



PLANNING AND DESIGN TOOLS: BRIDGE DATA AT THE CLICK OF A TAB FOR ALL TXDOT DISCIPLINES

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October 14, 2015

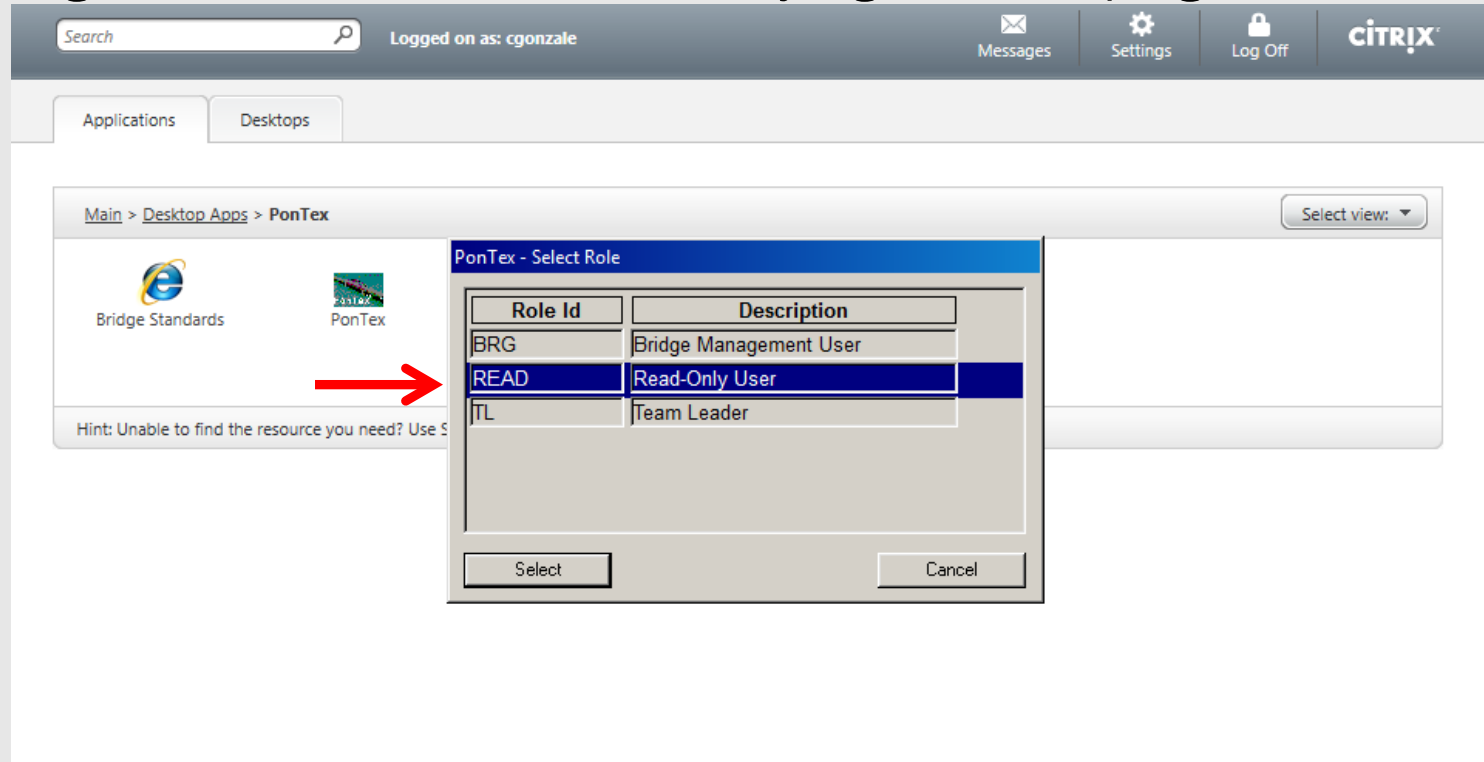
BRIDGE MANAGEMENT DATABASE



- The current Bridge Management Database is named PONTEX. Its' purpose is to store collected bridge inspection information and pertinent information about bridges, and allow Users to manage this data. It is also used by PONTIS, an AASHTO bridge management application, by the federal government to analyze this data. FHWA uses PONTIS in their review of TxDOT's compliance with the National Bridge Inspection Standards (NBIS) as per 23 CFR 650 Subpart.

BRIDGE MANAGEMENT DATABASE: User Role

There are different types of Users and PonTex recognizes these Users depending on the Role selected when they sign into the program.



The “Read Only User” is the Role most non-bridge personnel parties will be issued to access the database.

BRIDGE MANAGEMENT DATABASE : ACCESS to PONTEX

- Requesting access to the bridge inspection database consists of submitting a TxDOT Now ticket.

The screenshot shows the TxDOT Now service catalog page. The browser address bar displays the URL: https://txdotnow.service-now.com/ess/catalog.do?sysparm_document_key=sc_cat_item_guide,b2d336572b473500fe1062a119da1555. The page header includes the Texas Department of Transportation logo and a search bar. Below the header is a navigation bar with links: I NEED, SOMETHING'S BROKEN, KNOWLEDGE, CHECK TICKET STATUS, ERP, and NAVIGATION HELP.

The main content area is titled "Describe Needs" and "Choose Options". A red arrow points to the "Order guide - Grant, Modify, or Revoke Access" link. Below this, the "Requestor Information" section includes a "Requested For" field with the name "Claudia Gonzalez-Liendo (CGONZALE)" and a "Date needed by" field. The "Person to Contact for Questions" field is also present.

The "Please select the items to grant, modify, or remove access" section contains two columns of checkboxes. The "General Access" column includes options for Network Access, Mainframe Access, ERP Role Request, WebEx Account Request, and SiteManager/EPRS and Other System Access. The "Citrix Access" column includes options for Standard Citrix Access, SiteManager Citrix Access, MBITS Citrix Access, PonTex Citrix Access (which is checked), and Primavera P6 Citrix Access. A red arrow points to the "PonTex Citrix Access" checkbox.

The "Terminate / Revoke" section includes a "General Access" checkbox for "Terminate / Revoke". A "Choose Options" button is located at the bottom right of the form.

BRIDGE MANAGEMENT DATABASE: Components

MENU →

BRIDGE &
ROUTE TABS →

IDENTIFICATION
FIELDS →

PonTex

File Edit Reports Tools Help

Structure Number: [Navigation Buttons]

Programming | Clearance | Bridge Entry | ← PLANNING TABS

Bridge List | Identification | Geometry | Structure | Loading | Inventory Route | Intersecting Route | Inspection & Appraisal | Element Condition | Components

Dist: Co: Cont: Sect: Maint Sec: ☐ Clearance Struc List Sys: All ☐ Insp Status ☐ Brdg Status Reset Filter

Dist	Cnty	Maint Sect	Structure Number	Features Intersected	Facility Carried	Location	Last Insp Date	
01	060	03	01-060-0-0136-03-019	BARNETT SLOUGH	SH 24	1.50 MI NE OF HUNT C/L	03/10/2015	02
01	060	03	01-060-0-0136-03-021	JERNIGAN CRK REL NO 2	SH 24	3.80 MI NE OF HUNT C/L	03/10/2015	02
01	060	03	01-060-0-0136-03-022	JERNIGAN CRK REL NO 1	SH 24	3.90 MI NE OF HUNT C/L	03/10/2015	02
01	060	03	01-060-0-0136-03-023	JERNIGAN CREEK	SH 24	4.00 MI NE OF HUNT C/L	03/10/2015	02
01	060	03	01-060-0-0136-03-026	HONEY CREEK	SH 24	1.10 MI NE OF FM 2890	03/10/2015	02
01	060	03	01-060-0-0136-03-027	JOHNS CREEK	SH 24	3.20 MI SW OF FM 64	03/10/2015	02
01	060	03	01-060-0-0136-03-028	DOCTORS CREEK	SH 24	1.60 MI SE OF FM 64	03/11/2015	02
01	060	03	01-060-0-0136-03-057	BARNETT CREEK	SH 24	0.90 MI NE OF HUNT C/L	03/10/2015	02
01	060	03	01-060-0-0136-03-083	DRAIN	SH 24	0.60 MI SW OF FM 128	03/12/2015	02
01	060	03	01-060-0-0136-04-058	SOUTH BIG CREEK	SH 24 SB	0.15 MI SW OF FM 128	03/12/2015	02
01	060	03	01-060-0-0136-04-059	NORTH BIG CREEK	SH 24 SB	0.80 MI NE OF FM 128	03/12/2015	02
01	060	03	01-060-0-0136-04-061	NORTH BRUSHY CREEK	SH 24 SB	2.00 MI SW OF SH 19	03/14/2015	02
01	060	03	01-060-0-0136-04-062	LAKE CREEK	SH 19 WB	0.40 MI NE OF SH 19	03/13/2015	02
01	060	03	01-060-0-0136-04-079	N SULPHUR RIVER RELIEF	SH 19 EB	0.15 MI S OF LAMAR C/L	03/13/2015	02
01	060	03	01-060-0-0136-04-101	LAKE CREEK	SH 19 EB	0.40 MI NE OF SH 19	03/13/2015	02
01	060	03	01-060-0-0136-04-102	N SULPHUR RIVER RELIEF	SH 19 WB	0.15 MI S OF LAMAR C/L	03/13/2015	02
01	060	03	01-060-0-0136-04-126	SOUTH BIG CREEK	SH 24 NB	0.15 MI SW OF FM 128	03/12/2015	02
01	060	03	01-060-0-0136-04-127	NORTH BIG CREEK	SH 24 NB	0.80 MI E OF FM 128	03/12/2015	02

Refresh List View Export

54256 bridges retrieved. TX:XENAPPS-10 PONTISPD CGONZALE READ 88 09-28-2015 11:23:37

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number:

Programming | Clearance | Bridge Entry

Bridge List | Identification | Geometry | Structure | Loading | Inventory Route | Intersecting Route | Inspection & Appraisal | Element Condition | Components

Dist: Co: Cont: Sect: Maint Sec: ☐ Clearance Struc List Sys: ☐ Insp Status ☐ Brdg Status

Dist	Cnty	Maint Sect	Structure Number	Features Intersected	Facility Carried	Location	Last Insp Date	Rel M
06	156	11	06-156-0-0005-04-032	MUSTANG DRAW	IH 20	1.60 MI W OF FM 829	07/18/2014	0150
06	156	11	06-156-0-0005-04-205	IH 20	IH 20 Bus	2.10 Mi W of SH 137	08/25/2015	0153
06	156	11	06-156-0-0005-04-206	SH 137	IH 20 WB	At JCT of SH 137 & IH 20	08/25/2015	0155
06	156	11	06-156-0-0005-04-207	SH 137	IH 20 EB	IH 20 at SH 137	08/25/2015	0155
06	156	11	06-156-0-0005-04-208	DRAW	IH 20	0.45 MI E OF SH 137	02/14/2013	0156
06	156	11	06-156-0-0005-04-209	IH 20	IH 20 Bus (US 80)	2.55 Mi E of SH 137	08/25/2015	0158
06	156	11	06-156-0-0005-04-212	IH 20 & UPRR	FM 829	4.45 MI W OF SH 137	08/26/2015	0151
06	156	11	06-156-0-0005-16-136	DRAIN	IH 20 BUS	0.65 MI E OF SH 137	02/09/2015	0340
06	156	11	06-156-0-0005-16-137	DRAIN	IH 20 BUS	0.55 MI E OF SH 137	02/09/2015	0340

Refresh List View **IF YOU WANT TO EXPORT THIS LIST, CLICK HERE** Export

9 bridges retrieved. TX: XENAPPS-10 PONTISPD CGONZALE READ 88 09-28-2015 11:26:32

BRIDGE MANAGEMENT DATABASE

The screenshot shows the PonTex Bridge Management Database application. A 'Save As' dialog box is open, displaying a file explorer view of the local drive C:. The 'Save in:' field is set to '2015CONFERENCE_COLLEGE'. The 'File name' field is empty. The 'Encoding' dropdown is set to 'UTF-8'. The 'Save' button is highlighted with a red arrow.

The background window displays a table of bridge data. The table has columns: 'Route', 'Intersecting Route', 'Inspection & Appraisal', 'Element Condition', 'Components', 'Clearance', 'Struc List', 'Sys', 'Insp Status', 'Brdg Status', 'Facility Carried', 'Location', 'Last Insp Date', and 'Rel M'. The table contains 10 rows of data.

IT IS IMPORTANT TO SAVE THE EXPORTED DATA INTO A LOCAL DRIVE ACCESSIBLE BY THE USER. WHILE LOGGED INTO THE DATABASE, A DRIVE IDENTIFIED WITH A "\$" REPRESENTS A LOCAL DRIVE.

Export

9 bridges retrieved. TX:XENAPPS-10 PONTISPD CGONZALE READ 88 09-28-2015 11:29:50

BRIDGE MANAGEMENT DATABASE and EXCEL

- Excel spreadsheet created when exporting data directly from the “Bridge List” tab.

