

# Highway Performance Monitoring System (HPMS): Concepts, Data Collection & Reporting Requirements

Highway Performance Monitoring System (HPMS) 101  
FHWA Highway Information Seminar (HIS)  
Arlington, VA  
October 29, 2018



U.S. Department of Transportation  
Federal Highway Administration



# Welcome

- Who is in attendance?
  - State DOTs, FHWA Division Offices
- Familiarity with HPMS?
- Expectations for this workshop?



# Goals/Objectives

To provide training on the following HPMS topics:

- Program Background
- Data Model
- Data Collection and Reporting Requirements
- Submittal Process



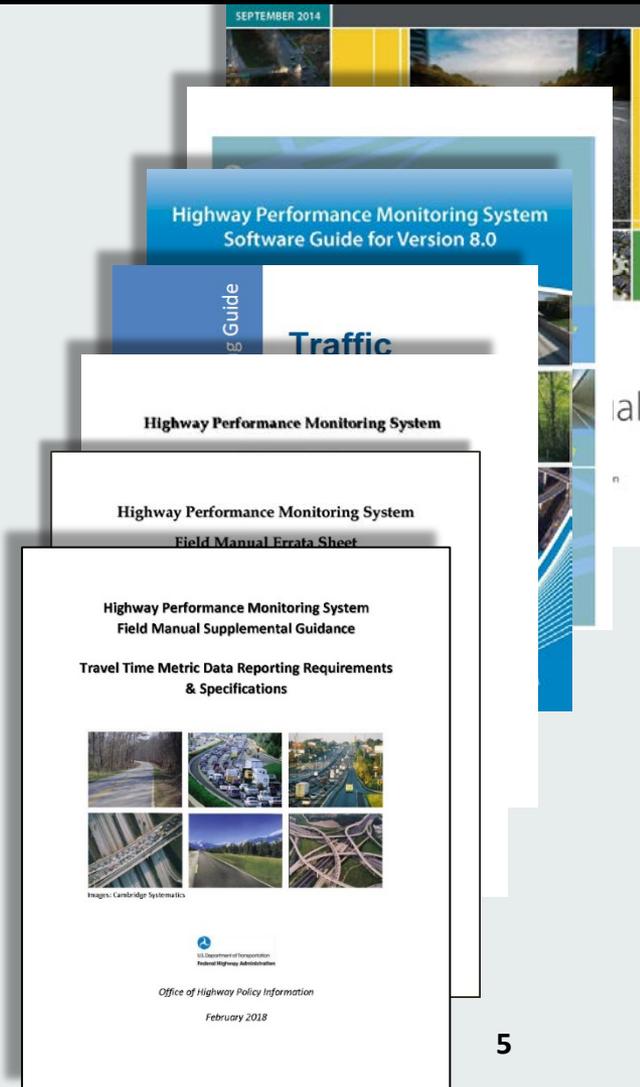
# Topics to be Covered

- I. HPMS Background and Core Components
- II. Data Model and Required Datasets
- III. Data Reporting Requirements
- IV. Sampling
- V. HPMS Submittal Process



# HPMS-related Reference Materials

- ARNOLD Technical Reference Manual
- Highway Functional Classification Concepts, Criteria, and Procedures 2013 Edition
- HPMS Field Manual & Errata Sheet
- HPMS Field Manual PM3 Requirements Supplemental Guidance
- HPMS Software & Guide
- Traffic Monitoring Guide (TMG)



# Reference Material Links

<https://www.fhwa.dot.gov/policyinformation/hpms.cfm>

The screenshot shows the top portion of the FHWA website. On the left is the FHWA logo and the text "U.S. Department of Transportation Federal Highway Administration". On the right is a navigation menu with links for "About", "Programs", "Resources", "Briefing Room", "Contact", and "Search FHWA". Below the navigation menu are social media icons for Facebook, YouTube, Twitter, and LinkedIn. The main header area features the text "Policy and Governmental Affairs Office of Highway Policy Information" over a background image of a highway interchange. Below this is a secondary navigation menu with links for "About", "Offices", "Publications", and "Contact Us". A search bar is located on the right side of the header area. At the bottom of the header is a breadcrumb trail: "FHWA Home / Policy & Governmental Affairs / Highway Policy Information / Office of Highway Policy Information".

## Highway Performance Monitoring System (HPMS)

The HPMS is a national level highway information system that includes data on the extent, condition, performance, use and operating characteristics of the nation's highways. The HPMS contains administrative and extent of system information on all public roads, while information on other characteristics is represented in HPMS as a mix of universe and sample data for arterial and collector functional systems. Limited information on travel and paved miles is included in summary form for the lowest functional systems.

HPMS was developed in 1978 as a continuing database, replacing the special biennial condition studies that had been conducted since 1965. The HPMS has been modified several times since its inception. Changes have been made to reflect changes in the highway systems, legislation, and national priorities, to reflect new technology, and to consolidate or streamline reporting requirements.



### HPMS and Related Publications

[Quick Find Mileage Data](#) (tables on Road miles from Highway Statistics)

[HPMS Field Manual](#)

[HPMS Software Guide](#)

[HPMS Primer](#) (Overview of the HPMS for FHWA)

[FHWA Review Guidelines](#)

[ARNOLD Guidance](#)

#### HPMS Archive Item Descriptions (Data item descriptions)

- [1982-1987 Archive](#)
- [1988-1992 Archive](#)
- [1993-1998 Archive](#)
- [Urbanized Area Codes 1991-2001](#)

#### Use of Census Boundaries for HPMS Data Reporting

[FAQs: Applying 2000 Census Data to Urbanized and Urban Areas Urban Area Boundaries](#)

#### Highway Functional Classification Guidelines

[Highway Functional Classification: Concepts, Criteria and Procedures](#)

#### HPMS Travel Data Reporting

[State Practices Used to Report Local Area Travel](#)

[Traffic Data for High Volume Routes: Best Practices and Guidelines](#)

[Improving HPMS Data Quality](#)

# Ground Rules

- Raise hand to speak
- One conversation at a time
- Parking Lot will be used for items needing offline/further discussion



<http://kylebaptiste.com/home-remodeling-tips/project-ground-rules/>