\Fig 2- Wetland Results.mxd



10 North Bridge Street
 Chippewa Falls, WI 54729-2550
 PHONE: 715.720.6200
 Toll Free: 800.472.5881
 Fax: 888.908.8166
 www.sehinc.com

Project: WATPS 128676
 Print Date: 8/1/2014
 Map by: rbeduhn
 Projection: NAD83_UTM_Zone_15N
 Source: USDA NAIP

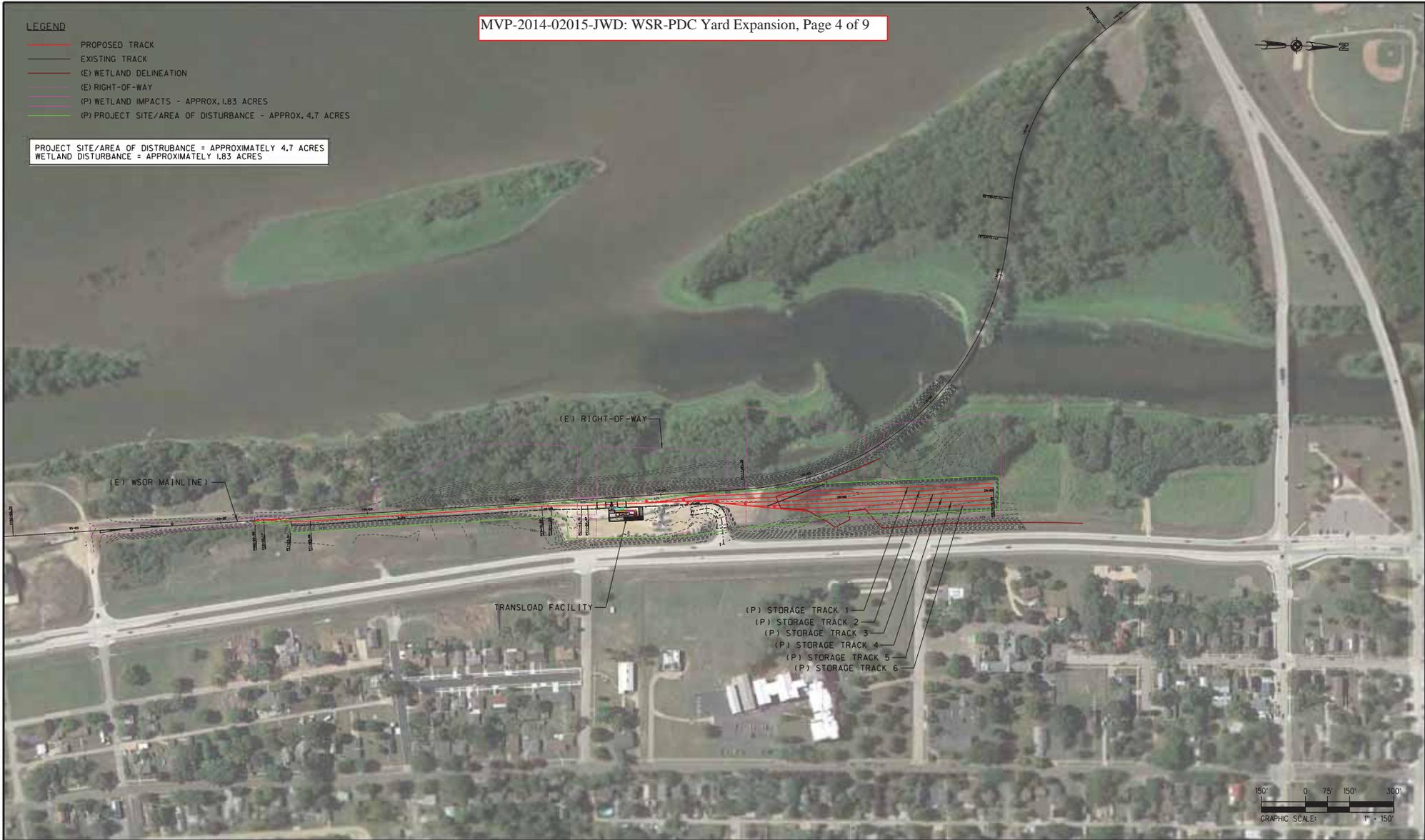
Wetland Boundary Map
 PdC Unit Train Sand Transload Facility
 Crawford Co, WI

Figure
 2

This map is neither a legally recorded map nor a survey map and is not intended to be used as one. This map is a compilation of records, information, and data gathered from various sources listed on this map and is to be used for reference purposes only. SEH does not warrant that the Geographic Information System (GIS) Data used to prepare this map are error free, and SEH does not represent that the GIS Data can be used for navigational, tracking, or any other purpose requiring exacting measurement of distance or direction or precision in the depiction of geographic features. The user of this map acknowledges that SEH shall not be liable for any damages which arise out of the user's access or use of data provided.

