

# FY 2010 PLANNING MENU OF SERVICES



## Technical Assistance, Training, and Peer Exchanges (includes Air Quality, Environment, and Freight)

This document serves as a “Menu of Services” detailing technical assistance, training, and peer exchange options available in the planning discipline. It also includes offerings for the disciplines of air quality, environment, and freight. It has been developed as a resource for Federal Highway Administration (FHWA) division offices and partner agencies and is organized by subject areas. Technical assistance and training offerings listed are available from a variety of FHWA offices (including the National Highway Institute (NHI)) as well as the National Transit Institute (NTI).

The “Menu” includes offerings that may be coordinated or delivered through different FHWA units. This listing also attempts to provide an overall summary of what is currently available, and enhance awareness of these resources to build professional capacity. Included in the Menu are brief overviews of each technical assistance or training option. These include formal courses, workshops, and seminars that are delivered in person, as well as online training and technical assistance opportunities. Online training or “webinars” may be self-paced or led by an instructor, and allow participants the opportunity to access training and technical assistance without incurring travel costs. In addition to formal training, please note that on-going, general technical assistance by topic will continue to be provided to the FHWA division offices and partner agencies as requested. For both the training and the technical assistance entries, the appropriate specialist’s contact data is provided for further information. The FHWA Points of Contact by Office is also included.

In considering Menu selections, please note that the NHI/NTI courses will generally offer a comprehensive overview of a particular topic. Workshops (often offered through the FHWA Resource Center) are often shorter in length, and depending on the topic can provide either a general summary view of a subject or a more in-depth discussion of an element of a broader NHI/NTI course. In



many cases, these workshops can also be tailored to the needs/ issues of a specific State or MPO. Workshops may also include facilitated discussions on particular topics and development of action plans.

### *FHWA Points of Contact by Office*

FHWA Resource Center Planning Team  
**Lisa Randall** (720) 963-3209

FHWA Resource Center Air Quality Team  
**Bob O’Loughlin** (415) 744-3823

FHWA Resource Center Environment Team  
**Lamar Smith** (720) 963-3210

HEPP, Transportation Planning Capacity Building Program  
**Kenneth Petty** (202) 366-6654

HEPP, Planning Oversight and Stewardship Team  
**Harlan Miller** (202) 366-0847

HEPP, Travel Demand Forecasting, TRANSIMS, and TMIP  
**Brian Gardner** (202) 366-4061

HEPI, Border Planning and GIS  
**Roger Petzold** (202) 366-4074

HEPI, National Systems and Economic Development  
**Stefan Natzke** (202) 366-5010

HEPE, Project Development and Environment Review  
**Carol Adkins** (202) 366-2054

HEPN, Natural and Human Environment  
**April Marchese** (202) 366-6724

HEPN, Transportation Conformity and Air Quality  
**Cecilia Ho** (202) 366-9862

HIN, Innovative Program Delivery  
**Regina McElroy** (202) 366-9216

HOFM, Freight Management and Operations  
**Tony Furst** (202) 366-2201

HPPI, Policy Information  
**David Winter** (202) 366-0175

## *Technical Assistance & Training Specialty Areas*

### **Air Quality**

- Estimating Regional Mobile Source Emissions
- Implications of Air Quality Planning for Transportation
- Introduction to Transportation/Air Quality Conformity
- Mobile Source Air Toxics
- Specialized Air Quality Workshops/Seminars

### **Community Impact Assessment**

- Community Impact Assessment

### **Congestion Management Process**

- Congestion Management Process
- Congestion Management Process Technical Assistance

### **Data Collection, Reporting and Applications**

- Comprehensive Census Transportation Planning Products (CTPP) Assistance
- Development and Implementation of Travel Surveys
- Driver's License and Motor Vehicle Registration
- Federal-aid Financing—Highway Information and Apportionment Factors, Understanding Your State's Fair Share
- Financial Analysis System – Highways (FASH)
- Freight Analysis Framework (FAF2)
- Highway Information
- Highway Performance Monitoring System (HPMS)
- HPMS Software Training
- HPMS Technical Assistance
- HPMS Understanding its Purpose and Place
- 2010 HPMS Reassessment Implementation
- Motor Fuel
- National Household Travel Survey (NHTS) Technical Assistance
- Planning Data Technical Assistance
- Quick Response Freight Manual Technical Assistance
- Traffic Data for HPMS Reporting
- Traffic Monitoring: An Introduction
- Traffic Monitoring Analysis System (TMAS) Assistance
- Traffic Monitoring Guide
- VTRIS and TVT Data, Understanding and Using

### **Environment**

- Section 4(f)
- Section 7 Basic - Endangered Species Act
- Section 7 Advanced—Interagency Cooperation
- Section 10/404 - Clean Water Act
- Section 106 and Historic Preservation Technical Assistance
- Advanced Seminar on Transportation Project Development: Navigating the NEPA Maze
- American Indian Best Practices
- Beyond Compliance: Historic Preservation in Transportation Project Development
- Bicycle Facility Design
- Biological Assessments
- Context Sensitive Solutions
- Design and Implementation of Erosion and Sediment Control
- Highway Traffic Noise
- Indirect and Cumulative Effects Analysis
- Introduction to Context Sensitive Solutions
- Introduction to NEPA and Transportation Decisionmaking
- Linking Freight to Planning and the Environment
- National Environmental Policy Act (NEPA) Executive Briefing
- NEPA and Transportation Decisionmaking
- Pedestrian Facility Design
- Soil Erosion/Sediment Control
- Water Quality Management of Highway Runoff
- Wetland Delineation

### **Environmental Justice**

- Environmental Justice and Project Development
- Environmental Justice for MPOs
- Environmental Justice/Title VI Technical Assistance
- Fundamentals of Title VI/Environmental Justice

### **Financial Planning/Fiscal Constraint**

- Advance Construction in TIPs and STIPs
- Cost Estimation for Transportation Planning and Programming
- FHWA Role in Public Private Partnerships
- Financial Planning in Transportation
- Financing Freight Improvements
- Fiscal Constraint
- Fiscal Constraint Process Review Assistance
- Fiscal Constraint/Financial Planning Technical Assistance
- Highway Program Financing
- Operations and Maintenance Costs in Planning and Programming
- Specialized Innovative Finance
- Transportation Revenues 101

<b>Freight</b>
<ul style="list-style-type: none"> <li>Advanced Freight Planning</li> <li>Engaging the Private Sector in Freight Planning</li> <li>Financing Freight Improvements</li> <li>Freight Analysis Framework (FAF2)</li> <li>Freight Security Awareness</li> <li>Freight Technical Assistance</li> <li>Integrating Freight in the Transportation Planning Process</li> <li>Linking Freight to Planning and the Environment</li> <li>Principles of Effective Commercial Motor Vehicle (CMV) Size and Weight Enforcement</li> <li>Quick Response Freight Manual Technical Assistance</li> <li>Transportation Planning for the Private Sector Tool</li> <li>Uses of Multimodal Freight Forecasting in Transportation Planning</li> </ul>
<b>GIS and Planning/GIS and Environment</b>
<ul style="list-style-type: none"> <li>Applying GIS and Spatial Data Technologies to Transportation</li> <li>GIS and Transportation Planning Technical Assistance</li> <li>Linking Conservation and Transportation Planning</li> <li>Transportation Planning Applications of Google Earth</li> <li>Using Visualization in Transportation Planning</li> </ul>
<b>Land Use and Transportation</b>
<ul style="list-style-type: none"> <li>Forecasting Land Use Activity</li> <li>Land Use and Transportation Planning</li> <li>Land Use and Transportation Planning Technical Assistance</li> <li>Transportation and Land Use</li> </ul>
<b>Performance Measures</b>
<ul style="list-style-type: none"> <li>Performance Measures for Transportation Planning</li> </ul>
<b>Planning and Environmental Linkages</b>
<ul style="list-style-type: none"> <li>Linking Conservation and Transportation Planning</li> </ul>
<b>Planning for Operations</b>
<ul style="list-style-type: none"> <li>Advancing Planning for Operations in Metropolitan Areas</li> <li>Congestion Management Process</li> <li>Congestion Management Process Technical Assistance</li> <li>Executive Session on Advancing Planning for Operations</li> <li>ITS Deployment Analysis System</li> <li>Traffic Analysis Tools/Technical Support</li> </ul>
<b>Planning Fundamentals</b>
<ul style="list-style-type: none"> <li>Administration of FHWA Planning and Research Grants</li> <li>General Planning Technical Assistance</li> <li>Metropolitan Transportation Planning</li> <li>Metropolitan or Statewide Planning 101</li> <li>Statewide Transportation Planning</li> <li>State and Metropolitan Transportation Programming</li> </ul>

