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Sheets	Bridge Plan
A.1	Title Sheet
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V.1	Estimated Quantities - Design 427
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A.3-J.5	Road Plans
C.1	Estimated Quantities - Road
C.3	Standard Plans - Road



PLANS OF PROPOSED IMPROVEMENT ON THE

PRIMARY ROAD SYSTEM WEBSTER COUNTY

BRIDGE REPAIR

2nd Ave S over CN RR &
Meriweather Dr, 0.8 mi. E
of N Jct. US 169
FRA No. 307384N

Refer to the Plan Sheets for list of applicable specifications.

Value Engineering Saves. Refer to Article 1105.13 of the Specifications.



Revisions

	TOTAL
	18
PROJECT IDENTIFICATION NUMBER	
26-94-926-010	
PROJECT NUMBER	
STPN-926-0(024)--2J-94	
R.O.W. PROJECT NUMBER	
PROJECT DIRECTORY NUMBER	
9492601026	

Standard Road Plans

Standard Road Plans are listed on Sheet Number C.3

Design Data Urban			
2nd Ave S / IA 926 (EB & WB)			
2023 AADT	2,850	V.P.D.	
Trucks	0	%	

Design Data Urban			
Meriweather Drive			
2023 AADT	1,640	V.P.D.	
Trucks	0	%	

Iowa DOT Bridges and Structures
Consultant Coordinator Contact:
Zahrah Alghalibi

Index of Seals		
Sheet No.	Name	Type
A.1	Casey V. Faber	Structural Design
A.3	Lucas D. Fatka	Roadway Design

Structural Design

I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the laws of the State of Iowa.