- LEGEND**
- PROPOSED TRACK
 - EXISTING TRACK
 - (E) WETLAND DELINEATION
 - (E) RIGHT-OF-WAY
 - (P) WETLAND IMPACTS - APPROX. 1.83 ACRES
 - (P) PROJECT SITE/AREA OF DISTURBANCE - APPROX. 4.7 ACRES

PROJECT SITE/AREA OF DISTURBANCE = APPROXIMATELY 4.7 ACRES
 WETLAND DISTURBANCE = APPROXIMATELY 1.83 ACRES



Plot of files: WATCO_pdc_2006pencil9
 Files: D:\projects\Wsrpdc\MA_DAL_PDC_ML_Spec>Loading_Site_VCAD\Rail\Enb\Sheeted Layouts.dgn
 Time: 5/13/2014 11:59 AM
 Date: 05/13/2014

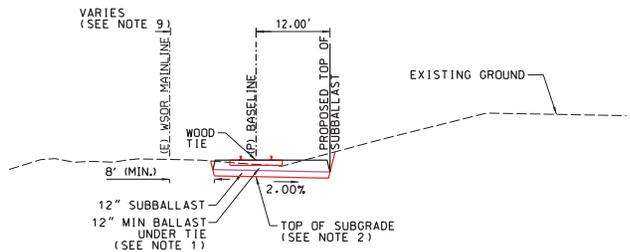
INFORMATION CONFIDENTIAL;
 ALL PLANS, DRAWINGS, SPECIFICATIONS, AND/OR INFORMATION
 FORMED HEREIN SHALL
 REMAIN THE PROPERTY OF WATCO
 COMPANIES, LLC, AND SHALL BE
 HELD CONFIDENTIAL AND SHALL
 NOT BE USED FOR ANY PURPOSE
 UNLESS PROVIDED FOR IN
 AGREEMENTS WITH WATCO
 COMPANIES, LLC.

DESIGNED BY	DRW
DRAWN BY	DRW
CHECKED BY	JLW
APPROVED BY	JLW
DATE	05/10/2014

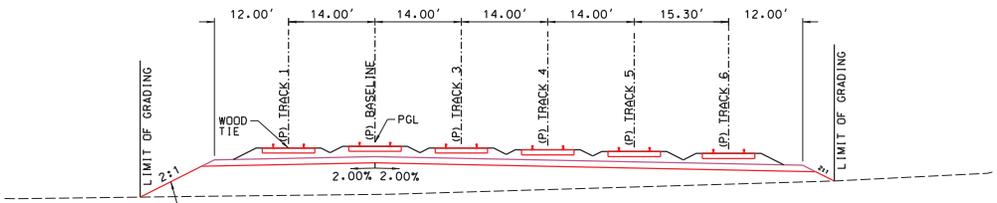


Project Layout

Figure 3

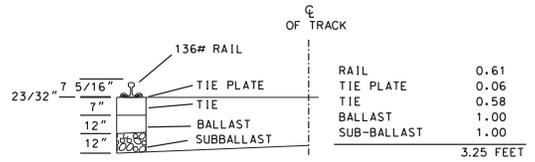


TYPICAL - BASELINE TRACK
 BASELINE STA. 0+00.00 TO STA. 13+34.59

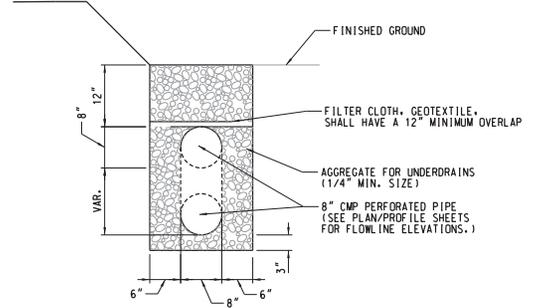
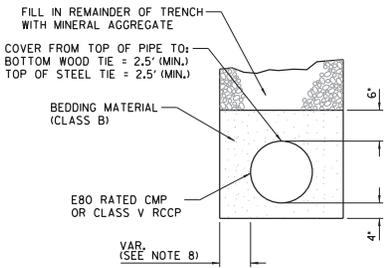