<b>Planning Oversight and Stewardship</b>
<ul style="list-style-type: none"> <li>Planning Oversight and Stewardship Program Assistance</li> </ul>
<b>Public Involvement</b>
<ul style="list-style-type: none"> <li>Engaging the Private Sector in Freight Planning</li> <li>Public Involvement</li> <li>Public Involvement in Transportation Decisionmaking</li> <li>Public Participation Plans</li> <li>Public Participation Technical Assistance</li> <li>Transportation Planning for the Private Sector Tool</li> </ul>
<b>Scenario Planning</b>
<ul style="list-style-type: none"> <li>Scenario Planning</li> <li>Scenario Planning Technical Assistance</li> </ul>
<b>Security and Transportation Planning</b>
<ul style="list-style-type: none"> <li>Freight Security Awareness</li> <li>Security and Transportation Planning Technical Assistance</li> </ul>
<b>Transportation Safety Planning</b>
<ul style="list-style-type: none"> <li>Introduction to Transportation Safety Planning – Planning it Safe</li> <li>Transportation Safety Planning</li> <li>Transportation Safety Planning Technical Assistance</li> </ul>
<b>Travel Demand Forecasting/Modeling</b>
<ul style="list-style-type: none"> <li>Estimating Travel Demand and Revenues for Toll Road Projects</li> <li>How to Interpret and Communicate Forecasts for Corridor Planning</li> <li>Introduction to Travel Demand Forecasting: A Webinar for FHWA Planners</li> <li>Introduction to Travel Demand Forecasting: A Webinar for MPOs and DOTs</li> <li>Introduction to Urban Travel Demand Forecasting</li> <li>Model Validation and Quality Control Strategies for Regional Travel Models</li> <li>Statewide Travel Forecasting</li> <li>Travel Demand Forecasting</li> <li>Travel Demand Forecasting Technical Assistance</li> <li>Travel Model Improvement Program (TMIP) Seminars and Webinars</li> <li>Uses of Multimodal Freight Forecasting in Transportation Planning</li> </ul>
<b>Tribal Transportation</b>
<ul style="list-style-type: none"> <li>American Indian Best Practices</li> <li>Tribal Transportation Planning Technical Assistance</li> <li>Tribal Consultation and Section 106 Technical Assistance</li> </ul>

## Technical Assistance & Training Descriptions

### Air Quality

#### Estimating Regional Mobile Source Emissions (NHI 152071)

Provides an overview of travel demand forecasting models, emission factor models and travel related data requirements, travel model and emission factor model interactions and assessing transportation control measure (TCM) effectiveness and impacts on emissions. Length: 3.5 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [tmip.dot.gov](http://tmip.dot.gov).

#### Implications of Air Quality Planning for Transportation (NHI 142044)

Explains how the integrated transportation and air quality planning process has been defined and reinforced over the past decade by regulations, guidance, and litigation. It provides a context for the various statutory and regulatory requirements, including a comprehensive review of the 1990 CAAA requirements, EPA policies related to transportation, and the process of developing SIPs. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

#### Introduction to Transportation/Air Quality Conformity (NTI)

Provides basic information about conformity requirements and the relationship of the transportation and air quality planning processes. Also highlights the roles and responsibilities in inter-agency coordination on air quality issues. Length: 3 days. For more information, go to [www.ntionline.com](http://www.ntionline.com).

**Mobile Source Air Toxics** For practitioners and managers who will be responsible for analyzing and modeling the mobile source air toxic impacts of transportation projects in the NEPA process. Length: 2 days. For more information, contact [robert.o'loughlin@dot.gov](mailto:robert.o'loughlin@dot.gov).

**Specialized Air Quality Workshops/Seminars** Several workshops and seminars, of varying lengths, are available from the FHWA Resource Center's Air Quality Technical Service Team, including: Introduction to Transportation and Air Quality Fundamentals (AQ101), COMMUTER Model, Mobile Source Emissions Modeling (MOBILE6.2, Introduction to MOVES), Micro-Scale Air Pollution Dispersion Modeling (Project Level Hot Spot Air Quality Modeling), Modeling Mobile Source Emissions Inventory (SIP Air Quality Analyses Methodologies), MSAT (Mobile Source Air Toxics) Evaluation Methodologies, PM Modeling Practices (including AP42 Methodologies), Air Quality Analyses for NEPA (National Environmental Policy Act) Projects, CMAQ (Congestion Mitigation and Air Quality) Program Overview, Estimating Air Quality Benefits from CMAQ Projects, Transportation Conformity 101, Modeling Mobile Source Energy/GHGs (Greenhouse Gases), and Highway Traffic Noise Analysis. For more information, contact [robert.o'loughlin@dot.gov](mailto:robert.o'loughlin@dot.gov).

### Community Impact Assessment

**Community Impact Assessment Course** A how-to companion to the FHWA's "Community Impact Assessment: A Quick Reference for Transportation" (the CIA small purple book). The course uses everyday projects as examples and includes an extensive reference of resources. Length: 2.5 days. For more information, go to [www.planning.dot.gov](http://www.planning.dot.gov) or contact [brenda.kragh@dot.gov](mailto:brenda.kragh@dot.gov).

**Community Impact Assessment Seminar** Provides an overview of CIA, as an iterative process focusing on understanding the potential impacts of proposed transportation activities on affected communities and populations. Assessments focus on socio-economic and cultural impacts. Length: 2 days. For more information, contact [klynn.berry@dot.gov](mailto:klynn.berry@dot.gov).

### Congestion Management Process

**Congestion Management Process** Tailored to audience requirements (length and topics), it provides an overview of the requirements and components of a Congestion Management Process, including the development of performance measures, identifying alternative solutions to manage congestion, prioritizing funding strategies, and highlighting noteworthy practices. Recently updated for SAFETEA-LU. Length: 1 day Workshop, 2-4 hour Webinar. For more information, contact [ben.williams@dot.gov](mailto:ben.williams@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

#### Congestion Management Process Technical Assistance

Tailored to customer requirements (length and topics), Resource Center specialists provide technical assistance and reviews on a range of Congestion Management Process topics and issues. Length: Depends on customer needs. For more information, contact [ben.williams@dot.gov](mailto:ben.williams@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

### Data Collection, Reporting, and Applications

#### Comprehensive Census Transportation Planning Products (CTPP) Assistance

A variety of technical assistance and training opportunities are available on Census data products that can be used for transportation needs. Under this element a program of activities exists that can address any Census Data question or need. Be it a simple clarification of a data issue to an executive briefing on the program, or a multi-day workshop with hands on exercises, the CTPP staff can help. For more information, contact [ed.christopher@dot.gov](mailto:ed.christopher@dot.gov) or [elaine.murakami@dot.gov](mailto:elaine.murakami@dot.gov).

