



**Institutional Aspects of Management in
the Transport Sector
in the
United States of America**

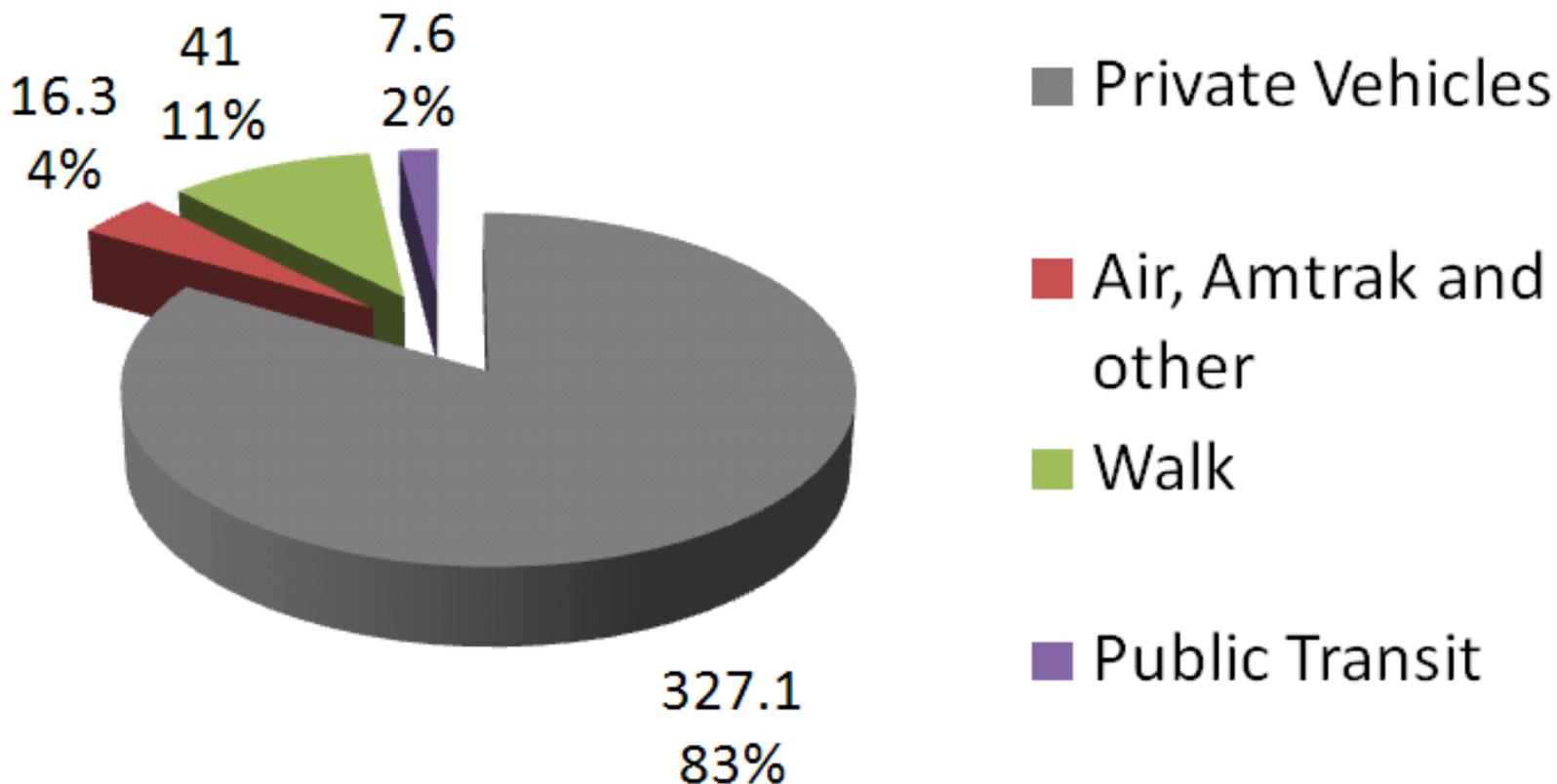
**International Workshop on Transportation
Infrastructure**

