



**Your Safety • Your Mobility
Your Economic Opportunity**

IDAHO TRANSPORTATION DEPARTMENT

P.O. Box 7129 • Boise, ID 83707-1129

(208) 334-8000 • itd.idaho.gov

March 10th 2025

Dale Kuperus
District Engineer
Ada County Highway District
5800 N. Meeker Ave.
Boise, ID 83713

RE: Bridge Load Rating Recommendation (Re-Open)

The Idaho Transportation Department (ITD) has evaluated the below referenced bridge, **BK 12810**, for live load carrying capacity based on the recent repairs completed by ACHD and ITD that address the critical finding (widespread decay of the timber piles) issued by Burgess and Niple recommended to ACHD through a Local Agency Communication Verification form that the bridge be posted at 3 tons total gross vehicle. ACHD acknowledged the critical finding and responded by closing the bridge that same day. The bridge remains closed to all vehicle traffic. Repair plans were finalized by Forsgren Associates Inc. on 2/13/2025 and are attached.

HMH Engineering completed a Special Supplemental Inspection on 3/7/25 (attached) documenting the completed repairs and recommended Item 60 for Substructure condition be upgraded from "3, Serious Condition" to "5, Fair Condition." Our load rating analysis shows the bridge is adequate to carry legal loads. Please see attached load rating for the superstructure and substructure. The structure will be moved to a 12 month inspection interval. No additional work is recommended and we understand that ACHD is moving forward with bridge replacement plans.

ITD advises that the current bridge closure may be lifted, allowing highway traffic to resume.

Please contact Patty Fish at (208) 334-8847 or patty.fish@itd.idaho.gov and let her know when the bridge has re-opened to public traffic. Your attention to this matter is much appreciated.

Sincerely,

Alan Buehrig

Digitally signed by Alan Buehrig
DN: cn=Alan Buehrig, email=alan.buehrig@itd.idaho.gov,
ou=Idaho Transportation Department,
ou=Bridge HO, cn=Alan Buehrig
Date: 2025.03.10 12:17:33 -0600

Alan Buehrig, P.E.
Bridge Asset Management Engineer

Cc: Scott Wood (LHTAC); Amanda LaMott (LHTAC);
Laila Kral (LHTAC); Burgess and Niple (Inspection)

BRIDGE INFORMATION:

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Idaho Transportation Department Inspection Form District No. 3

BRIDGE KEY: 12810

STRUCTURE NAME: 97643A 4.04

FEATURES INTERSECTED: BOISE RIVER

LOCATION: AT BOISE ECL; ECKERT RD

OWNER: ADA COUNTY HIGHWAY DISTRICT

TYPE OF INSPECTION

- ☐ **DAMAGE**
- ☐ **UNDER BRIDGE INSPECTION TRUCK (UBIT)**
- ☐ **IN-DEPTH**
- ☒ **SUPPLEMENTAL INSPECTION**

SUBSTRUCTURE:

From the 2/4/2025 Supplemental Level III Timber Inspection: The Timber piles are in serious condition with major defects. The timber piles are concealed with a 2" x 12" x 22'-6" timber plank system on both sides and a steel nose armor at the upstream end. Decay is typically located near the high waterline. (13) Timber piles have widespread moderate to major decay. (5) Timber piles have moderate decay between 14% and 30% of the cross-sectional area and are rated as (CS 3). (8) Timber piles have decay affecting more than 51% of the cross-sectional area and are rated as (CS 4). The Timber piles at pier 6 are in the worst condition. See the Timber Resistograph Supplemental Report "12810_0225_resi" for more details on drilling locations and analysis.

During the 03/07/2025 Supplemental Inspection, the following piles were observed to have been retrofitted with steel channels embedded in a reinforced concrete foundation:

Timber Pile 2 at Pier 1

Timber Piles 3-6 at Pier 2

Timber Piles 3, 5, and 6 at Pier 3

Timber Piles 1 and 4-6 at Pier 4

Timber Piles 1-6 at Pier 6

Timber Piles 1-6 at Pier 7

Timber Piles 3-5 at Pier 8

Pier 5 had no retrofit repairs installed

See the Repair Plans prepared by Forsgren for more details and information on the structural repairs.

NOTES:

The Idaho Transportation Department contacted HMH Engineering to perform a Quality Control supplemental inspection using HMH's IML PD500 Resistograph to re-evaluate the timber piles. An In-Depth Inspection was completed on 2/4/2025 by Rick Smith and Rene Leon with HMH Engineering using ITD's A62 UBIT and standard wading equipment to access and perform a Level III Timber Inspection of the timber piles.

A follow up Supplemental Inspection assessing the sufficiency of the pile repairs was completed on 3/7/2025 by Rick Smith and Anthony Jankowski with HMH Engineering. Item 60 – Substructure rating should be changed to a 5 due to the repairs completed on the timber piles.

WORK ACCOMPLISHED:

All timber piles with moderate to major decay were repaired with steel channels embedded into reinforced concrete foundations.

INSPECTION INTERVAL:

Inspection interval to remain at 12 months to monitor repairs and condition of timber piles without repairs. Perform Level III Timber Inspections at a 12-month interval to monitor the condition of the timber piles.

MAINTENANCE RECOMMENDATIONS:

None.

INSPECTOR'S SIGNATURE : Rick Smith Digitally signed by Rick Smith
DN: C=US, E=rsmith@hnh-llc.com,
O=HMH Engineering, OU=Inspection,
CN=Rick Smith
Date: 2025.03.07 15:45:11-07'00' DATE: 3/7/2025



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of Timber Pile 2 at Pier 1 Looking North.



Repair of Timber Pile 2 at Pier 1 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of Timber Piles 4-6 at Pier 2 Looking North.



