



U.S. DOT's John A. Volpe National Transportation Systems Center

September 10, 2020



50
YEARS
1970 – 2020



U.S. Department of Transportation

Volpe Center

TRANSPORTATION INNOVATION FOR THE PUBLIC GOOD

The Volpe Center's Unique Mission

We advance transportation innovation for the public good.

The Volpe Center is a multimodal and multidisciplinary shared resource for the U.S. DOT.

- We have 50 years of experience partnering with multiple modes to solve complex challenges.
- We maintain a wide breadth and depth of technical talent who are nimble and efficient.
- We apply a systems approach, pulling staff from across our organization to address new challenges, driving us to constantly learn and improve.
- As a federal partner, we can support the department with its inherently governmental functions.



History in Brief

- The Transportation Systems Center was created in 1970, drawing on the legacy of the former NASA Electronics Research Center.
- In 1990, the Center was renamed in honor of the second Secretary of Transportation and former Governor of Massachusetts, John A. Volpe.
- The Volpe Center has proudly and professionally served 17 Secretaries of Transportation, their deputies and assistant secretaries, and over 300 modal administrators.



Working Beyond U.S. DOT

Other Federal Agencies

- U.S. Department of Defense
- U.S. Department of Energy
- U.S. Department of Homeland Security
- U.S. Department of the Interior
- U.S. Department of Agriculture
- U.S. Department of Commerce
- Environmental Protection Agency
- Federal Emergency Management Agency
- Millennium Challenge Corporation
- National Aeronautics and Space Administration
- National Capital Planning Commission

Academia

- University of Florida
- University of Wisconsin
- Pennsylvania State University
- University of Maryland
- University of Wisconsin
- Massachusetts Institute of Technology (CRADA)
- University of Massachusetts Amherst (CRADA)

State, Local and Regional

- Arizona DOT
- Delaware DOT
- Florida DOT
- New York, NY
- Oregon DOT
- PennDOT
- Pitkin County, CO
- Manchester-Boston Regional Airport
- Maryland State Highway Administration
- Massachusetts Bay Transportation Authority
- North Carolina DOT
- Orange County Transportation Authority
- San Francisco Municipal Transportation Agency
- Washington Metro Area Transit Authority

International

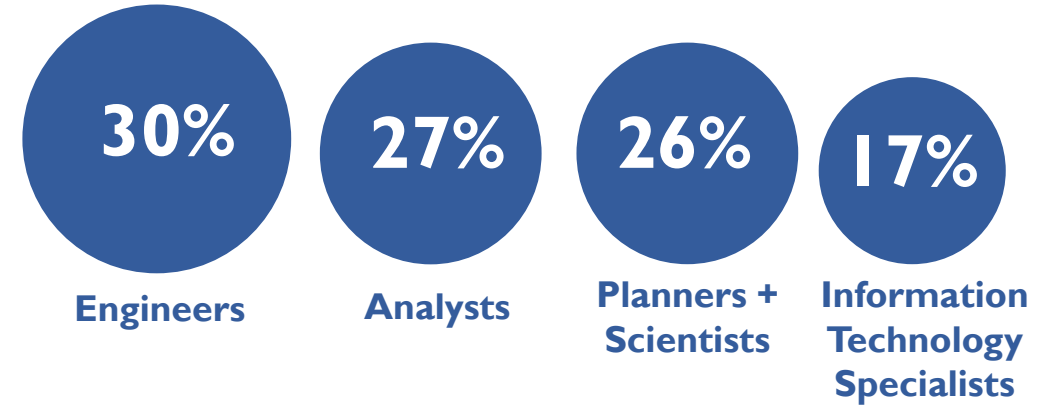
- Defence Science and Technology Laboratory (UK)
- Directorate-General of Public Works and Water Management - Rijkswaterstaat, the Netherlands
- International Civil Aviation Organization
- United Kingdom Ministry of Defence
- The World Bank
- Transport Canada

Non-profit

- American Association of State Highway and Transportation Officials
- American Concrete Paving Association
- Columbia River Pilots
- National Academy of Sciences
- National Association of City Transportation Officials
- National Motor Freight Traffic Association

Our Workforce

- We are ~550 technical and mission support professionals; half hold advanced degrees.
- Staff have extensive multidisciplinary transportation expertise and a deep knowledge of government operations.
- Our federal staff are supplemented by contractors (on- and off-site).



A Multigenerational Team

Generation	% of Workforce
Mature	2%
Boomers	32%
Gen X	33%
Gen Y	33%
Total	100%



Volpe Center Core Capabilities

- Safety and Security Assessments
- Economic and Policy Analysis
- Systems and Infrastructure Modernization and Optimization
- Applied Data Science
- Engineering and Technology Deployment to Enhance Transportation
- Human Factors Research and Design
- Impartial Investigations and Program Evaluations
- Knowledge Transfer and Capacity Building to Maximize Impact

Our Specialized Capabilities

- On-site laboratories to study:
 - Human factors
 - Alcohol countermeasures
 - Air traffic management systems
 - Maritime domain awareness
- Analytical tools including:
 - Specialized acoustic monitoring
 - Field siting
 - Remote sensing and spatial analysis





Volpe Library contribution to 50th Anniversary

- Five Decades document with Timeline
- Photographs key projects and researchers
- Mission statements
- TSC annual phonebooks and Award Ceremony brochures
- TSC monthly newsletters
- Women at TSC booklet circa 1977 with photos
- Volpe Vintage



History of Volpe Library

- Originally known as TSC Technical Reference Center (TRC)
- Inherited the NASA Electronic Research Center's (ERC) collection.
- It was a contractor run library from 1970 – 2010.
- In August of 1980, there was a staff of 15.
- Located on the 8th floor of 12 story building. (Job control)



History of TRC continued

- First task to move the library from the 8th floor to Building 4, 1st floor.
 - The new space was the old tire lab, no windows, lost great location
 - Five different kinds of shelving
 - 1989ish there was a flood, burst pipes

History of TRC continued

- 2009 – Transition document to Obama administration bragged that we were the 4th largest transportation library in the country.
- Ordered to reduce footprint and relocate “the face” of the library
- Renamed Technical Library and Information Center
- The reopening of the library in new location coincided with Volpe’s 40th anniversary in October 2010

Ribbon Cutting 40th Anniversary





Reactive to Proactive

- Jim Matarazzo, Simmons College
- Report to Director of Communications and Knowledge Management
- Part of a team that is bigger than my former library team
- Input, influence outcomes, committee work.
 - New websites, sharepoint presence
 - All TSC/Volpe reports in ROSA-P – feeds our website.



Interns

For a number of years, able to hire library interns through the Pathways Program. There have been five who have landed in great jobs. I mentored them and they taught me about the new technologies and trends.

Anticipating a hiring freeze, my last intern was sworn in on January 19, 2016

My last intern





New Building

- Kendall Square, Cambridge, among the highest real estate properties in the country. Proximity to MIT and other universities in the area, Red Line access
- Tech companies : Google, Microsoft, Akamai
- Pharmaceutical: Moderna, Biogen, Novartis
- Startups
- Hopping place

New Building

- 14 acres
- \$750 mil deal with MIT.
- Build new building before they can develop the land.
- Hope to open in early 2023.
- Big priority is reducing footprint to fit into new space.



Fun facts

- SARSAT
- TRN Division chair in 1995-6 in Boston.

Questions?

Our new facility is scheduled to open in early 2023 in Kendall Square, Cambridge, Massachusetts!

