Bridge Inspections and Being an ERC

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Objectives

- Purpose of Bridge Inspections
- LPA Guidance Document
 - Role of ERC in Bridge Inspections
- Consultant & INDOT Contracts
- Inspection Reports
 - BIAS (Bridge Inspection Application System)
- Bridge Inspection Resources
 - INBridgesHelp@indot.in.gov





Purpose of Bridge Inspections

- 1. To ensure public safety
- 2. To provide for the efficient use of resources in maintaining the serviceability of Indiana's bridges and small structures
- 3. To comply with all federal and state laws, rules, and policies





Bridge Inspections

- Bridge inspections are required by FHWA
- INDOT allows Local Bridge Funds from the Federal Aid Program to be used
- Reimbursable and matching program
- Maintaining the Bridge Inspection Program in compliance with FHWA And INDOT regulations, laws, and standards is Expected
- Compliance dates have been set for all 92 counties

Failure to comply may result in loss or repayment of county's federal aid





Before We Jump In

- New Federal Requirement in 2014
 - Bridges with condition ratings of equal to or less than 4 require 12 month inspections
 - Adds additional phases to Bridge inspection
 - New Phases; 1, 1A, 2 and 2A
- Lots of changes to better meet this requirement





Guidance Document

Chapter 13*: County Bridge Inspections

- Role of the ERC
- Consultant Selection and RFPs
- Contracts— Consultant and INDOT
 - 4-year Phased Contracts
 - 80/20 Federal Aid Program
- Bridge Inspection Schedule
- Technical Issues
- Revisions are in process

*Guidance Document Revised 2/2015



Role of the ERC

- Manage Inspection Process-Documentation
 - Consultant Selection
 - Financial
- Manage the Bridge Inspection Schedule
 - Timely Inspections (Compliance dates)
 - Timely Reports
 - Quarterly Tracking (ITAP)
- Educate Yourself
 - National Bridge Inspection Standards (NBIS)
 - Bridge Inspection Manual (BIM)
 - Bridge Conference



Role of the ERC

Financial requirements

- Manage the timing and execution of bridge inspection contracts
- Must ensure the work is included in the TIP & STIP
- Request FMIS Approval— Any work that occurs prior to FMIS Authorization (NTP) will result in all costs being paid 100% by the LPA
 - FMIS request letter required for all Phases
- Issue the Notice to Proceed (NTP)
- Review and submit related invoices
 - This is a reimbursement program proof of payment is required with your invoice





Consultant Selection and RFP

- Critical component in inspection process
 - Start one year before first phase due
- Must be prequalified with INDOT
- No letting or contractor
 - All work on contract done by consultant
- ERC responsible for writing and submitting RFPs as outlined in Guidance Document
 - New RFP and Checklist on website



Consultant Selection and RFP

New RFP and Selection checklist:

 http://www.in.gov/indot/files/LPA RFPTemplateforBridgeInspections.do
 CX

http://www.in.gov/indot/files/LPA SelectionReviewChecklistforBridgeIn spections.docx





NEW LPA-Consultant Contract

- New Boilerplate contract is on the INDOT LPA Consultant Information website and must be use for all new contracts
- Maximum fee not to exceed
- MUST be reviewed by INDOT before LPA signs to ensure compliance and reasonable fees
- Bridge inspection specific contract review checklist on INDOT's website
- You have the right to negotiate your contract fees and activities.



LPA-Consultant Contract

Lets take a look at the new contract

http://www.in.gov/indot/files/LPA ConsultingContractf
orCountyBridgeInspections.docx





Include with Consultant Contract

- Use Bridge inspection specific <u>LPA-</u> <u>Consultant Contract Review Checklist</u> and include with contract
 - Ensures a complete contract package
 - Found in consultant section on LPA website

- Consultant Prequalification Letter
 - Sub-consultants letter as well





INDOT-LPA Contract

- Completed <u>after</u> INDOT has received signed LPA-Consultant Contract
 - Importance of early RFP
- Shows federal cap
- Will need to be returned to INDOT with signatures and fully executed by the Attorney General's office before FMIS can be requested
- INDOT will issue NTP, LPA will issue NTP to consultant and copy to INDOT





Supplemental Contracts

- Additional funding may be given
 - Reduced Frequency Inspections
 - New Bridges
- Supplemental Consultant Contract
 - List of Bridges and fee's
 - INDOT approval needed before executed
- Sample supplemental contract can be obtained through your PM
- Supplemental agreements should not be drafted until previous phase is completed





Schedule

Bridge inspections shall be maintained on schedulecompleted no later than the end of the month of the scheduled due date (per bridge basis).

- Late inspections do not change the schedule of any future inspection – *Federal Regulation*
- Late inspections = NON-COMPLIANCE; penalties may include:
 - Losing part or all of the federal funds provided within the inspection contract
 - Losing part or all of federal funds for other projects, etc.
- For schedule questions contact consultant, look at BIAS or contact <u>INBridgesHelp@indot.in.gov</u>





Schedule

- Bridges with condition rating less than or equal to 4 on any part require yearly (12 month frequency) inspections
 - Items 58,59,60 and 62 on Report
 - Supplemental Contract
- All other bridges inspected every <u>24 months</u>
- Special Inspections could be on lesser cycle
- All inspections need to be maintained on schedule and completed by due date
- New bridges and non-scheduled inspections
 - Supplemental Contract





Types of Inspections

- Routine on all Bridges
- Additional Special Inspections:
 - Fractural Critical
 - Underwater
 - Complex
 - Element level
 - Special
 - Define and give justification







Technical Issues

Most common issues:

- Scour Monitoring
 - Scour Critical Bridges (SCB)
 - Plan of Action (POA)
- Load Rating
 - Included on <u>EVERY BRIDGE</u>
- Critical Findings
 - Acted on within 30 days
- New bridges
 - Add to BIAS





Inspection Reports

- Reports prepared by consultant
- Bridge Inspection Application System (BIAS)
- Reports uploaded into BIAS by consultant
- Need to Request access as ERC
 - Contact Consultant for access

https://indot-it.bentley.com





Key Report Takeaways

Condition Rating

58: Deck

59: Superstructure

• **60**: Substructure

• **62**: Culvert

Load Rating

Asset management Tool

- Project/Maintenance Priorities
 - Not always worst rated bridge





Fatal Flaws

- Bridges Inspected out of compliance with NBIS
- Not in TIP/STIP
- No quarterly Reports
- RFP process not followed
- Not completed on schedule
- No Scour Monitoring Plan
- Work before NTP
- No ERC



Additional Information

Use your Consultant

Your first contact for Bridge Inspection questions and information

GovDelivery

- Sign up to ensure notifications of important LPA and County Bridge information
- New policy information





FHWA Online Resources

http://www.fhwa.dot.gov/bridge/nbis.htm

National Bridge Inspection Standards (NBIS):

- 23 CFR 650C (NBIS) regulation
- NBIS Q&A guidance

National Bridge Inventory (NBI)

- National database of bridge inventory and inspection data
- NBI data is collected per the "FHWA Coding Guide"





INDOT Online Resources

INDOT Bridge Inspection Website:

http://www.in.gov/dot/div/contracts/standards/bridge/bridgeinspect.htm

INDOT Bridge Inspection Manual:

http://www.in.gov/dot/div/contracts/standards/bridge/inspector_manual/index.htm

Indiana Bridge Inspection Application System (BIAS):

https://indot-it.bentley.com(password
protected)





Resources-People

<u>INBridgesHelp@indot.in.gov</u>

District Program Director - Funding

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Questions?



