

Bridge 06891 Inspection Report



Latitude:35.92304, Longitude:-90.70466

Route:141 Section:01 Log:5.78

Arnold Road ID:16x141x1xA, Arnold Log mile:5.685

District 10, 31 - Craighead County

Owner: 1 - State Highway Agency

Inspection Direction: 2 - S to N

Bridge Posting Information

41 - Structure Open/Posted/Closed: A - Open, no restriction

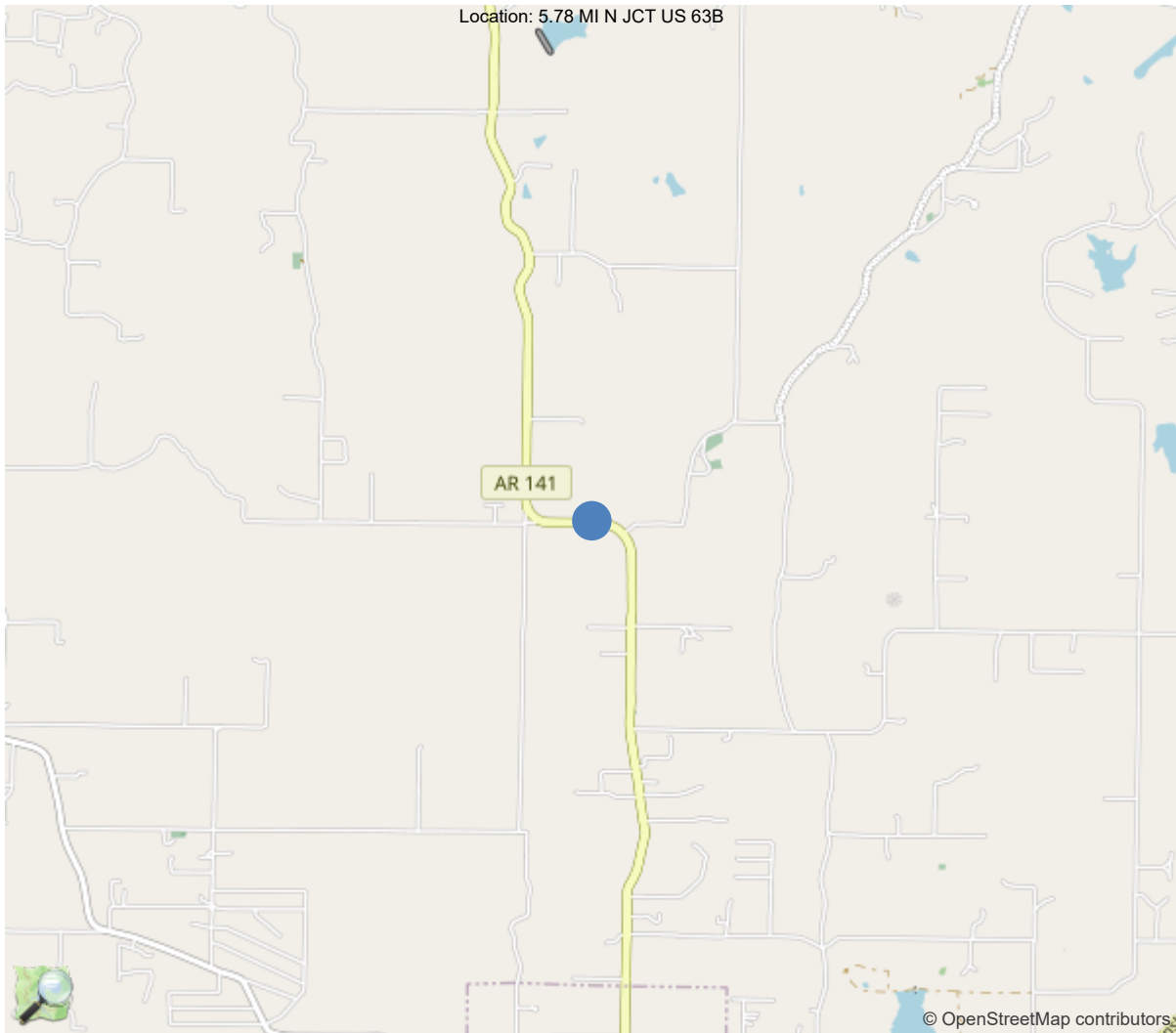
70 - Bridge Posting: 5 - Equal to or above legal loads