BRIDGElist.xls [Compatibility Mode] - Microsoft Excel

File

Home

Insert

Page Layout

Formulas

Data

Review

View

Paste

Clipboard

Arial

10

Font

Alignment

General

\$

%

0.00

0.00

Number

Conditional Formatting

Format as Table

Cell Styles

Insert

Delete

Format

Sort & Find & Filter

Select

Editing

A1		DISTRICT												
	A	B	C	D	E	F	G	H	I	J	K	L	M	
	DISTRICT	COUNTY	BRKEY	FEATINT	FACILITY	LOCATION	LASTINSP	TX_STATU	MAINT_SERM	RKR_N	CONTROL	SECTION	USERKEY	
2	20	036	200360024	DRAW	SH 61	0.4 MI N C	5/24/2014 0:00 A	01	0460	+018	0242	03		
3	20	036	200360024	ALBRITTO	SH 61	0.5 MI S C	5/14/2014 0:00 A	01	0462	+008	0242	03		
4	20	036	200360024	LONE STA	SH 61	0.1 MI N C	5/21/2014 0:00 A	01	0468	+002	0242	03		
5	20	036	200360024	WHITES	ESH 61	0.1 MI N C	5/21/2014 0:00 A	01	0466	+001	0242	03		
6	20	036	200360024	ANAHUAC	FM 563	1.5 MI S C	5/21/2014 0:00 A	01	0470	+011	0242	05		
7	20	036	200360024	OYSTER	FM 1985	5.1 MI E C	5/23/2014 0:00 A	01	0730	+009	0242	06		
8	20	036	200360024	EAST BAY	FM 1985	3.4 MI W C	5/23/2014 0:00 A	01	0736	+012	0242	06		
9	20	036	200360024	DRAIN	FM 1985	0.7 MI E C	5/23/2014 0:00 A	01	0726	+005	0242	06		
10	20	036	200360036	DRAIN	SH 124	1.5 MI N C	5/22/2014 0:00 A	01	0484	+010	0367	01		
11	20	036	200360036	DRAIN	SH 124	1.1 MI N C	5/22/2014 0:00 A	01	0484	+014	0367	01		
12	20	036	200360036	SPINDLET	SH 124	2.8 MI S C	5/22/2014 0:00 A	01	0482	+017	0367	01		
13	20	036	200360036	LITTLE EL	SH 124	1.5 MI S C	5/22/2014 0:00 A	01	0486	+021	0367	01		
14	20	036	200360036	BIG ELM	ESH 124	0.2 MI S C	5/22/2014 0:00 A	01	0488	+013	0367	01		
15	20	036	200360036	DRAW	SH 65	0.7 MI W C	5/21/2014 0:00 A	01	0728	+016	0368	01		
16	20	036	200360036	ELM BAY	SH 65	0.1 MI E C	5/21/2014 0:00 A	01	0732	+001	0368	01		
17	20	036	200360036	LONE STA	SH 65	2.3 MI E C	5/21/2014 0:00 A	01	0724	+002	0368	01		
18	20	036	200360036	E FORK D	SH 65	1.1 MI E C	5/21/2014 0:00 A	01	0726	+012	0368	01		
19	20	036	200360036	DRAW	SH 124	0.2 MI N C	6/28/2012 0:00 A	01	0480	+006	0368	01		
20	20	036	200360036	OYSTER	ESH 65	1.0 MI W C	5/21/2014 0:00 A	01	0728	+014	0368	01		
21	20	036	200360036	SPINDLET	SH 65	2.9 MI E C	5/21/2014 0:00 A	01	0734	+009	0368	01		
22	20	036	200360036	CEDAR B	SH 146	3.7 MI S C	6/5/2014 0:00 A	01	0480	+003	0389	02		
23	20	036	200360036	SMITHS	GSH 146	0.4 MI N C	6/5/2014 0:00 A	01	0476	+003	0389	02		
24	20	036	200360036	MCGAR	GSH 146	0.9 MI N C	6/5/2014 0:00 A	01	0478	+011	0389	02		
25	20	036	200360036	DRAW	SH 146	3.7 MI N C	6/5/2014 0:00 A	01	0472	+007	0389	02		
26	20	036	200360036	IRRIGATIC	SH 146	3.2 MI N C	6/5/2014 0:00 A	01	0472	+014	0389	02		
27	20	036	200360036	SH 146	SP RR	1.5 MI S C	6/8/2010 0:00 A	01	0476	+020	0389	02		
28	20	036	200360050	BARBERS	IH 10	1.6 MI E C	6/8/2014 0:00 A	01	0799	+002	0508	02		
29	20	036	200360050	TRINITY R	IH 10 EB	2.2 MI E C	5/14/2014 0:00 A	01	0805	+006	0508	02		

BRIDGElist

Ready

100%

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number:

Programming | Clearance | Bridge Entry | **Bridge List** | Identification | Geometry | Structure | Loading | Inventory Route | Intersecting Route | Inspection & Appraisal | Element Condition | Components

Dist: Co: Cont: Sect: Maint Sec: ☐ Clearance Struc List Sys: ☐ Insp Status ☐ Bldg Status

Dist	Cnty	Maint Sect	Structure Number	Features Intersected	Facility Carried	Location	Last Insp Date	Rel M
06	156	11	06-156-0-0005-04-032	MUSTANG DRAW	IH 20	1.60 MI W OF FM 829	07/18/2014	0150
06	156	11	06-156-0-0005-04-205	IH 20	IH 20 Bus	2.10 MI W of SH 137	08/25/2015	0153
06	156	11	06-156-0-0005-04-206	SH 137	IH 20 WB	At JCT of SH 137 & IH 20	08/25/2015	0155
06	156	11	06-156-0-0005-04-207	SH 137	IH 20 EB	IH 20 at SH 137	08/25/2015	0155
06	156	11	06-156-0-0005-04-208	DRAW	IH 20	0.45 MI E OF SH 137	02/14/2013	0156
06	156	11	06-156-0-0005-04-209	IH 20	IH 20 Bus (US 80)	2.55 MI E of SH 137	08/25/2015	0158
06	156	11	06-156-0-0005-04-212	IH 20 & UPRR	FM 829	4.45 MI W OF SH 137	08/26/2015	0151
06	156	11	06-156-0-0005-16-136	DRAIN	IH 20 BUS	0.65 MI E OF SH 137	02/09/2015	0340
06	156	11	06-156-0-0005-16-137	DRAIN	IH 20 BUS	0.55 MI E OF SH 137	02/09/2015	0340

9 bridges retrieved. | TX:XENAPPS-10 | PONTISPD | CGONZALE | READ | 88 | 09-28-2015 11:32:40

FOR DATA ON A PARTICULAR BRIDGE, DOUBLE CLICK ON THE PSN OF INTEREST.

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Inspection Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming | Clearance | Bridge Entry |

Bridge List | Identification | Geometry | Structure | Loading | Inventory Route | Intersecting Route | **Inspection & Appraisal** | Element Condition | Components

Attachment(s) Exist

Schedule:

	Required Y / N:	Frequency:	Last Date:
Routine Inspection:		(91): 24 mos	(90): 8/7/2013 mm/dd/yyyy
Fracture Critical Inspection / Req (92.1.1):	N-No	(92.1.2): mos	(93.1): mmyyyy
Underwater Inspection / Req (92.2.1):	N-No	(92.2.2): mos	(93.2): mmyyyy
Other Special Inspection / Req (92.3.1):	N-No	(92.3.2): mos	(93.3): 032014 mmyyyy

Special Flags:

Underwater Inspection (88.1): N-Underwater inspec

Fracture Critical Areas (88.2): NN-Structure without

Steel Type (88.3): 2-Some or all expose

Year Steel Painted (88.4): 1968

Condition Ratings:

Deck Condition (58): 5-FAIR CONDITION

Superstructure Condition (59): 4-POOR CONDITION

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Other Special Inspection **Approved**

06-156-0-0005-04-205 0011 OS 1 0 A D

Appraisal Ratings - Entered:

Traffic Safety Bridge Railings (36.1): 1-Meet Current Accepta

Traffic Safety Transitions (36.2): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Curre

Roadway Approach Condition (65): 7-GOOD CONDITION

Waterway Adequacy (71): N-Not Applicable

Approach Roadway Alignment (72): 8-No Speed Reduction

Navigation Pier or Abutment Protection (111): Blank-Not Applicable

Scour Critical (113): N-Bridge Not Over Wat

Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable

Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerabl

Deck Geometry (68): 5-Better than Minimum Tol

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol

Structurally Deficient /Functionally Obsolete (120): D

Sufficiency Rating (121): 67.5

Insp Cmt Print Insp Attach Chng Log

Ready TX:XENAPPS-10 PONTISPD CGONZALE READ 88 09-28-2015 11:34:37

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge Identification Geometry Structure Loading Inventory Route Intersecting Route Inspection & Appraisal Element Condition Components

Structure Identification:

Structure Number: 061560000504205

Name:

District Notes (126):

Bridge Description: 4 - Span Continuous Steel I-Beam Bridge on C

Location:

District (2): 06

County (3): 156

Control (8.4): 0005

Section (8.5): 04

Permanent Bridge Number (8.6): 205

City Code (4): 00000

Feature Intersected (6.1): IH 20

Facility Carried (7): IH 20 Bus

Location (9): 2.10 Mi W of SH 137

GPS Latitude (16.1): 32.11634341 32° 06' 58.84"

GPS Longitude (17.1): 101.82907963 101° 49' 44.69"

Collection Method (17.2): 4-Generated from reference marker data

06-156-0-0005-04-205 A Active

Age and Service:

Year Built (27): 1968

Year Reconstructed (106): 0000

Widening Code (106.1): 0-No widening or not applicable

Type of Service On (42.1): 1-Highway (highway stream crossing)

Type of Service Under (42.2): 1-Highway, with or without pedestrian

Management:

Maintenance Responsibility (21): 01-State Highway Agency

Owner (22): 01-State Highway Agency

System Designation: 1-On System

Maintenance Section Number (22.1): 11

Project Type (23.1): 1-Federal Aid (F.A.)

Neighboring State Code (98.1): Blank-Not BorderBridge

Percent Responsibility (98.2):

Border Bridge Structure Number (99):

CSJ When Built (23.2): 0005 04 019

Historical Significance (37): 3-Not eligible for NRHP listing

NBIS Bridge Length (112): Y-Yes

Land-Locked: Insp Dist: 06

Bridge Map It! Bridge Attach Attachment(s) Exist

TX:XENAPPS-10 PONTISPD CGONZALE READ 88 09-28-2015 11:41:22

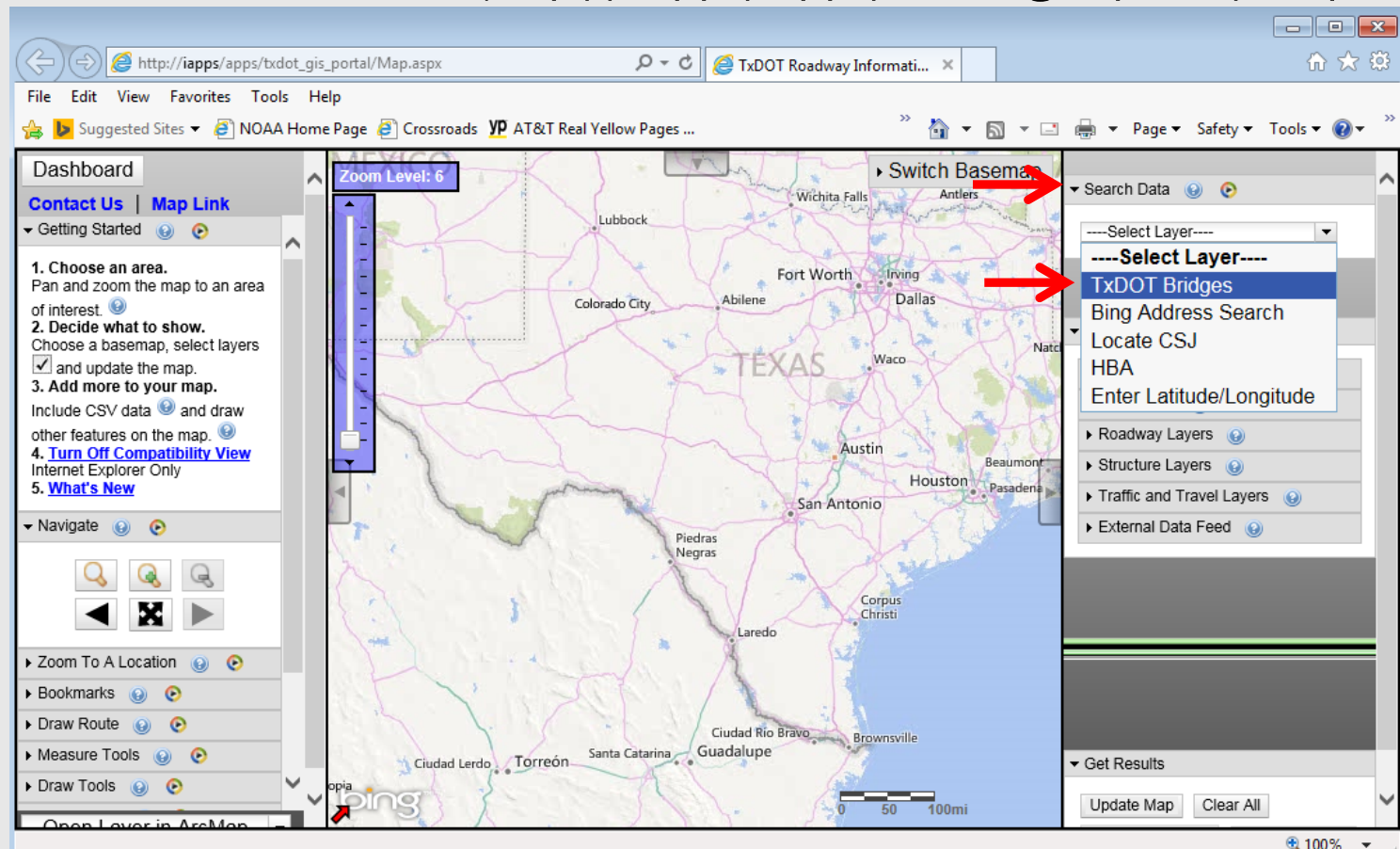
FIELD BOXES THAT APPEAR TO "PROJECT" FROM THE SCREEN CAN PERFORM ADDITIONAL TASKS. THE "MAP IT" FEATURE WILL CONNECT TO MICROSTATION'S VIRTUALEARTH.NET AND MAP THE BRIDGE AT THE STORED DATABASE COORDINATES.