Signature Casey V. Faber Date 8-21-2026

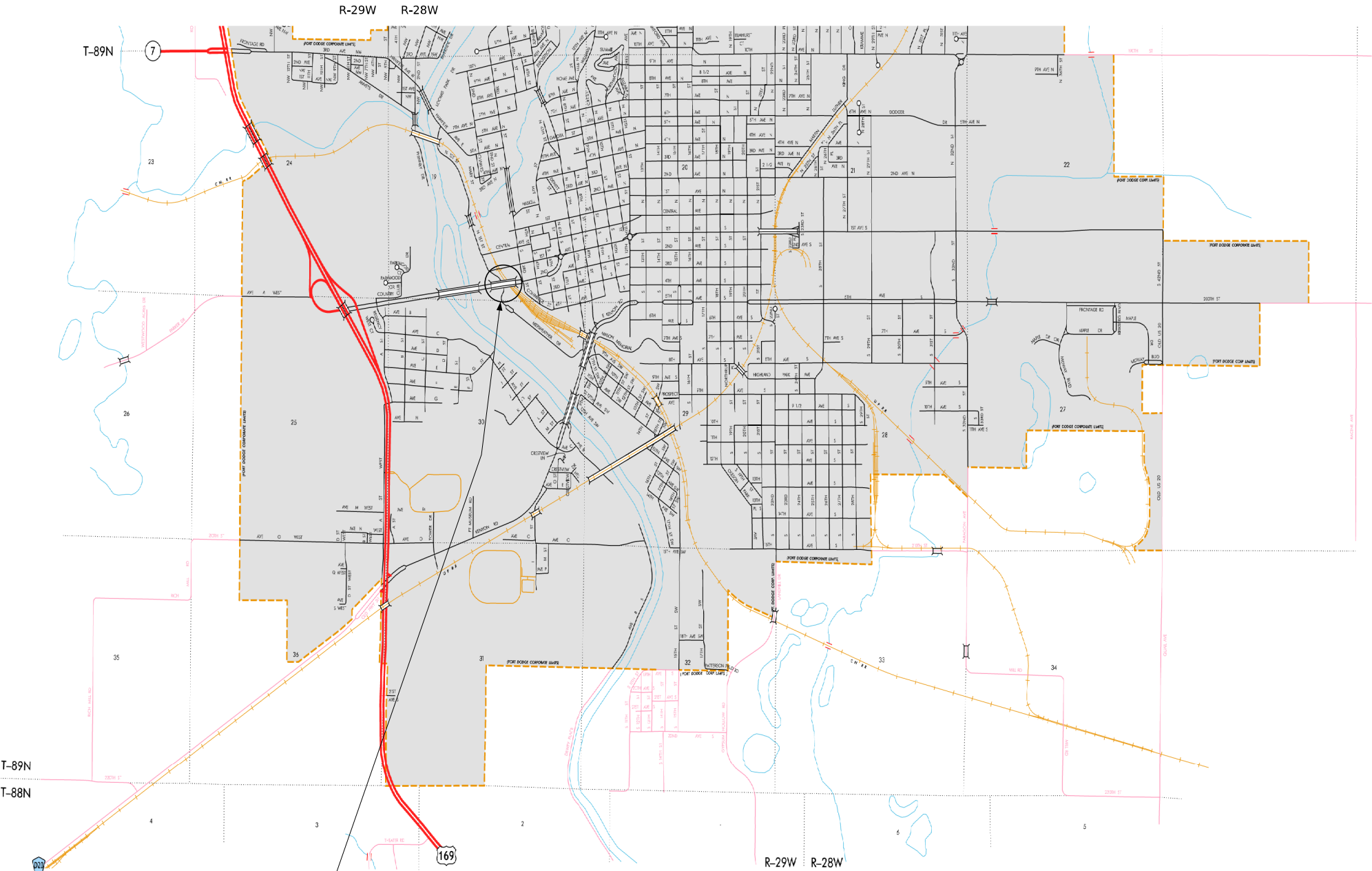
Printed or Typed Name

My license renewal date is December 31, 2027

Pages or sheets covered by this seal: A.1-A.2, V.1-V.3

LEGEND

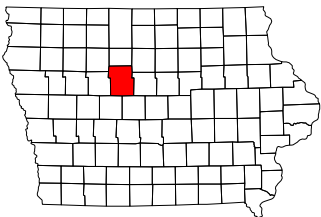
- INTERSTATE ROUTE
- FREEWAY OR EXPRESSWAY ROUTE
- U.S. NUMBERED ROUTE
- BUSINESS ROUTE
- STATE NUMBERED ROUTE
- UNSIGNED ROUTE
- COUNTY NUMBERED ROUTE
- SECONDARY ROAD OR ADJOINING CITY STREET
- CITY STREET
- PARK, INSTITUTION, OR FEDERAL ROAD
- RAILROAD
- CORPORATION LINE
- SECTION LINE
- CUL-DE-SAC
- SECTION, TOWNSHIP & RANGE NUMBERS



Part City of Fort Dodge Location Map

Not To Scale

Design No. 427
FHWA No. 52310



ESTIMATED BRIDGE REPAIR QUANTITIES				
ITEM NO.	ITEM CODE	ITEM	UNIT	TOTAL
1	2533-4980005	MOBILIZATION	LS	1
2	2595-0005120	RAILROAD PROTECTIVE LIABILITY INSURANCE FOR CHICAGO, CENTRAL & PACIFIC RR / CEDAR RIVER RR / IOWA NORTHERN RAILWAY	LS	1
3	2599-9999009	('LINEAR FEET' ITEM) Timber Protective Shield	LF	238

ESTIMATE REFERENCE INFORMATION		
ITEM NO.	ITEM CODE	ITEM DESCRIPTION
1	2533-4980005	MOBILIZATION --
2	2595-0005120	RAILROAD PROTECTIVE LIABILITY INSURANCE FOR CHICAGO, CENTRAL & PACIFIC RR / CEDAR RIVER RR / IOWA NORTHERN RAILWAY --
3	2599-9999009	Timber Protective Shield The Method of Measurement is Linear Feet. The Basis of Payment is per Linear Foot of Timber Protective Shield installed in accordance with this Plan. See Design Sheet No. 3 for additional information.

General Notes:

This design is for repairs to the existing 654'-8" x 57'-0" Continuous Welded Girder Bridge on 2nd Ave. South over Meriweather Drive and CN RR in the City of Fort Dodge.

Electronic copies of original design plans are available to the Contractor as part of the E-Files supplied with the contract documents. Dimensions shown on these plans are based on design plans (Design Nos. 2058, 275, 482, 201, 208, 120).

Repairs shall consist of constructing a timber protective shield below the median curb joint over the limits shown on the Situation Plan on Design Sheet No. 2

2nd Avenue South will be open to traffic during construction. Meriweather Drive will be closed to traffic during work overhead. See Traffic Control Plan note on this sheet.

The City and Utility Companies whose facilities are shown on the plans or known to be within the construction limits shall be notified by the Bridge Contractor of the construction starting date.

All dimensions and details shown on these plans pertinent to new construction shall be verified in the field by the Contractor before starting construction.

Faint lines on plans indicate the existing structure.

The Bridge Contractor shall work in such a manner that equipment and materials shall not be allowed to interfere with train traffic or be allowed to fall on the railroad tracks. Interference above the railroad track area shall be coordinated with the railroad.

The Bridge Contractor shall work in such a manner that equipment and materials shall not be allowed to interfere with roadway traffic, or be allowed to fall on the roadway.