#### Development and Implementation of Travel Surveys (NHI 151034)

Provides an overview of the development and implementation of the most common types of travel surveys, including: household travel and activity, vehicle intercept, transit on-board, commercial vehicle, work place and establishment, special generator, hotel/visitor, and parking surveys. Length: 3 days. Available: Course under Revision. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Driver's License and Motor Vehicle Registration** Tailored to Federal, State and local finance data providers and users to describe the fundamentals for collecting, processing and using these data sets for the Federal-aid program. With increasing emphasis on data quality, proper review techniques and best practices will be presented. Length: 1 day. Available: To be announced. For more information, contact [gloria.williams@dot.gov](mailto:gloria.williams@dot.gov).

**Federal-aid Financing – Highway Information and Apportionment Factors, Understanding Your State's Fair Share** Annually each State is apportioned Federal-aid funds for the various programs authorized within that State. Such apportionments cannot be distributed without the appropriate data reported by the States. The FHWA division staff play an important role in ensuring that State-reported data is of apportionment quality. Learn how you can ensure that your State's data and resulting share of Federal-aid are correct and accurate. Length: 5 days. For more information, contact [ralph.erickson@dot.gov](mailto:ralph.erickson@dot.gov).

**Financial Analysis System – Highways (FASH)** This tool is tailored to Federal, State, and local finance data providers and users to demonstrate data entry and the submittal process. The tool is used by data providers for data quality initiatives for use by the FHWA, the U.S. Congress, and the public. FASH is a data base management system that captures the overall financial status of a State's highway program. Length: 1.5 days. For more information, contact [clarissa.smith@dot.gov](mailto:clarissa.smith@dot.gov).

**Freight Analysis Framework (FAF2)**  
*See Freight section for description.*

**Highway Information** Tailored to Federal, State, and local data providers and users to inform and discuss critical data issues including the reauthorized Federal-aid highway program, data quality, data quality initiatives, and software improvements. Data areas include HPMS, travel monitoring, motor fuel, highway finance, drivers' licenses, vehicle registrations, and NHTS. Length: 4 days. For more information, contact [marsha.reynolds@dot.gov](mailto:marsha.reynolds@dot.gov).

**Highway Performance Monitoring System (HPMS)** Discusses the latest issues in HPMS focusing on methods, procedures, and processes used for collection, coding, analyzing, and reporting annually highway-related data items. Each year, a new theme highlights the sessions chosen for that year's workshop. Previous workshops targeted data collection, partnering, and data quality, to name a few. Federal, State, and local applications and uses of HPMS data are also discussed. Audience is FHWA division office Planners, State HPMS Coordinators and Data Program Managers, MPOs/local agencies, and consultants. Length: 2-3 days. Available: Annually - February/March. For more information, contact [robert.rozycki@dot.gov](mailto:robert.rozycki@dot.gov).

**Highway Performance Monitoring System (HPMS) Software Training** Provides in depth technical training for the HPMS Software. This may be either hands-on training or through web conferencing. Topics include the HPMS submittal and review

process using the HPMS Software as a tool. The intended audience is FHWA Division Planners, State HPMS coordinators, and MPOs. Length: 2-4 hours web conferencing or 1-2 days. For more information, contact [thomas.roff@dot.gov](mailto:thomas.roff@dot.gov).

**HPMS Technical Assistance** HPMS combines data on the extent, condition, performance, use, and operating characteristics of the Nation's highways into an integrated geospatial database. HPPI specialists provide technical assistance and reviews on topics related to collecting and reporting HPMS data. Length: Depends on customer requirements. For more information, contact [ralph.gillmann@dot.gov](mailto:ralph.gillmann@dot.gov).

**HPMS: Understanding its Purpose and Place** Otherwise known as "HPMS 101," this session provides a basic overview of the HPMS program to those new to using highway system performance data at either the technical or management level. The requirements, needs, applications, structure, and quality assurance aspects of the HPMS will be discussed to provide an understanding of the program and to gain additional support and emphasis for quality data. Length: 4 hours to 1.5 days. For more information, contact [ralph.gillmann@dot.gov](mailto:ralph.gillmann@dot.gov).

**2010 HPMS Reassessment Implementation** Technical assistance is available to State and local agencies in implementing the changes in HPMS resulting from the 2010 HPMS Reassessment. This includes but is not limited to the new Data Model, data collection and reporting requirements, submittal procedures, data reviews and edits, and establishing and coordinating databases for HPMS submittals. This will be tailored to the specific request and can be provided in webinars, on site visits, or in conjunction with other training activities. For more information, contact [ralph.gillmann@dot.gov](mailto:ralph.gillmann@dot.gov).

**Motor Fuel** Tailored to Federal, State, and local motor fuel data providers and users to inform and discuss critical issues in data accuracy and attribution. Length: 1.5 days. For more information, contact [ralph.erickson@dot.gov](mailto:ralph.erickson@dot.gov).

**National Household Travel Survey (NHTS) Technical Assistance** On-going training, technical assistance and user support is offered for the NHTS data. Training includes a tutorial on how to use the on-line analysis engine at <http://nhts.ornl.gov> to access the data from this valuable household travel data resource. Length: Self-paced or up to 2 days. For more information, contact [heather.contrino@dot.gov](mailto:heather.contrino@dot.gov).

**Planning Data Technical Assistance** Data for transportation planning is a broad and vast area, and responding to individual needs can be very specific. Resource Center specialists provide tailored technical assistance (by topic and length) on a range of major data sources (including the American Community Survey), their current availability and future plans, and how they can be used for transportation planning. Specific assistance provided could be as simple as pointing to some more popular data sources to hosting a seminar on the best practices for doing a customized travel survey. Length: Depends on customer requirements. For more information, contact [ed.christopher@dot.gov](mailto:ed.christopher@dot.gov).

**Quick Response Freight Manual Technical Assistance**  
See **Freight** section for description.

**Traffic Data for HPMS Reporting** Developed for FHWA division office staff and State DOT/MPO staffers responsible for HPMS and Traffic Monitoring. This session outlines the importance of improved traffic monitoring and to promote an interaction between the HPMS and traffic professionals. Length: ½ day Webinar. For more information, contact [harshad.desai@dot.gov](mailto:harshad.desai@dot.gov).

**Traffic Monitoring, An Introduction** Designed for those looking for a basic understanding of the various bits of information collected on highway traffic (i.e. traffic volume, vehicle classification, and truck weight). This course can either be offered as a web cast or delivered in person and is available for Federal, State, and MPO participants. Length: ½ day. For more information, contact [david.jones2@dot.gov](mailto:david.jones2@dot.gov).

**Travel Monitoring Analysis System (TMAS) Assistance**  
Technical Assistance provided to States using TMAS software. TMAS training will be most helpful to people involved with traffic data collection at the State who submit data for the monthly Traffic Volume Trends report. Length: Varies; Depends on customer requirements. For more information, contact [steven.jessberger@dot.gov](mailto:steven.jessberger@dot.gov).

**Traffic Monitoring Guide (NHI 151018)** This provides an overview of the collection and application of traffic data including traffic volume, vehicle classification, and truck weight, and it is available to the FHWA, State DOT, MPO, and consultant participants. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or contact [david.jones2@dot.gov](mailto:david.jones2@dot.gov).

**Vehicle Travel Information System (VTRIS) and Traffic Volume Trends (TVT) Data, Understanding and Using** Presents an overview and hands-on tutorial of using these systems to better understand and use traffic volume, vehicle classification, and truck weight data. The intended audience is State DOT traffic data providers, as well as FHWA division office contacts with oversight for traffic data. Length: ½ to 1 day. For more information, contact [david.jones2@dot.gov](mailto:david.jones2@dot.gov).

## Environment

**Section 4(f)** Provides an overview of Section 4(f) focusing on the protection of parklands, recreation areas, wildlife and waterfowl refuges and significant historic sites. Intended for practitioners with some Section 4(f) experience. Length: 1-2 days. For more information, contact [dave.gamble@dot.gov](mailto:dave.gamble@dot.gov) or [david.grachen@dot.gov](mailto:david.grachen@dot.gov).