Ministry of Transport, Brasilia, 8 May 2012

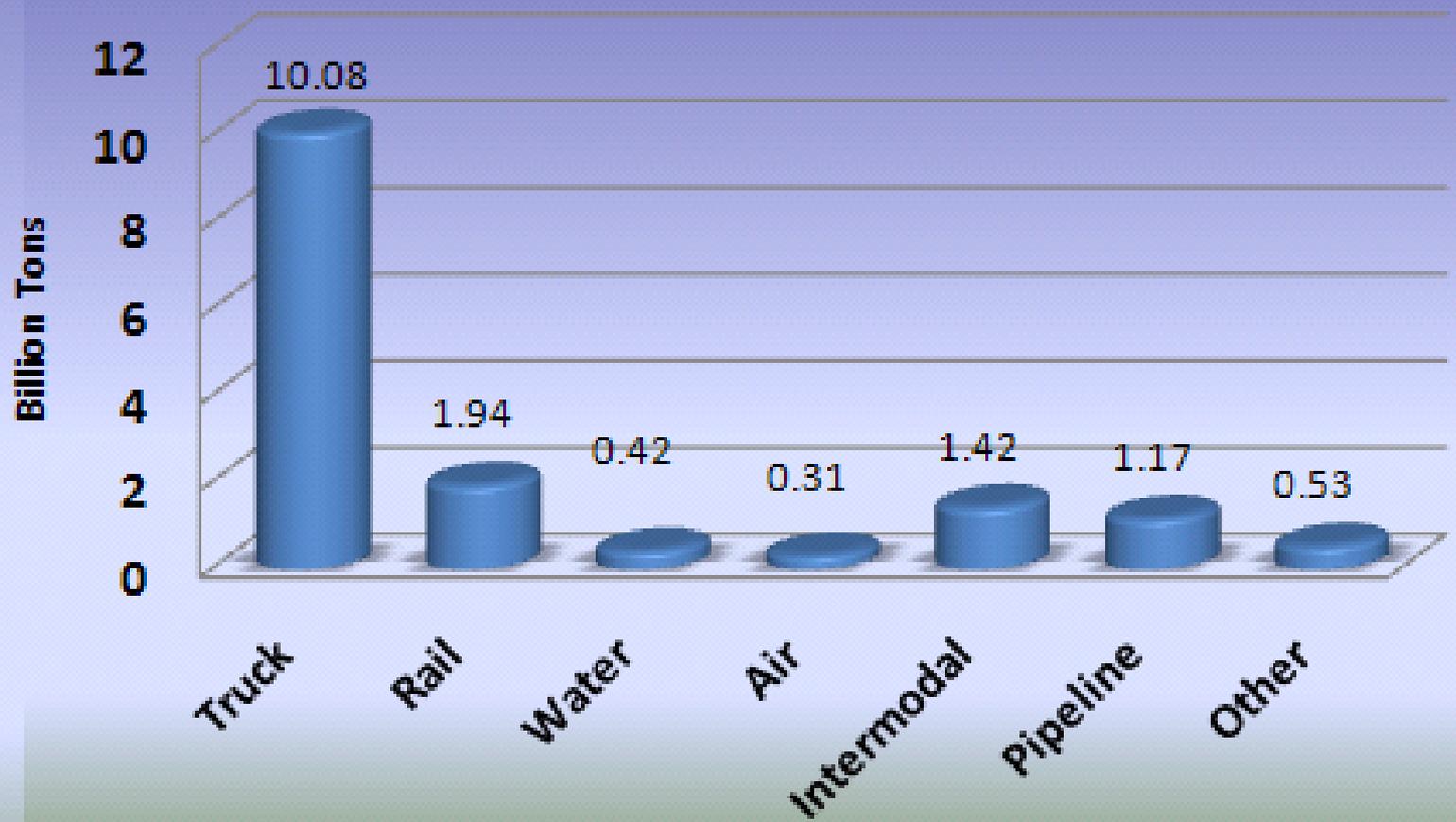
King W. Gee

(Retired, U.S. Federal Highway Administration)

Nearly 400 Billion Person Trips In 2008



Goods Shipped in 2009





U.S. Department of Transportation

- *Federal Aviation Administration (FAA)*
- *Saint Lawrence Seaway Corporation (SLSC)*
- *Federal Highway Administration (FHWA)*
- *Federal Transit Administration (FTA)*
- *National Highway Traffic Safety Administration (NHTSA)*
- *Federal Motor Carrier Safety Administration*
- *Federal Rail Administration (FRA)*
- *Maritime Administration (MARAD)*
- *Pipeline & Hazardous Materials Safety Administration (PHMSA)*
- *Research, Innovation and Technology Administration (RITA)*