Specifications:

Design:
AASHTO series of 2002.

Construction:

Iowa Department of Transportation Standard Specifications for Highway and Bridge Construction, Series 2023, plus applicable General Supplemental Specifications, Developmental Specifications, Supplemental Specifications and Special Provisions shall apply to construction work on this project.

Developmental Specifications for Construction or Maintenance Work on Railroad Right-of-Way (Chicago, Central, and Pacific Railroad Company, Cedar River Railroad Company, and Iowa Northern Railway Company).
Developmental Specification for Electronic Ticketing.
Special Provisions for Environmental Protection.

Design Stresses:

Lumber design stresses are in accordance with Structural Class Material Grades per Section 4162 of the Standard Specifications.

Design History at this Site	
(Includes this Design)	
Des. No.	Type of Work
2058	Original Design
275	Overlay and Repair
482	Curb Reconstruction
201	Abutment Repair
208	Re-Overlay and Repair
120	Deck Joint Repair
427	Bridge Repair - Protective Shield

Roadway Quantities shown elsewhere in these plans.

Traffic Control Plan
2nd Avenue South will be open to thru traffic. Meriweather Drive will be closed to traffic during work overhead. Refer to the Traffic Control Plan shown elsewhere in these plans.

Design For Repairs to 26°24' Skew (R.A.)

654'-8" x 57'-0" Continuous Welded Plate Girder Bridge

49'-0" & 49'-8" Appr. Spans126'-0", (2) 166'-0", & 98'-0" Spans

Estimated Quantities and General Notes

STA. 232+22.93 (2nd Ave. South)Turn-in Date: Aug, 2026

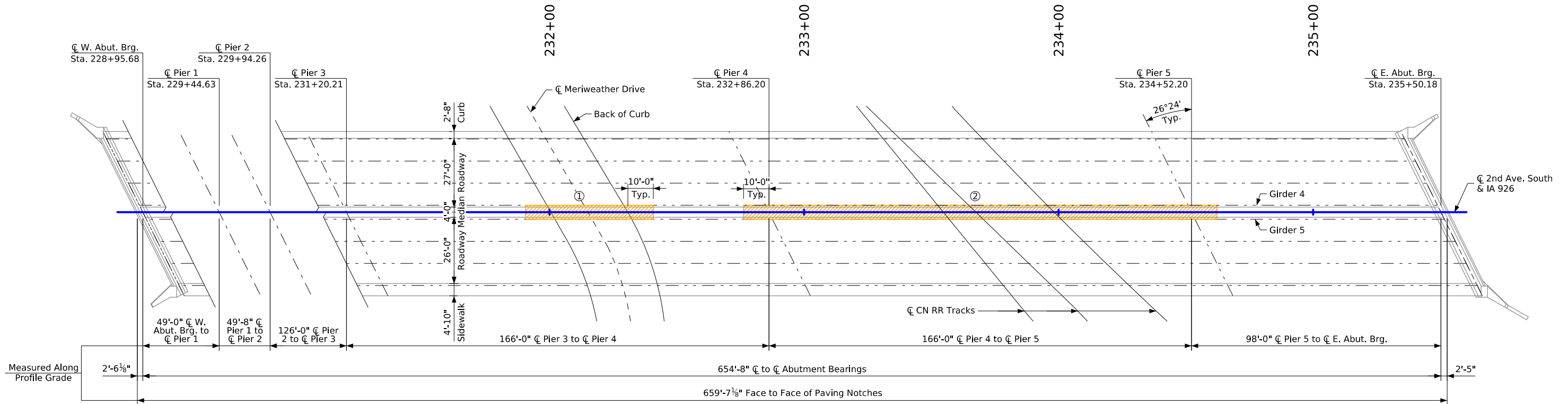
Webster County

IOWA DEPARTMENT OF TRANSPORTATION

Design No. 427Design Sheet No. 1 of 3FHWA No. 52310

SHEET NUMBERV.1





Situation Plan



Repairs Shall Consist of:

- ① The construction of a timber protective shield over roadway.
- ② The construction of a timber protective shield over railway.

Location
2nd Ave. South over
Meriweather Drive and CN RR
In City of Fort Dodge
T-89N R-28W
Section 19
Wahkonsa Township
Webster County
Railroad Crossing; Federal
Railroad Administration (FRA)
Identification No. 307384N
Bridge Maint. No. 9402.35926
FHWA No. 52310
Latitude 42.501856°
Longitude -94.196535°

Design For Repairs to 26°24' Skew (R.A.)