**Section 7 Basic - Endangered Species Act** Provides an overview of the Endangered Species Act (ESA) and the procedures and responsibilities associated with the Act. Reviews terms, roles and key sections of the Act. Length: 2 days. For more information, contact [kevin.moody@dot.gov](mailto:kevin.moody@dot.gov) or [brian.yanchik@dot.gov](mailto:brian.yanchik@dot.gov).

**Section 7 Advanced - Interagency Cooperation** Tailored to customer requirements, provides an advanced discussion on the Endangered Species Act (ESA), section 7—interagency cooperation. Topics include: ESA definitions, prohibited acts, biological assessments, biological opinions, incidental take statements. Length: 1-2 days. For more information, contact [brian.yanchik@dot.gov](mailto:brian.yanchik@dot.gov).

**Section 10/404 - Clean Water Act** Provides a basic overview of the U.S. Army Corps of Engineers permitting process, with a focus on compliance and permitting requirements under the Clean Water Act Section 404 and the Rivers and Harbors Act Section 10. Length: 1-2 days. For more information, contact [brian.yanchik@dot.gov](mailto:brian.yanchik@dot.gov).

**Section 106 and Historic Preservation Technical Assistance**  
Tailored to customer requirements (length and topics), Resource Center specialists provide technical assistance on a range of Section 106 and Historic Preservation topics and issues. Length: Depends on customer needs. For more information, contact [deborah.scherkoske@dot.gov](mailto:deborah.scherkoske@dot.gov), [stephanie.stoermer@dot.gov](mailto:stephanie.stoermer@dot.gov) or [deborah.sucui.smith@dot.gov](mailto:deborah.sucui.smith@dot.gov).

**Advanced Seminar on Transportation Project Development: Navigating the NEPA Maze (NHI 142055)** Building upon demonstrated knowledge and understanding of the NEPA project development process, this advanced training provides practical tools and approaches to successfully resolve complex environmental issues and challenges. Designed in seminar format, this training is highly interactive. It guides participants through the NEPA decisionmaking process while pointing out potential pitfalls. It provides the skills and knowledge to apply critical thinking to reach defensible decisions. The course is intended for experienced environmental practitioners and project development managers. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**American Indian Best Practices** Provides the basic understanding of the need for formal consultation with federally recognized American Indian tribes and how to approach consultation with the tribes. Reviews applicable regulations and executive orders, definition of terms, cultural differences to consider and best practices. Length: 1 day. For more information, contact [david.grachen@dot.gov](mailto:david.grachen@dot.gov).

**Beyond Compliance: Historic Preservation in Transportation Project Development (NHI 142049)** Designed to help transportation professionals meet the new requirements of the Section 106 regulations and take advantage of the greater flexibility and autonomy offered by the recent revisions. The course focuses on the fundamentals of NEPA, Section 106, and Section 4(f) of the Department of Transportation Act, and provides techniques for coordinating transportation planning, project development and compliance with these three laws. The emphasis is on practical approaches for real-world situations and the importance of balancing stewardship and project delivery. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Bicycle Facility Design (NHI 142046)** Assists planners and designers in learning how to apply the existing standards and how to deal with other technical issues involved. The availability of Federal, State, and local transportation funding for bicycle facilities that serve transportation and recreational users is resulting in a dramatic increase in the number of bicycling (and shared use) facilities being planned and built. Although there are no Federal design standards for bicycle facilities, the AASHTO Guide for the Development of Bicycle Facilities or a modification thereof, serves as a design guide. As with most guides, the AASHTO guide cannot address every possible scenario so designers often need to apply engineering judgment where specific information is not provided. Length: 1.5 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or contact [gabe.rousseau@dot.gov](mailto:gabe.rousseau@dot.gov).

**Biological Assessments** Provides biological and regulatory discussions and tips on preparing a Biological Assessment under the Endangered Species Act. Length: 1 day. For more information, contact [william.vanpeeters@dot.gov](mailto:william.vanpeeters@dot.gov) or [brian.yanchik@dot.gov](mailto:brian.yanchik@dot.gov).

**Context Sensitive Solutions** Provides an overview of Context Sensitive Solutions (CSS) as a collaborative, interdisciplinary approach that involves all stakeholders to develop a transportation facility that fits its physical setting and preserves the scenic, aesthetic, historic and environmental resources while maintaining safety and mobility. Length: ½ day to 1 day. For more information, contact [klynn.berry@dot.gov](mailto:klynn.berry@dot.gov) or [rodney.vaughn@dot.gov](mailto:rodney.vaughn@dot.gov).

**Design and Implementation of Erosion and Sediment Control (NHI 142054)** Provides an overview of the components of an erosion and sediment control plan, lists sources for the plan, identifies management practices and measures for typical situations, reviews typical construction and inspection problems and strategies and reviews Federal and State regulations in this area. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Highway Traffic Noise (NHI 142051)** Covers the requirements of 23 CFR Part 772, Procedures for Abatement of Highway Traffic Noise and Construction Noise, and the noise requirements of the National Environmental Policy Act of 1969, provides both technical and policy training, and includes basic principles of acoustics and an overview of the FHWA Traffic Noise Model (TNM). The noise specialist from the host State is invited to present the State's noise policy and procedures. The course features a customized noise simulation program that allows participants to hear realistic traffic noise recordings and noise-reducing effects of abatement measures. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Indirect and Cumulative Effects Analysis** Provides an overview of the requirements and methodologies used to analyze the indirect and cumulative effects of transportation projects. Covers terminology, regulations and court cases pertaining to these analyses. The workshop can be tailored to include local case studies. Length: 1-2½ days. For more information, contact [amar.smith@dot.gov](mailto:amar.smith@dot.gov), [kevin.moody@dot.gov](mailto:kevin.moody@dot.gov) or [brian.smith@dot.gov](mailto:brian.smith@dot.gov).

**Introduction to Context Sensitive Solutions (NHI 142050)** Context sensitive solutions (CSS) – also known as context sensitive design – is a collaborative, interdisciplinary approach to a transportation project that involves stakeholders in the development of a transportation facility that equally addresses safety, mobility, and the preservation of scenic, aesthetic, historic, and environmental resources and community values. Benefits of the CSS process include effective and timely decisions, gaining public trust and support, building positive relationships with resource agencies, delivering safe and financially feasible project solutions, and improving the overall project delivery process. This course will provide participants with tools and techniques to effectively deliver timely and successful transportation projects. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Introduction to NEPA and Transportation Decisionmaking (NHI 142052)** This web-based training is a basic introduction to the FHWA's National Environmental Policy Act (NEPA) transportation decisionmaking process. It provides an overview of the environmental process, including the integration of social, environmental, and economic factors within the framework of existing laws, regulations, policies, and guidance for transportation project decisions. The training covers the requirements of NEPA as implemented by the Council on Environmental Quality, as well as the FHWA's regulations and guidance for NEPA implementation and project decisionmaking. Separate lessons address such topics as purpose and need, alternatives development and analysis, impact analysis, public involvement, interagency coordination, mitigation, and documentation. Length: Web-based days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Linking Freight to Planning and the Environment (NHI 139005)** See **Freight** section for description.

**National Environmental Policy Act (NEPA) Executive Briefing** Provides an overview of the FHWA project development process, emphasizing topics such as innovative mitigation and enhancement, significance, streamlining, reasonable alternatives, logical termini, purpose and need, interagency coordination and public involvement. Includes background on NEPA, the processing of environmental documents and a brief overview of the Section 4(f) regulation (if desired). Length: ½ day to 2 days. For more information, contact [amar.smith@dot.gov](mailto:amar.smith@dot.gov).