Legal Load	Calculated Capacity	Beginning of Bridge Sign Current Value	End of Bridge Sign Current Value
Code 4 (22 Tons)	40		
Code 9 (31 Tons)	50		
Code 5 (40 Tons)	60		

If calculated capacity is less than the Legal Load Listed, the Bridge Legally Requires Posting Signs to be installed by the Bridge Owner.



30"x36" AR



35.92304, -90.70466

National Bridge Inventory Data Sheet

IDENTIFICATION	
(1) State Names	5 - Arkansas
(8) Structure Number	06891
(5) Inventory Route	1
(2) Highway Agency District	10 - District 10
(3) County Code	31 - Craighead County
(4) Place Code	0
(6) Features Intersected	Mud Creek Relief
(7) Facility Carried	SH 141-01-LM 5.78
(9) Location	5.78 MI N JCT US 63B
(11) Mile Point	5.78 mi
(12) Base Highway Network	Yes
(13) LRS Inventory Rte & Subrte	0000141010
(16) Latitude	35.92304
(17) Longitude	-90.70466
(98) Border Bridge State Code	
(99) Border Bridge Structure No.	
STRUCTURE TYPE AND MATERIAL	
(43) Main Structure Type	42
Material	4 - Steel continuous
Type	2 - Stringer/Multi-beam or girder
(44) Approach Structure Type	00
Material	0 - Other
Type	0 - Other
(45) No. of Spans in Main Unit	3
(46) No. of Approach Spans	0
(107) Deck Structure Type	1 - Concrete Cast-in-Place
(108) Wearing Surface/Protective System	
Type of Wearing Surface	1 - Monolithic Concrete (concurrently pl
Type of Membrane	0 - None
Type of Deck Protection	1 - Epoxy Coated Reinforcing
AGE AND SERVICE	
(27) Year Built	2004
(106) Year Reconstructed	0
(42) Type of Service	15
On	1 - Highway
Under	5 - Waterway
(28) Lane	
On	2
Under	0
(29) Average Daily Traffic	2700
(30) Year of ADT	2018
(109) Truck ADT	11 %
(19) Bypass, Detour Length	5 mi
GEOMETRIC DATA	
(48) Length of Maximum Span	24 ft
(49) Structure Length	74.2 ft
(50) Curb or Sidewalk Width	
Left	0 ft
Right	0 ft
(51) Bridge Roadway Width Curb to Curb	40 ft
(52) Deck Width Out to Out	43.2 ft
(32) Approach Roadway Width (W/Shoulders)	40 ft
(33) Bridge Median	0 - No median
(34) Skew	0 Deg
(35) Structure Flared	0 - No flare
(10) Inventory Route Min Vert Clear	99.99 ft
(47) Inventory Route Total Horiz Clear	41 ft
(53) Min Vert Clear Over Bridge Rdwy	99.99 ft
(54) Min Vert Underclear	0 ft
Ref:	
(55) Min Lat Underclear RT	99.9 ft
Ref:	
(56) Min Lat Underclear LT	0 ft
NAVIGATION DATA	
(38) Navigation Control	0 - No navigation control on w
(111) Pier Protection	1 - Navigation protection not
(39) Navigation Vertical Clearance	0 ft
(116) Vert-Lift Bridge Nav Min Vert Clear	0 ft
(40) Navigation Horizontal Clearance	0 ft

