Lorie Tudor, P.E.
Director
National Roadshow Series
February 17, 2022
1998 AHTD ENGINEERING INTERN ORIENTATION CLASS

I-40 Mississippi River Bridge
Interstate 40 Hernando DeSoto Bridge

Fracture Discovered

May 11, 2021 - Closed

Emergency Repair Team assembled within 24 hours

August 2, 2021 – Opened

Cost - $10 Million
Investigations

• ARDOT Bridge Inspection Program
  ✓ ARDOT Internal Investigation
  ✓ FHWA Assessment

• Fracture Analysis
  ✓ Wiss, Janney, Elstner Associates, Inc. (WJE)
18 Recommendations

- Quality Control and Quality Assurance
- Inspection Procedures
- Load Rating Procedures
- Scour Appraisals
- Inspection Resources

18 Commendations
Wiss, Janney, Elstner Associates, Inc. (WJE)

Removed Fractured Portion

Removal of Fractured Pieces from the Tie Girder

Core Sample Removed

Figure 14. Removal of fractured pieces from tie.

Figure 15. View from inside tie showing core sample removed from groove weld.
Good Weld

Defective Weld

Welds Repairs During Fabrication
Defect - Undetected
- Three Phases
- Cold Temperatures, Stress, Live Loads
- Reoccurrence Unlikely
- Ultrasonic Testing
Moving Forward

- New Management
- Reorganize
- Create Oversight Committees
- Additional Personnel
- Professional Engineers
- Shall Rotate Inspectors
- FHWA Recommendations
- Consultants
- Ultrasonic Testing

“Never let a good crisis go to waste”

~Winston Churchill
“Ooooh! THAT infrastructure!!”
Funding

- Federal
- State
- Renew Arkansas Highways Program
Infrastructure Investment and Jobs Act

- Roads and Bridges: $110B
- Electric Grid Upgrade: $73B
- Passenger and Freight Rail: $66B
- Broadband: $65B
- Improved Water Quality: $55B
- Climate Change Protection: $50B
- Airports & Ports: $42B
- Public Transit: $39B
- Environmental Clean-Up: $21B
- Electric Vehicles: $15B
- Transportation Safety: $11B
- Reconnecting Communities: $1B
TO ALL TO WHOM THESE PRESENTS COME – GREETINGS:

EXECUTIVE ORDER TO ESTABLISH THE GOVERNOR’S INFRASTRUCTURE PLANNING ADVISORY COMMITTEE

WHEREAS: President Joe Biden signed the Infrastructure Investment and Jobs Act into law on November 15, 2021; and

WHEREAS: The Infrastructure Investment and Jobs Act provides $1.2 trillion in both grants and dedicated spending for infrastructure projects, capital assets, and workforce development; and

WHEREAS: The Infrastructure Investment and Jobs Act includes provisions that allow for disbursements to entities and individuals through various programs operated by agencies of the State of Arkansas; and

WHEREAS: It is in the best interest of the state and its citizens to identify best practices and procedures for ensuring that the State of Arkansas, its citizens, and businesses realize the maximum relief and benefits available under the Infrastructure Investment and Jobs Act;
$54 million Electric Vehicle Chargers
$279 million Bridges
$31.1 million Motor Carrier Safety Assistance Program
$3.5 billion Roads
$244 million Transit
$203 million Safety Improvements

$1 trillion Infrastructure Investment and Jobs Act

Arkansas
5 Years
FFYs 2022-2026

Department of Transportation
✓ Fed Highway
✓ Fed Motor Carrier Safety
✓ Fed Transit
Formula Programs $3.9 B

- National Highway Performance $2.1 B
- Bridge $278 M
- Transportation Planning $78.8 M
- Safety RR Xing $222.5 M
- Surface Transportation Block $1.1 B
- Trans Alternative Rec Trails $96.7 M
- Ferry Boat $304,000
- Electric Vehicle $40 M
Discretionary Grant Programs

- Bridge Investment: $12.5 B
- INFRA: $8 B
- PROTECT: $1.4 B
- Mega-Projects: $5 B
- Charging and Fueling Infrastructure: $2.5 B
- Rural Surface Transportation: $2 B
- Reconnecting Communities Pilot: $1.0 B
- Safe Streets for All: $5.0 B
Governor’s Long Term Highway Plan

State Highways

Act 416 $95 Million
Issue 1 $205 Million
Total to ARDOT $300 Million
- Preservation
  - Pavement
  - Bridges
- Safety
- Capital and Capacity Needs
Public Service Campaigns
• Slow Down, Phone Down: a statewide work zone safety campaign

• Arkansas Highway Police and Arkansas State Police cracking down on distracted and reckless driving

• Education and awareness around work zone laws

**WORK ZONE CRASHES**

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<tr>
<th>Year</th>
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<tr>
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<td>2021</td>
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NEW YEAR, NEW ARDOT!

We’re now on Facebook and Instagram: @myardot