654'-8" x 57'-0" Continuous
Welded Plate Girder Bridge

49'-0" & 49'-8" Appr. Spans126'-0", (2) 166'-0", & 98'-0" Spans

Situation Plan

STA. 232+22.93 (2nd Ave. South)Turn-in Date: Aug, 2026

Webster County

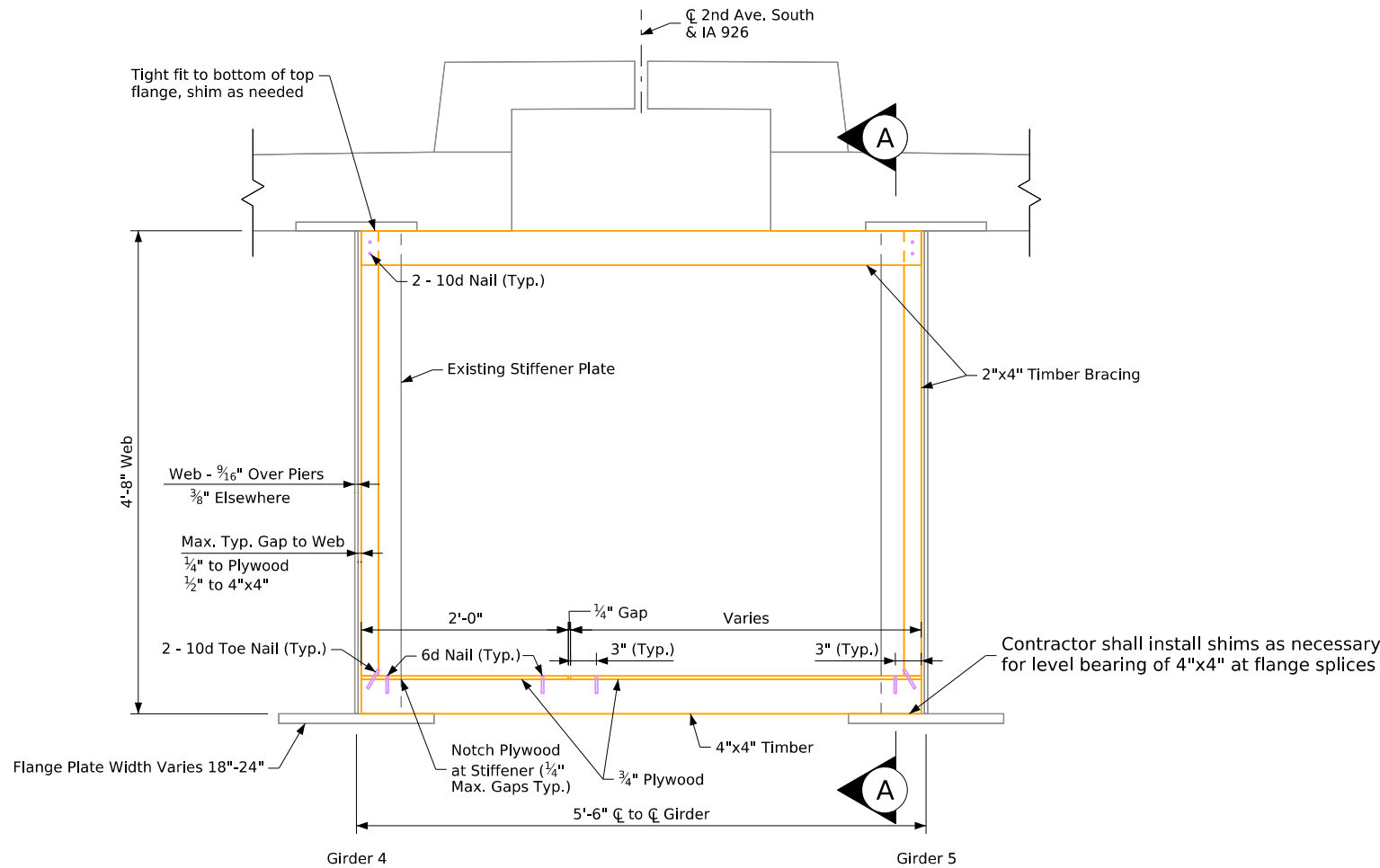
IOWA DEPARTMENT OF TRANSPORTATION

Design No. 427Design Sheet No. 2 of 3FHWA No. 52310

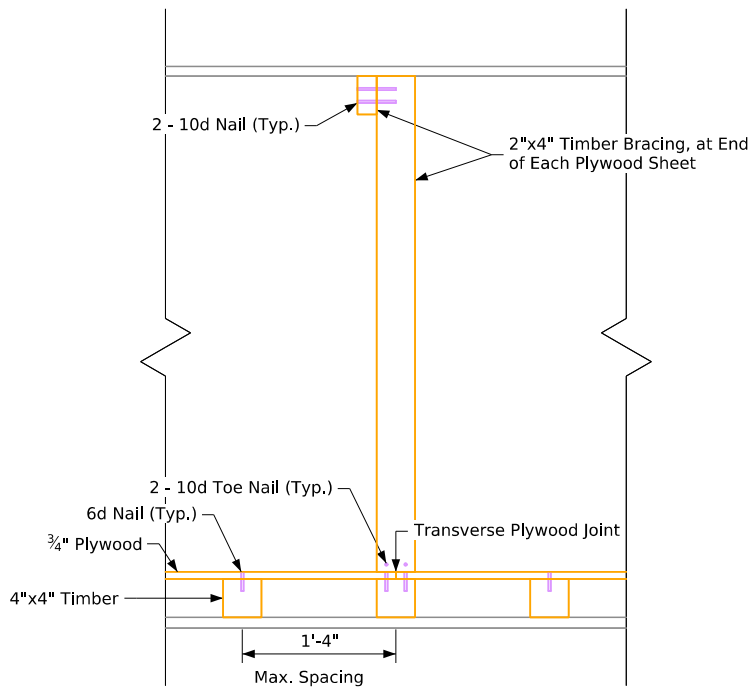


Timber Protective Shield Notes:

Install protective shield over the limits shown on the Situation Plan on Design Sheet No. 2.
Timber shall be in accordance with Section 2409 of the Standard Specifications.
Timber sizes shown are nominal sizes. Rough sawn timber of the dimensions shown will also be considered acceptable.
The timber spacings shown have been determined using allowable stresses (Structural Class) with all adjustment factors necessary for the anticipated service conditions. Design load includes selfweight of the protective shield, concrete curbs and decks from gutterline to edge (for future demolition), and construction live load of 50 psf.
All timber shall be treated. Plywood shall be "Exterior" use.
Plywood shall be placed such that the face grain is perpendicular to the timber supports.
Transverse plywood joints shall be supported by timbers.
Nails shall be ring shanked galvanized in accordance with 4153.07, D, of the Standard Specifications.



Section Thru Timber Protective Shield at Median

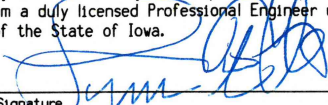


Section A-A



Design For Repairs to 26°24' Skew (R.A.)
654'-8" x 57'-0" Continuous Welded Plate Girder Bridge
49'-0" & 49'-8" Appr. Spans 126'-0", (2) 166'-0", & 98'-0" Spans