USA's Highway System

Public Roads: 4,059,352 miles

Federal Eligible Roads: 994,517 miles

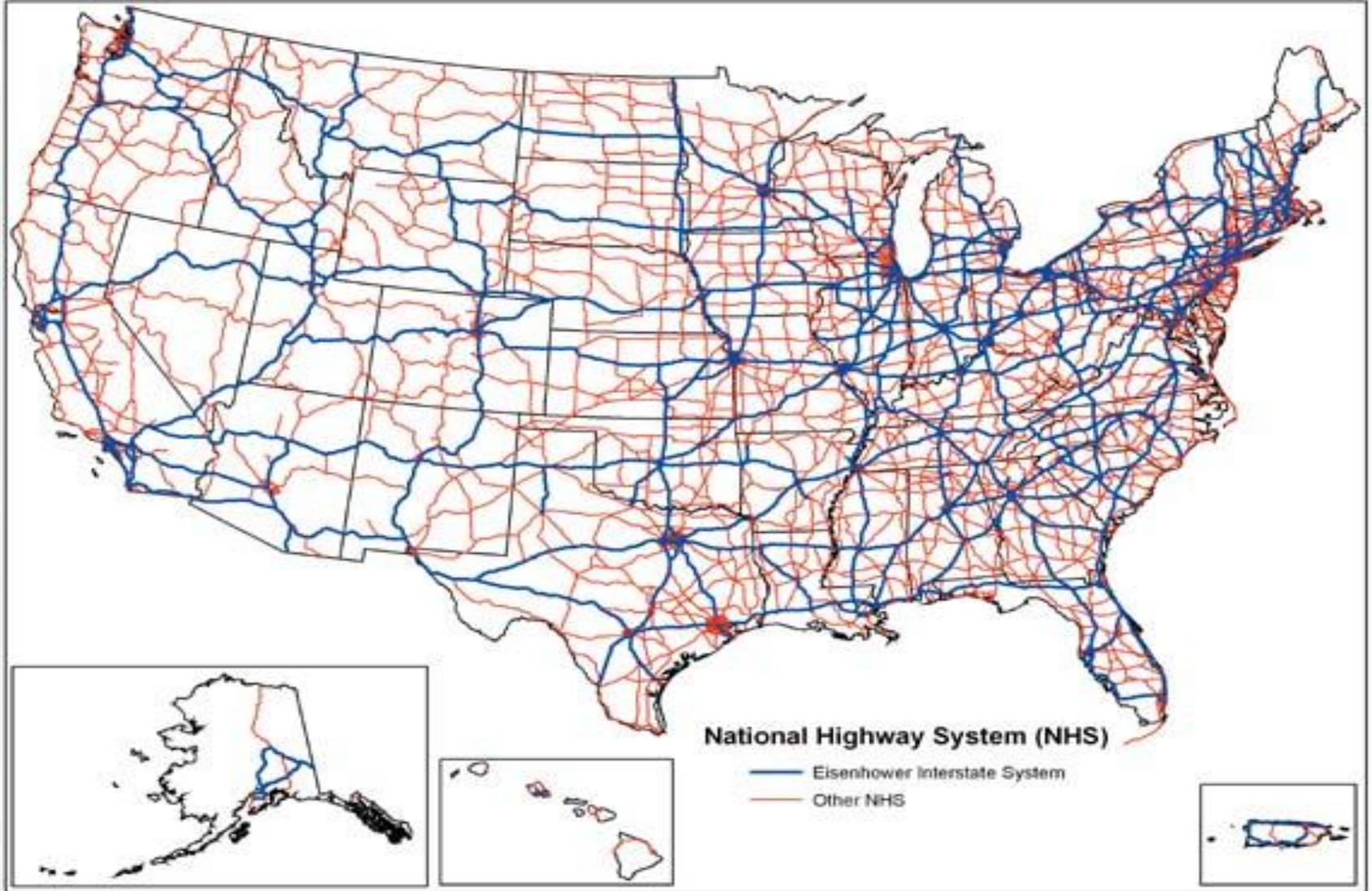
National Highway System: 164,094 miles

Interstate: 47,013 miles

Bridges: 604,493



Interstates - Legacy of 50 Years of Growth







1916 FEDERAL-AID HIGHWAY PROGRAM

- 1. Federal-State partnership.**
- 2. Each State must have a highway agency.**
- 3. 50-50 Federal-State funding for projects.**
- 4. Limited system eligibility.**
- 5. Federal review of each project.**

