

# **INDIANA DEPARTMENT OF TRANSPORTATION**

Driving Indiana's Economic Growth

Design Memorandum No. 16-01 Technical Advisory

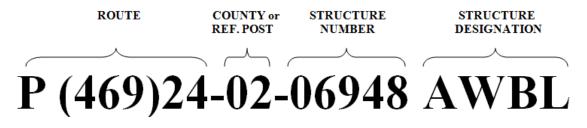
January 5, 2016

TO:All Design, Operations, and District Personnel, and ConsultantsFROM:/s/Elizabeth W. Phillips<br/>Elizabeth W. Phillips<br/>Manager, Office of Standards and Policy<br/>Bridges DivisionSUBJECT:Structure Number in ERMS, SPMS, and on PlansEFFECTIVE:Immediately

This memo is to identify the structure number information to be shown on the plans and entered into both ERMS and SPMS.

The Department is required to maintain a bridge file for each of the bridges within its inventory to comply with federal regulations. Various systems are used to store data related to each bridge such as existing plans, condition, as well as proposed and historic work performed on the bridge. To be able to effectively and efficiently access and compile data related to a particular bridge, a unique identifier is needed to tie the data together. That identifier is the structure number.

Although the full bridge number is often referred to as the structure number, the structure number is, more specifically, the 5-digit number that appears after the route-county/reference post prefix and before the designation which identifies the sequence of rehabilitation the bridge has undergone. The route and reference post also serve as a field reference for bridge inspectors on interstate bridges.



The INDOT Bridge Numbering System and guidance on properly including the structure number on the plans and in ERMS and SPMS is included as an attachment to this memo and summarized below.

## <u>SPMS</u>

New and replacement bridges must be assigned a new 5-digit structure number prior to letting. Rehabilitated bridges and bridges programmed for preventive maintenance retain their existing structure number, but utilize a new structure designation.

The new 5-digit structure number is auto-generated upon saving when the Replace Bridge icon is selected from the Bridge Tab. If the Maintain Bridge icon is selected, a new structure number will not be generated.

### <u>Plans</u>

The full bridge number should appear as both the Bridge File and Structure number on the Title Sheet. The number shown should be the new (not the existing) full bridge number as described above. For interstate bridges, revisions to a route's reference post may have altered the prefix information in the full bridge number from that shown on existing plans or a prior bridge inspection report. Therefore, the full bridge number shown on the plans should be verified against the information in SPMS prior to submitting the Final Tracings package to Contract Administration.

As a reminder, each new or replacement bridge should be assigned its own Des number and developed as described below.

# For INDOT projects:

- A. <u>New or Replacement Beam or Slab Bridge.</u> A separate set of plans should be developed for each bridge. However, plans for an overflow structure may be included in the set for the main-channel structure.
- B. <u>New or Replacement (Bridge-Length) Three-Sided, Box, or Pipe Structure.</u> These structures, known as underfill structures, and may be incorporated into the road plans. The full bridge numbers and Des numbers for all such structures included in the road plans should be shown on the title sheet.
- C. <u>Bridge Preservation.</u> Multiple bridges programmed for rehabilitation or preventative maintenance may be combined into one set of bridge plans. The full bridge numbers and Des numbers for all such bridges should be shown on the title sheet.

#### For Local Public Agency (LPA) projects:

Bridge plans may be incorporated into road plans or developed as a separate set per the requirements of the LPA. However, the full bridge numbers and Des numbers for all structures included in the road plans should be shown on the road title sheet.

### <u>ERMS</u>

The structure number field is currently shown as optional in ERMS. Effective with the date of this memo, the structure number field should be completed for all documents uploaded to ERMS as described below. This applies regardless of the ERMS repository, e.g. Design Documents, Construction Change, Large Plans, etc.

Project	Structure Number Entry in ERMS*
Road Plans, no bridge	"N/A"
Road Plans, new or replacement bridge	New 5-digit structure number
included in plan set	
Road Plans, bridge rehabilitation or	Existing 5-digit structure number
preventative maintenance included in plan	
set	
Bridge Plans, new or replacement bridge	New 5-digit structure number
Bridge Plans, bridge rehabilitation or	Existing 5-digit structure number
preventative maintenance	
*Where multiple bridges are included in a contract or on a set of plans, the 5-digit structure	
number should be entered for each bridge, separated by commas.	

Questions regarding structure numbers can be sent to INBridgesHelp@indot.in.gov.