Protective Shield Details
STA. 232+22.93 (2nd Ave. South) Turn-in Date: Aug, 2026
Webster County
IOWA DEPARTMENT OF TRANSPORTATION
Design No. 427 Design Sheet No. 3 of 3 FHWA No. 52310

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No.	DESCRIPTION
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* A.3	Title Sheet
C Sheets	Quantities and General Information
* C.1	Estimated Project Quantities
* C.1	Estimate Reference Information
C.2	Project Description
C.3	Standards
C.4	Index of Tabulations
C.5	Safety Closures
D Sheets	Mainline Plan Sheets
* D.1	Legend Sheet
* D.2	Plan Sheets
J Sheets	Traffic Control and Staging Sheets
J.1	Traffic Control Plan
J.2	Coordinated Operations
* J.3	Traffic Control Legend and Symbol Information Sheet
* J.4 - 5	Traffic Control Plan Sheets
	*Color Plan Sheets

	I hereby certify that this engineering document was prepared by me or under my direct personal supervision and that I am a duly licensed Professional Engineer under the laws of the State of Iowa.	
		8/20/2026
	Signature	Date
	Printed or Typed Name	
	My license renewal date is December 31, 2027	
Pages or sheets covered by this seal: A.3, C.1-5, D.1-2, J.1-5		

ESTIMATED PROJECT QUANTITIES AND REFERENCE NOTES

Roadway Items : Roadway Items

Item no.	Item Code	Item	Unit	Quantities	Estimate Reference Notes
				Estimated	
				Roadway Items	
1	2528-2518000	SAFETY CLOSURE	EACH	2	Refer to Tab. 108_13A and the J Sheets for details.
2	2528-8445110	TRAFFIC CONTROL	LS	1	Refer to J Sheets for details.
3	2528-9290050	PORTABLE DYNAMIC MESSAGE SIGN (PDMS)	CDAY	0	See Proposal.