CLASSIFICATION	
(112) NBIS Bridge Length	Y
(104) Highway System	0
(26) Functional Class	6 - Rural Minor Arterial
(100) Defense Highway	0 - The inventory route is not
(101) Parallel Structure	N - No parallel structure exists
(102) Direction of Traffic	2 - way traffic
(103) Temporary Structure	
(105) Federal Lands Highways	0 - N/A
(110) Designated National Network	0 - The inventory route is not
(20) Toll	3 - On free road. The structure
(21) Maintain	1 - State Highway Agency
(22) Owner	1 - State Highway Agency
(37) Historical Significance	5 - Bridge is not eligible for
CONDITION	
(58) Deck	8
(59) Superstructure	7
(60) Substructure	8
(61) Channel & Channel Protection	7
(62) Culverts	N
LOAD RATING AND POSTING	
(31) Design Load	5 - MS 18 / HS 20
(63) Operating Rating Method	1
(64) Operating Rating	
Type	1 - Load Factor(LF)
Rating	60
(65) Inventory Rating Method	1 - Load Factor(LF)
(66) Inventory Rating	
Type	
Rating	36
(70) Bridge Posting	5 - Equal to or above legal loads
(41) Structure Open/Posted/Closed	A - Open, no restriction
APPRAISAL	
(67) Structural Evaluation	
(68) Deck Geometry	6
(69) Clearances, Vertical/Horizontal	N
(71) Waterway Adequacy	9
(72) Approach Roadway Alignment	8
(36A) Bridge Railings	1 - Inspected feature meets current
(36B) Transitions	1 - Inspected feature meets current
(36C) Approach Guardrail	1 - Inspected feature meets current
(36D) Approach Guardrail Ends	1 - Inspected feature meets current
(113) Scour Critical Bridges	5 - Bridge foundations determined t
PROPOSED IMPROVEMENTS	
(75) Type of Work	
(76) Length of Structure Improvement	0 ft
(94) Bridge Improvement Cost	\$ 0
(95) Roadway Improvement Cost	\$ 0
(96) Total Project Cost	\$ 0
(97) Year of Improvement Cost Estimate	
(114) Future ADT	3355
(115) Year of Future ADT	2028

INSPECTIONS *			
(90) Inspection Date			04/04/2022
(91) Frequency			24
(92) Critical Feature Inspection	Done	Freq. (Mon)	Date
A: Fracture Critical Detail	No		
B: Underwater Inspection	No		
C: Other Special Inspection	No		
* The inspection date and frequency information in this box contains the current NBI date and frequency information. Please refer to the report header for the date this inspection was conducted.			

Team Lead: James Adams, Inspection Date: 04/04/2022

Specifications for National Bridge Inventory Sheets

IDENTIFICATION	
B.ID.01 Bridge Number	06891
B.ID.02 Bridge Name	
B.ID.03 Previous Bridge No.	
B.W.01 Year Built	

LOCATION	
B.L.01 State Code	5 - Arkansas
B.L.02 County Code	31 - Craighead County
B.L.03 Place Code	00000 - N/A
B.L.04 Highway Agency District	10 - District 10
B.L.05 Latitude	35.92304
B.L.06 Longitude	-90.70466
B.L.07 Border Bridge Number	
B.L.08 Border Bridge State or Country Code	
B.L.09 Border Bridge Insp. Resp.	
B.L.10 Border Bridge Designated Lead State	
B.L.11 Bridge Location	
B.L.12 Metropolitan Planning Organization	

CLASSIFICATION	
B.CL.01 Owner	
B.CL.02 Maint. Responsibility	
B.CL.03 Federal or Tribal Land Access	
B.CL.04 Historic Significance	
B.CL.05 Toll	
B.CL.06 Emergency Evacuation Designation	

ROADSIDE HARDWARE	
B.RH.01A Bridge Railing Type	
B.RH.01B Bridge Railing Year (YY)	
B.RH.01C Bridge Railing Test Level	
B.RH.02A Transition Type	
B.RH.02B Transition Year (YY)	
B.RH.02C Transition Test Level	

BRIDGE GEOMETRY	
B.G.01 NBIS Bridge Length	
B.G.02 Total Bridge Length	
B.G.03 Max Span Length	
B.G.04 Min Span Length	
B.G.05 Bridge Width Out-to-Out	
B.G.06 Bridge Width Curb-to-Curb	
B.G.07 Left Curb or Sidewalk Width	
B.G.08 Right Curb or Sidewalk Width	
B.G.09 Approach Roadway Width	