**NEPA and Transportation Decisionmaking (NHI 142005)** Considers the FHWA's policies and procedures for applying the National Environmental Policy Act (NEPA) to the project development and decisionmaking processes related to transportation facilities. The course examines the evolution of environmental policy and the integration of social, environmental and economic factors into the framework of laws, regulations, policies, and guidance, which assist in achieving a decision on a transportation project that is in the best overall public interest. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Pedestrian Facility Design (NHI 142045)** Emphasizing the importance of planning for pedestrians, the course focuses on case examples involving corridor and intersection design issues. Participants are engaged through lecture, discussion, video demonstrations of problem areas in corridors and intersections, small group problem identification, and the development of design alternatives. This training was developed to provide information and application opportunities to those involved in the design of pedestrian facilities. The Americans with Disabilities Act (ADA) requires newly constructed and altered sidewalks to be accessible and usable by people with disabilities, and accessibility improvements need to be implemented for existing facilities. Length: 1.5 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or contact [gabe.rousseau@dot.gov](mailto:gabe.rousseau@dot.gov).

**Soil Erosion/Sediment Control** Provides an overview of soil erosion and sediment processes, planning, site evaluations, laws and regulations. Length: 1 to 2 days. For more information, contact [brian.smith@dot.gov](mailto:brian.smith@dot.gov).

**Water Quality Management of Highway Runoff (NHI 142047)** Provides a basic understanding of water quality parameters, processes, requirements, and best management practices (BMPs) in order to provide the transportation community with guidance on how to mitigate impacts and protect water quality. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Wetland Delineation** Provides a basic overview on the application of the 1987 Wetland Delineation Manual in use by the Army Corps of Engineers. Length: 3 to 5 days. For more information, contact [brian.smith@dot.gov](mailto:brian.smith@dot.gov) or [william.vanpeeters@dot.gov](mailto:william.vanpeeters@dot.gov).

## Environmental Justice

**Environmental Justice and Project Development** Tailored to audience requirements (length and topics), provides an overview of Title VI and Executive Order 12898 requirements and environmental justice objectives with particular focus on NEPA and the transportation decision-making process. Length: ½ day to 1.5 days. For more information, contact [klynn.berry@dot.gov](mailto:klynn.berry@dot.gov) or [katiann.wong-murillo@dot.gov](mailto:katiann.wong-murillo@dot.gov).

**Environmental Justice for MPOs** Tailored to audience requirements (length and topics), provides an overview of Title VI and Executive Order 12898 requirements and environmental justice objectives with particular focus on MPO issues and analytical approaches to assess compliance in metropolitan plans and programs. Length: 2-8 hours. For more information, contact [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Environmental Justice/Title VI Technical Assistance** Tailored to customer requirements (length and topics), Resource Center specialists provide technical assistance related to EJ/Title VI issues and the transportation planning process. Length: Depends on

customer needs. For more information, contact [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov), [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov) or [katiann.wong-murillo@dot.gov](mailto:katiann.wong-murillo@dot.gov).

**Fundamentals of Title VI/Environmental Justice (NHI 142042)** Provides an overview of Title VI and Executive Order 12898 requirements and a framework for using a variety of approaches and tools for accomplishing environmental justice goals with transportation objectives. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

## Financial Planning/Fiscal Constraint

**Advance Construction in TIPs and STIPs** Covers the definition of advance construction, how and why States use it, the Federal requirements for accounting for AC in TIPs and STIPs, and notable examples. The audience includes the FHWA, State DOT, and MPO planners. Length: 2 hours. For more information contact: [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

**Cost Estimation for Transportation Planning and Programming** Provides an overview of issues related to cost estimation at the stage of long range planning and program development. Reviews Federal fiscal constraint requirements pertaining to costs and highlights notable MPO and State DOT practice. Length: Seminar or Webinar format. For more information, contact: [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

**FHWA Role in Public Private Partnerships (NHI 310116)** Provides participants with an awareness of various non-traditional and alternate sources of funding for construction, operation, and maintenance of U.S. Highways. The course is primarily for FHWA employees responsible for administering the Federal-Aid Program. Length: 1 day. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Financial Planning in Transportation (NTI)** Provides an overview of financial planning in support of the development of transportation plans and programs as well as information on the process and the types of analyses associated with developing forecasts over the planning horizons. Available: Early Calendar Year 2010. Length: 3 days. For more information, go to [www.ntionline.com](http://www.ntionline.com).

**Financing Freight Improvements**  
*See Freight section for description.*

**Fiscal Constraint** Provides an overview of practices designed to ensure the development of fiscally-constrained plans and programs for transportation agencies. The session reviews fiscal constraint regulations and highlights revenue forecasting/cost estimation processes and tools; as well as, reviews examples of noteworthy practices. The target audience is FHWA/FTA, MPO, and State DOT planners. Length: Seminar or Webinar format. For more information, contact [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Fiscal Constraint Process Review Assistance** Customized technical assistance to the FHWA division offices and the FTA region office partners in assessing compliance with fiscal constraint requirements for transportation plans and programs. Review would focus on the State DOT and development of the Statewide Transportation Improvement Program, multimodal plans, major projects and cost estimation techniques. Additional topics might include cooperative forecasting processes with MPOs and public involvement opportunities. Length: Depends on customer needs. For more information, contact [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Fiscal Constraint/Financial Planning Technical Assistance** Tailored to customer requirements (length and topics), Resource Center specialists provide technical assistance related to fiscal constraint/financial planning, including topics related to revenues, costs and operations and maintenance. Length: Depends on customer needs. For more information, contact: [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

**Highway Program Financing (NHI 152072)** Covers the various aspects of Federal-aid highway financing unique to the FHWA program. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Operations and Maintenance Costs in Planning and Programming** Provides an overview of Federal requirements and notable practices in showing operations and maintenance costs for highways and transit in plans and programs. The audience includes the FHWA, State DOT, and MPO planners. Length Seminar or Webinar format. For more information contact [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

**Specialized Innovative Finance** Several workshops and seminars, of varying lengths are available from the Innovative Program Delivery Office, focusing on a review of traditional transportation funding sources and discussions of TIFIA, GARVEEs, RVEEs, public-private partnerships, etc. Length: Varies. For more information, contact [thay.bishop@dot.gov](mailto:thay.bishop@dot.gov).

**Transportation Revenues 101** Provides an overview of Federal fiscal constraint requirements pertaining to transportation revenues for both long range plans and programs. Reviews a range of revenue sources including Federal, State, local and innovative finance. Discusses notable practices by MPOs and DOTs and highlights effective approaches for revenue documentation. Length: Seminar or Webinar format. For more information, contact: [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

## Freight

**Advanced Freight Planning (NHI 139003)** Expands on freight topics covered in other FHWA-developed freight planning courses to provide techniques and strategies designed for those individuals directly involved in the implementation of transportation planning, programming and allocation of resources. It provides participants with the skills needed to identify, prioritize, develop and implement freight supportive projects. This is an advanced level course and it focuses heavily on resources and solutions, and how those solutions can be applied to developing plans and programs for public and private sectors. Prerequisite: Integrating Freight in the Transportation Planning Process Self-Paced or Instructor Led NHI Course. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Engaging the Private Sector in Freight Planning** This workshop provides strategies and techniques to initiate private-public sector cooperation, identifies key private sector stakeholders, and suggests ways to improve communication. Successful approaches employed at several State DOTs and MPOs are also discussed. *See also Transportation Planning for the Private Sector Tool on page 10.* Length: 1 day Workshop or 2 hour Webinar. For more information, contact [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov).

**Financing Freight Improvements** Provides information on funding and financing multimodal freight improvement projects. It also presents examples of successful freight project financing by State DOTs, MPOs, local agencies, and the private sector. The workshop uses the FHWA handbook, *Financing Freight Improvements*, as a teaching tool. Length: 1 ½ days. For more information, contact [carol.keenan@dot.gov](mailto:carol.keenan@dot.gov).