BRIDGE MANAGEMENT DATABASE & VIRTUALEARTH.net

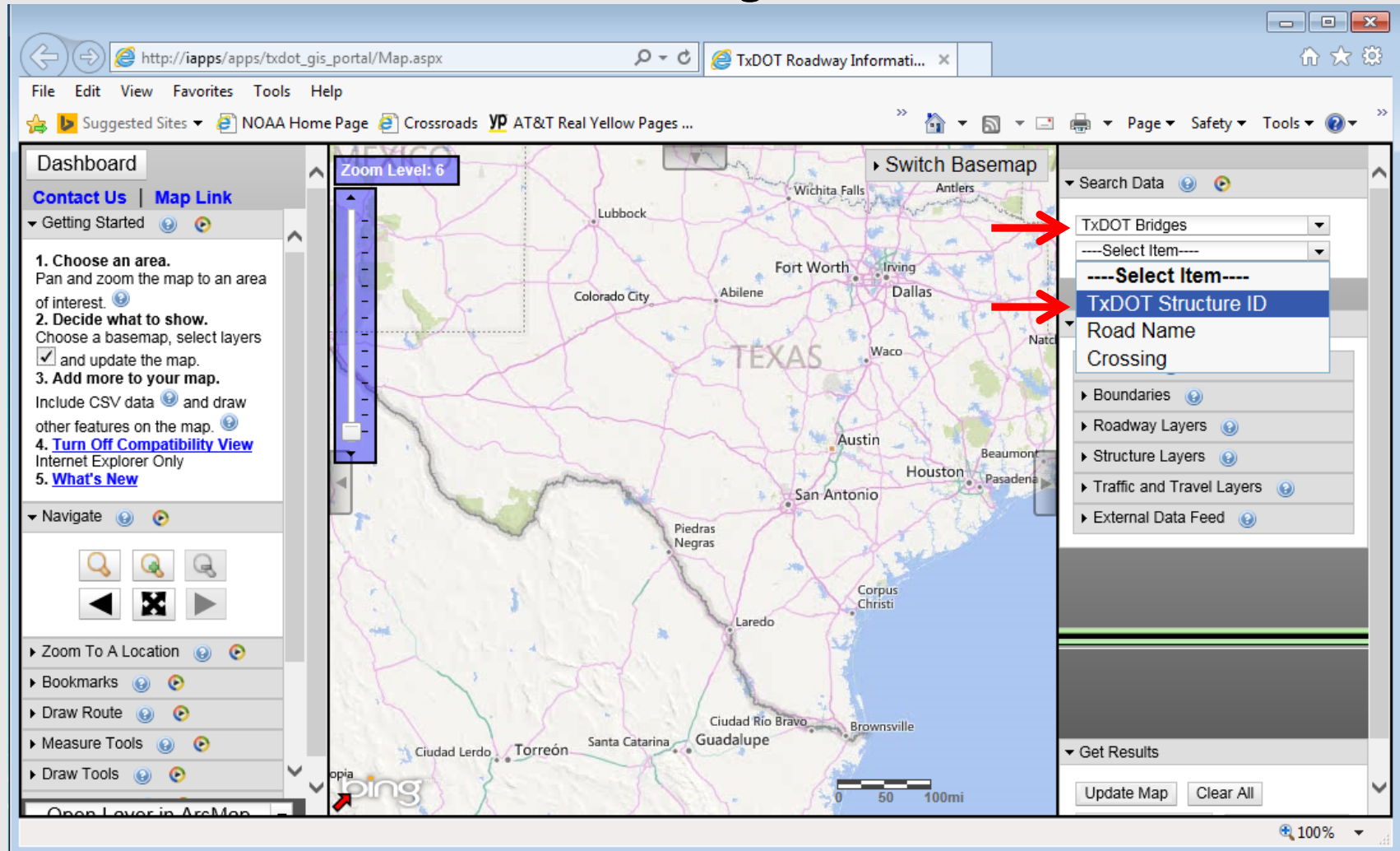
- From the “Identification” tab, the “Map It” capability will automatically connect to VirtualEarth.net and locate the bridge.



- An alternate way to map a bridge is through the use of GIS_Portal, otherwise known as TxDOT Roadway Information Portal (TRIP). If it is a single bridge that needs to be located - (http://iapps/apps/txdot_gis_portal/Map.aspx)



- Under Search Data, select “TxDOT Bridges”, “TxDOT Structure ID”.



- Type the bridge PSN, and click on Search. The bridge plots at the inventoried coordinates and structure data is reported in the data box.

The screenshot displays the GIS Portal interface. The main map area shows a bridge crossing a road, with a red arrow pointing to it labeled "BRIDGE LOCATION". The map includes a scale bar (0 to 600ft) and a "Zoom Level: 16" indicator. The left sidebar contains a "Dashboard" with instructions for using the map, a "Navigate" section with navigation tools, and a "Zoom To A Location" section. The right sidebar contains a "Search Data" section with a search bar and a "Search Layer(s)" section. The "Search Data" section shows the search criteria: "TxDOT Bridges" and "TxDOT Structure ID" with the value "06 - 156 - 0 - 0005 - 04 - 205". The "Search Layer(s)" section lists various layers like Imagery, Boundaries, Roadway Layers, Structure Layers, Traffic and Travel Layers, and External Data Feed. The "DATA BOX" at the bottom displays the search results in a table.

Structure ID	County Name	Facility Carried	Feature Crossed	Location
061560000504205	Martin	IH 20 Bus	IH 20	2.10 Mi W of SH 137

- An alternate way to use GIS_Portal to map bridges is to use the Search Layers, Structure Layers feature. GIS can map all the bridges for a district, or limit them to a county at a time. This screen depicts Martin County bridges.

The screenshot displays the GIS_Portal web application interface. The main map area shows a road network in Martin County, Texas, with labels for Midway, Ackerly, Knott, Big Spring, Morita, Lomax, and Loop. A red box highlights a bridge structure on the map, with a red arrow pointing to the 'Analytics' box. The 'Analytics' box contains a table of bridge data for structure 061560000504205.

Structures 061560000504205	
Facility Carried	IH 20 Bus
Feature Crossed	IH 20
Location	2.10 Mi W of SH 137
Latitude	32.116343
Longitude	-101.82908
Deck	5
Superstructure	4
Substructure	7
Culvert	N
Structural Evaluation	4
Deck Geometry	5
Underclearances, Vertical and Horizontal	5
Waterway Adequacy	N
Approach Roadway Alignment	8
Year Built	1968
Year Reconstructed or Widened	0
Structure Length	290
NBIS Bridge Length	Y

Red arrows point to the 'Search Layer(s)' panel on the right, specifically to the 'TxDOT Bridges' section. The 'TxDOT Bridges' section shows a list of bridges (All) and a filter for 'Select A County (Filtered)' with 'Martin' selected. The 'Bridge Classification' section shows 'Off System' and 'On System' options, with 'On System' selected. The 'Get Results' section shows 'Update Map' and 'Clear All' buttons.

CLICKING ON A BRIDGE WILL PROMPT THE DATA SHOWN IN THE ANALYTICS BOX.

- Clicking on the “Display Data Grid” feature will prompt the data box with a listing of all bridges located within the set criteria. A single bridge may be located by activating the data line associated with the PSN of interest.

LOCATION OF HIGHLIGHTED BRIDGE IN DATA BOX

DATA BOX

Structure ID	County Name	Facility Carried	Feature Crossed	Location
061560000504032	Martin	IH 20	MUSTANG DRAW	1.80 MI W OF FM 829
061560000504205	Martin	IH 20 Bus	IH 20	2.10 MI W OF SH 137
061560000504206	Martin	IH 20 WB	SH 137	At JCT of SH 137 & IH 20
061560000504207	Martin	IH 20 EB	SH 137	IH 20 at SH 137

Display Data Grid **Export To Excel**

**PRESS IF
YOU WANT
TO EXPORT
DATA IN THE
DATA BOX TO
EXCEL.**

GIS_PORTAL and EXCEL

- Excel spreadsheet created directly from GIS_Portal data box.

Structures.xls - Microsoft Excel

	A	B	C	D	E	F	G	H	I	J	K
	Structure ID	County Name	Facility Carried	Feature Crossed	Location	Latitude	Longitude	CSJ	Federal Status Designation	Sufficiency Rating	Planned Activity
1				MUSTANG DRAW	1.60 MI W OF FM 829	32.09272453	-101.8860079	None		82	Unprogrammed
2	61560000504032	Martin	IH 20	IH 20	2.10 Mi W of SH 137	32.11634341	-101.8290796	None	Structurally Deficient	67.5	Unprogrammed
3	61560000504205	Martin	IH 20 Bus	SH 137	At JCT of SH 137 & IH 20	32.13847693	-101.8058803	None		98	Unprogrammed
4	61560000504206	Martin	IH 20 WB	SH 137	IH 20 at SH 137	32.13830093	-101.8058273	None		97	Unprogrammed
5	61560000504207	Martin	IH 20 EB	DRAW	0.45 MI E OF SH 137	32.14013996	-101.7979571	None		83	Unprogrammed
6	61560000504208	Martin	IH 20	IH 20	2.55 MI E of SH 137	32.14010035	-101.763351	None		95.8	Unprogrammed
7	61560000504209	Martin	IH 20 Bus (US 80)	IH 20 & UPRR	4.45 MI W OF SH 137	32.10151548	-101.8654275	None		71.7	Unprogrammed
8	61560000504212	Martin	FM 829	DRAIN	0.65 MI E OF SH 137	32.12856442	-101.7915107	None		95.6	Unprogrammed
9	61560000516136	Martin	IH 20 BUS	DRAIN	0.55 MI E OF SH 137	32.12820443	-101.7924917	None		95.6	Unprogrammed
10	61560000516137	Martin	IH 20 BUS	DRAIN	9.04 MI S OF FM 87/SH 176	32.19461389	-102.1285472	None		85	Unprogrammed
11	61560038008001	Martin	SH 349	DRAIN	2.65 MI S OF FM 2002	32.454396	-101.978341	None		99.7	Unprogrammed
12	61560163802002	Martin	FM 829								

- If the “Bridge Inventory Report” option is clicked from the ANALYTICS data box, GIS_Portal will generate a Detail Bridge Report, more commonly referred to as the “NBI Sheet”.

The screenshot shows the GIS_Portal web application interface. The main map displays a portion of Texas, including Midway, Ackerly, Knott, Lamesa Hwy, Big Spring, Morita, Lomax, Midland, Loop, and Lees. A detail report for a bridge structure is overlaid on the map. The report includes a table with the following data:

Facility Carried	IH 20 Bus
Feature Crossed	IH 20
Location	2.10 Mi W of SH 137
Latitude	32.116343
Longitude	-101.82908
Deck	5
Superstructure	4
Substructure	7
Culvert	N
Structural Evaluation	4
Deck Geometry	5
Underclearances, Vertical and Horizontal	5
Waterway Adequacy	N
Approach Roadway Alignment	8
Year Built	1968
Year Reconstructed or Widened	0
Structure Length	290
NBIS Bridge Length	Y

The interface also includes a left sidebar with navigation options, a top menu bar, and a right sidebar with search and layer management tools. A red arrow points to the 'Bridge Inventory Report' link in the 'Structures' data box.

- Clicking on the Coding Guide option will connect to the current version of the database Coding Guide.

Dashboard

Contact Us | Map Link

Getting Started

1. Choose an area. Pan and zoom the map to an area of interest.
2. Decide what to show. Choose a basemap, select layers and update the map.
3. Add more to your map. Include CSV data and draw other features on the map.
4. Turn Off Compatibility View Internet Explorer Only
5. What's New

Navigate

Zoom To A Location

Bookmarks

Draw Route

Measure Tools

Draw Tools

Query Tools

Roadway Location Tools

--Open Layer in ArcMap--

Zoom Level: 10

Structures
061560000504205

[Analytics](#)

[Bridge Inventory Report](#) [Coding Guide](#)

Facility Carried	IH 20 Bus
Feature Crossed	IH 20
Location	2.10 Mi W of SH 137
Latitude	32.116343
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Deck Geometry	5
Underclearances, Vertical and Horizontal	5
Waterway Adequacy	N
Approach Roadway Alignment	8
Year Built	1968
Year Reconstructed or Widened	0
Structure Length	290
NBIS Bridge Length	Y

[Zoom to](#)

Midway

Ackerly

Knott

Lamesa Hwy

Big Spring

Morita

Lomax

Midland

Loop

Lees

0 5 10mi

Switch Basemap

Search Data

-----Select Layer-----

Search Layer(s)

Imagery

Boundaries

Roadway Layers

Structure Layers

-----TxDOT Bridges-----

Bridges (All)

☒ Bridges - (All) 14

Select A District

Odessa

Select A County (Filtered)

Martin

Bridge Classification

☐ Off System ☒ On System

Functionally Obsolete

Get Results

Update Map

Clear All

Display Data Grid

Export To Excel

100%

- Clicking on the “Coding Guide” option will connect to the current version of the database Coding Guide which explains each of the items listed on the “NBI Sheet” and guides a database User on how to code each item.

CODING GUIDE

GENERAL

This Coding Guide is used to interpret and maintain data in the computerized Bridge Inventory, Inspection and Appraisal Files. The interpretation of this coding guide will apply to both ON- and Off-system bridge data. The Bridge Inspection Database contains a record for each Bridge Class Structure (See definition of structures, Item 112) and tunnel on public roadways in Texas. Bridge Inventory, Inspection and Appraisal data is also used to update the National Bridge Inspection File (NBI) in Washington.

DATA QUALITY CANNOT BE OVEREMPHASIZED. The data in the Bridge Inventory, Inspection and Appraisal Files must be kept in as up-to-date condition as possible. Requirements for Bridge Inventory, Inspection and Appraisal data are that an inspection that reflects changes to existing structure data must be updated within 90 days of the evaluation or inspection that denotes the change in status. Newly built or rehabilitation projects are to be reported within 90 days of job completion. **Note: (SR) in the right margin means that item number is used in the Sufficiency Calculation. See the CICS BRISUF calculation in the Appendix for more information.**

CODING INSTRUCTIONS

When coding on a disk input or using a coding form, the following rules should apply:

- (1) Use one character per space. *Complete* all data items for each bridge when adding new records. **Before loading transactions, perform a virus scan of any disks received from outside sources.**
- (2) Use alpha characters only in the fields where specified, and use capital letters.
- (3) Complete coding for each item and column entirely; justify right or left. Read and follow coding instruction for the item number being coded.

BRIDGE MANAGEMENT DATABASE

- BACK TO PONTEX - The following slides consist of screen shots of the bridge tabs identifying information that is probably most useful to Read-Only Users.