B.G.10 Bridge Median	
B.G.11 Skew	
B.G.12 Curved Bridge	
B.G.13 Max Bridge Height	
B.G.14 Sidehill Bridge	
B.G.15 Irregular Deck Area	
B.G.16 Calculated Deck Area	

LOADS AND LOAD RATING	
B.LR.01 Design Load	
B.LR.02 Design Method	
B.LR.03 Load Rating Date	
B.LR.04 Load Rating Method	
B.LR.05 Inventory Load Rating Factor	
B.LR.06 Operating Load Rating Factor	
B.LR.07 Controlling Legal Load Rating Factor	
B.LR.08 Routine Permit Loads	

INSPECTION REQUIREMENTS	
B.IR.01 NSTM Inspection Required	
B.IR.02 Fatigue Details	
B.IR.03 UW Inspection Required	
B.IR.04 Complex Feature	

COMPONENT CONDITION RATINGS	
B.C.01 Deck Condition Rating	
B.C.02 Superstructure Condition	
B.C.03 Substructure Condition	
B.C.04 Culvert Condition	
B.C.05 Bridge Railing Condition	
B.C.06 Bridge Railing Transitions Condition	
B.C.07 Bridge Bearings Cond.	
B.C.08 Bridge Joints Condition	
B.C.09 Channel Condition Rating	
B.C.10 Channel Protection Condition	
B.C.11 Scour Condition Rating	
B.C.12 Bridge Condition Classification	
B.C.13 Lowest Condition Rating	
B.C.14 NSTM Insp. Condition	
B.C.15 UW Inspection Condition	

APPRAISAL	
B.AP.01 Approach Roadway Alignment	
B.AP.02 Overtopping Likelihood	
B.AP.03 Scour Vulnerability	
B.AP.04 Scour Plan of Action	
B.AP.05 Seismic Vulnerability	



Team Lead: James Adams, Inspection Date: 04/04/2022

HIGHWAY ROUTES					
Highway Parent	B.RT.01 Route Designation	B.RT.02 Route Number	B.RT.03 Route Direction	B.RT.04 Route Type	B.RT.05 Service Type

POSTING STATUS DATA	
B.PS.01 Load Posting Status	B.PS.02 Posting Status Change Date

LOAD EVALUATION AND POSTING			
B.EP.01 Legal Load Configuration	B.EP.02 Legal Load Rating Factor	B.EP.03 Posting Type	B.EP.04 Posting Value



Inspection Notes

58 - Deck (8 - VERY GOOD CONDITION - no problems noted.)

Approach slabs have a few minor longitudinal cracks and minor abrasion.

Deck has a few minor longitudinal and transverse cracks.

Deck has minor traffic wear in wheel paths and a few areas of minor abrasion with areas of missing coarse aggregate.

Compression seals have a few areas beginning to lose adhesion.

Concrete portion of soffit has a few cracks with efflorescence.

59 - Superstructure (7 - GOOD CONDITION - some minor problems.)

Ends of girders have areas of granular texture.

Exterior girders have a few areas of granular texture on outside face. Bottom flange has areas of flaking rust.

60 - Substructure (8 - VERY GOOD CONDITION - no problems noted.)

Backwall portion of abutments have a few vertical cracks

Channel has small trees and brush growing under and adjacent to bridge.

Minor drift across channel.

61 - Channel/Channel Protection (7 - Bank protection is in need of minor repairs. River control devices and embankment protection have a little minor damage. Banks and/or channel have minor amounts of drift.)

Channel has small trees and brush growing under and adjacent to bridge.