Repair of Timber Piles 4-6 at Pier 2 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of Timber Piles 3, 5, & 6 at Pier 3 Looking North.



Repair of Timber Piles 3, 5, & 6 at Pier 3 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of Timber Piles 1 & 4-6 at Pier 4 Looking North.



Repair of Timber Piles 1 & 4-6 at Pier 4 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6) Features Intersected:	BOISE RIVER (BARBER BR)	(9) Location:	AT BOISE ECL; ECKERT RD
Facility Carried (Route):	SMA 7643; ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Pier 5 Looking North.

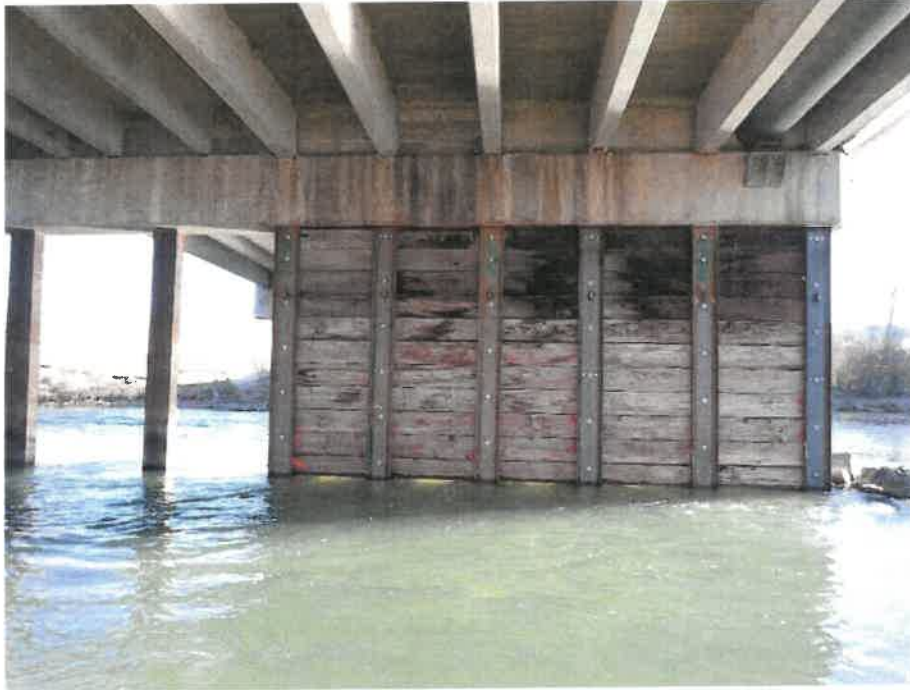


Pier 5 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of All Timber Piles at Pier 6 Looking North.



Repair of All Timber Piles at Pier 6 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6)Features Intersected:	BOISE RIVER(BARBER BR)	(9)Location:	AT BOISE ECL;ECKERT RD
Facility Carried(Route):	SMA 7643;ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of All Timber Piles at Pier 7 Looking North.



Repair of All Timber Piles at Pier 7 Looking South.



Idaho Transportation Department Supplemental Bridge Inspection Report

Bridge Key:	12810	Structure Name:	97643A 4.04
(6) Features Intersected:	BOISE RIVER (BARBER BR)	(9) Location:	AT BOISE ECL; ECKERT RD
Facility Carried (Route):	SMA 7643; ECKERT RD	Admin Jurisdiction:	0101 Ada County Hwy District
Xref Structure Name:		District:	03



Repair of Timber Piles 3-5 at Pier 8 Looking North.



Repair of Timber Piles 3-5 at Pier 8 Looking South.

Substructure Rating



ASR/LFR BRIDGE LOAD RATING SUMMARY

rev. 1/26/2024

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Bridge Key No. 33085		Structure Name X996410 8.11		(27) Year Built 1984		(106) Year Reconstruct N/A		Inspection Date 9/6/2023		Inventory Data Date 2/21/2024			
(9) Bridge Location 0.5 S. 1.0 E. TETONIA				(7) Facility Carried N 2000 W				(6a) Feature Intersected SPRING CR;N.FK.LEIGH CR				Drawing Number 18068	
(49) Length 29 ft.		(11) Milepost 100.260		(2) District 6		(3) County Teton		(22) Owner County Highway Agency		Administrative Jurisdiction Teton County			
(45, 43a, 43b) Bridge Description 1 Span Prestressed Concrete Tee Beam						(31) Design Load (per plans) HS-20		Granular WS 2 in.		Asphalt WS N/A in.		Concrete WS N/A in.	
Rating Program & Version BrR 7.5 - AASHTO Engine				Rating Method LFR		AASHTO Reference The Manual for Bridge Evaluation, Third Edition, 2018							
(58) Deck 6 Satisfactory		(59) Superstructure 7 Good		(60) Substructure 6 Satisfactory		(62) Culvert N N/A (NBI)		(113) Scour Critical 5 Stable, w/in Footing					
(30) ADT Year 2019		(29) ADT 100		(109) Truck % ADT 10 %		ADTT (ADT x Truck % ADT) 10		(19) Detour Length 3 miles		Year Programmed N/A			

INVENTORY RATINGS

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
HS-20	Truck	36	Pile 4	Pier 6	Axial - Compression + Bending	0.99	35
Idaho - Type 3	Truck	27	Pile 4	Pier 6	Axial - Compression + Bending	1.18	31
Idaho - Type 3S2	Truck	39.5	Pile 4	Pier 6	Axial - Compression + Bending	1.18	46
Idaho - Type 3-3	Truck	39.5	Pile 4	Pier 6	Axial - Compression + Bending	1.12	44
Idaho - 121k	Truck	60.5	Pile 4	Pier 6	Axial - Compression + Bending	0.99	60
NRL	Truck	40	Pile 4	Pier 6	Axial - Compression + Bending	0.86	34