PonTex
File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry **Identification** Geometry Structure Loading Inventory Route Intersecting Route Inspection & Appraisal Element Condition Components

Structure Identification:
Structure Number: 061560000504205
Name:
District Notes (126):
Bridge Description: 4 - Span Continuous Steel I-Beam Bridge on C
Location:
District (2): 06
County (3): 156
Control (8.4): 0005
Section (8.5): 04
Permanent Bridge Number (8.6): 205
City Code (4): 00000
Feature Intersected (6.1): IH 20
Facility Carried (7): IH 20 Bus
Location (9): 2.10 Mi W of SH 137
GPS Latitude (16.1): 32.11634341 32° 06' 58.84"
GPS Longitude (17.1): 101.82907963 101° 49' 44.69"
Collection Method (17.2): 4-Generated from reference marker data

Age and Service:
Year Built (27): 1968
Year Reconstructed (106): 0000
Widening Code (106.1): 0-No widening or not applicable
Type of Service On (42.1): 1-Highway (highway stream crossing)
Type of Service Under (42.2): 1-Highway, with or without pedestrian

Management:
Maintenance Responsibility (21): 01-State Highway Agency
Owner (22): 01-State Highway Agency
System Designation: 1-On System
Maintenance Section Number (22.1): 11
Project Type (23.1): 1-Federal Aid (F.A.)
Neighboring State Code (98.1): Blank-Not BorderBridge
Percent Responsibility (98.2):
Border Bridge Structure Number (99):
CSJ When Built (23.2): 0005 04 019
Historical Significance (37): 3-Not eligible for NRHP listing
NBIS Bridge Length (112): Y-Yes
Land-Locked:
Insp Dist: 06

06-156-0-0005-04-205 A Active

Bridge Cmt Map It! Bridge Attach Attachment(s) Exist

Ready | TX:XENAPPS-10 | PONTISPD | CGONZALE | READ | 88 | 09-28-2015 11:41:22

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge List Identification **Geometry** Structure Loading Inventory Route Intersecting Route Inspection & Appraisal Element Condition Components

Deck:

Bridge Median (33): 0-No medians

Skew (34): 30

Structure Flared (35): 0-No Flare

Left Sidewalk Width (50.1): 0.0

Right Sidewalk Width (50.2): 0.0

Approach Roadway Width (32): 33

Bridge Roadway Width (51): 32.9

Deck Width Out-to-Out (52): 35.3

Lanes On Structure (28.1): 02

Lanes Under Structure (28.2): 05

Vertical Clearance:

Minimum Vertical Clearance Over Bridge Deck (53): 9999 ft / in

Minimum Vertical Underclearance Reference Feature (54.1): H-Highway beneath structure

Minimum Vertical Underclearance (54.2): 1511 ft / in

Lateral Clearance:

Minimum Lateral Underclearance on Right Reference Feature (55.1): H-Highway beneath structure

Minimum Lateral Underclearance on Right (55.2): 11.5

Minimum Lateral Underclearance on Left (56): 20.6

Navigation:

Navigation Control (38): N-Not applicable, no waterway

Navigation Vertical Clearance (39): 0

Navigation Horizontal Clearance (40): 0

Minimum Navigation Vertical Clearance Vertical Lift Bridge (116):

06-156-0-0005-04-205

Bridge Cmt Bridge Attach Attachment(s) Exist

nvf_set_bridge_protection: READ TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:18:41

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge List Identification **Structure** Loading Inventory Route Intersecting Route Inspection & Appraisal Element Condition Components

Span Configuration:

Total Number of Spans (46): 4 Number of Major Approach Spans (45.2): Maximum Span Length (48): 85
Number of Main Spans (45.1): 4 Number of Minor Approach Spans (45.3): Structure Length (49): 290

	Main Span	Major Approach Span	Minor Approach Span
Superstructure			
Superstructure Type (43.1.1):	2-Continuous	(43.2.1): Blank-NotApplicable	(43.3.1): Blank-NotApplicable
Roadway Type (43.1.2):	1-Deck	(43.2.2): Blank-NotApplicable	(43.3.2): Blank-NotApplicable
Member Type (43.1.3):	11-Steel I-Beam	(43.2.3): Blank-NotApplicable	(43.3.3): Blank-NotApplicable
Substructure			
Above Ground Type (44.1.1):	3-Multiple Column Bent	(44.2.1): Blank-NotApplicable	(44.3.1): Blank-NotApplicable
Below Ground Type (44.1.2):	4-Drilled Shafts	(44.2.2): Blank-NotApplicable	(44.3.2): Blank-NotApplicable
Bent Cap Type (44.1.3):	1-Concrete	(44.2.3): Blank-NotApplicable	(44.3.3): Blank-NotApplicable
Deck			
Structure Type (107.1):	1-Concrete Cast-in-Place	(107.2): N-NotApplicable or Non-vehic	(107.3): N-NotApplicable or Non-vehic
Wearing Surface Type (108.1.1):	6-Bituminous	(108.2.1): N-NotApplicable	(108.3.1): N-NotApplicable
Membrane Type (108.1.2):	8-Unknown	(108.2.2): N-NotApplicable	(108.3.2): N-NotApplicable
Protection (108.1.3):	8-Unknown	(108.2.3): N-NotApplicable	(108.3.3): N-NotApplicable
Culvert / Tunnel			
Culvert Span Type (43.4.1):	Blank-NotApplicable		
Culvert Main Member Type (43.4.2):	Blank-NotApplicable		
Tunnel Type (43.5):	Blank-NotApplicable		

06-156-0-0005-04-205

Bridge Cmt Bridge Attach Attachment(s) Exist

nvf_set_bridge_protection: READ TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:21:26

BRIDGE MANAGEMENT DATABASE

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge List Identification Geometry **Loading** Inventory Route Intersecting Route Inspection & Appraisal Element Condition Components

Status:

Operational Status (41): A-Open, No Restriction

Load Restriction Code (41.1): N-NotApplicable

Load Restriction (41.2): NNN 1000 lbs.

Last Load Rating Inspection Date: 01/01/1900 mm/dd/yyyy

Loading:

Design Load (31): 5-HS 20

Operating Rating Method (63): 1-Load Factor (LF)

Operating Rating Type of Loading (64.1): 2-HS Loading

Operating Rating Gross Loading (64.2): 45 tons

Inventory Rating Method (65.1): 1-Load Factor (LF)

Inventory Rating Type of Loading (66.1): 2-HS Loading

Inventory Rating Gross Loading (66.2): 27 tons

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

06-156-0-0005-04-205

Bridge Cmt Bridge Attach Attachment(s) Exist

nvf_set_bridge_protection: READ TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:24:09

- Inventory Route is the roadway on which the bridge is located.

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming | Clearance | Bridge Entry | **Inventory Route** | Intersecting Route | Inspection & Appraisal | Element Condition | Components

Route Information:

Structure Function (5.1): 2-Single route goes "Under" the
 Inventory Route System(5.2): 11-Interstate Highway
 Designated Level of Service (5.3): 1-Mainlane (service roads and
 Route Number (5.4): 0020
 Directional Suffix (5.5): 0-Not Applicable
 Route Suffix (5.6): 0
 Toll Facility (20): 3-On free road. The structure is 1
 Inventory Route Functional Classification (26): 01-Interstate Rural 0-4K Pop
 Minimum Vertical Clearance (10): 1607 ft / in
 Total Horizontal Clearance (47): 51.5

Traffic Information:

Inventory Milepoint (11): 04.466
 Inventory Route Milepoint Date (11.1): 197405
 Reference Marker and Displacement (11.2): 0153 +00812
 Direction of Traffic (102): 2-way traffic
 Parallel Structure Designation (101): N-No parallel structure exists.
 Temporary Structure Designation (103): (blank)-No Temporary Structure
 Bypass, Detour Length (19): 00
 AADT (29): 11320
 Year of AADT (30): 2011
 AADT Truck Percent (109): 40
 Future AADT (114): 15850
 Year of Future AADT (115): 2031

Federal Systems Classification:

Base Highway Network (12):
 LRS Inventory Route (13.1):
 Subroute Number (13.2):
 STRAHNET Highway Designation (100): 1-The route is on a Interstate STf
 National Highway System Designation (104): 1-The Route is on the NHS
 Federal Lands Highway (105): 0-Not applicable
 Nation Network Designation (110): 1-The route is part of the national

06-156-0-0005-04-205 1 A Active

Bridge Cmt Bridge Attach Attachment(s) Exist

nvf_set_bridge_protection: READ TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:31:31

BRIDGE MANAGEMENT DATABASE

- The data listed on the “Intersecting Route” tab represents the data for the intersecting feature at an overpass/underpass; it DOES NOT represent data for the Inventory Route.

PonTex
File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry
Bridge List Identification Geometry Structure Loading **Intersecting Route** Inspection & Appraisal Element Condition Components

Route Information:
Control (8.4A): 0005 Section (8.5A): 16 Bridge (8.6A): 205
Structure Function (5.1A): 1-Route carried "On" the structure
Intersecting Route System (5.2A): 25-Business Interstate
Designated Level of Service (5.3A): 6-Business
Route Number (5.4A): 0020
Directional Suffix (5.5A): 0-Not Applicable
Route Suffix (5.6A): F
Toll Facility (20A): 3-On free road. The structure is 1
Intersecting Route Functional Classification (26A): 04-Major 0-4K Pop
Minimum Vertical Clearance (10A): 9999 ft / in
Total Horizontal Clearance (47A): 32.9

Traffic Information:
Intersecting Milepoint (11A): 05.327
Intersecting Route Milepoint Date (11.1A): 197405
Reference Marker and Displacement (11.2A): 0338 +00127
Direction of Traffic (102A): 2-way traffic
Parallel Structure Designation (101A): N-No parallel structure exists.
Temporary Structure Designation (103A): (blank)-No Temporary Structure
Bypass, Detour Length (19A): 04
AADT (29A): 1210
Year of AADT (30A): 2015
AADT Truck Percent (109A): 9
Future AADT (114A): 1840
Year of Future AADT (115A): 2035

Federal Systems Classification:
Base Highway Network (12A):
LRS Inventory Route (13.1A):
Subroute Number (13.2A):
STRAHNET Highway Designation (100A): 0-The route is not a STRAHNET
National Highway System Designation (104A): 0-The Route is not on the NHS
Nation Network Designation (110A): 1-The route is part of the national network

06-156-0-0005-04-205 2 Active

Bridge Cmt Bridge Attach Attachment(s) Exist

nvf_set_bridge_protection: READ TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:34:43

BRIDGE MANAGEMENT DATABASE

- The “Inspection & Appraisal” tab provides structural data for the major bridge components and basic bridge rail/approach MBGF information.

PonTex

File Edit Inspection Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge List Identification Geometry Structure Loading Inventory Route Intersecting Route **Inspection & Appraisal** Element Condition Components

Attachment(s) Exist

Schedule:

Required Y / N:	Frequency:	Last Date:
Routine Inspection: (91):	24 mos (90):	8/7/2013 mm/dd/yyyy
Fracture Critical Inspection / Req (92.1.1): N-No (92.1.2):	mos (93.1):	mm/yyyy
Underwater Inspection / Req (92.2.1): N-No (92.2.2):	mos (93.2):	mm/yyyy
Other Special Inspection / Req (92.3.1): N-No (92.3.2):	mos (93.3):	mm/yyyy

Special Flags:

Underwater Inspection (88.1): N-Underwater inspec

Fracture Critical Areas (88.2): NN-Structure without

Steel Type (88.3): 2-Some or all expose

Year Steel Painted (88.4): 1968

Condition Ratings:

Deck Condition (58): 5-FAIR CONDITION

Superstructure Condition (59): 4-POOR CONDITION

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Appraisal Ratings - Entered:

Traffic Safety Bridge Railings (36.1): 1-Meet Current Accepts

Traffic Safety Transitions (36.2): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Curre

Roadway Approach Condition (65): 7-GOOD CONDITION

Waterway Adequacy (71): N-Not Applicable

Approach Roadway Alignment (72): 8-No Speed Reduction

Navigation Pier or Abutment Protection (111): Blank-Not Applicable

Scour Critical (113): N-Bridge Not Over Wat

Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable

Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerabl

Deck Geometry (68): 5-Better than Minimum Tol

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol

Other Special Inspection

Approved
06-156-0-0005-04-205 0011 OS 1 0 A D

Insp Cmt Print Insp Attach Chng Log

nvf_set_bridge_protection: READ TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 15:01:45

BRIDGE MANAGEMENT DATABASE

- The “Element Condition” tab records the condition rating for elements that make up the bridge. These are recorded by span.

PonTex

File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming | Clearance | Bridge Entry | **Element Condition** | Components

☒ TxDOT Elements ☐ NBI Conditions ☐ CCS Measurement

Inspection Record - Field Inspection and Coding TxDOT Elemental Data

Structure: 06-156-0-0005-04-205 Description: 4 - Span Continuous Steel I-Beam Bridge on Concrete Bents
 Location: 2.10 Mi W of SH 137 Company: Texas Department of Transportation
 Facility: IH 20 Bus Inspector: Evans Kessey Inspection Date: 08/07/2013
 Length: 290 Width: 35.3 Area: 10237 sq. ft. Inspection: 06-156-0-0005-04-205:0011-OS-1-0

S/B	Element	Cmt / SF	Description	Units	Total	Cond 1	Cond 2	Cond 3	Cond 4	Cond 5
Ap1	272		Rip Rap Slope Protection - Reinforced Concrete	EA	1	1				
Ap1	321		Approach Slab - Reinforced Concrete	EA	1	1				
Ap1	340		Approach Rail - Metal	LF	300	300				
Ab1	215		Abutment - Reinforced Concrete	LF	40	38	4			
Ab1	270		Wing Wall - Reinforced Concrete	EA	2	2				
Ab1	301		Pourable Joint Seal	LF	38	38				
Ab1	310		Elastometric Bearing	EA	5	5				
S1	12.1	SF	Conventionally Formed	EA	1			1		
S1	61		Two-Course Surface Treatment	EA	1		1			
S1	107	SF	Steel Girder, Riveted or Rolled Beam - Painted Steel	LF	300	290		10		

Smart Flags (SF):

S/B	Element	Description	Units	Total	Cond 1	Cond 2	Cond 3	Cond 4	Cond 5

General Comments: (60' - 85' - 85' - 60')

Elemental Comments (Cmt):

Save Cancel Add Smart Flag Delete Smart Flag Add Comment Edit Comment Delete Comment Condition Desc Spell Check

nvf_set_bridge_protection: READ TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:40:19

BRIDGE MANAGEMENT DATABASE

- The “Component” tab defines the acronyms used to identify the components that make up the bridge elements.

PonTex
File Edit Reports Tools Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry
Bridge List Identification Geometry Structure Loading Inventory Route Intersecting Route Inspection & Appraisal Element Components

Structure: 06-156-0-0005-04-205
Inspection Date: 03/01/2014 OS (A)
Layout From: [Dropdown]
Component: Add Insert Copy Delete
Element: Add Delete

Components: Inspection: 06-156-0-0005-04-205:0011-OS-1-0

Type	Seq.	S/B No.	Description
Ap	1	Ap1	Approach
Ab	1	Ab1	Abutment
S	1	S1	Span
B	2	B2	Bent
S	2	S2	Span
B	3	B3	Bent
S	3	S3	Span
B	4	B4	Bent
S	4	S4	Span
Ab	5	Ab5	Abutment
Ap	2	Ap2	Approach

Elements:

S/B	Elmt No.	Category	Description	Units	Total
Ap1	272	Substructure	Rip Rap Slope Protection - Reinforced Concrete	EA	1
Ap1	321	Other Elements	Approach Slab - Reinforced Concrete	EA	1
Ap1	340	Other Elements	Approach Rail - Metal	LF	300

Save Cancel

nvf_set_bridge_protection: READ TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 14:40:56

BRIDGE MANAGEMENT DATABASE – UPLOADED DOCUMENTS

- An important feature of the current database is the ability to upload documents. Loaded documents are grouped into “Inspection Attachments” or “Bridge Attachments”. “Inspection Attachments” includes data that is prone to change and is collected and reported during each inspection cycle. “Bridge Attachments” includes data and documents that does not typically change, for example, construction plans or a scour analysis.
- “Bridge Attachments” can be accessed from either the “Identification”, “Geometry”, “Structure”, “Loading”, “Inventory”, or “Intersecting Route” tabs.
- “Inspection Attachments” can only be accessed from the “Inspection & Appraisal” tab.
- The source of information used to saturate, or substantiate, the data in the database comes from these documents that are uploaded.