100_01D
8/15/22

PROJECT DESCRIPTION

This project involves traffic control for bridge repairs for the 556'-0 x 58'-0 CWPB Bridge Plus Two 49'-0 x 85'-0 Approach Span (FHWA NO. 52310) on IA 926 over CN RR and Merriweather Drive, 0.8 miles East of West Junction US 169. The work under this contract has the potential to impact an environmentally sensitive area, see D.2 and Special Provisions for Environmental Protection for additional information.

105_04
10/20/26

STANDARDS

The following Standards apply to construction work on this project.

Number	Date	Title
TC-1	10-15-19	Work Not Affecting Traffic (Two-Lane or Multi-Lane)
TC-202	04-18-23	Work Within 15 ft of Traveled Way
TC-418	04-18-23	Lane Closure on Divided Highway

111_25 10/20/26		
INDEX OF TABULATIONS		
Tabulation	Tabulation Title	Sheet No.
100_01A	ESTIMATED PROJECT QUANTITIES	C.1
100_04A	ESTIMATE REFERENCE INFORMATION	C.1
100_01D	PROJECT DESCRIPTION	C.2
105_04	STANDARD ROAD PLANS	C.3
111_25	INDEX OF TABULATIONS	C.4
108_13A	SAFETY CLOSURES	C.5
108_23A	TRAFFIC CONTROL PLAN	J.1
111_01	COORDINATED OPERATIONS	J.2

108_13A 3/27/25 SAFETY CLOSURES		
Road Closure Qty.	Hazard Closure Qty.	Remarks
1		South 1st Street - North
1		South 1st Street - South
2		TOTAL

	Interstate Highway Symbol
	U.S. Highway Symbol
	Iowa Highway Symbol
	County Road Highway Symbol
	Evergreen Tree
	Deciduous Tree
	Fruit Tree
	Shrub (Bushes)
	Timber
	Hedge
	Stump
	Swamp
	Rock Outcrop
	Broken Concrete
	Revetment (Rip Rap)
	Cemetery
	Grave
	Cave
	Sink Hole
	Board Fence
	Chain Link or Security Fence
	Wire Fence
	Terrace
	Earth Dam or Dike (Existing)
	Tile Outlet
	Edge of Water
	Existing Drainage
	Right of Way Rail or Lot Corner
	Concrete Monument
	Well
	Windmill
	Beehive Intake
	Existing Intake
	Existing Utility Access (Manhole)
	Fire Hydrant
	Water Hydrant (Rural)

	Septic Tank
	Cistern
	L.P. Gas Tank (No Footing)
	Underground Storage Tank
	Latrine
	Satellite TV Dish
	Water Hook Up
	Radio Tower
	Tower Anchor
	Guardrail (Beam or Cable)
	Guard Post (one or two)
	Guard Post (over two)
	Filler Pipe
	Gas Valve
	Water Valve
	Speed Limit Sign
	Mile Marker Post
	Sign
	Traffic Signal Control Box
	Rail Road Signal Control Box
	Telephone Switch Box
	Electric Box

— G — MIDAMER-GAS
MATT HARTMAN
515-972-6138
matthew.hartman@midamerican.com

— SAN. — FRONTIER COMMUNICATIONS
— ST S — Uranan Thao
— W — 515-573-1268
frontierlocatemapsia@ftr.com

— F0 — FORT DODGE, CITY OF
Brett Daniel
515-573-5071
iowaonecall@fortdodgeiowa.org

— E1 — AUREON NETWORK SERVICES
Jeff Klocko
515-830-0445
jeff.klocko@aureon.com

MIDAMER-ELEC
BRIAN SEWELL
515-574-5042
brian.sewell@midamerican.com

VERIZON
INVESTIGATIONS
469-886-4090
INVESTIGATIONS@VERIZON.COM

MEDIACOM
Mike Lawler
515-571-2183
mlawler@mediacomcc.com

LINEWORK	Design Color No.		
Green	(2)		Existing Topographic Features and Labels
Blue	(1)		Proposed Alignment, Stationing, Tic Marks, and Alignment Annotation
Magenta	(5)		Existing Utilities