OPERATING RATINGS

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
HS-20	Truck	36	Pile 4	Pier 6	Axial - Compression + Bending	1.35	48
Idaho - Type 3	Truck	27	Pile 4	Pier 6	Axial - Compression + Bending	1.60	43
Idaho - Type 3S2	Truck	39.5	Pile 4	Pier 6	Axial - Compression + Bending	1.60	63
Idaho - Type 3-3	Truck	39.5	Pile 4	Pier 6	Axial - Compression + Bending	1.52	60
Idaho - 121k	Truck	60.5	Pile 4	Pier 6	Axial - Compression + Bending	1.35	81
NRL	Truck	40	Pile 4	Pier 6	Axial - Compression + Bending	1.17	46

BRIDGE LOAD RATING SUMMARY

Controlling Truck Idaho - Type 3-3	Bridge Factor 752	Bridge Color Blue	Load Posting Required? No	Max Axle Weight if Posting Req. N/A
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#	Load Rater	Checker	Quality Control Engineer
Name:	Jared R. Larkin, PE	Kayla M. Jacobsen, PE	Ryan L. Sherman, SE
Company:	Forsgren Associates, Inc.	Forsgren Associates, Inc.	Forsgren Associates, Inc.
Date:	2/3/2025	2/6/2025	3/3/2025

Remarks:

- *These ratings are for the substructure with repaired timber piles only. The superstructure was not rated as part of this analysis.
 *See supporting calculations for additional comments and assumptions.





ASR/LFR BRIDGE LOAD RATING SUMMARY

rev. 1/26/2024

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Bridge Key No. 33085		Structure Name X996410 8.11		(27) Year Built 1984	(106) Year Reconstruct N/A	Inspection Date 9/6/2023	Inventory Data Date 2/21/2024
(9) Bridge Location 0.5 S. 1.0 E. TETONIA			(7) Facility Carried N 2000 W		(6a) Feature Intersected SPRING CR;N.FK.LEIGH CR		Drawing Number 18068
(49) Length 29 ft.	(11)Milepost 100.26	(2) District 6	(3) County Teton	(22) Owner County Highway Agency		Administrative Jurisdiction Teton County	
(45, 43a, 43b) Bridge Description 1 Span Prestressed Concrete Tee Beam			(31) Design Load (per plans) HS-20	Granular WS 2 in.	Asphalt WS N/A in.	Concrete WS N/A in.	Timber WS N/A in.
Rating Program & Version BrR 7.5 - AASHTO Engine		Rating Method LFR		AASHTO Reference The Manual for Bridge Evaluation, Third Edition, 2018			
(58) Deck 6 Satisfactory		(59) Superstructure 7 Good		(60) Substructure 6 Satisfactory	(62) Culvert N N/A (NBI)	(113) Scour Critical 5 Stable, w/in Footing	
(30) ADT Year 2019	(29) ADT 100	(109) Truck % ADT 10 %		ADTT (ADT x Truck % ADT) 10	(19) Detour Length 3 miles	Year Programmed N/A	

OPERATING RATINGS - Specialized Hauling Vehicles (SHV)

(Fill in the below SHV Operating Ratings only when Operating Rating Factor for NRL is less than 1.0)

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
SU4	Truck	27				0.30	8
SU5	Truck	31				0.28	8
SU6	Truck	34.75				0.25	8
SU7	Truck	38.75				0.23	8

OPERATING RATINGS - Emergency Vehicles (EV)

(Fill in the below EV Operating Ratings only when bridge is within one mile of Interstate System)

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
EV2	Truck	28.75					0
EV3	Truck	43					0

POSTING

Vehicle	Schematic	Posting (Tons)
Single Unit		N/A
Semi Tractor-Trailer Combination		N/A
Truck-Trailer Combination		N/A
	Max Axle	N/A

Additional Remarks:

Superstructure Rating



ASR/LFR BRIDGE LOAD RATING SUMMARY

rev. 4/30/2019

Page 1 of 2

Bridge Key No. 12810	Structure Name 97643A 4.04	(27) Year Built 1954	(106) Year Reconstruct 1998	Inspection Date 10/25/2018	Inventory Data Date 3/25/2019
(9) Bridge Location AT BOISE ECL;ECKERT RD	(7) Facility Carried SMA 7643;ECKERT RD	(6a) Feature Intersected BOISE RIVER(BARBER BR)	Drawing Number 6404		
(49) Length 315 ft.	(11) Milepost 4.040	(2) District 3	(3) County Ada	(22) Owner County Highway Agency	Administrative Jurisdiction Ada County Hwy District
(45, 43a, 43b) Bridge Description 9 Span Concrete Stringer/Girder	(31) Design Load HS-15	Granular WS N/A in.	Asphalt WS 1 in.	Concrete WS N/A in.	Timber WS N/A in.
Rating Program & Version BrR 6.8.2 - AASHTO Engine	Rating Method LFR	AASHTO Reference The Manual for Bridge Evaluation, Third Edition, 2018			
(58) Deck 7 Good	(59) Superstructure 6 Satisfactory	(60) Substructure 6 Satisfactory	(62) Culvert N N/A (NBI)	(113) Scour Critical 3 SC - Unstable	
(30) ADT Year 2016	(29) ADT 4600	(109) Truck % ADT 4	ADTT (ADT x Truck % ADT) 184	(19) Detour Length 4 mi.	Year Programmed N/A