Federal Aid Highway Act of 1956



THE DWIGHT D. EISENHOWER SYSTEM OF INTERSTATE AND DEFENSE HIGHWAYS





Federal Aid Highway Act of 1956

- **National Commitment to Build 40,000 Mile Interstate Highway System.**
- **Retained Federal-State Partnership.**
vs. Federally Owned System
- **Funding Source: Highway Trust Fund.**
vs. Toll Road System
- **Cost-to-Complete Guarantee.**
- **High Design Standards.**
- **Interregional AND Urban Traffic**



Federal – State Partnership

FEDERAL:

- **Highway System Designation (IHS & NHS)**
- **National Standards: Geometric & Signing**
- **Reimburse IHS Construction Cost**
- **Administer Funds & Oversee Processes**

STATE (& LOCAL):

- **Suitably Equipped & Staffed State Agency**
- **Planning & Selection of Projects**
- **State Processes for Execution of Works**
- **Maintenance & Operation of System**

JOINT

- **Environmental & Other Federal Requirements**

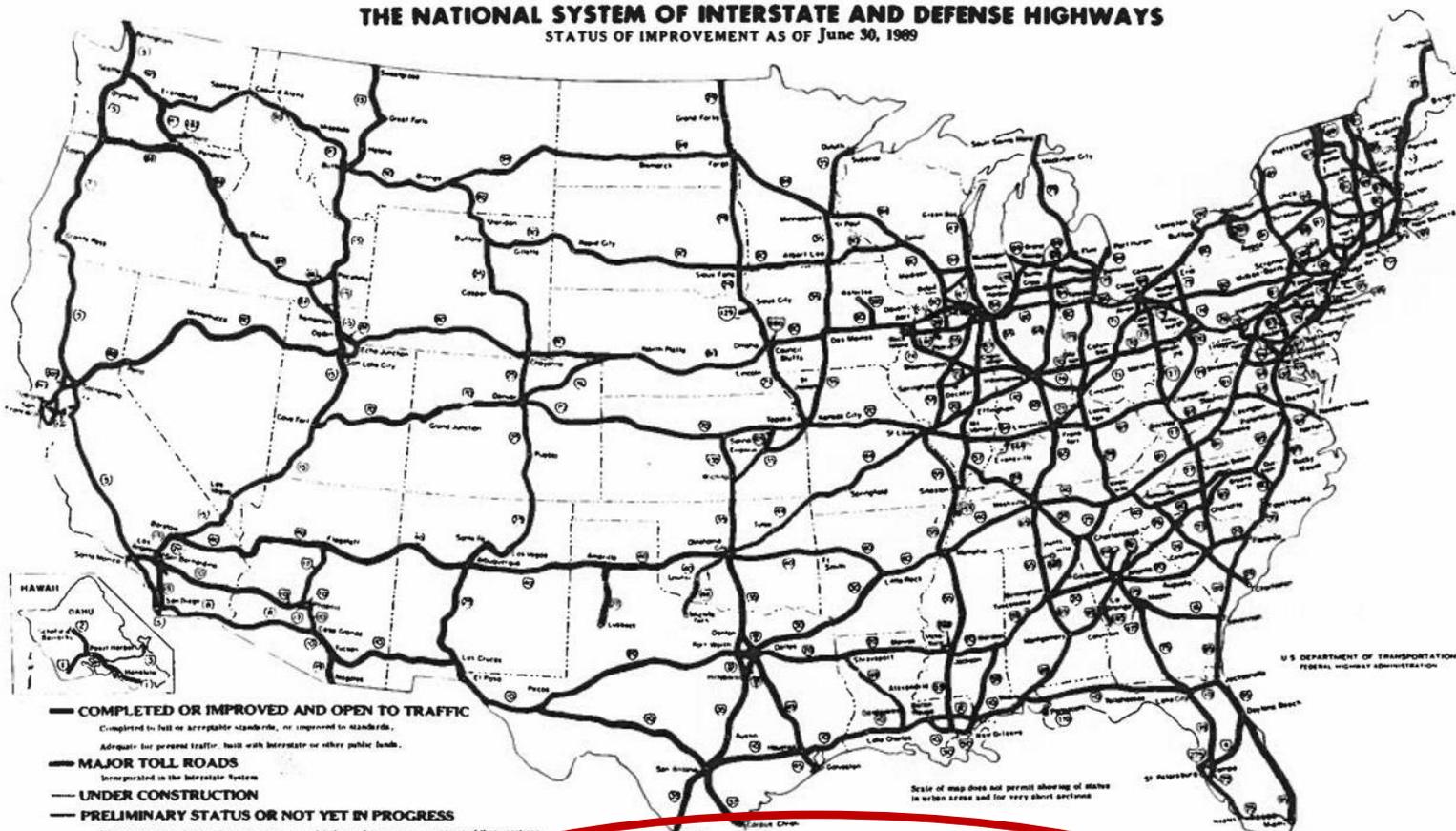