BRIDGE MANAGEMENT DATABASE

- From the “Identification” tab, click on the “Bridge Attach” feature.

The screenshot shows the PonTex Bridge Management Database software interface. The 'Identification' tab is selected, and the 'Bridge Attach' button is highlighted with a red arrow. The interface displays various fields for bridge identification, location, and management.

Structure Number: 06-156-0-0005-04-205

Find Item: 002.0 District

Identification | Geometry | Structure | Loading | Inventory Route | Intersecting Route | Inspection & Appraisal | Element Condition | Components

Structure Identification:

- Structure Number: 061560000504205
- Name:
- District Notes (126):
- Bridge Description: 4 - Span Continuous Steel I-Beam Bridge on C

Location:

- District (2): 06
- County (3): 156
- Control (8.4): 0005
- Section (8.5): 04
- Permanent Bridge Number (8.6): 205
- City Code (4): 00000
- Feature Intersected (6.1): IH 20
- Facility Carried (7): IH 20 Bus
- Location (9): 2.10 Mi W of SH 137
- GPS Latitude (16.1): 32.11634341 32° 06' 58.84"
- GPS Longitude (17.1): 101.82907963 101° 49' 44.69"
- Collection Method (17.2): 4-Generated from reference marker data

Age and Service:

- Year Built (27): 1968
- Year Reconstructed (106): 0000
- Widening Code (106.1): 0-No widening or not applicable
- Type of Service On (42.1): 1-Highway (highway stream crossing)
- Type of Service Under (42.2): 1-Highway, with or without pedestrian

Management:

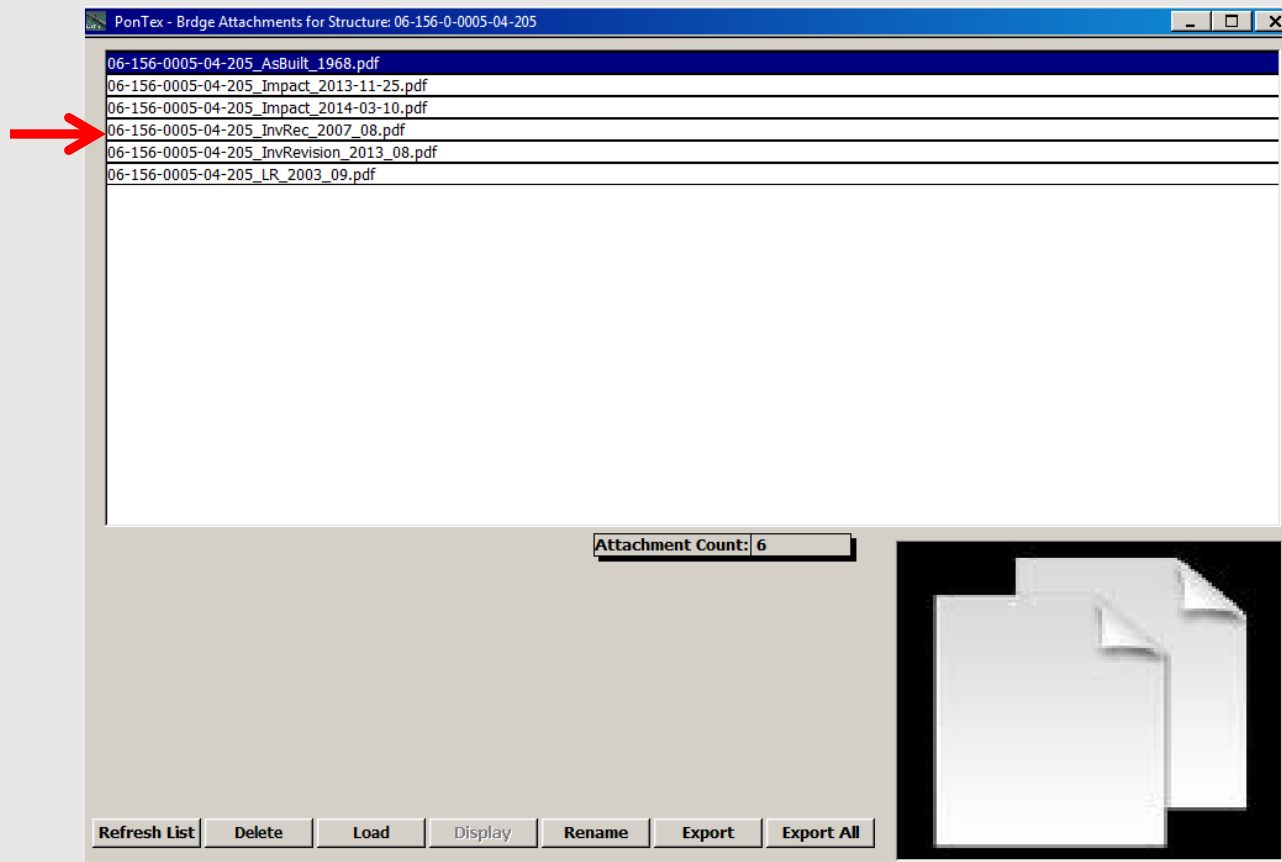
- Maintenance Responsibility (21): 01-State Highway Agency
- Owner (22): 01-State Highway Agency
- System Designation: 1-On System
- Maintenance Section Number (22.1): 11
- Project Type (23.1): 1-Federal Aid (F.A.)
- Neighboring State Code (98.1): Blank-Not BorderBridge
- Percent Responsibility (98.2):
- Border Bridge Structure Number (99):
- CSJ When Built (23.2): 0005 04 019
- Historical Significance (37): 3-Not eligible for NRHP listing
- NBIS Bridge Length (112): Y-Yes
- Land-Locked:
- Insp Dist: 06

Bridge Cnt | **Bridge Attach** | Attachment(s) Exist

Ready | TX:XENAPPS-10 | PONTISPD | CGONZALE | READ | 88 | 09-28-2015 11:41:22

BRIDGE MANAGEMENT DATABASE

- A window listing the available documents that have been uploaded to the database becomes available. The User can scroll down the list and double clicking on the document of interest will open it.



BRIDGE MANAGEMENT DATABASE

- The Inventory Record contains lots of interesting data that planner, design or maintenance personnel working on a programming, design, or repair plan may find useful.


Revised 10-5-2005
 for Bureau of Road 7.0, WWS & NT

Bridge Inventory Record

District: 06 County: 156 Cont-Sec: 0005-04 Structure: 205 Route: IH 20 BUS
 Feature Crossed: IH 20 Inspector's Signature: [Signature] Date: 8/27/2007
 Company Name: Enfor Design
 Location: 2.10 Mi W of SH 137 Maintenance Section: 11
 Latitude: N 32° 6' 58.84" Longitude: W 101° 49' 44.69" Milepoint: 4.453 4.466
 General Description: 4-Span continuous steel girder bridge on concrete supports. Standard railing with non-standard guardfence (no thru beam, non-standard terminal). Bridge is on a high-speed paved road with medium ADT (~1210 vpd). (no blockouts)

Bridge Length: 290 ft. Deck Width: 35.3 ft. Lanes On: 2 Lanes Under: 5
 Skew Angle: 30 Deg. ☒ Lf. Fwd. ☐ Rt. Fwd. Bridge Rail: T201
 Clear Width Between 33.0 ft. ☐ Curbs, ☒ Rails, ☐ Pmnt Edges Approach Rdwy Wid: 33 ft.
 Deck Type: Concrete
 Surfacing: 1" Asphalt Vertical Over-Clearance: _____ ft. ☒ Unimpaired
 Stringers: Spans: 1 to 4
 Type: Steel Size: W 36 x 160 Number: 5
 Spacing: 7'-3" Controlling Span Length (C-C bearings): 85 ft.
 Stringers: Spans: _____
 Type: _____ Size: _____ Number: _____
 Spacing: _____ Controlling Span Length (C-C bearings): _____ ft.
 Stringers: Spans: _____
 Type: _____ Size: _____ Number: _____
 Spacing: _____ Controlling Span Length (C-C bearings): _____ ft.
 Est Deck Overtopping Freq: ☐ >100 ☐ 11 - 100 ☐ 3 - 10 ☐ <3
 Est Approach Overtop. Freq: ☐ >100 ☐ 11 - 100 ☐ 3 - 10 ☐ <3
 Horizontal / Vertical Alignment: Good / Good
 Date Built / Design Load: 1968 / H-20 HS 20
 Regulatory / Advisory Speeds: 55 mph / None
 Posted Load Restriction: _____ ☒ None
 Comments: Revised 8/18/07 - D. R. Fagan, Inc. [Signature]
Revised 8/20/11 - Klatz Assoc. [Signature]



BRIDGE MANAGEMENT DATABASE

- From the “Inspection & Appraisal” tab, there are two menus of interest, the Inspection and Reports menus.

PonTex

File Edit View Inspection Reports Help

Structure Number: 06-156-0-0005-04-205 Find Item: 002.0 District

Programming Clearance Bridge Entry

Bridge List Identification Geometry Structure Loading Inventory Route Intersecting Route **Inspection & Appraisal** Element Condition Components

Attachment(s) Exist

Schedule:

	Required Y / N:	Frequency:	Last Date:
Routine Inspection:	(91):	24 mos	(90): 8/7/2013 mm/dd/yyyy
Fracture Critical Inspection / Req (92.1.1):	N-No	(92.1.2):	(93.1): mm/yyyy
Underwater Inspection / Req (92.2.1):	N-No	(92.2.2):	(93.2): mm/yyyy
Other Special Inspection / Req (92.3.1):	N-No	(92.3.2):	(93.3): 03/2014 mm/yyyy

Special Flags:

Underwater Inspection (88.1): N-Underwater inspect

Fracture Critical Areas (88.2): NN-Structure without

Steel Type (88.3): 2-Some or all exposed

Year Steel Painted (88.4): 1968

Condition Ratings:

Deck Condition (58): 5-FAIR CONDITION

Superstructure Condition (59): 4-POOR CONDITION

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Appraisal Ratings - Entered:

Traffic Safety Bridge Railings (36.1): 1-Meet Current Acceptable

Traffic Safety Transitions (36.2): 0-Does Not Meet Current

Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Current

Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Current

Roadway Approach Condition (65): 7-GOOD CONDITION

Waterway Adequacy (71): N-Not Applicable

Approach Roadway Alignment (72): 8-No Speed Reduction

Navigation Pier or Abutment Protection (111): Blank-Not Applicable

Scour Critical (113): N-Bridge Not Over Water

Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable

Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerable

Deck Geometry (68): 5-Better than Minimum Tolerable

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tolerable

Structurally Deficient / Functionally Obsolete (120): D

Sufficiency Rating (121): 67.5

Other Special Inspection **Approved**

06-156-0-0005-04-205 0011 OS 1 0 A D

Insp Cmt Print Insp Attach Chng Log

Ready TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 15:54:40

BRIDGE MANAGEMENT DATABASE

- From the Inspection menu option, the “Attachments” option will open a window listing current bridge inspection finding documents. (These may also be accessed through the “Insp Attach” feature.)

The screenshot shows the Bridge Management Database software interface. The 'Inspection' menu is open, and the 'Attachments' option is highlighted. A red arrow points to the 'Attachments' option in the menu. Another red arrow points to the 'Insp Attach' button at the bottom of the window.

The main window displays the 'Attachment(s) Exist' section. It includes a 'Schedule' table with columns for Required Y / N, Frequency, and Last Date. The 'Appraisal Ratings - Entered' section lists various bridge components and their current ratings. The 'Appraisal Ratings - Calculated' section shows the overall condition and sufficiency rating.

Required Y / N:	Frequency:	Last Date:
Routine Inspection:	(91): 24 mos	(90): 8/7/2013
Fracture Critical Inspection / Req (92.1.1): N-No	(92.1.2): mos	(93.1):
Underwater Inspection / Req (92.2.1): N-No	(92.2.2): mos	(93.2):
Other Special Inspection / Req (92.3.1): N-No	(92.3.2): mos	(93.3): 032014

Special Flags:

- Underwater Inspection (88.1): N-Underwater inspec
- Fracture Critical Areas (88.2): NN-Structure without
- Steel Type (88.3): 2-Some or all expose
- Year Steel Painted (88.4): 1968

Condition Ratings:

- Deck Condition (58): 5-FAIR CONDITION
- Superstructure Condition (59): 4-POOR CONDITION
- Substructure Condition (60): 7-GOOD CONDITION
- Channel Condition (61): N-NOT APPLICABLE
- Culvert Condition (62): N-NOT APPLICABLE

Appraisal Ratings - Entered:

- Traffic Safety Bridge Railings (36.1): 1-Meet Current Accepts
- Traffic Safety Transitions (36.2): 0-Does Not Meet Curre
- Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Curre
- Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Curre
- Roadway Approach Condition (65): 7-GOOD CONDITION
- Waterway Adequacy (71): N-Not Applicable
- Approach Roadway Alignment (72): 8-No Speed Reduction
- Navigation Pier or Abutment Protection (111): Blank-Not Applicable
- Scour Critical (113): N-Bridge Not Over Wat
- Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable
- Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

- Structure Evaluation (67): 4-Meets Minimum Tolerabl
- Deck Geometry (68): 5-Better than Minimum Tol
- Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol
- Structurally Deficient / Functionally Obsolete (120): D
- Sufficiency Rating (121): 67.5