INVENTORY RATINGS

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
HS-15	Truck	27	G3 - Int. Gir.	1.20	Design Shear - Concrete	0.89	24.0
HS-20	Truck	36	G3 - Int. Gir.	1.20	Design Shear - Concrete	0.67	24.1
Idaho - Type 3	Truck	27	G3 - Int. Gir.	1.20	Design Shear - Concrete	0.74	20.0
Idaho - Type 3S2	Truck	39.5	G3 - Int. Gir.	1.20	Design Shear - Concrete	0.87	34.4
Idaho - Type 3-3	Truck	39.5	G3 - Int. Gir.	2.00	Design Shear - Concrete	0.99	39.1
Idaho - 121k	Truck	60.5	G3 - Int. Gir.	1.20	Design Shear - Concrete	0.81	48.7
NRL	Truck	40	G3 - Int. Gir.	1.50	Design Flexure - Concrete	0.65	26.1

OPERATING RATINGS

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
HS-15	Truck	27	G3 - Int. Gir.	1.20	Design Shear - Concrete	1.48	40.0
HS-20	Truck	36	G3 - Int. Gir.	1.20	Design Shear - Concrete	1.12	40.1
Idaho - Type 3	Truck	27	G3 - Int. Gir.	1.20	Design Shear - Concrete	1.24	33.3
Idaho - Type 3S2	Truck	39.5	G3 - Int. Gir.	1.20	Design Shear - Concrete	1.45	57.3
Idaho - Type 3-3	Truck	39.5	G3 - Int. Gir.	2.00	Design Shear - Concrete	1.66	65.4
Idaho - 121k	Truck	60.5	G3 - Int. Gir.	1.20	Design Shear - Concrete	1.34	81.0
NRL	Truck	40	G3 - Int. Gir.	1.50	Design Flexure - Concrete	1.09	43.6

BRIDGE LOAD RATING SUMMARY

Controlling Truck Idaho - Type 3	Bridge Factor 686	Bridge Color Blue	Load Posting Required? No	Max Axle Weight if Posting Req. N/A
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Remarks:

- *Girders were evaluated assuming simple span load distribution.
- *Lump sum girder losses were in accordance with the design drawings.
- *Composite dead load was equally distributed to all girders.
- *Prestressing strand reinforcement was input into Virtis using the strand locations given in the shop drawings.
- *Pedestrian live loads were not considered.
- *Live load distribution factor overridden for G3 RCT since double-tees are only designed for pedestrian loads. Assumed G3 has a distributed load more like an exterior girder; used the same factors as G8 RCT.
- *Inspection report calls out 6-inch water main attached to the right curb on the deck, a 22-inch diameter welded steel pipe between girders 5 & 6 (G7 & G8), and 16-inch diameter steel pipe outside girder 6 (G8) along entire length of bridge.
- *Site visit was done to verify placement of utilities. 6-inch water main is attached to the superstructure while 22-inch and 16-inch steel pipes were bearing on the piers and were not a part of the superstructure. Pictures are included.

Quality Assurance Engineer

Name: Brent Schiller
Company: Forsgren Associates, Inc.
Date: 9/25/2009

Load Rating Engineer

Name: Barrie Jo Moss
Company: Forsgren Associates, Inc.
Date: 9/11/2009



ASR/LFR BRIDGE LOAD RATING SUMMARY

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Bridge Key No. 12810	Structure Name 97643A 4.04	(27) Year Built 1954	(106) Year Reconstruct 1998	Inspection Date 43398	Inventory Data Date 43549
(9) Bridge Location AT BOISE ECL;ECKERT RD		(7) Facility Carried SMA 7643;ECKERT RD		(6a) Feature Intersected BOISE RIVER(BARBER BR)	
(49) Length 315 ft.	(11) Milepost 4.04	(2) District 3	(3) County Ada	(22) Owner County Highway Agency	Administrative Jurisdiction Ada County Hwy District
(45, 43a, 43b) Bridge Description 9 Span Concrete Stringer/Girder			(31) Design Load (per SI&A) HS-15	Granular WS N/A in.	Asphalt WS 1 in.
				Concrete WS N/A in.	Timber WS N/A in.
Rating Program & Version BrR 6.8.2 - AASHTO Engine		Rating Method LFR		AASHTO Reference The Manual for Bridge Evaluation, Third Edition, 2018	
(58) Deck 7 Good		(59) Superstructure 6 Satisfactory		(60) Substructure 6 Satisfactory	
				(62) Culvert N N/A (NBI)	
(30) ADT Year 2016		(29) ADT 4600	(109) Truck % ADT 4	ADTT (ADT x Truck % ADT) 184	(19) Detour Length 4 mi.
				Year Programmed N/A	
				(113) Scour Critical 3 SC - Unstable	

OPERATING RATINGS - Specialized Hauling Vehicles (SHV)

(Fill in the below SHV Operating Ratings only when Operating Rating Factor for NRL is less than 1.0)

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
SU4	Truck	27					0.0
SU5	Truck	31					0.0
SU6	Truck	34.75					0.0
SU7	Truck	38.75					0.0

OPERATING RATINGS - Emergency Vehicles (EV)

(Fill in the below EV Operating Ratings only when bridge is within one mile of Interstate System)

Rating Vehicle	Controlling Configuration	Weight (Tons)	Controlling Member	Controlling Location	Controlling Limit State	Rating Factor	Rating (Tons)
EV2		28.75					0.0
EV3		43					0.0