Minor drift across channel



Asset #06891(Routine)
SH 141-01-LM 5.78 over Mud Creek Relief

Location: 5.78 MI N JCT US 63B

Team Lead: James Adams Inspection Date: 04/04/2022

National Bridge Element Quantities and Notes

ELEMENTS	DESCRIPTION	UNITS	TOTAL	CS1	CS2	CS3	CS4
12	Reinforced Concrete Deck	SF	3108	2676	394	38	0
1120	Efflorescence/Rust Staining	SF	24	0	24	0	0
1130	Cracking (RC and Other)	SF	222	0	222	0	0
1190	Abrasion/Wear (PSC/RC)	SF	186	0	148	38	0
107	Steel Open Girder/Beam	LF	360	216	144	0	0
1000	Corrosion	LF	144	0	144	0	0
515	Steel Protective Coating	SF	3181	3015	120	46	0
3430	Oxide Film Degradation Color/Texture Adherence(Steel Protective Coatings)	SF	166	0	120	46	0
215	Reinforced Concrete Abutment	LF	124	112	12	0	0
1130	Cracking (RC and Other)	LF	12	0	12	0	0
227	Reinforced Concrete Pile	EA	10	10	0	0	0
234	Reinforced Concrete Pier Cap	LF	84	84	0	0	0
302	Compression Joint Seal	LF	86	53	33	0	0
2320	Seal Adhesion	LF	33	0	33	0	0
310	Elastomeric Bearing	EA	20	20	0	0	0
321	Reinforced Concrete Approach Slab	SF	1752	1679	73	0	0
1130	Cracking (RC and Other)	SF	72	0	72	0	0
1190	Abrasion/Wear (PSC/RC)	SF	1	0	1	0	0
331	Reinforced Concrete Bridge Railing	LF	144	140	4	0	0
1130	Cracking (RC and Other)	LF	4	0	4	0	0

Inspection Photos and Notes



Elevation

Maintenance Needs

Date Reported: 04/20/2020

Priority: D- Routine

Type of Work: (Inactive) (Inactive) 1 - Clean

Status: Monitor

Component: Superstructure

Deficiency Description

Ends of girders have areas of granular texture.

Exterior girders have a few areas of granular texture on outside face. Bottom flange has areas of flaking rust.

Remarks



Outside girders



Outside girders



Exterior girders



Exterior girders

Maintenance Needs

Date Reported: 04/01/2016

Priority: (Inactive) (Inactive) G - General/
Preventive maintenance

Status: Monitor

Type of Work: Repair (General)

Component: Deck

Deficiency Description

Deck has a few minor longitudinal and transverse cracks.

Deck has minor traffic wear in wheel paths and a few areas of minor abrasion. Deck has areas of missing coarse aggregate.

Remarks



Looking North



Looking South



Asset #06891(Routine)
SH 141-01-LM 5.78 over Mud Creek Relief
Location: 5.78 MI N JCT US 63B

Team Lead: James Adams **Inspection Date:** 04/04/2022

Maintenance Needs

Date Reported: 04/20/2020

Priority: (Inactive) (Inactive) G - General/
Preventive maintenance

Status: Monitor

Type of Work: Repair (General)

Component: Element

Deficiency Description

Compression seals have a few areas beginning to lose adhesion.

Remarks

Routine Maintenance

Check Box Maintenance Items

Type of Maintenance	Is Recommended?
A-54 - Sealable Deck Cracks	
A-55 - Deck Washing Needed	
A-56 - Joint Cleaning/Flushing Needed	
A-57 - Beam End and Bearing Paint Needed	
A-58 - Cap Cleaning/Flushing Needed	
A-59 - Joint Repair Needed	
A-60 - Full Beam Painting Needed	
A-61 - Polymer Overlay Advised	
A-62 - Hydro and LMC Advised	
A-63 - Missing/Incorrect Log Mile Signage	
A-64 - Vegetation Removal Requested	
A-65 - Clogged deck drains?	
A-66 - Approach minor pothole/leveling needed	

A-54 - Sealable Deck Cracks

A-55 - Deck Washing Needed

A-56 - Joint Cleaning/Flushing Needed



Asset #06891(Routine)

SH 141-01-LM 5.78 over Mud Creek Relief

Location: 5.78 MI N JCT US 63B

Team Lead: James Adams Inspection Date: 04/04/2022

A-57 - Girder End and Bearing Painting Needed

A-58 - Cap Cleaning/Flushing Needed

A-59 - Joint Repair Needed

A-60 - Full Girder Painting Needed

A-61 - Polymer Overlay Advised

A-62 - Hydro and LMC Advised

A-63 - Missing/Incorrect Log Mile Signage

A-64 - Vegetation Removal Requested

A-65 - Clogged deck drains?