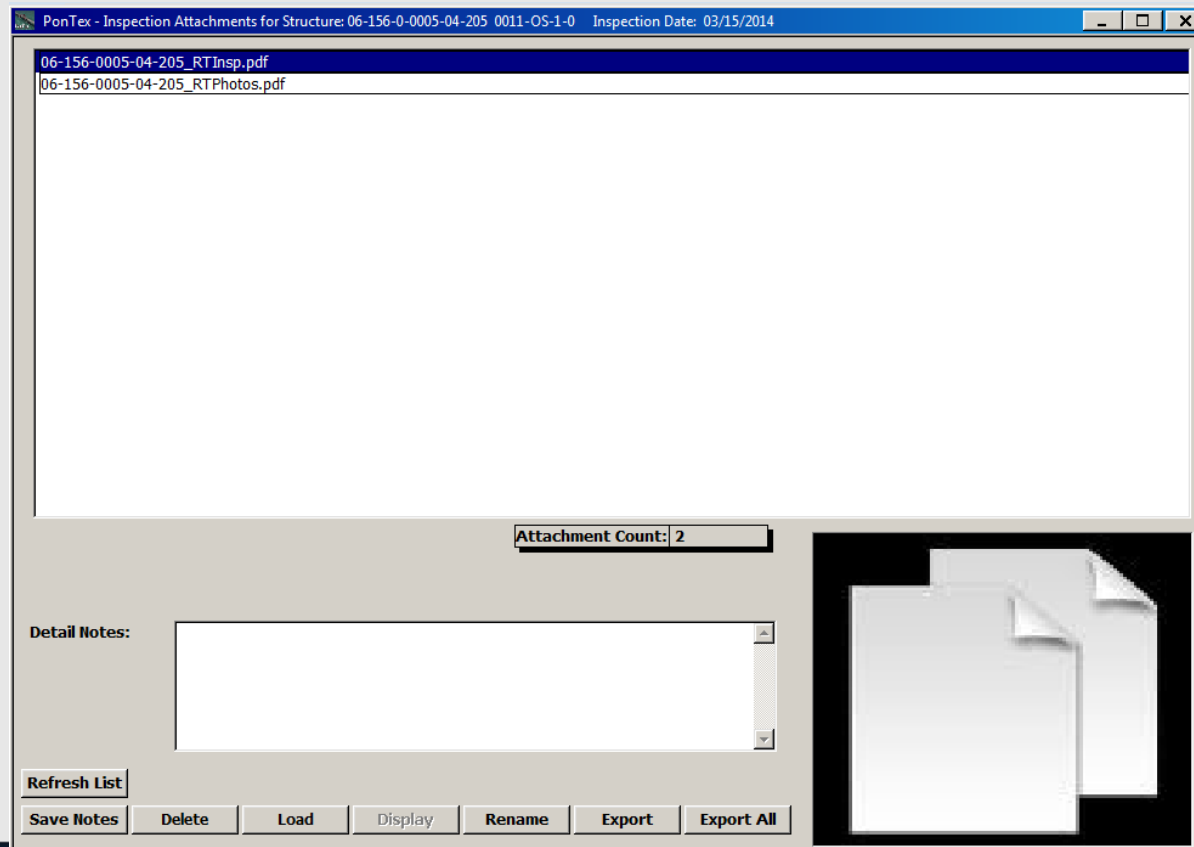
Other Special Inspection Approved

06-156-0-0005-04-205 | 0011 | OS | 1 | 0 | A | D

Buttons: Insp Cmt, Insp Attach, Chng Log

BRIDGE MANAGEMENT DATABASE

- From the Inspection Attachments option, the xxxxx_RTInsp.pdf includes the forms completed by the bridge inspector responsible for performing the most current routine bridge inspection. xxxx_RTPHOTOS includes the photos associated with this inspection.



BRIDGE MANAGEMENT DATABASE

- This is a scanned copy of the signed and sealed Bridge Inspection Record for the most current inspection. If the User scrolls through this document they will find some very useful information.

06-156-0005-04-205_RTInsp.pdf - Adobe Reader

File Edit View Window Help

1 / 7 52.2%

Tools Sign Comment

Click on Tools to convert PDF documents to Word or Excel.

Bridge Inspection Record

Form 1008

District: 06 County: 156 Cost-Sect: 0005-04 Structure: 205 Route: IH 20 BUS Main Sect: 11

Description: 4-span continuous steel I-beam bridge, 30 degree LFS

Feature Crossed: IH 20 Inspector's Signature: *Christopher Brull* Date: 8/7/2013

Company Name: Bontemps Structural Engineering, Inc. [7708] Inspector: Christopher Brull

Rating

- Not Applicable
- Excellent condition
- Very good condition
- Good condition - some minor problems
- Satisfactory condition - minor deterioration of structural elements (limited)
- Fair condition - minor deterioration of structural elements (extensive)
- Poor condition - deterioration significantly affects structural capacity
- Serious condition - deterioration seriously affects structural capacity
- Critical condition - bridge should be closed until repaired
- Failing condition - bridge closed not repairable
- Failed condition - bridge closed not beyond repair

General Comment:
(60' - 85' - 60')

Deck (Item 58)

Min.	Concrete	Rating
1 Deck - Rating	(1)	5
6 Wearing - Surface	-1" asphalt	7
6 Joints, Expansion, Open	-	-
6 Joints, Expansion, Sealed	-	8
6 Joints, Other	-	-
6 Drainage System	-	8
6 Curbs, Sidewalks & Parapets	-	-
6 Median Barrier	-	-
6 Railings	1201	6
7 Railing Protective Coating	-	-
7 Delamination (curve markers)	-	-
Other	-	-

Comments:

- Top of deck is not visible due to asphalt but previous reports indicate spalling on top surface of deck. Deck soffits at span 4 from West has 2 large areas that appear to have chloride contamination (Total area = ~22 SF - see photos). Extensive repairs have been done to deck soffits and overhangs since the last inspection (see photos).
- Asphalt wearing surface has minor flushing. In east span, an approx. 60 SF area of asphalt is uneven due to punching (see photo).
- Concrete bridge rails have several areas of delaminations and spalls with exposed rebar due to insufficient cover. Some areas appear to have been patched since the last inspection (see photo).

Superstructure (Item 59)

Min.	Rating
0 Main Members - Steel	(1-2) 7
0 Main Members - Concrete	-
0 Main Members - Timber	-
0 Main Members - Connections	Welded girders 8
1 Floor System Members	-
1 Floor System Connections	-
5 Secondary Members	Steel (1) 7
5 Secondary Member Connections	Welds 8
6 Expansion Bearings	Elastomeric 8
6 Fixed Bearings	-
6 Steel Protective Coating	Paint (1) 7
Other	-
Component rating	7

Comments:

- Steel I-beams and diaphragms have minor paint run on top flanges, and isolated paint failure at ends of unit.
- Bottom flange of East exterior beam over IH 20 WB is bent out-of-alignment approx. 2" due to impact damage (see photo). All beams over IH 20 have minor overheight impact scrapes.

DO NOT DISCLOSE - INFORMATION CONFIDENTIAL UNDER THE TEXAS HOMELAND SECURITY ACT AND 23 USC SECTION 409, SAFETY SENSITIVE INFORMATION

BRIDGE MANAGEMENT DATABASE

... continued Bridge Inspection Record

District: 06 County: 156 Cont-Sec: 0005-04 Structure: 205 Route: IH 20 BUS Maint Sect: 11

Min.	Substructure (Item 60)	Rating
0	Abutment Caps (1)	7
0	Above Ground	-
0	Below Ground or Foundation	8
0	Backwalls & Wingwalls (1)	8
0	Intermediate Supports	
	Caps - Concrete	8
	Caps - Steel	-
	Caps - Timber	-
	Above Ground - Concrete	8
	Above Ground - Steel	-
	Above Ground - Timber	-
	Above Ground - Masonry	-
	Below Ground or Foundation	8
5	Collision Protection System	8
6	Steel Protective Coating	-
	Component rating	7

Comments:

(1) Extensive repairs have been made to abutment caps and backwalls since the last inspection (see photos).

Min.	Channel (Item 61)	Rating
0	Channel Banks	-
0	Channel Bed	-
5	Rip Rap, Toe Walls & Apron	-
5	Dikes	-
5	Jetties	-
	Other	-
	Component rating	N

Min.	Culverts (Item 62)	Rating
0	Top Slabs	-
0	Bottom Slab or Footing	-
0	Abutments & Intermediate Supports	-
5	Headwalls & Wingwalls	-
	Other	-
	Component rating	N

District: 06 County: 156 Cont-Sec: 0005-04 Structure: 205 Route: IH 20 BUS Maint Sect: 11

Min.	Approaches (Item 65)	Rating
0	Embankments	8
4	Embankment Retaining Walls	-
5	Slope Protection	8
5	Roadway Asphalt (1)	7
6	Relief Joints	-
6	Drainage	8
6	Guardfence	8
7	Delineation (2)	7
7	Sight Distance	8
	Other	-
	Component rating	7

Comments:

(1) Asphalt has minor flushing and ~1/8" wide longitudinal cracks.
(2) Several delineators have impact damage.

Min.	Miscellaneous	Rating
7	Signs Vertical Clearance (1)	8
7	Illumination	-
7	Warning Devices	-
7	Utility Lines	-
	Other	-

Comments:

(1) See Underclearance Record.

	Traffic Safety (Item 36)	Rating	Comments:
	Traffic Safety Bridge Railings (036.1)	1	Type T201, Concrete Parapet Rail
	Traffic Safety Transitions (036.2)	0	No thrie beam
	Traffic Safety Approach Guardrail (036.3)	0	No blockouts
	Traffic Safety Approach Guardrail Ends (036.4)	0	Turndowns

	Appraisal Ratings	Rating	Comments:
	Waterway Adequacy (071)	N	
	Approach Roadway Alignment (072)	8	Regulatory Speed: 55 mph Advisory Speed: None

- The front side of the Bridge Inspection Follow-up Action Worksheet describes significant discrepancies found. Along with this is a recommended action for rehabilitation of the discrepancy.

41

BRIDGE MANAGEMENT DATABASE

- The backside of the Follow-up Action Worksheet allows for District personnel comments to be entered for rehabilitation work performed to the bridge.

 District: County: Cont-Sec: - Structure: Route:

District Maintenance Office Comments

Date: Comments By:

Follow-up Actions Taken

Description	Date	Verified By

BRIDGE MANAGEMENT DATABASE

- Aside note, keep in mind that all rehabilitation performed to bridges must be documented and forward to the right personnel. This is to assist personnel in programming, planning, and also for accountability purposes.



MEMORANDUM

TO: District Engineers DATE: July 18, 2012

FROM: John A. Barton, P.E. *John A. Barton, P.E.*
Deputy Executive Director

SUBJECT: Reporting Bridge Maintenance Activities

TxDOT is committed to transportation asset preservation and as a result has increased maintenance funding, developed asset management systems, and dedicated additional personnel to maintenance activities. Bridges are included in this commitment as evidenced by our dedicated Bridge Preventative Maintenance fund and improved Bridge Management and Information System.

The Bridge Division uses the bridge inspection program to identify maintenance recommendations for bridges. This information is then communicated to the districts to be used to prioritize bridge maintenance and rehabilitation. To close the information loop, it is also important for the districts to document and communicate back to the Bridge Division when maintenance and rehabilitation of a bridge is complete. This information exchange improves the Department's ability to plan and prioritize future bridge maintenance and rehabilitation.

In addition, FHWA requires TxDOT to report critical findings found during routine safety inspections. It is equally important that we timely perform and report remedial actions taken as a result of any critical finding.

Report all work performed on a bridge to your district bridge inspection coordinator. Documentation includes what work was done, when it was completed, who performed the work (contract or in-house), and the cost. Include photos of the completed work to help with the documentation. The bridge inspection coordinator will add all documentation provided to the permanent bridge record for each bridge, and will provide updates to the Bridge Division for bridges where critical findings are addressed.

This flow of information between the districts and the Bridge Division is critical to our successful management of bridges. Please ensure that your staff is committed to the communication exchange required to document our bridge needs and TxDOT's responsiveness to those needs. You may contact Gregg Freeby at (512) 416-2183 if you have any questions.

cc: Gregg A. Freeby, P.E., Director, Bridge Division

BRIDGE MANAGEMENT DATABASE

- This particular bridge is an overpass, associated with overpass/underpass bridges is the Underclearance Record. Currently, vertical clearances are collected via a different contract, therefore vertical clearance measurements are typically no longer recorded on this document. However, signed vertical clearances are.

Texas Department of Transportation
Modified (12-6-2005)
for Microsoft Word 7.0, WINGS & NT

Underclearance Record

District: 06 County: 156 Cont-Sec: 0005-04 Structure: 205 Route: IH 20 BUS
Feature Crossed: IH 20 Inspector's Signature: [Signature] Date: 8/20/11
Company Name: Klotz Associates, Inc. Texas PE Firm Registration No. F-929 [Signature] 8/7/13

Underclearance Record Sketch

Controlling Item No.: 54.2 - Min. Vertical Clearance | 55.2 - Min. 10' Wide Vertical Clearance | 55.2 - Right Lateral Clearance | 56 - Left Lateral Clearance | 47 or 47A - Total Horizontal Clearance

Reference Features:
A. Beam C. Cap E. Guard fence G. Pile I. Toe of >3:1 Slope K. Middle of Yellow Stripe M. _____
B. Slab D. Railing F. Column H. Curb J. Barrier L. Middle of White Stripe N. _____

Feature Xcd →	IH 20 EB			IH 20 WB			IH 20 EB			IH 20 WB		
PSN: 0005-04-205	Field Data	Refer.	Item No.	Field Data	Refer.	Item No.	Field Data	Refer.	Item No.	Field Data	Refer.	Item No.
Right Lateral Clearance	11.5'	L-F	55.2	25.3'	L-F	-	11.5'	L-F	55.2	25.3'	L-F	-
Left Lateral Clearance	20.3'	K-F	56	21.3'	K-F	-	20.6'	K-F	56	21.6'	K-F	-
Total Horizontal Ctr	71.4'	F-F	47	71.4'	F-F	-	51.5'	E-E	47	43.5'	E-E	-
Max Practical Vert Clr	-			-			-			-		
Min Measured Vert Clr	-			-			-			-		
Signed Vertical Clr	15'-11"		Tolerance	15'-9"		Tolerance	15'-11"		Tolerance	15'-9"		Tolerance

BRIDGE MANAGEMENT DATABASE

- This document is from a bridge that spans across a creek. Documentation for bridges that span bodies of water require channel measurements be taken.

Channel Cross-Section Measurements Record

District: 22 **County:** 240 **Cont-Sec:** 0086-02 **Structure:** 008 **Route:** SH 359

Feature Crossed: SAN JUANITO CREEK NO 2 *Followed 2/19/2015*

If measurements were taken with any device other than a drop line or tape measure, please describe method in comment section.

Reference Features:
 A. Top of Railing B. Edge of Deck C. Top of Curb D. Top of Parapet E. Sidewalk F. Top of Cap
 G. Water Surface H. Channel I. Rigid Rip-Rap J. Rubble Rip-Rap K. Other

Company Name: XR Structural [758] **Inspection Date:** 12/22/2014

Point Location	Total Horiz Dist	Dist From Last Bent	Top Ref	Bottom Ref	Vertical Distance	Stream Direction	UpStream Side Is
W Abut	0	0	B	J	2.60	UpStream	North
	20	20	B	J	10.80	UpStream	North
B2	29	29	B	H	11.80	UpStream	North
B3	57	28	B	H	12.60	UpStream	North
	69	12	B	H	12.90	UpStream	North
B4	86	29	B	H	12.10	UpStream	North
B5	114	28	B	J	11.40	UpStream	North
	126	12	B	J	10.70	UpStream	North
E Abut	143	29	B	J	2.00	UpStream	North
Bottom Chord			B	F	2.10	UpStream	North

Channel Cross Section Comments

Water Level = Dry

Rock gabions and rock riprap have been installed to protect foundations at Bents 2 and 5 and to replace failing concrete riprap at the abutments.