POSTING

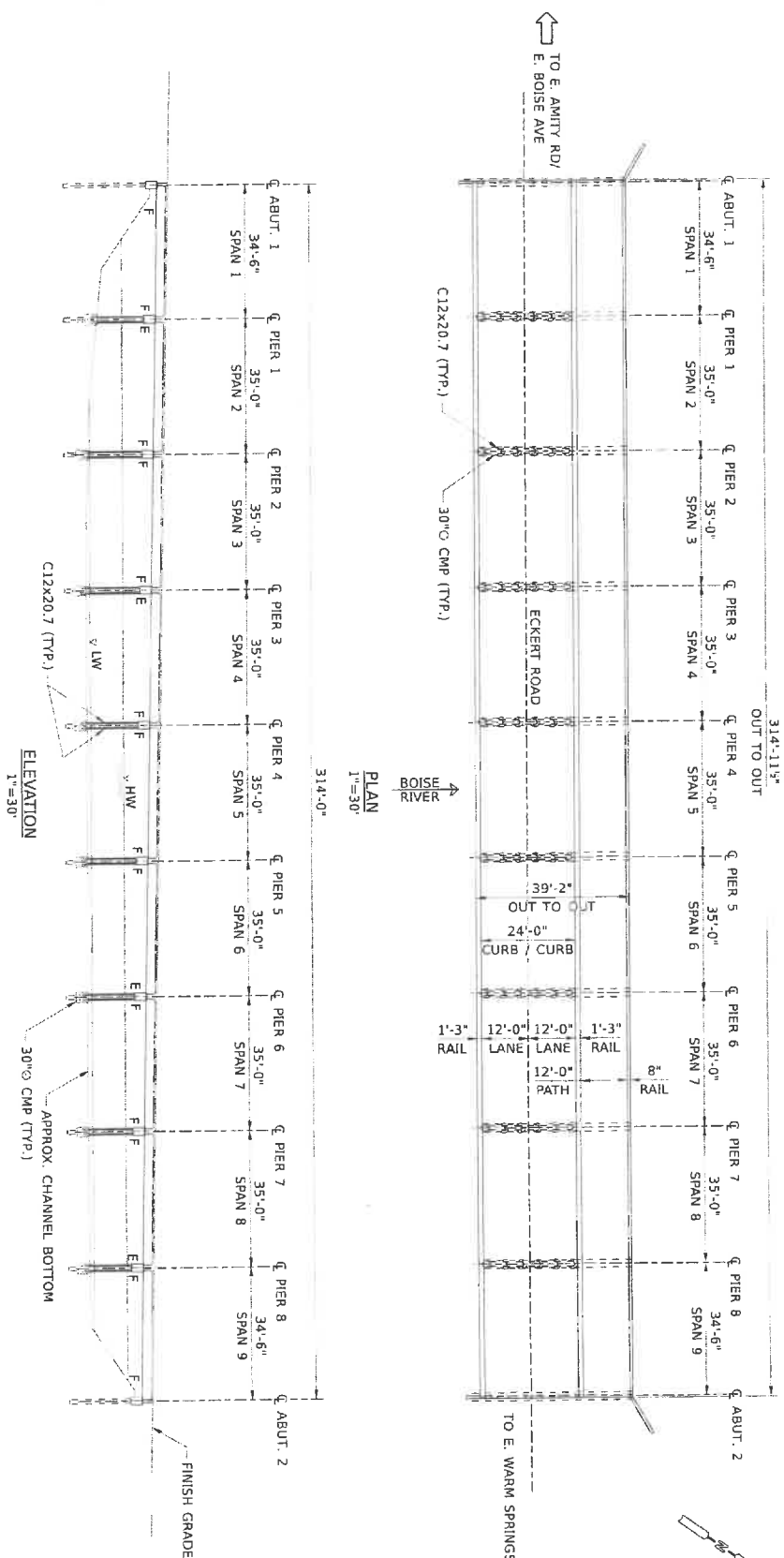
Vehicle	Schematic	Posting (Tons)
Single Unit		N/A
Semi Tractor-Trailer Combination		N/A
Truck-Trailer Combination		N/A
	Max Axle	N/A

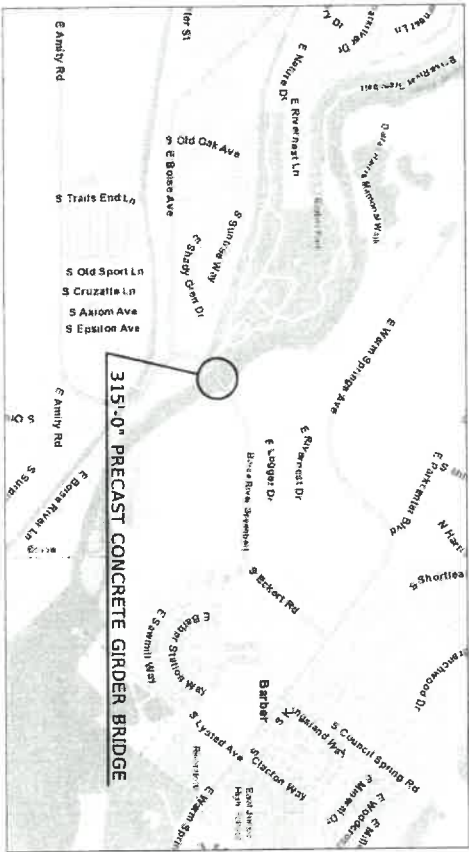
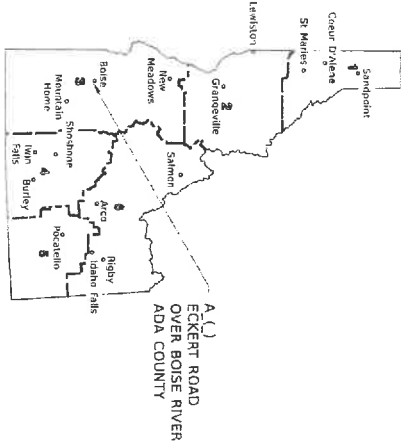
EMERGENCY VEHICLE POSTING

Axle	Posting (Tons)
Single	N/A
Tandem	N/A
Gross	N/A

Additional Remarks:

Modified by Forsgren 05/10/2019
*Changed from BRASS to AASHTO Engine
*Updated ADTT per 2016 Traffic Data
*Updated LFR and LRFR Control Options
*Updated Utilities Load from DC2 to DW
*Design Truck Updated from H15 to HS15





VICINITY MAP
NTS

QUANTITIES		
560-005A	DEWATERING FOUNDATION	1 LS
5501-20A	SP BRIDGE, TIMBER PILE RETROFIT	48 EA

SHEET INDEX

SITUATION AND LAYOUT	1
SHEET INDEX, QUANTITIES, & VICINITY MAP	2
PIER DETAILS (1 OF 2)	3
PIER DETAILS (2 OF 2)	4
CHANNEL FABRICATION DETAILS	5

GENERAL NOTES

MATERIALS: CONSTRUCTION AND WORKMANSHIP IN ACCORDANCE WITH THE STATE OF IDAHO TRANSPORTATION DEPARTMENT: 2023 STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION, 2024 SUPPLEMENTAL SPECIFICATIONS, SPECIAL PROVISIONS AND THE PROJECT PLANS.
DESIGN SPECIFICATIONS AND DESIGN LOADS
NEW CONSTRUCTION: "ASHTO STANDARD SPECIFICATIONS FOR HIGHWAY BRIDGES" 17TH EDITION (DECEMBER 2024) ITD BRIDGE LRFD DESIGN MANUAL.
ELEMENTS STRENGTHENED: TIMBER PILES RETROFITTED WITH STEEL CHANNELS.

EXISTING CONSTRUCTION: DWG. NO. 6404, 6404-A, & 6404-B.
EXISTING PLANS ARE AVAILABLE AT THE BRIDGE DESIGN OFFICE.

PLAN DIMENSIONS
STATIONS, ELEVATIONS, BEARINGS, AND DIMENSIONS SHOWN ARE BASED ON THE EXISTING PLANS AND DO NOT NECESSARILY REPRESENT THE AS-CONSTRUCTED BRIDGE. WHERE DIMENSIONS OF THE PROPOSED WORK DEPEND ON EXISTING CONDITIONS, FIELD VERIFY AND ADJUST CONTROLLING DIMENSIONS TO FIT THE AS-CONSTRUCTED BRIDGE BEFORE ORDERING MATERIALS.
DO NOT SCALE DIMENSIONS FROM THE PROJECT PLANS.

CONSTRUCTION
PROVIDE 2" CONCRETE COVER MEASURED FROM FACE OF THE CONCRETE TO THE FACE OF ANY REINFORCING BAR, UNLESS SHOWN OTHERWISE.

REINFORCING STEEL DIMENSIONS ARE MEASURED TO BAR CENTERLINE UNLESS NOTED OTHERWISE.
PREVENT DAMAGE TO THE PORTIONS OF THE STRUCTURE AND ROADWAY TO REMAIN DURING REPAIR OPERATIONS.
REPAIR OR REPLACE DAMAGE DUE TO CONTRACTOR OPERATIONS AS APPROVED BY THE ENGINEER AND AT NO ADDITIONAL COST TO THE DEPARTMENT.

PREVENT DEBRIS, RESULTING FROM CONTRACTOR OPERATIONS, FROM ENTERING THE WATERWAY.
DISPOSE OF REMOVED MATERIALS IN ACCORDANCE WITH 106.16.

LOCATE, RETAIN, AND PROTECT UTILITIES WITHIN THE VICINITY OF THE BRIDGE.
CONSTRUCTION BRIDGE LOAD RESTRICTION

LIMIT CONSTRUCTION EQUIPMENT OR OTHER LOADS ON THE BRIDGE TO A TOTAL OF 3 TONS. DO NOT ALLOW CONSTRUCTION EQUIPMENT OR OTHER LOADS TO BE PLACED WITHIN 5 FEET OF THE UPSTREAM (SOUTHEAST) CURB. DO NOT ALLOW CONSTRUCTION EQUIPMENT OR OTHER LOADS TO BE PLACED IN ADJACENT SPANS AT ANY TIME. DO NOT ALLOW CONSTRUCTION EQUIPMENT OR OTHER LOADS TO BE PLACED IN SPANS ADJACENT TO A PIER THAT IS UNDER REPAIR. LOAD RESTRICTIONS ON A SPAN WILL BE REMOVED BY THE ENGINEER IN WRITING ONCE THE PIERS ON EACH SIDE OF THE SPAN ARE CONSIDERED FULLY REPAIRED.

NEW MATERIALS

CONCRETE: FOOTING - CLASS 50A
METAL REINFORCEMENT: AASHTO M31, GRADE 60, TYPE S
STRUCTURAL STEEL:

CHANNELS - ASTM A36
PLATES - ASTM A36
THREADED ROD - ASTM A307, GRADE A
NUTS - ASTM A563, GRADE A HEX
WASHERS - ASTM A36, TYPE 1 CIRCULAR

INCIDENTAL ITEMS
WORK NECESSARY TO FULFILL THE CONTRACT THAT IS NOT MEASURED OR PAID FOR SEPARATELY.

NO DATE BY	REVISIONS	DESIGNED R. SHERMAN	SCALES SHOWN ARE FOR 11" X 17"	PROJECT NO.	SITUATION AND LAYOUT	BRIDGE PLANS
		DESIGN CHECKED K. JACOBSEN	PRINTS ONLY	315' PRECAST CONCRETE GIRDER BRIDGE		
		DETAILS D.W.G.	CADD FILE NAME P: 27118401-20240601	ENGLISH		
		DWG. CHECKED B. SCHILLER	27118401-20240601	TRANSPORTATION DEPARTMENT		
		CORRECTIONS	DRAWING DATE: 13-FEB-2023	FORSGREN Associates Inc.		