Challenges Overcome

- **Unconnected Continent of 48 States**
 - ***Interstate & National Highway Systems***
- **Inconsistent Design Standards**
 - ***AASHTO Design Standards***
- **Stable Funding Source**
 - ***Gas Tax & Highway Trust Fund***
- **Inexperienced Technical Corps**
 - ***Federal-State partnership***
- **Driver Expectations**
 - ***Manual on Uniform Traffic Control Devices (MUTCD)***

THE NATIONAL SYSTEM OF INTERSTATE AND DEFENSE HIGHWAYS

STATUS OF IMPROVEMENT AS OF June 30, 1969



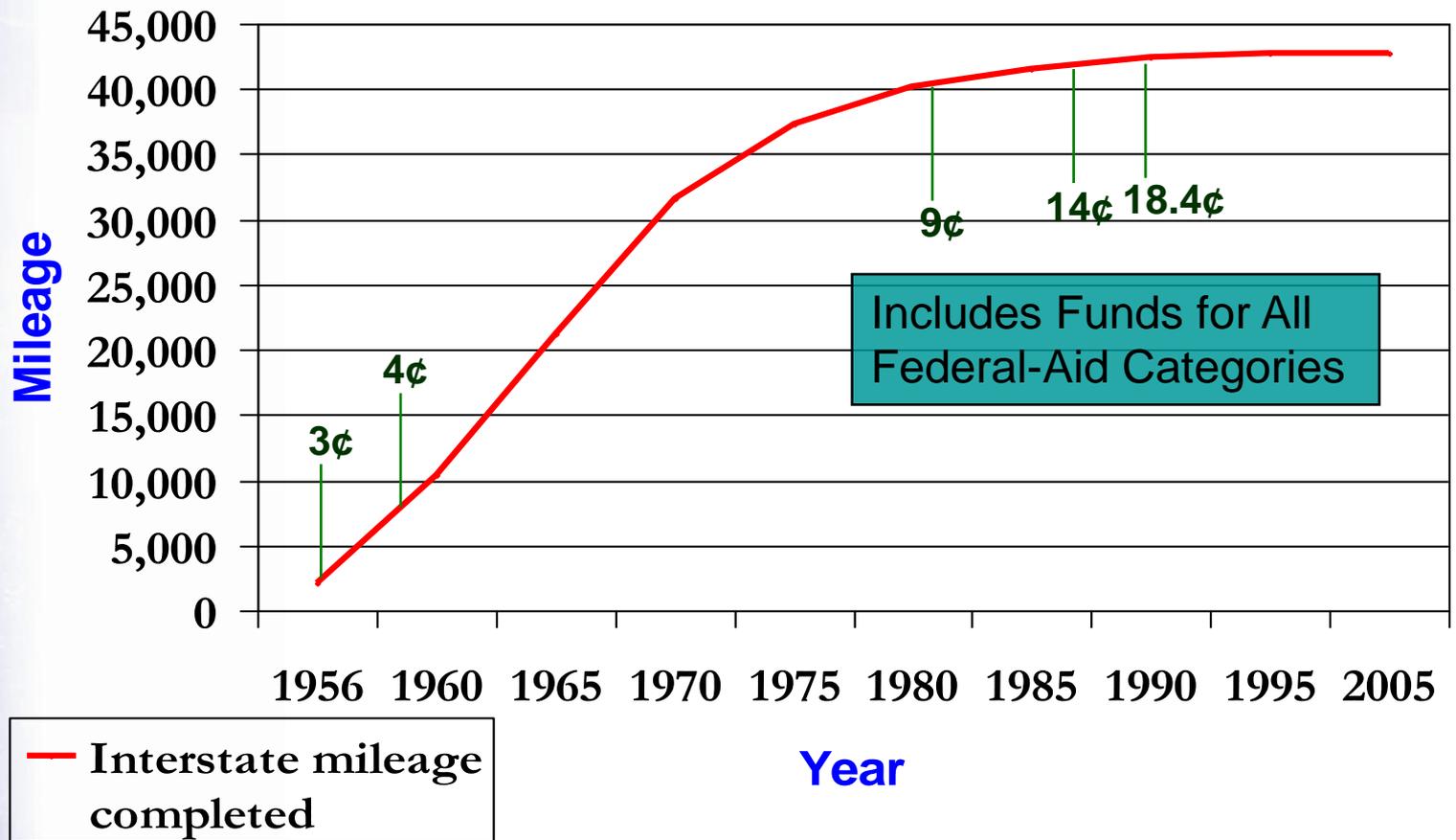
- COMPLETED OR IMPROVED AND OPEN TO TRAFFIC**
Completed to full or acceptable standards, or improved to standards.
Adequate for present traffic. Built with Interstate or other public funds.
- MAJOR TOLL ROADS**
Incorporated in the Interstate System
- UNDER CONSTRUCTION**
- PRELIMINARY STATUS OR NOT YET IN PROGRESS**
Plan preparation and right-of-way acquisition completed or underway on many portions of these sections