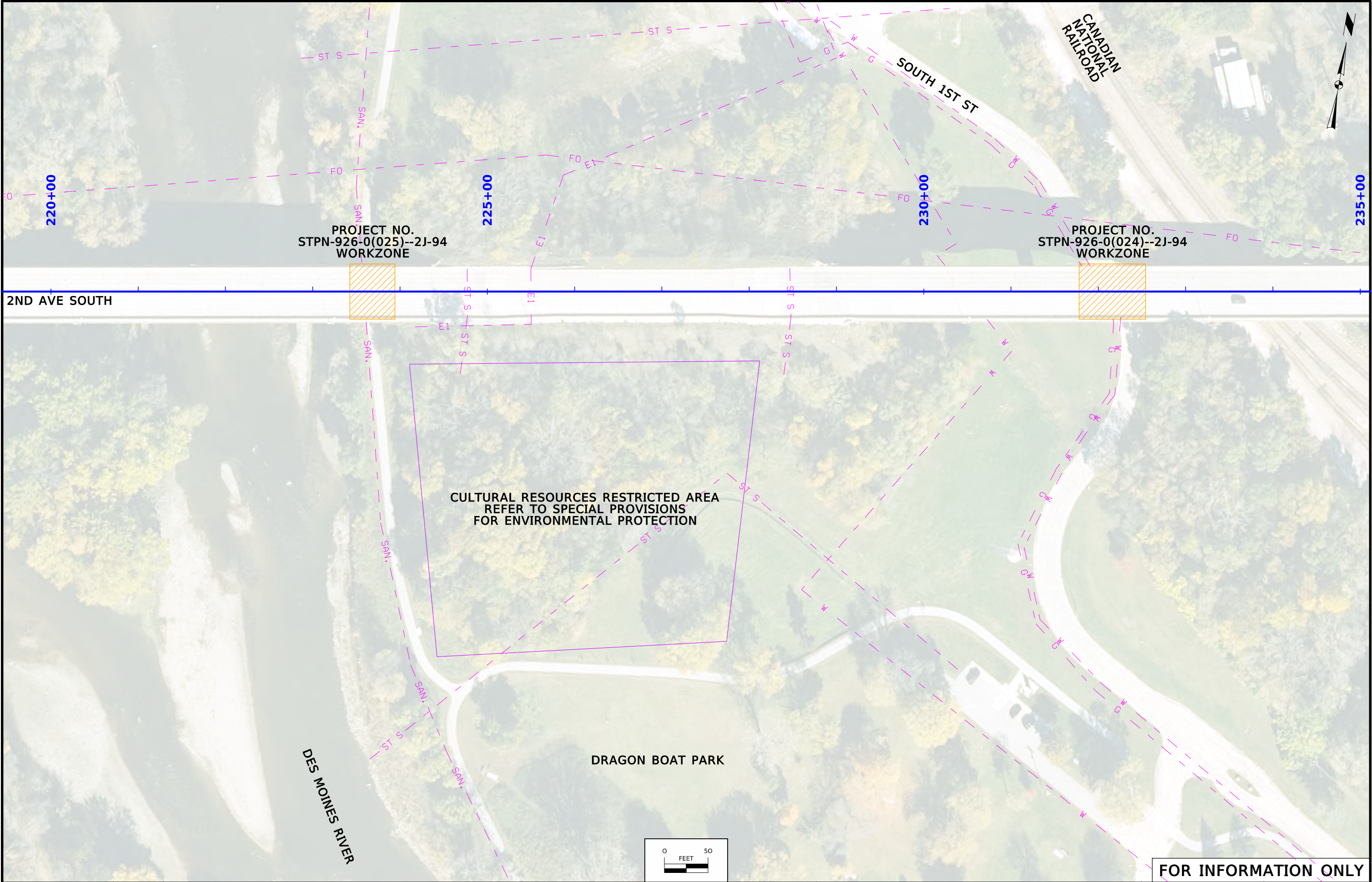
SHADING	Design Color No.		Transparency
Pink, Dark	(13)		Temporary Pavement Shading
Yellow	(4)		Proposed Pavement Shading
Orange	(6)		Proposed Granular Shading
Orange	(70)		Proposed Shoulder Granular Shading
Yellow	(68)		Proposed Shoulder Paved Full Depth Shading
Yellow	(132)		Proposed Shoulder Paved Partial Depth Shading
Brown, Light	(236)		Grading Shading
Orange, Light	(134)		Proposed Granular Entrance Shading
Yellow	(220)		Proposed Paved Entrance Shading
Tan	(8)		Proposed Sidewalk Shading
Blue, Light	(230)		Proposed Sidewalk Landing Shading
Pink	(11)		Proposed Sidewalk Ramp Shading
Red	(3)		Proposed Structure Shading
Red	(3)		Delineates Restricted Areas

LINEWORK	Design Color No.	
Green	(10)	Existing Ground Line Profile
Blue	(1)	Proposed Profile and Annotation
Magenta	(5)	Existing Utilities
Blue, Light	(230)	Proposed Ditch Grades, Left
Black	(0)	Proposed Ditch Grades, Median
Rust	(14)	Proposed Ditch Grades, Right

RIGHT-OF-WAY LEGEND

	Proposed Right-of-Way Symbol
	Proposed Right-of-Way Line
	Existing Right of Way
	Existing and Proposed Right-of-Way
	Easement and Existing Right-of-Way
	Easement (Temporary) Symbol
	Easement (Temporary) Line
	Easement
	Access Control
	Property Line Symbol
	Property Line

(COVERS SHEET SERIES D)



TRAFFIC CONTROL PLAN

Traffic on IA 926 at the Bridge over CN RR and Merriweather Drive will be maintained per Standard Road Plans listed on Tab. 105-4 and as detailed on the J Sheets.