- In addition to taking measurements, these are to be plotted against a cross section of the channel. The bridge layout is used to plot this data. Data is recorded on the same sheet for several routine inspections using different color ink in order that any scour discrepancies may be detected.



BRIDGE MANAGEMENT DATABASE

- Another option afforded by the Inspection Menu is the “Attachment History” feature.

PonTex

File Edit **Inspection** Reports Tools Help

Structure Attachments 205 Find Item: 002.0 District

Program Comment Entry

Bridge List Activity Log

Structure Loading Inventory Route Intersecting Route **Inspection & Appraisal** Element Condition Components

Attachment(s) Exist

Schedule:

Required Y / N:	Frequency:	Last Date:
Routine Inspection:	(91): 24 mos	(90): 8/7/2013 mm/dd/yyyy
Fracture Critical Inspection / Req (92.1.1): N-No	(92.1.2): mos	(93.1): mmyyyy
Underwater Inspection / Req (92.2.1): N-No	(92.2.2): mos	(93.2): mmyyyy
Other Special Inspection / Req (92.3.1): N-No	(92.3.2): mos	(93.3): 032014 mmyyyy

Special Flags:

Underwater Inspection (88.1): N-Underwater inspec

Fracture Critical Areas (88.2): NN-Structure without

Steel Type (88.3): 2-Some or all expose

Year Steel Painted (88.4): 1968

Condition Ratings:

Deck Condition (58): 5-FAIR CONDITION

Superstructure Condition (59): 4-POOR CONDITION

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Appraisal Ratings - Entered:

Traffic Safety Bridge Railings (36.1): 1-Meet Current Accepts

Traffic Safety Transitions (36.2): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Curre

Roadway Approach Condition (65): 7-GOOD CONDITION

Waterway Adequacy (71): N-Not Applicable

Approach Roadway Alignment (72): 8-No Speed Reduction

Navigation Pier or Abutment Protection (111): Blank-Not Applicable

Scour Critical (113): N-Bridge Not Over Wat

Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable

Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerabl

Deck Geometry (68): 5-Better than Minimum Tol

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol

Structurally Deficient /Functionally Obsolete (120): D

Sufficiency Rating (121): 67.5

Other Special Inspection **Approved**

06-156-0-0005-04-205 0011 OS 1 0 A D

Insp Cmt Print Insp Attach Chng Log

Ready TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 16:01:13

BRIDGE MANAGEMENT DATABASE

- When selected, an Attachment History window will populate and the User will select the inspection of interest by selecting a date. Some Districts have uploaded documents that record back for three (3) inspection cycles. Depending on the District's inspection cycle schedule, the number of available inspection dates will vary but will typically not date back more than six (6) years. Click OK.

The screenshot displays the PonTex Bridge Management Database interface. The main window is titled "PonTex" and has a menu bar with "File", "Edit", "Inspection", "Reports", "Tools", and "Help". Below the menu bar is a toolbar with navigation buttons. The "Structure Number" field is set to "06-156-0-0005-04-205". The "Find Item" dropdown is set to "District". The "Inspection & Appraisal" tab is selected, showing various inspection and appraisal data. A red arrow points to the "Attachment History" window, which is a modal dialog box. This window has a title bar "PonTex" and a menu bar with "File", "Edit", "Inspection", "Reports", "Tools", and "Help". It contains a "Structure Number" field set to "06-156-0-0005-04-205", an "As of Date" dropdown set to "9/28/2015", and an "Inspection" dropdown. The "Inspection" dropdown is open, showing a list of inspection dates: "08/07/2013 (A)", "08/20/2011 (A)", "08/20/2011 (A)", "08/08/2009 (A)", and "08/27/2007 (A)". A red arrow points to the "Exit" button in the bottom left corner of the "Attachment History" window. The main window also shows various appraisal ratings and condition data.

Structure Number: 06-156-0-0005-04-205

Find Item: 002.0 District

Attachment(s) Exist

Schedule:

Required

Routine Inspection:

Fracture Critical Inspection / Req (92.1.1): N-N

Underwater Inspection / Req (92.2.1): N-N

Other Special Inspection / Req (92.3.1): N-N

Special Flags:

Underwater Inspection (88.1): N-Underwater

Fracture Critical Areas (88.2): NN-Structure wi

Steel Type (88.3): 2-Some or all e

Year Steel Painted (88.4):

Condition Ratings:

Deck Condition (58): 5-FAIR COND

Superstructure Condition (59): 4-POOR COND

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Other Special Inspection

Approved

06-156-0-0005-04-205 0011 OS 1 0 A D

Attachment History

Structure Number: 06-156-0-0005-04-205

As of Date: 9/28/2015

Inspection:

08/07/2013 (A)

08/20/2011 (A)

08/20/2011 (A)

08/08/2009 (A)

08/27/2007 (A)

Exit

Appraisal Ratings - Entered:

Bridge (36.1): 1-Meet Current Accepta

Traffic Safety (36.2): 0-Does Not Meet Curre

Approach (36.3): 0-Does Not Meet Curre

Approach (36.4): 0-Does Not Meet Curre

Condition (65): 7-GOOD CONDITION

Quacy (71): N-Not Applicable

ment (72): 8-No Speed Reduction

tion (111): Blank-Not Applicable

tical (113): N-Bridge Not Over Wat

ns (113.1): Blank-Not Applicable

age (128): Y-Damage to beam(s)

calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerabi

Deck Geometry (68): 5-Better than Minimum Tol

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol

Structurally Deficient/Functionally Obsolete (120): D

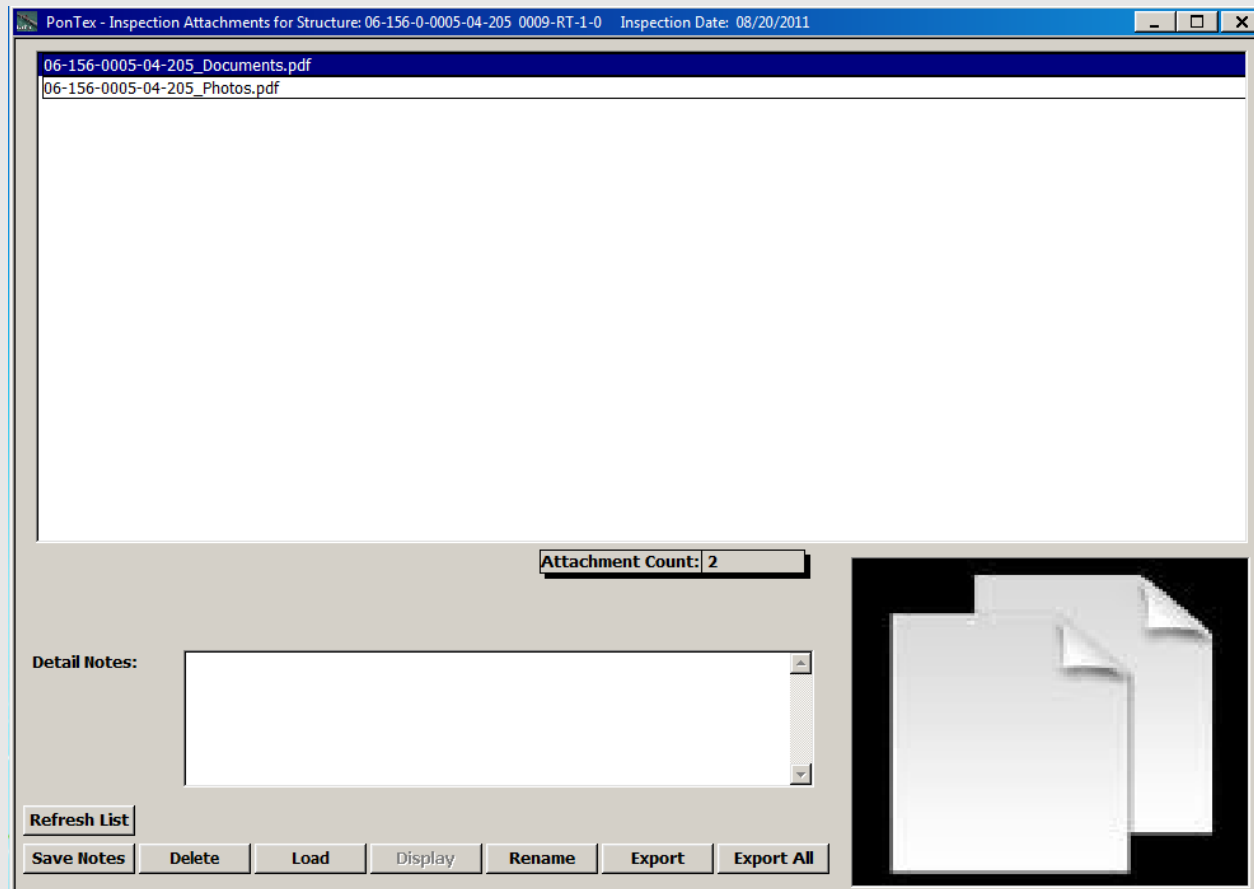
Sufficiency Rating (121): 67.5

Insp Cmt Print Insp Attach Chng Log

Ready TX:ENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 16:02:00

BRIDGE MANAGEMENT DATABASE

- For each one of the dates listed on the Attachment History window, there will be at least two documents available for viewing, the Routine Inspection and the Photos associated with this inspection.



BRIDGE MANAGEMENT DATABASE

- The Reports menu tabulates the different reports that are generated by the database using the inspection data that is entered. Since these reports are generated by the database, these reports are not signed and sealed. The NBI sheet can be accessed through the Reports menu.

PonTex

File Edit **Reports** Tools Help

Structure Number: [] Find Item: 002.0 District

Bridge List Identification

Schedule:

Routine Inspection: []

Fracture Critical Inspection: []

Underwater Inspection: []

Other Special Inspection: []

Special Flags:

Underwater Inspection (88.1): [N-Underwater Inspec]

Fracture Critical Areas (88.2): [NN-Structure without]

Steel Type (88.3): [2-Some or all expose]

Year Steel Painted (88.4): [1968]

Condition Ratings:

Deck Condition (58): [5-FAIR CONDITION]

Superstructure Condition (59): [4-POOR CONDITION]

Substructure Condition (60): [7-GOOD CONDITION]

Channel Condition (61): [N-NOT APPLICABLE]

Culvert Condition (62): [N-NOT APPLICABLE]

Other Special Inspection Approved

06-156-0-0005-04-205 [0011] [OS] [1] [0] [A] [D] []

Appraisal Ratings - Entered:

Agency: [] Last Date: [8/7/2013] [mm/dd/yyyy]

mos (90): [] [mm/yyyy]

mos (93.1): [] [mm/yyyy]

mos (93.2): [] [mm/yyyy]

mos (93.3): [032014] [mm/yyyy]

Traffic Safety Bridge Railings (36.1): [1-Meet Current Acceptance]

Traffic Safety Transitions (36.2): [0-Does Not Meet Current]

Traffic Safety Approach Guardrail (36.3): [0-Does Not Meet Current]

Traffic Safety Approach Guardrail Ends (36.4): [0-Does Not Meet Current]

Roadway Approach Condition (65): [7-GOOD CONDITION]

Waterway Adequacy (71): [N-Not Applicable]

Approach Roadway Alignment (72): [8-No Speed Reduction]

Navigation Pier or Abutment Protection (111): [Blank-Not Applicable]

Scour Critical (113): [N-Bridge Not Over Water]

Scour Plans of Action / Unknown Foundations (113.1): [Blank-Not Applicable]

Over Height Damage (128): [Y-Damage to beam(s)]

Appraisal Ratings - Calculated:

Structure Evaluation (67): [4-Meets Minimum Tolerable]

Deck Geometry (68): [5-Better than Minimum Tolerable]

Vertical and Horizontal Underclearances (69): [5-Better than Minimum Tolerable]

Structurally Deficient / Functionally Obsolete (120): [D]

Sufficiency Rating (121): [67.5]

Insp Cmt Print Insp Attach Chng Log

Ready TX:XENAPPS-9 PONTISPD CGONZALE READ 88 09-28-2015 15:57:21

BRIDGE MANAGEMENT DATABASE

- The NBI sheet is one report generated by the database through the Reports menu option.