Scale of map does not permit showing of status in urban areas and for very short sections

U.S. DEPARTMENT OF TRANSPORTATION
FEDERAL HIGHWAY ADMINISTRATION

Preliminary Status or Not Yet in Progress 0 Miles	Engineering and Right-of-Way in Progress 107 Miles	Under Basic Construction 397 Miles	Toll 2,271 Miles	Adequate Present Traffic 447 Miles	Minor Improvement is Required or Underway 1,868 Miles	Complete or Essentially Complete 37,705 Miles	INTERSTATE TOTAL 42,795 MILES

Federal Gasoline Tax and the Growth of the Interstate Highway System



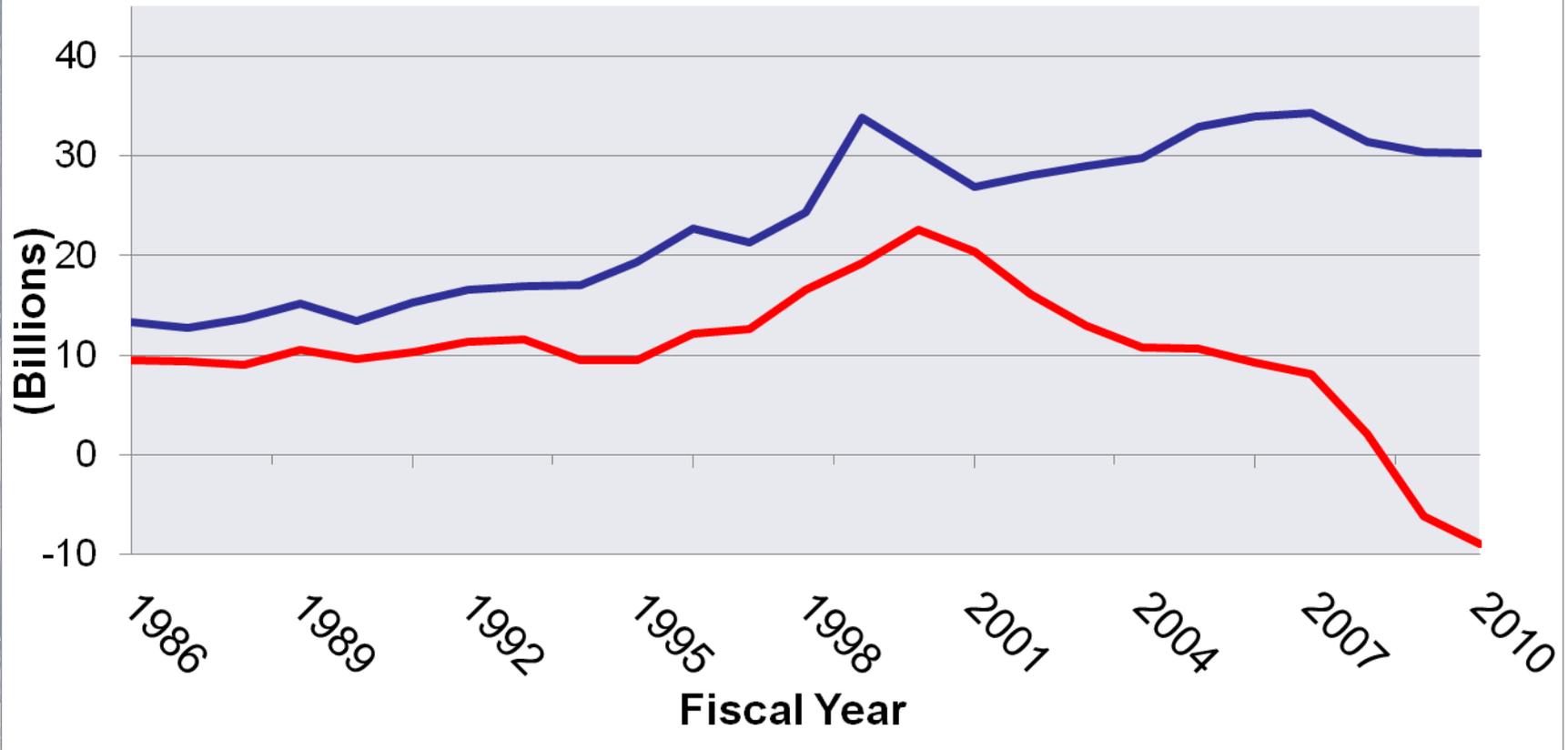
Highway Trust Fund

Income Sources:

- **Fuel Taxes (90%)**
- **Truck & Trailer Sales (5%)**
- **Heavy Vehicle Use Tax (4%)**
- **Tires (1%)**

User Fee Type	Rate
Motor Fuels	
Gasoline	18.4¢ per gallon
Gasohol (10% blend)	13.2¢ per gallon
Diesel Fuel	24.4¢ per gallon
Liquified Petroleum Gases	13.6¢ per gallon
Tires	0-40 pounds, no tax over 40-70 pounds, 15¢ per pound in excess of 40 over 70-90 pounds, \$4.50 plus 30¢ per pound in excess of 70 over 90 pounds, \$10.50 plus 50¢ per pound in excess of 90
Truck and Trailer Sales	12% of retailer's sales price for trucks over 33,000 pounds gross vehicle weight (GVW) and trailers over 26,000 pounds GVW
Heavy Use Vehicles	Annual Tax: Trucks 55,000-75,000 pounds GVW, \$100 plus \$22 for each 1,000 pounds (or fraction thereof) in excess of 55,000 pounds Trucks over 75,000 pounds GVW, \$550

Highway Trust Fund Highway Account 1986 – 2010



— Balance w/o General Fund
— Receipts



Federal – State Partnership

SUCCESS FACTORS:

- **Focused Federal Programs**
- **Respect for State Ownership/Sovereignty**
- **Collaboration & Trust**
- **Mutually Professional & Competent Staff**
- **Creative Oversight Tension**

COMPLICATIONS:

- **Funding Programs with Weak Objectives**
- **Conflicting State Objectives**
- **Unreliable Funding Expectations**
- **Unfunded Mandates – External Goals**
- **Varied State Roles with Local Agencies**
- **Ill-Defined Maintenance & Operation Metrics**