**Freight Analysis Framework (FAF2)** The FHWA has released truck flow data over the national highway network as part of the Freight Analysis Framework (version 2). These data include the FAF Highway Network and link specific FAF truck, non FAF truck, AADT, and link specific volume capacity ratio data for year 2002 and 2035. The FAF also includes Origin-Destination Database estimates of tonnage and value of goods shipped by type of commodity and mode of transportation for 114 domestic and 7 international trading regions and incorporates models to assign the detailed flows to individual highways. This two hour webinar describes the content of the underlying data, along with the strengths and limitations for 'real world' applications. Length: 2 hours. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Freight Security Awareness** Provides an overview of transportation security and freight security issues and roles, from a planning and operations perspectives. Highlights security initiatives and focuses on how transportation agencies can incorporate security-related issues and programs within their traditional, day-to-day transportation planning and operations activities. Length: 1 day in person workshop. For more information, contact [fawn.thompson@dot.gov](mailto:fawn.thompson@dot.gov), [chung.tran@dot.gov](mailto:chung.tran@dot.gov) or [crystal.jones@dot.gov](mailto:crystal.jones@dot.gov).

**Freight Technical Assistance** Tailored to customer requirements (length and topics), Resource Center specialists provide freight planning technical assistance on a range of issues, including freight studies, private sector involvement, freight and land use, data and forecasting, performance measures and intermodal connectors. Length: Depends on customer needs. For more information, contact [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov), [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov) or [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov).

**Integrating Freight in the Transportation Planning Process (NHI 139006)** This is the self-paced web version of the NHI course on the same topic that was previously instructor led. This course provides participants with a greater understanding of the various stakeholders, trends, and issues associated with freight transportation. It also addresses a challenge many transportation planners in the public sector face: how to best incorporate varying perspectives on freight in a way that results in safe and efficient transportation system for both people and goods. After completion, participants will be better prepared to incorporate freight considerations into their respective transportation planning processes and programs. Length: Web-based days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Linking Freight to Planning and the Environment (NHI 139005)** Provides transportation, environmental, and freight planners and engineers in both the public and private sectors with skills to better integrate freight and environmental considerations throughout the planning, programming, and project development processes. Through case studies and hands-on exercises, the course teaches participants how to incorporate freight and environmental considerations into their existing policies and activities and helps to mainstream freight and environmental elements with State DOTs, MPOs, and other organizations. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**Principles of Effective Commercial Motor Vehicle (CMV) Size and Weight Enforcement (NHI 139004)** Provides advanced understanding of Federal motor vehicle size and weight regulations and the importance of state level vehicle size and weight enforcement programs. This course targets transportation professionals responsible for overseeing the preservation of Federal and State highway assets through annual VSW enforcement planning and Federal certification, as well as

personnel directly involved in commercial VSW enforcement. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or contact [john.nicholas@dot.gov](mailto:john.nicholas@dot.gov).

**Quick Response Freight Manual Technical Assistance** An updated version of the QRFM was released in early 2008. This report is a valuable research for those agencies seeking to implement freight analytical procedures that are useful for both planning and project development activities. Length: Depends on customer requirements. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Transportation Planning for the Private Sector Tool** This presentation (and associated fact sheets) was developed for use by State DOTs and MPOs to provide a broad overview of the transportation planning process to private sector freight stakeholders. The goal of this effort is to foster awareness and encourage collaboration on freight issues and projects. Length: Up to 2 hours. For more information, contact [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov).

**Uses of Multimodal Freight Forecasting in Transportation Planning (NHI 139002)** Provides an overview of freight forecasting and the techniques for forecasting freight at the metropolitan and State levels, examines the factors that influence economic growth and distribution of freight traffic, and reviews notable practices. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

## GIS and Planning/ GIS and Environment

**Applying GIS and Spatial Data Technologies to Transportation (NHI 151039)** Provides an overview of transportation applications that can use today's major spatial data technologies and trains participants on how to implement these applications from a planning perspective. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**GIS and Transportation Planning Technical Assistance** Tailored to audience requirements (topics and length), Resource Center specialists provide technical assistance on spatial data technologies and how these can be used to enhance transportation planning. Length: Depends on customer requirements. For more information, contact [ben.williams@dot.gov](mailto:ben.williams@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Linking Conservation and Transportation Planning**  
*See Planning and Environmental Linkages section for description.*

**Transportation Planning Applications of Google Earth** Tailored to audience requirements (topics and length). Provides technical assistance on using Google Earth for transportation planning. Length: Depends on customer requirements. For more information, contact [mark.sarmiento@dot.gov](mailto:mark.sarmiento@dot.gov).

**Using Visualization in Transportation Planning** Tailored to customer needs, this seminar covers the visualization requirements of SAFETEA-LU, the latest in visualization technology and examples of how States and MPOs are incorporating the technology in their programs. Length: 2-4 hours. For more information, contact [ben.williams@dot.gov](mailto:ben.williams@dot.gov).

## Land Use and Transportation

**Forecasting Land Use Activity** Offered through the Travel Model Improvement Program (TMIP), this seminar explains and demonstrates methods and data sources for forecasting the nature and amount of land using activities, specifically, population, dwelling units, basic employment and services employment. Length: 1 day. For more information, go to [tmip.dot.gov](http://tmip.dot.gov).

**Land Use and Transportation Planning** Provides an overview of key issues related to the interaction of transportation planning and land use and the integration of transportation plans with local and State land use plans, with focus on innovative techniques, approaches and applications. Length: 1 day Seminar or 2-4 hour Webinar. For more information, contact [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov).

**Land Use and Transportation Planning Technical Assistance** Tailored to audience requirements (topics and length), Resource Center specialists provide technical assistance on land use issues as they relate to transportation planning, including sub-topics such as: transportation characteristics of land use patterns, agency roles and responsibilities, and developing land use and transportation plans. Length: Depends on customer requirements. For more information, contact [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Transportation and Land Use (NTI/NHI 151043)** Provides an overview of transportation and land use planning and how they can and should interact. The course trains participants to actively participate in the development of transportation systems that support desired land uses, as well as help shape land uses that support the transportation system. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [www.ntionline.com](http://www.ntionline.com).

## Performance Measures

**Performance Measures for Transportation Planning** With increased public demand for accountability, limited funding for transportation, there is a new emphasis on the use of the performance measurement in the transportation planning process. This workshop/webinar on transportation planning performance measurement is designed primarily for planning and programming personnel at State DOTs, MPOs and local

planning agencies. Length: 1 day Workshop or 2 hour Webinar. For more information, contact [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov) or [ed.christopher@dot.gov](mailto:ed.christopher@dot.gov).

## Planning and Environmental Linkages

**Linking Conservation and Transportation Planning** An opportunity for transportation and conservation planners to develop relationships, learn about each other's processes and data needs, find ways to improve existing processes as they currently exist, and support the integration of environmental considerations into transportation planning process. Included in this workshop is discussion of GIS based tools to aid in linking these two areas. Length: 2 days. For more information, contact [mary.gray@dot.gov](mailto:mary.gray@dot.gov).

## Planning for Operations

**Advancing Planning for Operations in Metropolitan Areas (NHI 133098)** Covers important institutional aspects necessary for advancing an objectives driven, performance based approach for Operations in the transportation planning process for metropolitan areas which includes: (1) regional transportation operations collaboration and coordination activities; (2) enhanced levels of operations considerations in the regional transportation planning process; and (3) improved linkage opportunities between planning and operations. Length: 1.5 days. Available: Early Calendar Year 2010. For more information, contact [richard.backlund@dot.gov](mailto:richard.backlund@dot.gov).

### Congestion Management Process

*See Congestion Management section for description.*

### Congestion Management Process Technical Assistance

*See Congestion Management section for description.*

### Executive Session on Advancing Planning for Operations

Provides an executive level overview to raise awareness of transportation managers and decision-makers on the need for improved levels of regional transportation operations planning and collaboration activities. Length: 1- 2 hours. For more information, contact [richard.backlund@dot.gov](mailto:richard.backlund@dot.gov).