[illegible]

**IDAHO
TRANSPORTATION
DEPARTMENT**
YOUR SAFETY—YOUR MOBILITY—YOUR ECONOMIC OPPORTUNITY

FORSGREN Associates, Inc.

The seal of the Idaho Department of Transportation is circular. It features a stylized 'ID' in the center, with 'IDAHO' at the top and 'TRANSPORTATION DEPARTMENT' around the bottom. A star is located at the bottom right of the seal.

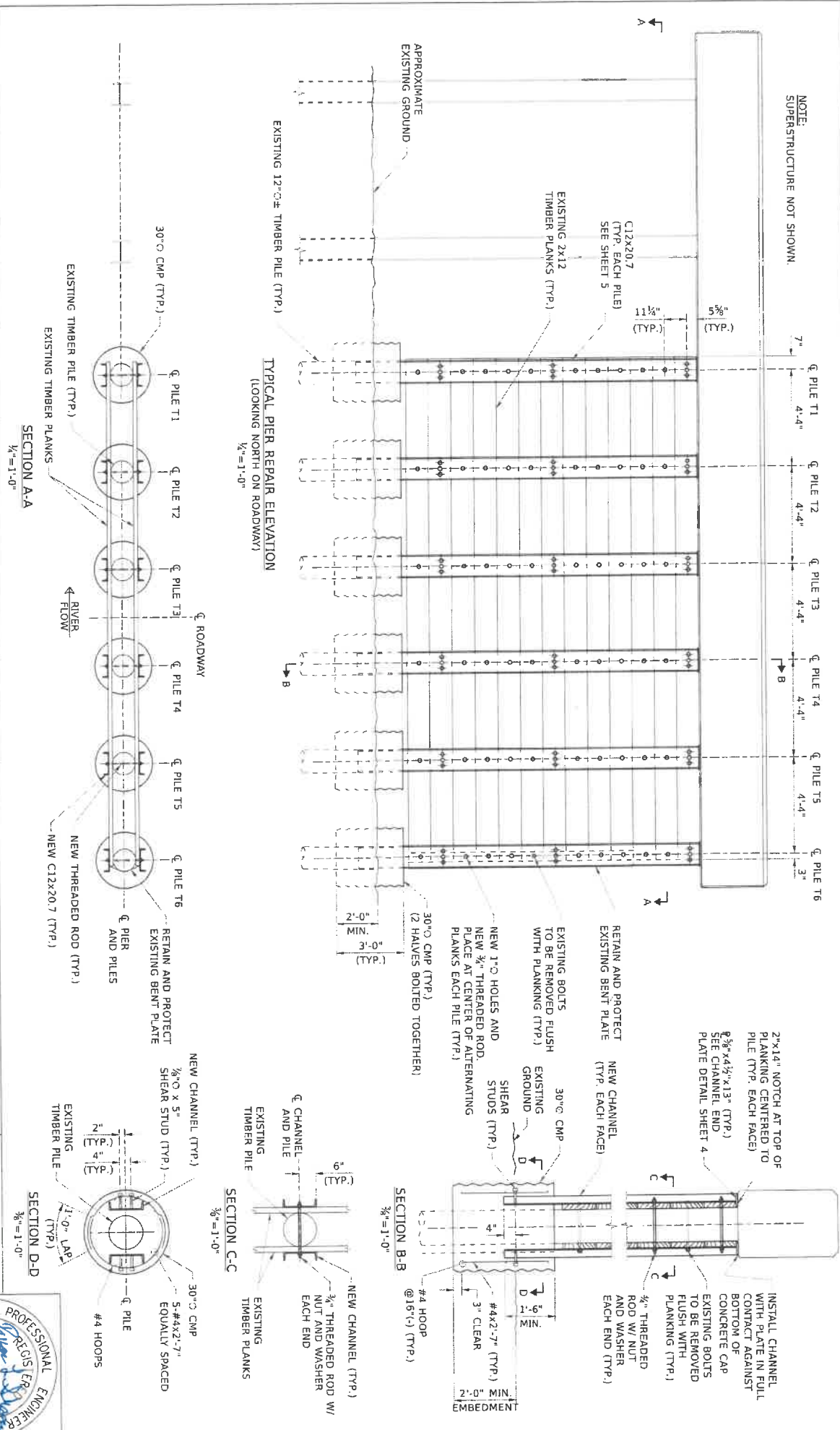
ENGLISH
PROJECT NO.

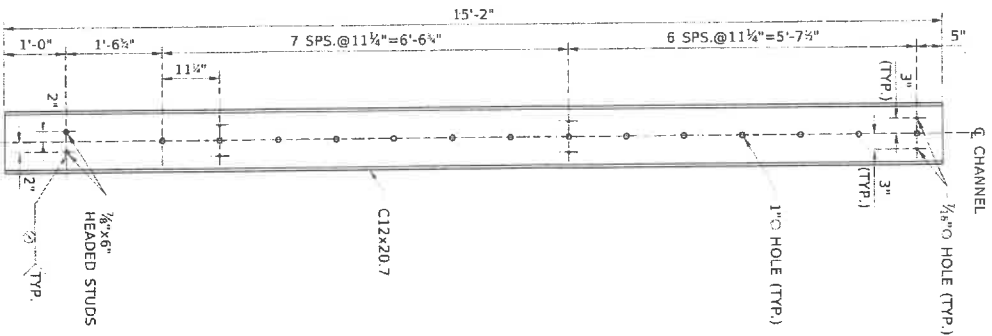
PIER REPAIR DETAILS (1 OF 2)