TYPICAL - STORAGE TRACKS
 BASELINE STA. 13+34.59 TO STA. 25+15.99

- NOTES:
1. ALL WORK PERTAINING TO PLACEMENT OF BALLAST, TIES AND TRACK SHALL BE BY TRACK CONTRACTOR.
 2. TOP OF SUBGRADE PLANE SHALL BE 3.25' BELOW TOP OF RAIL AT CENTERLINE OF TRACK IN NORMAL CROWN.
 3. WOOD TIES TO BE USED.
 4. PROTECT THE EXISTING MAIN TRACK IN PLACE AT ALL TIMES, UNLESS OTHERWISE NOTED. NO EXCAVATION TO OCCUR WITHIN 8' OF EXISTING TRACK CENTERLINES.
 5. FILL AND CUT SLOPES SHALL BE AS INDICATED ON SITE EXPLICIT CONSTRUCTION PLANS AND PROFILES.
 6. WHERE DOUBLE TRACK CROSSES A ROADWAY, ADJUST BALLAST SECTION TO PROVIDE UNIFORM ROADWAY PROFILE.
 7. ALL EXPOSED SURFACES SHALL BE COVERED WITH 4" TOPSOIL AND SEEDING.
 8. WHEN TRENCH < 5', WIDTH = 9" + OD + 9", WHEN 5' < TRENCH, WIDTH = 18" + OD + 18".
 9. STA. 1+89.06 TO STA. 9+78.86 IS AT 14' TRANSITION FROM 14' TO 21.38' STA. 9+78.86 STA. 11+34.47 TRANSITION FROM 21.38' TO 31.81' STA. 11+34.47 TO STA. 16+70.81



TYPICAL RAIL SECTION



UNDERDRAIN & LATERAL CULVERT TRENCHING DETAIL
 N.T.S.

Plot of files: WATCO.pdf_300dpi.plt
 Files: D:\projects\Wsr\m\041_PDC_M_Sand_Loading_Site_V040\RailSheet\VC-5001_Typical.dwg
 Time: 2/4/25 PM
 Date: 07/09/2014

REV	DATE	DESCRIPTION	BY	APP

DESIGNED BY	DRW
DRAWN BY	DRW
CHECKED BY	JLW
APPROVED BY	JLW
DATE	07/09/2014



WISCONSIN SOUTHERN RAILROAD
 PRAIRIE DU CHIEN, WI
 PDC UNIT TRAIN SAND TRANSLOAD FACILITY
 TYPICAL SECTIONS
 TRACK AND DRAINAGE
 SHEET 01 OF 01

CONTRACT NO.	14.043
DRAWING NO.	RC-01
REVISION	SHEET NO. 007
SCALE	NOT TO SCALE

BID SUBMITTAL

INFORMATION CONFIDENTIAL:
 ALL PLANS, DRAWINGS, SPECIFICATIONS, AND/OR INFORMATION CONTAINED HEREIN SHALL REMAIN THE PROPERTY OF WATCO COMPANIES, LLC, AND SHALL BE HELD CONFIDENTIAL AND SHALL NOT BE USED FOR ANY PURPOSES UNLESS OTHERWISE AGREED TO BY WATCO COMPANIES, LLC.



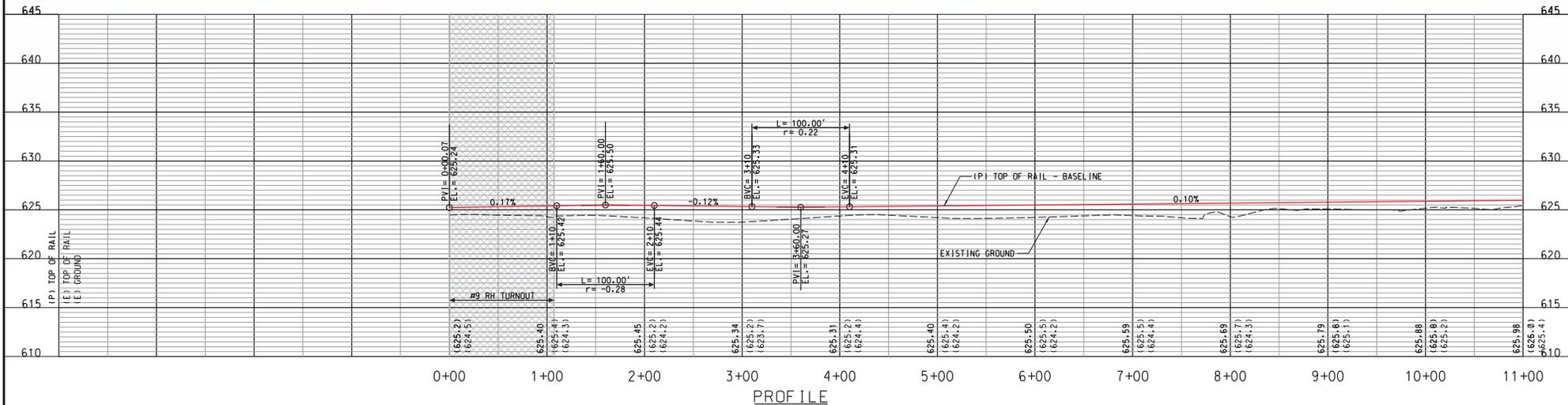
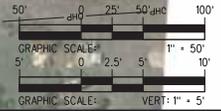
NOTES:

1. FOR GEOMETRY DATA, SEE DRAWING NO. RX-01
2. FOR TYPICAL CROSS-SECTIONS, SEE DRAWING NO. RX-01
3. FOR EARTHWORK CROSS-SECTIONS, SEE DRAWING NOS. RX-01 THRU RX549D3
4. FOR SURVEY CONTROL, SEE DRAWING NO. 1
5. CONTRACTOR TO FIELD VERIFY FIBER OPTIC AND ALL OTHER UTILITIES
6. ALL STATIONING IS BASED ON THE BASELINE UNLESS NOTED OTHERWISE
7. RIGHT-OF-WAY INFORMATION IS BASED ON WSDOT STATION & TRACK MAPS
8. ALL DRAINAGE PIPE EXTENSIONS SHALL BE PER WISCONSIN DOT STANDARDS
9. MILE POSTS & STATIONS FOR UTILITY LOCATIONS ARE APPROXIMATE.
10. CONTRACTOR OR UTILITY AGENT TO VERIFY IN FIELD.

PLAN

TRACK LEGEND

- PROPOSED TRACK
- TRACK SHIFT (RELOCATE TO)
- EXISTING TRACK (TO REMAIN)
- EXISTING TRACK (TO BE REMOVED)
- TRACK SHIFT (RELOCATE FROM)