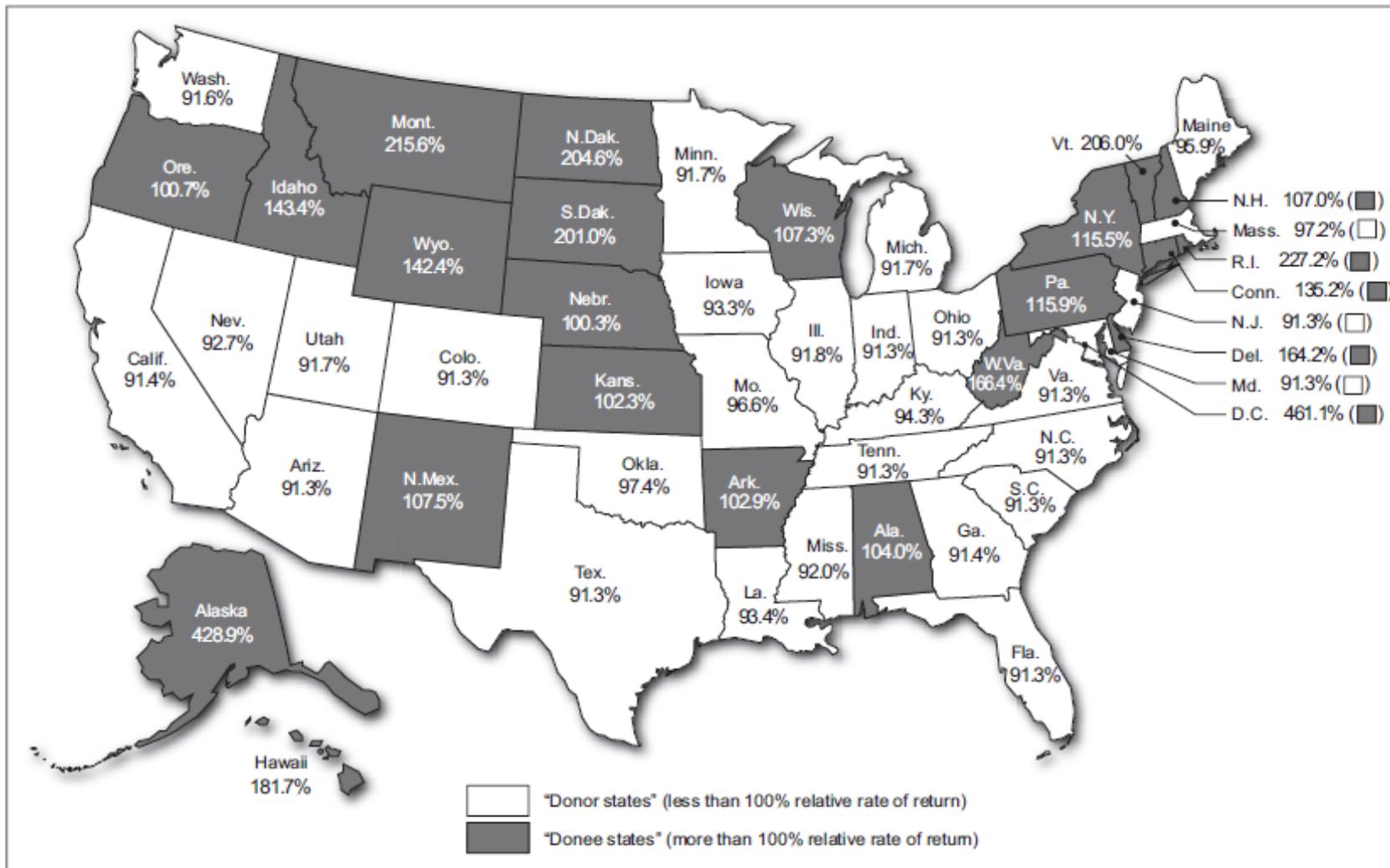


Current Challenges & Drivers

- **Daunting Safety Concerns**
- **Growing Congestion**
- **Aging Infrastructure**
- **Funding Shortfall / Competition**
- **Multi-Modal Focus**
- **Climate Change / Weather**
- **Energy**
- **Transparency & Accountability**
 - *System Performance*
- **State of States and State DOTs**

Donor-Donee Concerns

Return on Gas Tax from Highway Trust Fund



Sources: GAO analysis of FHWA data; Map Resources (map).



Underway: Re-Framing Our Business

- From Public Works to **Transportation**
- From Highways to **Multi-Modal**
- From Stand-Alone Government Agency to **“Business” Enterprise**
- From Infrastructure Outputs to **Outcomes & Broader Societal Goals**
- From Public Sector Ownership to **Private Investments Too**

→ *and Re-Defining the Partnership*

Definition of Success

From:

**On-Time,
On-Budget,
Within Specifications**

To:

**System & Program
Performance Measures**
(Safety, Travel, Infrastructure Condition)







Stewardship – Four Levels

- Transportation Stewardship
 - Highways →
Transportation System
 - Role in Society & Economy
- **Program Stewardship**
 - Return on Investment
- **Process Stewardship**
 - Efficient & Effective and Legal
- **Project Stewardship**
 - Schedule, Budget, Quality, Safety