**ITS Deployment Analysis System (NHI 137041)** Hands-on computer training session on the ITS Deployment Analysis System (IDAS) software. IDAS is a sketch-planning analysis tool that transportation practitioners can use to estimate the benefits and costs of ITS and operations investments. IDAS offers the capability for a systematic assessment of ITS and operational improvements with a single analysis tool, and can predict relative costs and benefits for more than 60 types of ITS and operations investments. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or contact [jenki.synn@dot.gov](mailto:jenki.synn@dot.gov).

**Traffic Analysis Tools/Technical Support** The Traffic Analysis Tools Team – comprised of the FHWA’s operations and modeling specialists – is available to support the implementation of both simulation and ‘sketch’ based analytical methods for evaluating the impacts of ITS and traffic operations improvements. Market ready operations planning tools supported by the FHWA include DynusT and IDAS. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

## Planning Fundamentals

**Administration of FHWA Planning and Research Grants (NHI 151021)** Provides an overview of the responsibilities and relationships among Federal, State, and local agencies involved in administration of FHWA planning grants to States and State subgrants to Metropolitan Planning Organizations (MPOs) and local governments. Length: 1.5 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov).

**General Planning Technical Assistance** Planning technical assistance in general metropolitan and statewide planning issues as well as planning specialty areas is available to Division Offices and their partner agencies. This will be tailored and targeted to the specific request. Length: Based on customer requirements. For more information, contact [lisa.randall@dot.gov](mailto:lisa.randall@dot.gov).

**Metropolitan Transportation Planning (NHI/NTI 152069)** Provides a general introduction and overview of the metropolitan transportation planning process, including basic concepts, products, and Federal requirements. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [www.ntionline.com](http://www.ntionline.com).

**Metropolitan or Statewide Planning 101** Tailored to audience requirements (topics and length), provides an overview of the basic concepts, components, and participants in the metropolitan planning and/or statewide planning process. Also highlights innovative and noteworthy practices. Length: Seminar or Webinar format. For more information, contact [lisa.randall@dot.gov](mailto:lisa.randall@dot.gov).

**Statewide Transportation Planning (NHI/NTI 151038)** Provides an overview of the statewide transportation planning process including tools, methods and best practices. Length: 2 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [www.ntionline.com](http://www.ntionline.com).

**State and Metropolitan Transportation Programming (NTI)** Provides an overview of the basic concepts, components, and participants in the transportation programming process. Length: 3 days. For more information, go to [www.ntionline.com](http://www.ntionline.com).

## Planning Oversight and Stewardship

**Planning Oversight and Stewardship Program Assistance** Planning program area assistance is available to Division Offices in scoping and/or conducting reviews associated with stewardship and oversight of metropolitan and statewide transportation planning processes/programs (e.g., Transportation Management Area certification reviews, statewide planning process/program reviews, or other associated process/program reviews). Length: As deemed necessary. For more information, contact [harlan.miller@dot.gov](mailto:harlan.miller@dot.gov).

## Public Involvement

**Engaging the Private Sector in Freight Planning**  
*See Freight section for description.*

**Public Involvement** Provides an overview of the importance of public involvement and reviews multiple public involvement techniques. Addresses the public’s procedural, psychological and substantive needs with a focus on communication styles and barriers to participation. Length: 2 days. For more information, contact [klynn.berry@dot.gov](mailto:klynn.berry@dot.gov).

**Public Involvement in Transportation Decisionmaking (NHI/NTI 142036)** Provides an in-depth review of the various components of public involvement in transportation decision-making, as well as specific skills, techniques and approaches for enhancing public interaction. Length: 3 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [www.ntionline.com](http://www.ntionline.com).

**Public Participation Plans** Public Participation is a fundamental component of effective transportation planning. The focus on this seminar/webinar is on new SAFETEA-LU requirements relating to Public Participation Plans, interested parties, and visualization. Notable practices from State DOTs and MPOs are presented. Length: 2 hours. For more information, contact [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov) or [fawn.thompson@dot.gov](mailto:fawn.thompson@dot.gov).

**Public Participation Technical Assistance** Tailored to customer requirements (length and topics), Headquarters and Resource Center specialists provide technical assistance on public involvement and public participation, including SAFETEA-LU requirements relating to public participation plans and interested parties. Length: Depends on customer needs. For more information, contact [jocelyn.jones@dot.gov](mailto:jocelyn.jones@dot.gov), [brenda.kragh@dot.gov](mailto:brenda.kragh@dot.gov) or [fawn.thompson@dot.gov](mailto:fawn.thompson@dot.gov).

**Transportation Planning for the Private Sector Tool**  
*See Freight section for description.*

## Scenario Planning

**Scenario Planning** Scenario planning is a process in which transportation professionals and citizens work together to analyze and shape the long-term future of their communities. Using a variety of tools and techniques, participants in scenario planning assess trends in key factors such as transportation and congestion, land use, safety, demographics, health, economic development, and the environment. Workshop presenters include peers who provide participants with an overview of the scenario planning process and share examples of scenario planning efforts. Headquarters and Resource Center specialists provide an overview of current methods and tools, and information about practices around the country. Length: Varies. For more information, contact [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov), [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov) or [sharlene.reed@dot.gov](mailto:sharlene.reed@dot.gov).

**Scenario Planning Technical Assistance** Tailored to customer requirements (length and topics), Resource Center specialists provide technical assistance on scenario planning, including an overview of scenario planning and how it provides a framework for developing a shared vision for the future by analyzing various forces (e.g., health, transportation, economic, environmental, land use, etc.) that affect growth. Reviews how different software packages can be used to test various future alternatives that meet State and community needs. Length: Depends on customer needs. For more information, contact [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov) or [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov).

## Security and Transportation Planning

**Freight Security Awareness**  
*See Freight section for description.*

**Security and Transportation Planning Technical Assistance** Tailored to customer requirements, Headquarters specialists provide technical assistance to explore opportunities for enhancing consideration of security in the transportation planning process. Length: Depends on customer needs. For more information, contact [spencer.stevens@dot.gov](mailto:spencer.stevens@dot.gov) or [susan.grosser@dot.gov](mailto:susan.grosser@dot.gov).

## Transportation Safety Planning

**Introduction to Transportation Safety Planning – Planning it Safe (NTI/NHI 151042)** Designed to identify opportunities for improving the manner in which safety is integrated as a key planning factor and performance measure in all transportation plans and projects. Length: 2 days. For more information go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) or [www.ntionline.com](http://www.ntionline.com).

**Transportation Safety Planning** Tailored to audience requirements (topics and length), provides an overview of innovative techniques and approaches for successfully integrating safety in the transportation planning process. Length: 1 day Seminar or 2-4 hour Webinar. For more information, contact [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov).

**Transportation Safety Planning Technical Assistance** Resource Center specialists provide technical assistance on transportation safety planning and work with State, MPO and Division staff to explore opportunities for enhancing consideration of safety in the planning process. Length: Depends on customer requirements. For more information, contact [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov).