315' PRECAST CONCRETE GIRDER BRIDGE
ECKERT ROAD OVER BOISE RIVER

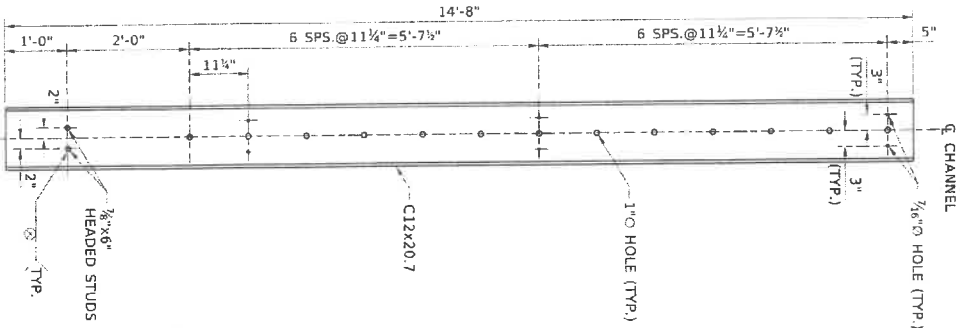
BRIDGE PLANS	
BRIDGE KEY NO. 12810	KEY NO.
COUNTY ADA	
BRIDGE DWG. NO. 6A04-C	SHEET 3 OF 5

13061
2/13/2005
STATE OF IDAHO
RYAN L. SHERMAN

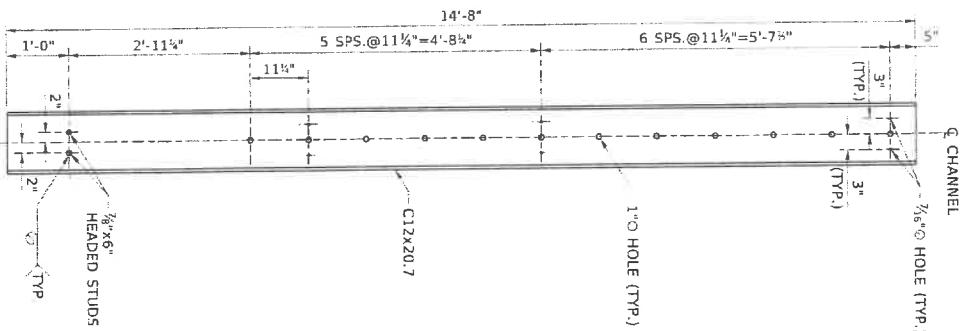




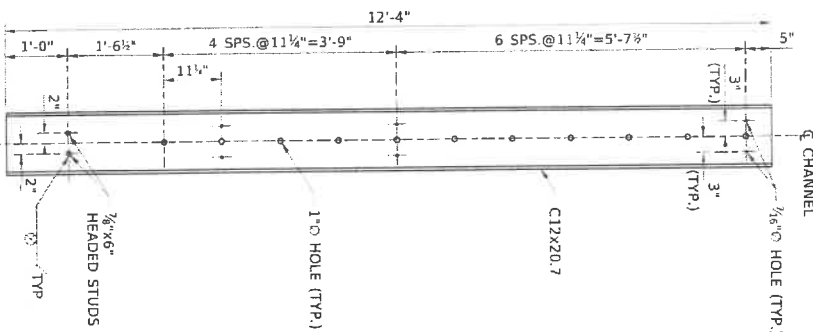
CHANNEL FOR PIERS 1, 2, & 3
(36 REQUIRED)
 $\frac{1}{2}" = 1'-0"$



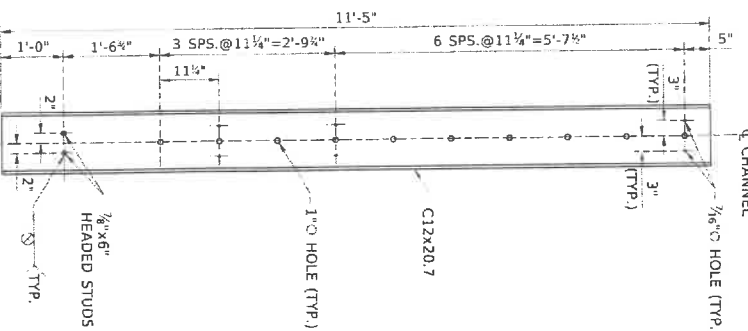
CHANNEL FOR PIERS 4 & 5
(24 REQUIRED)
 $\frac{1}{2}" = 1'-0"$



CHANNEL FOR PIER 6
(12 REQUIRED)
 $\frac{1}{2}" = 1'-0"$



CHANNEL FOR PIER 7
(12 REQUIRED)
 $\frac{1}{2}" = 1'-0"$



CHANNEL FOR PIER 8
(12 REQUIRED)
 $\frac{1}{2}" = 1'-0"$

NO.	DATE	BY	REVISIONS
1			DESIGNED
2			DESIGN CHECKED
3			DET. CHAN
4			DWG. CHECKED
5			B. SCHILLER
6			CORRECTIONS

SCALES SHOWN	ARE FOR 11" X 17"
PRINTS ONLY	
CADD FILE NAME	M:\211\Bridges\Channel\2111818.dwg
YOUR Stamp/Title/Model/2018 Electronic Ownership	
DRAWING DATE	13-FEB-2025

IDAHO	ENGLISH
TRANSPORTATION	PROJECT NO.
DEPARTMENT	

CHANNEL FABRICATION DETAILS	BRIDGE PLANS
315' PRECAST CONCRETE GIRDER BRIDGE	
ECKERT ROAD OVER BOISE RIVER	

COUNTY	BRIDGE KEY NO.
ADA	12810
BRIDGE DWG. NO.	KEY NO.
6404-C	5 OF 5