PROFILE

BID SUBMITTAL

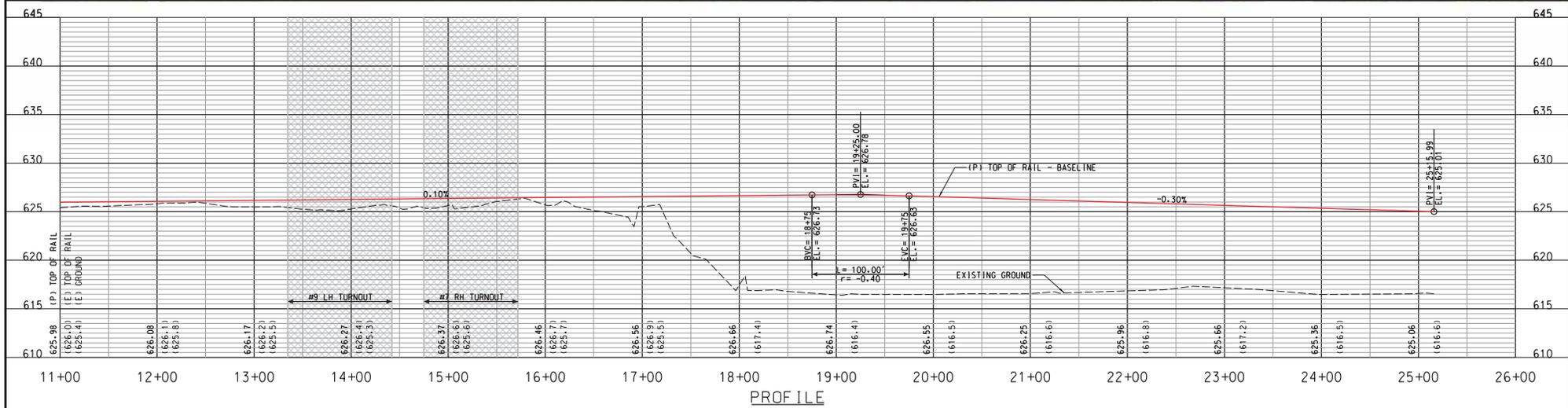
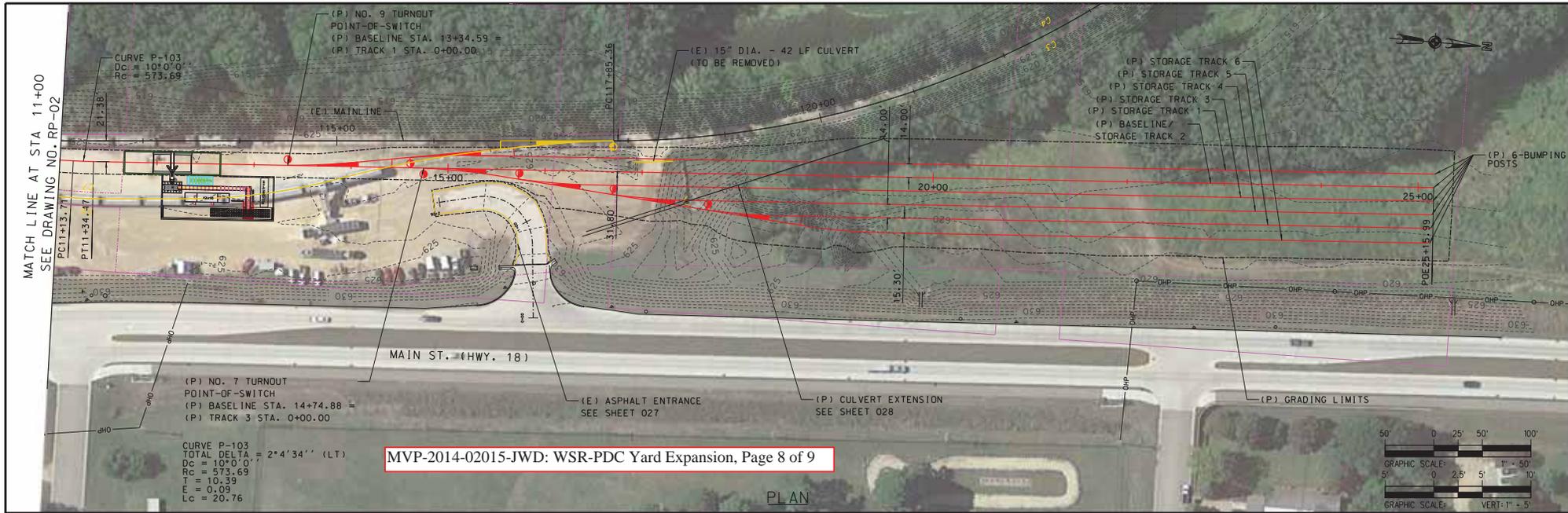
INFORMATION CONFIDENTIAL TO: ALL PLANS, DRAWINGS, SPECIFICATIONS, AND/OR INFORMATION FROM THIS PROJECT SHALL REMAIN THE PROPERTY OF WATCO COMPANIES, LLC, AND SHALL BE HELD CONFIDENTIAL AND SHALL NOT BE USED FOR ANY PURPOSES WITHOUT WRITTEN AGREEMENT WITH WATCO COMPANIES, LLC. WATCO

DESIGNED BY *DRW*
 DRAWN BY *DRW*
 CHECKED BY *JLW*
 APPROVED BY *JLW*
 DATE 07/09/2014



WISCONSIN SOUTHERN RAILROAD
 PRAIRIE DU CHIEN, WI
 PDC UNIT TRAIN SAND TRANSLOAD FACILITY
 BASELINE PLAN & PROFILE - SHEET 01 OF 02
 STA 0+00 TO STA 11+00