Asset #06891(Routine)

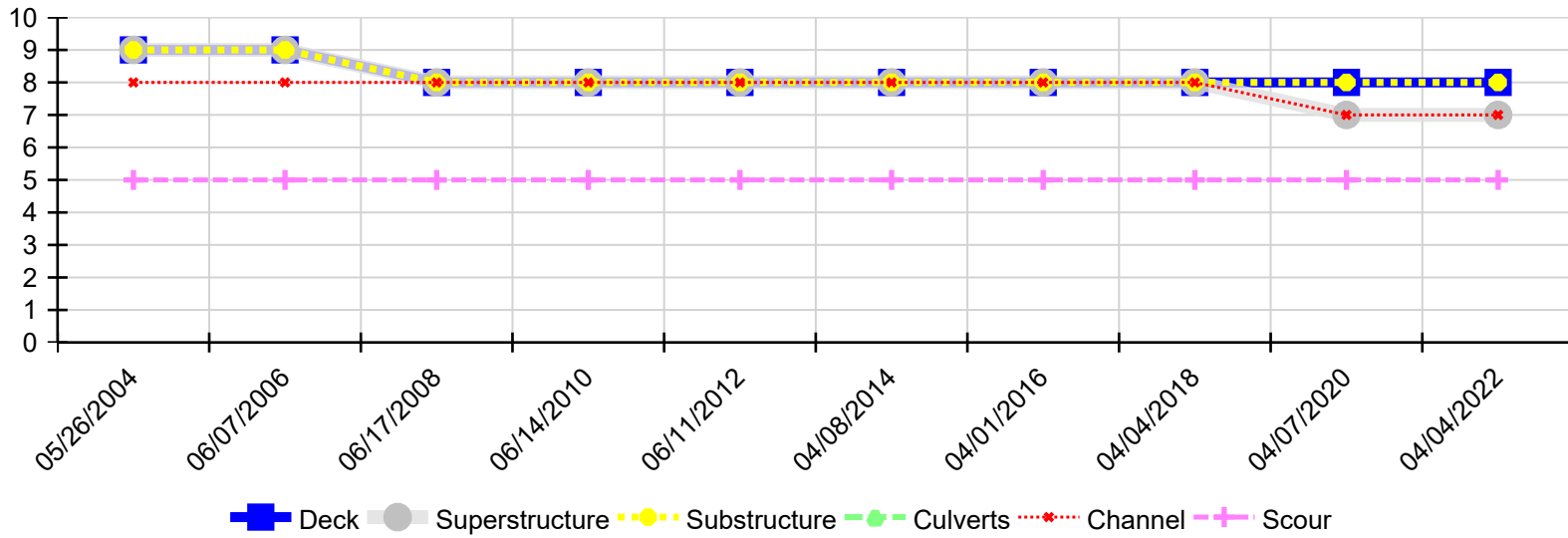
SH 141-01-LM 5.78 over Mud Creek Relief

Location: 5.78 MI N JCT US 63B

Team Lead: James Adams Inspection Date: 04/04/2022

A-66 - Approach minor pothole/leveling needed

Condition History



Inspection Date	Deck	Superstructure	Substructure	Culverts	Channel	Scour
04/04/2022	8	7	8	N	7	5
04/07/2020	8	7	8	N	7	5
04/04/2018	8	8	8	N	8	5
04/01/2016	8	8	8	N	8	5
04/08/2014	8	8	8	N	8	5
06/11/2012	8	8	8	N	8	5
06/14/2010	8	8	8	N	8	5
06/17/2008	8	8	8	N	8	5
06/07/2006	9	9	9	N	8	5
05/26/2004	9	9	9	N	8	5