South 1st Street will be closed to traffic as detailed on the J Sheets. Road closures will only be allowed during time of active work and all closures must be removed at the end of the working day.

Refer to Sheet J.5 for the approximate placement of PDMS Boards. The Contractor will coordinate with the City of Fort Dodge regarding precise PDSM Board placement and messaging.

The Contractor will coordinate with the Iowa DOT and the City of Fort Dodge prior to beginning any work or traffic control and provide at least a seven (7) day notice prior to any closure.

Fort Dodge City Contact:
Austin Morrow, P.E.
Phone - 515-576-4551 x1239
Email - amorrow@fortdodgeiowa.org

Iowa DOT Contact:
Devendra Tamrakar, P.E.
Phone - 515-239-1635
Email - Devendra.Tamrakar@iowadot.us

111_01
10/14/22

COORDINATED OPERATIONS

Other work in progress during the same period of time will include the construction of the projects listed. Coordinate operations with those of other contractors working within the same area.

Project	Type of Work
STPN-926-0(025)--2J-94	Bridge Repair

CROSS SECTION VIEW COLOR LEGEND OF TRAFFIC CONTROL AND STAGING SHEETS		
SHADING	Design Color No.	
Green, Light	(225)	Existing Pavement Shading
Gray, Light	(48)	Previously Constructed Pavement Shading
Gray, Med	(80)	Previously Constructed Granular Surface Shading
Blue, Light	(230)	Proposed Pavement Shading
Lavender	(9)	Temporary Pavement Shading
Brown, Med	(237)	Future Proposed Pavement Shading

CROSS SECTION VIEW PATTERN AND SYMBOL LEGEND OF TRAFFIC CONTROL AND STAGING SHEETS			
	Pavement Removal		Proposed Granular Shoulder
	Proposed Granular Subbase		Temporary Shoulder
	Proposed Special Backfill		Existing Shoulder Strengthening
	Temporary Barrier Rail		Permanent Barrier Rail
			Channelizing Device

PLAN VIEW COLOR LEGEND OF TRAFFIC CONTROL AND STAGING SHEETS			
LINEWORK	Design Color No.		
Green	(2)	Existing Topographic Features and Labels	
Magenta	(5)	Pavement Marking Call Outs	
Blue	(1)	Proposed Alignment, Stationing, Tic Marks, and Alignment Annotation	
Yellow	(4)	Pavement Markings, Yellow	
Off White	(254)	Pavement Markings, White	
Violet	(15)	Temporary barrier rail, Unpinned	
Flush Orange	(228)	Temporary barrier rail, Pinned	

SHADING	Design Color No.		
Green, Light	(225)	Existing Pavement Shading	
Gray, Light	(48)	Previously Constructed Pavement Shading	
Gray, Med	(6)	Proposed Granular Surface Shading	
Gray, Med	(80)	Previously Constructed Granular Surface Shading	
Blue, Light	(230)	Proposed Pavement Shading	
Pink, Dark	(13)	Temporary Pavement Shading	
Brown, Light	(236)	Proposed Grading Limits Shading	
Cyan	(7)	Proposed MSE or CIP Wall Shading	
Red	(3)	Proposed Bridge Shading and Sign Trusses	
Black w/Gray, Light Fill	(0,48)	Previously Constructed Structure	

PLAN VIEW PATTERN AND SYMBOL LEGEND OF TRAFFIC CONTROL AND STAGING SHEETS			
	Channelizing Device		Crash Cushion (Temp or Perm)
	Drum		Traffic Signal
	Temporary Lane Separator		Flagger
	Tubular Marker		Temporary Floodlighting
	Channelizer Marker		Traffic Sign
	Concrete Barrier Marker		Type III Barricade
	Delineator		Type A Warning Light
	Temporary Barrier Rail		Direction of Traffic
	Pavement Removal		Safety Closure
	Sand Barrel Layout		Lane Identification
	Vehicle Detection Area		PDMS Board

NOTE: Device spacing according to Standard Road Plans unless specifically dimensioned.

TRAFFIC CONTROL
AND STAGING
INFORMATION SHEET

(COVERS SHEET SERIES J)