STRUCTURE NUMBER: 06-156-0-0005-04-205 0011 OS 1 0 Texas Department of Transportation				Run Date: 10/1/2015				
BRIDGE STATUS: Active				Bridge Division				
INSPECTION STATUS: Approved				(007-0) FACILITY: IH 20 Bus				
(006-1) FEATURE: IH 20				(009-0) LOCATION: 2.10 Mi W of SH 137				
PonTex Detail Bridge Report								
ITEM #	DESCRIPTION	VALUE	ITEM #	DESCRIPTION	VALUE	ITEM #	DESCRIPTION	VALUE
(005-1)	STRUCTURE FUNCTION	2	(045-3)	NO MIN APPR SPAN		(106-1)	WIDENING CODE	0
(004-0)	CITY CODE	00000	(046-0)	TOTAL NUMBER SPANS	4	(107-1)	DECK STR TYPE MAIN SPAN	1
(005-2)	HWY. SYS	11	(047-0)	TOTAL HORIZ CLR	051.5	(108-1)	MAIN SPAN WEAR SF	688
(005-3)	RT. DESIGN	1	(048-0)	MAX.SPAN LENGTH	85	(107-2)	STR.TYP MAJ APP SP	N
(005-4)	HWY NO	0020	(049-0)	STR.LENGTH	290	(108-2)	MAJ APP SPN WEAR SF	NNN
(005-5)	ROUTE DIR	0	(050-1)	LEFT SIDEWALK	00.0	(107-3)	STR.TYP MIN APP SP	N
(005-6)	ROUTE SUFFIX	0	(050-2)	RIGHT SIDEWALK	00.0	(108-3)	MIN APP SPN WEAR SF	NNN
(006-2)	CRIT. BRDG		(051-0)	ROADWAY WIDTH	032.9	(109-0)	AADT TRK PRECENT	40
(010-0)	RT MIN VERT CLR	16FT 07IN	(052-0)	DECK WIDTH	035.3	(110-0)	DESIGN NATION NETWORK	1
(011-0)	MI-POINT	04.466	(053-0)	VERT.CLR OV	99FT 99IN	(111-0)	PIER/ABUT PROTECT	
(011-1)	MIPT DATE (PRI)	197405	(054-1)	VERT.CLR REF FEAT	H	(112-0)	NBIS BRIDGE LENGTH	Y
(011-2)	REF-MKR and DISP	0153 +00812	(054-2)	VERT.CLR UND	15FT 11IN	(113-0)	SCOUR CRITI BRDG	N
(011-A1)	MIPT DATE (IR)	197405	(055-1)	LAT.CLR REF FEAT	H	(113-1)	SCOUR VULNERABILITY	
(012-0)	BASE HWY NETWORK		(055-2)	RIGHT LAT CLEAR	11.5	(114-0)	FUTURE AADT	15650
(013-1)	LRS INVENTORY		(056-0)	LEFT LAT CLEAR	20.6	(115-0)	FUTURE AADT YEAR	2031
(013-2)	LRS SUB RT.		(056-0)	DECK COND	5	(116-0)	MIN NAVIG VERT CLR	
(016-0)	LATITUDE (D / M / S)	32° 06' 58.84"	(059-0)	SUPERSTR COND	4	(119-0)	COST ORIGIN CONSTR	
(016-1)	GPS LAT (DEG.)	32.11634341	(060-0)	SUBSTR COND	7	(120-0)	DEFI / OBSO / 10YR RULE	
(017-0)	LONGITUDE (D / M / S)	101° 49' 44.69"	(061-0)	CHANN-PROTECT	N	(121-0)	SUFF. RATING	067.5
(017-1)	GPS LONG (DEG.)	101.82907963	(062-0)	CULVERT	N	(122-0)	X-REF PRIMARY RT ID	
(017-2)	COLLECTION METHOD	4	(063-0)	METHOD OPR. RATING	1	(123-0)	X-REF STR FUNC PRIMARY RT	
(019-0)	BYPASS LENGTH	0	(064-0)	OPERATIONAL RATING	245	(124-0)	X-REF IR ID	
(020-0)	TOLL	3	(065-0)	RDWY APPR COND	7	(125-0)	X-REF STR FUNC IR	
(021-0)	MAINT. RESPON	01	(065-1)	METHOD INV. RATING	1	(126-0)	DIST USE	
(022-0)	OWNER	01	(066-0)	INVENTORY RATING	227	(128-0)	OV HEIGHT DAMAGE	Y
(022-1)	MAINT. SECT NO	11	(067-0)	STR. EVALUATION	4			
(023-1)	PROJECT TYPE	1	(068-0)	DECK GEOMETRY	5			
(023-2)	CONT / SECT / JOB	0005-04-019	(069-0)	UND. CLR VERT / HORIZ	5	(008-4A)	IR. CONTROL	0005
(026-0)	FUNCT. CLASS	01	(070-0)	BRIDGE POSTING	5	(008-5A)	IR. SECTION	16
(027-0)	YR ORIGIN BUILT	1968	(071-0)	WATERWAY ADEQUACY	N	(011-0A)	IR. MILEPOINT	05.327
(026-1)	LANES ON STR	02	(072-0)	APPR RDWY ALIGN	8	(008-6A)	IR. STR NO	205
(028-2)	LANES UNDER STR	05	(075-0)	TYPE WORK-REPLACE	0	(008-3A)	IR. DUPL OVER	0
(029-0)	AADT	11320	(076-0)	LENGTH IMPROVEMENT	NNN21968	(005-1A)	IR. FUNCTION	1
(030-0)	YR OF AADT	2011	(088-0)	ST-FRAC-CRIT/STEEL	5/7/2013	(005-3A)	IR. DESIGNAT	6
(031-0)	DESIGN LOAD	5	(090-0)	LAST INSP (MMDDYYYY)	24	(005-2A)	IR. HWY SYS	25
(032-0)	APPROACH WIDTH	33	(091-0)	DESIGNAT INSP FREQ	N	(005-4A)	IR. HWY NO	0020
(033-0)	MEDIAN	0	(092-1)	FRACT/CRITI DETAIL	N	(005-5A)	IR. DIR	0
(034-0)	SKEW	30	(092-2)	UNDERWATER INSP	N	(005-6A)	IR. ROUTE SUFFIX	F
(035-0)	STR. FLARED	0	(092-3)	OTHER SPECIAL INSP	N	(011-2A)	IR. REF-MKR / DISP	0338 +00127
(036-0)	TRAF. SAFETY FEAT	1000	(092-1-2)	FRACT/CRIT FREQUENCY		(047-0A)	IR. HORIZ CLR	32.9
(037-0)	HISTORICAL SIGNIF	3	(092-2-2)	UNDERWATER FREQUENCY		(010-0A)	IR. RT. MIN VERT CLR	99FT 99IN
(038-0)	NAVIG CNTL	N	(092-3-2)	OTHER SPECIAL FREQUENCY		(012-0A)	IR. BASE HWY NETWK	
(039-0)	NAVIG VERT CLR	0	(093-1)	FRACT/CRITI (MMYYYY)		(013-1A)	IR. LRS HWY	
(040-0)	NAVIG HORIZ CLR	0	(093-2)	UNWATER INSP (MMYYYY)		(013-2A)	IR. LRS SUB RT	
(041-0)	OPER. STATUS	B	(093-3)	OT/SPEC. INSP (MMYYYY)	032014	(019-0A)	IR. BYPASS LGTH	4
(041-1)	LOAD TYPE	3	(094-0)	BDG IMPROVE COST		(020-0A)	IR. TOLL	3
(041-2)	LOAD IN 1000 LBS	049	(095-0)	RDWY IMPROVE COST		(026-0A)	IR. FUNCT CLASS	04
(042-0)	TYPE SERVICE	11	(096-0)	TOTAL PROJECT COST	000000	(029-0A)	IR. AADT	1210
(043-1)	MAIN SPAN TYPE	2111	(097-0)	YR IMPROVE COST EST		(030-0A)	IR. YEAR OF ADT	2015
(043-2)	MAJ APP SPAN TYPE		(098-0)	BORDER BRIDGE		(100-0A)	IR. DEF HWY DESIGN	0
(043-3)	MIN APP SPAN TYPE		(099-0)	BORDER STR NO		(101-0A)	IR. PAR STR DESIG	N
(043-4)	CULVERT TYPE		(100-0)	DEFENSE HWY DESIGN	1	(102-0A)	IR. DIR OF TRAF	2
(043-5)	TUNNEL TYPE		(101-0)	PARALLEL STR DESIGN	N	(103-0A)	IR. TEMP STR DESIGN	
(044-1)	SUBSTR MAIN SPAN	341	(102-0)	DIR OF TRAFFIC	2	(104-0A)	IR. N H S	0
(044-2)	SUBSTR MAJ APP SPAN		(103-0)	TEMP STR DESIGN		(109-0A)	IR. AADT TRK PCT	9
(044-3)	SUBSTR MIN APP SPAN		(104-0)	N H S	1	(110-0A)	IR. DESIG NAT NETWK	1
(045-1)	NO. MAIN SPAN	4	(105-0)	FED LANDS HWY	0	(114-0A)	IR. FUTURE AADT	1840
(045-2)	NO. MAJ APPR SPAN		(106-0)	YR RECONST	0	(115-0A)	IR. YEAR OF AADT	2035

BRIDGE MANAGEMENT DATABASE

- One other source of information for the PonTex Read Only User role is available through the ability to run queries via the Ad Hoc Report Generator.

Ad Hoc Reports

PonTex Ad Hoc Report Generator

Table:
Bridge

Columns:

- 002.0: District [DISTRICT]
- 003.0: County [COUNTY]
- 004.0: TxDot City Number- Names table. ; (ie., TRMCITY Tacs table)

Computed Columns:

Filter:

Column	Operator	Value	Logical
--------	----------	-------	---------

Sort:

- 002.0: District [DISTRICT] DESC
- 003.0: County [COUNTY] DESC
- 004.0: TxDot City Number- Names table. ; (ie., TRMCITY Tacs table) DESC

Group By:

- 002.0: District [DISTRICT]
- 003.0: County [COUNTY]
- 004.0: TxDot City Number- Names table. ; (ie., TRMCITY Tacs table)

Syntax:

```
SELECT  
FROM PONTIS.USERBRDG
```

Save Import Clear Close Execute

BRIDGE MANAGEMENT DATABASE

- NEED ASSISTANCE ??? Use the PonTex Help menu. There are several sources of helpful information. Most useful for a Read-Only User are the PonTex Overview, Adhoc Reporting Tool, and PonTex Reference Guides.

The screenshot shows the PonTex software interface. The 'Help' menu is open, and the 'PonTex Overview' option is highlighted. Red arrows point to the 'Help' menu, the 'PonTex Overview' option, and the 'Required Y/N:' field in the 'Schedule' section.

PonTex

File Edit Inspection Reports **Help**

Structure Number: 06-156-0-0005-04-20

Find Item: 002.0 District

Programming Clearance Bridge List Identification Geometry

Help

- About
- What's New
- Documentation**
 - PonTex Overview
 - Inspection Management
 - Inspections
 - New Bridge
 - Reporting
 - Change Citrix Password
 - Adhoc Reporting Tool
 - User and Contract Management
 - PonTex Reference
 - Maintenance History
 - New Features
- Contacts
- Color Legend
- User Information

Schedule:

Required Y/N:

Routine Inspection:

Fracture Critical Inspection / Req (92.1.1): N-No (92.1.2)

Underwater Inspection / Req (92.2.1): N-No (92.2.2)

Other Special Inspection / Req (92.3.1): N-No (92.3.2)

Special Flags:

Underwater Inspection (88.1): N-Underwater inspec

Fracture Critical Areas (88.2): NN-Structure without

Steel Type (88.3): 2-Some or all expose

Year Steel Painted (88.4): 1968

Condition Ratings:

Deck Condition (58): 5-FAIR CONDITION

Superstructure Condition (59): 4-POOR CONDITION

Substructure Condition (60): 7-GOOD CONDITION

Channel Condition (61): N-NOT APPLICABLE

Culvert Condition (62): N-NOT APPLICABLE

Other Special Inspection **Approved**

06-156-0-0005-04-205 0011 OS 1 0 A D

Inspection & Appraisal **Element Condition** **Components**

Appraisal Ratings - Entered:

Traffic Safety Bridge Railings (36.1): 1-Meet Current Accepta

Traffic Safety Transitions (36.2): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail (36.3): 0-Does Not Meet Curre

Traffic Safety Approach Guardrail Ends (36.4): 0-Does Not Meet Curre

Roadway Approach Condition (65): 7-GOOD CONDITION

Waterway Adequacy (71): N-Not Applicable

Approach Roadway Alignment (72): 8-No Speed Reduction

Navigation Pier or Abutment Protection (111): Blank-Not Applicable

Scour Critical (113): N-Bridge Not Over Wat

Scour Plans of Action / Unknown Foundations (113.1): Blank-Not Applicable

Over Height Damage (128): Y-Damage to beam(s)

Appraisal Ratings - Calculated:

Structure Evaluation (67): 4-Meets Minimum Tolerabl

Deck Geometry (68): 5-Better than Minimum Tol

Vertical and Horizontal Underclearances (69): 5-Better than Minimum Tol

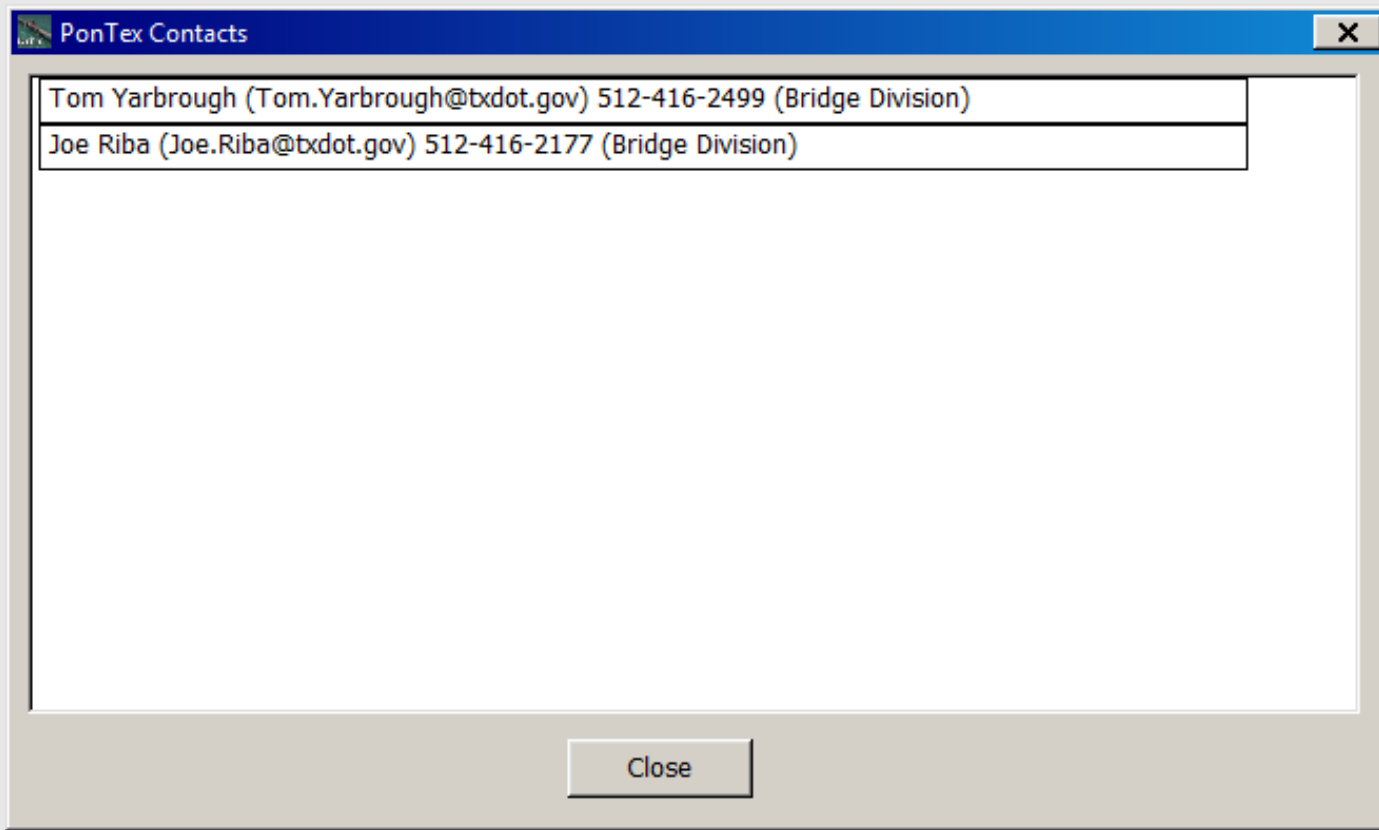
Structurally Deficient /Functionally Obsolete (120): D

Sufficiency Rating (121): 67.5

Insp Cmt Print Insp Attach Chng Log

Ready TX:ENAPPS-10 PONTISPD CGONZALE READ 88 10-01-2015 15:36:37

Questions?



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