CONTRACT NO.	14.043
DRAWING NO.	RP-01
REVISION	SHEET NO. 008
SCALE	AS SHOWN



REV	DATE	DESCRIPTION	BY	APP

DESIGNED BY *DRW*

DRAWN BY *JLW*

CHECKED BY *JLW*

APPROVED BY *JLW*

DATE 07/09/2014

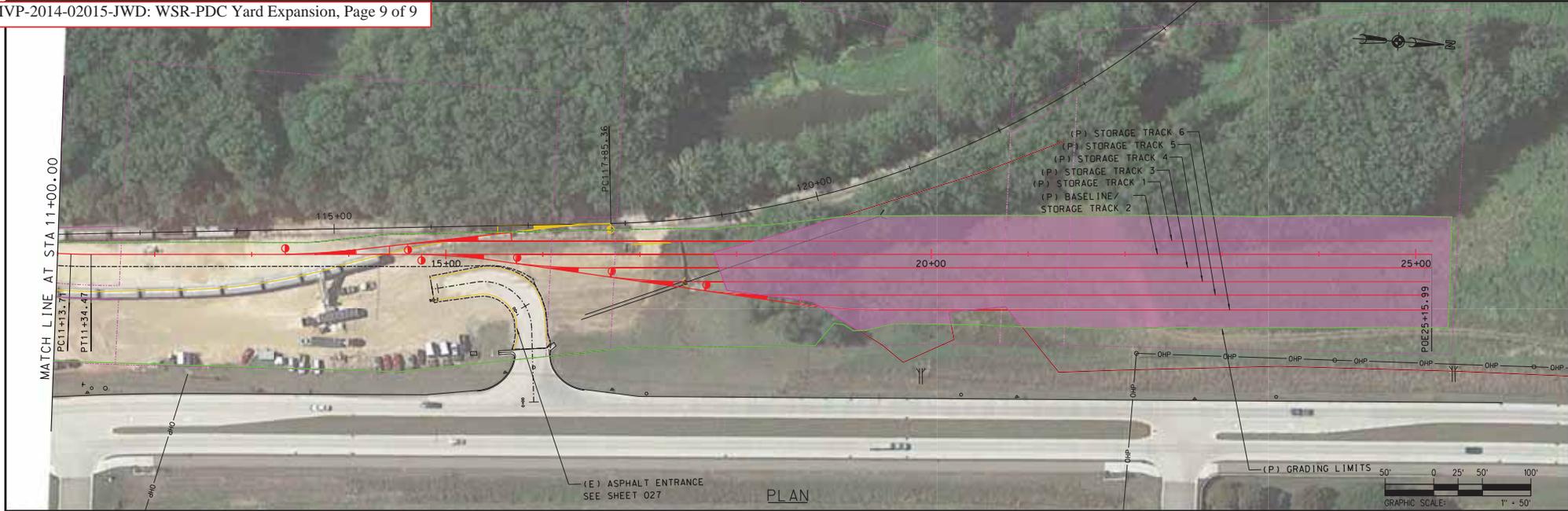
WATCO
TERMINAL & PORT
SERVICES

WS

WISCONSIN SOUTHERN RAILROAD
PRAIRIE DU CHIEN, WI
PDC UNIT TRAIN SAND TRANSLOAD FACILITY
BASELINE PLAN & PROFILE - SHEET 02 OF 02
STA 11+00 TO STA 25+16

CONTRACT NO.	14.043
DRAWING NO.	RP-02
REVISION	SHEET NO. 009
SCALE	AS SHOWN

Plot of files: WATCO.pdf_20060219
Files (D:\projects\Watco\MA_DAL_PDC_WI_Sand_Load\Sheet\VC-7002-PP.dgn
Time: 2:45:05 PM
Date: 07/09/2014



LEGEND

- PROPOSED TRACK
- EXISTING TRACK
- (E) WETLAND DELINEATION
- (E) RIGHT-OF-WAY
- (P) WETLAND IMPACTS - APPROX. 1.83 ACRES
- (P) PROJECT SITE/AREA OF DISTURBANCE - APPROX. 4.7 ACRES

PROJECT SITE/AREA OF DISTURBANCE = APPROXIMATELY 4.7 ACRES
 WETLAND DISTURBANCE = APPROXIMATELY 1.83 ACRES

DESIGNED BY *DRW*
 DRAWN BY *DRW*
 CHECKED BY *JLW*
 APPROVED BY *JLW*
 DATE 08/01/2014



Wetland Impacts

Figure 4

P:\01 - View - WATCO.ppt_2006.ppt
 Files (0) \watsrv\watsrv\04_041_PDC_01_Spec_Landing_Site_V040\Rail\Enb\Wetland_Delineation_P\W01.dwg
 Times: 5/10/16 AM
 Date: 08/01/2014

INFORMATION CONFIDENTIAL:
 ALL PLANS, DRAWINGS, SPECIFICATIONS, AND/OR INFORMATION
 FURNISHED HEREIN SHALL
 REMAIN THE PROPERTY OF WSR
 COMPANIES, LLC, AND SHALL BE
 HELD CONFIDENTIAL AND SHALL
 NOT BE USED FOR ANY PURPOSE
 UNAUTHORIZED FOR THE
 COMPANIES, LLC.