## Travel Demand Forecasting/Modeling

**Estimating Travel Demand and Revenues for Toll Road Projects** Provides an overview of national experience with tolling and congestion pricing initiatives and associated benefits to transportation system users. The webcast provides examples and lessons learned based on a synthesis of the state of the practice in toll road demand forecasting. This training helps identify the appropriate questions (and issues) to consider when reviewing demand and revenue forecasts for toll facilities. Length: 2 hours. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**How to Interpret and Communicate Forecasts for Corridor Planning** Travel forecasts are often immersed in theory and esoteric formulas, and presenting results useful for planners requires a blend of art and science. Examples of presentation techniques and reporting steps have emerged that make model derived information more accessible/useful. This workshop provides multimodal systems and corridor planning studies that have effectively presented travel forecasting information to support the evaluation of plans, policies, and projects, with an emphasis on corridor planning. Length: ½ day. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Introduction to Travel Demand Forecasting: A Webinar for FHWA Planners** A two hour web-based version of the one-day workshop on travel forecasting targeted to the needs of the FHWA field planner. The Field Planners Travel Demand Modeling Workshop is organized around the “Checklist for Travel Forecasting Methods” used in Federal certifications reviews. This interactive session will help field planners understand: why travel demand modeling is important, how to assess the health of a model, and how to assure a healthy model is properly applied. Length: 2 hours. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Introduction to Travel Demand Forecasting: A Webinar for MPOs and DOTs** A two hour web-based version of the one-day workshop on travel forecasting targeted to “customers” of travel forecasts at State and local agencies. The webinar discusses the key properties and characteristics of models – including attributes of models considered by Federal certifications reviews. The overall focus is on applications of models, data needs, and steps taken to evaluate model outputs used for a variety of planning needs. Length: 2 hours. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Introduction to Urban Travel Demand Forecasting (NHI 152054)** Provides an overview of the traditional four-step planning process of trip generation, trip distribution, mode choice and traffic assignment. Also reviews the development of land use forecasts, network and zone structures and use of Geographic Information Systems. Length: 4 days. For more information, go to [www.nhi.fhwa.dot.gov](http://www.nhi.fhwa.dot.gov) and [tmip.dot.gov](http://tmip.dot.gov).

**Model Validation and Quality Control Strategies for Regional Travel Models** Provides an overview of best practices in model validation and quality control methods for regional travel models. Key parameters and inputs that are linked to forecast error or uncertainty are discussed, as well as the use and interpretation of forecasts as a means of diagnosing errors in up-stream model components. This session also illustrates how “user benefit” calculations can be used as a model diagnostic tool for identifying and correcting errors. Length: 1 day. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Statewide Travel Forecasting** Provides State DOT, MPO, and other transportation planning practitioners an overview of statewide travel demand forecasting models, how these models are used to analyze transportation issues and policies at the State level and the interaction with MPO travel demand models. This workshop also provides information and insight to State DOTs that are considering the development or revision of these models. Length: 1 day. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).

**Travel Demand Forecasting** Tailored to audience requirements (topics and length), provides a general overview of travel demand forecasting, especially the traditional four-step model. Reviews the uses and applications of forecasts for planning purposes and highlights noteworthy practices and techniques. Length: 1 day. For more information, contact [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov) or [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov).

**Travel Demand Forecasting Technical Assistance** Tailored to customer requirements (length and topics), Resource Center specialists are available for technical support on issues related to the application of travel forecasting methods. Assistance provided to State, regional and local agencies on the incorporation of model QA/QC procedures, model validation, data collection efforts, and analytical reporting of model outputs. RC staff are also available to review technical workplans and can provide recommendations

on appropriate analytical methods for planning studies ranging from traditional 4-step models to sketch planning-based methodologies. For more information, contact [eric.pihl@fhwa.dot.gov](mailto:eric.pihl@fhwa.dot.gov), [brian.betlyon@dot.gov](mailto:brian.betlyon@dot.gov) or [jim.thorne@dot.gov](mailto:jim.thorne@dot.gov).

### **Travel Model Improvement Program Seminars and Webinars**

The Travel Model Improvement Program (TMIP) periodically hosts seminar and webinars on topics relevant to transportation planners and modelers. Previous webinar offerings have focused on data needs, trip distribution techniques, and a case study of the Transims regional simulation model. TMIP Seminars include: Activity and Tour Based Forecasting Seminar (reviews activity and tour-based modeling procedures developed around the U.S. and abroad and identifies key areas of research interest); Forecasting Land Use Activity (describes land use models and land-use allocation procedures used in standard practice – including a discussion of advanced and emerging practices); Model Calibration, Validation and Reasonableness Checking (describes procedures for estimating, calibrating and validating travel models). TMIP also provides funding and assistance for peer reviews of models for those agencies seeking suggestions on how to improve their models. For more information, go to [tmip.dot.gov](http://tmip.dot.gov) or contact [sarah.sun@dot.gov](mailto:sarah.sun@dot.gov).

**Uses of Multimodal Freight Forecasting in Transportation Planning (NHI 139002)** See **Freight** section for description.

## **Tribal Transportation**

### **American Indian Best Practices**

See **Environment** section for description.

### **Tribal Transportation Planning Technical Assistance**

Headquarters and Resource Center specialists provide technical assistance related to tribal consultation requirements at the transportation planning level. Specific areas include statewide and metropolitan transportation planning. In addition to technical assistance, presentations and other resource materials are also available. For more information, contact [theresa.hutchins@dot.gov](mailto:theresa.hutchins@dot.gov), [lorrie.lau@dot.gov](mailto:lorrie.lau@dot.gov), [kenneth.petty@dot.gov](mailto:kenneth.petty@dot.gov), [ralph.j.rizzo@dot.gov](mailto:ralph.j.rizzo@dot.gov) or [fawn.thompson@dot.gov](mailto:fawn.thompson@dot.gov).

### **Tribal Consultation and Section 106 Technical Assistance**

Headquarters and Resource Center specialists provide technical assistance related to tribal consultation in the context of Section 106 of the National Historic Preservation Act. In addition to technical assistance, presentations and other resource materials are also available. For more information, contact [david.grachen@dot.gov](mailto:david.grachen@dot.gov), [deborah.scherkoske@dot.gov](mailto:deborah.scherkoske@dot.gov), [maryann.naber@dot.gov](mailto:maryann.naber@dot.gov), [deborah.sucui.smith@dot.gov](mailto:deborah.sucui.smith@dot.gov) or [stephanie.stoermer@dot.gov](mailto:stephanie.stoermer@dot.gov).

## Peer Exchanges

- Freight Peer-to-Peer Program
- Transportation Planning Capacity Building Peer Program
- Travel Model Improvement Program (TMIP) Peer Reviews and TMIP Technical Roundtables

Peer Exchanges are available through the following programs: Freight, Travel Model Improvement Program (TMIP), and Other Planning Areas (through the Transportation Planning Capacity Building Program).

The peer exchange provides transportation agencies a forum to share ideas and noteworthy practices not only to strengthen transportation planning practices, but also to build relationships and reinforce cooperation between agencies.

**Freight Peer-to-Peer Program (P2P)** Facilitates information sharing between public sector freight transportation professionals and provides an opportunity for public sector freight professionals to learn from their peers, the Freight P2P Program identifies and expands State and regional noteworthy practices in the freight transportation field and builds relationships, understanding, and cooperation among key stakeholders. The Freight P2P Program provides targeted, customized technical assistance on a wide variety of freight issues related to planning and operations. Length: Varies. For more information, contact [kate.quinn@dot.gov](mailto:kate.quinn@dot.gov).

**Transportation Planning Capacity Building Peer Program** Designed to bring together practitioners from a variety of experiences and levels of expertise in a spirit of partnership and teamwork. This program can be viewed on the web at [www.planning.dot.gov](http://www.planning.dot.gov). The website contains information on how to apply as well as a summary of prior Peer Exchange activities. Length: Varies. For more information, go to [www.planning.dot.gov](http://www.planning.dot.gov) or contact [susan.grosser@dot.gov](mailto:susan.grosser@dot.gov).

**Travel Model Improvement Program (TMIP) Peer Review Program and TMIP Technical Roundtables** The Travel Model Improvement Program (TMIP) offers a peer review program focused on forecasting and data collection procedures to assist with model development and improvement efforts. TMIP supports peer reviews by funding travel, lodging and per diem for site visit(s) by peer review panel members. TMIP can also assist in the selection of peer review panel members and can help document the review, if requested, by the sponsoring agency. TMIP also periodically holds forums where experts in a particular area share ideas and discuss an emerging technical issue. Discussion results are disseminated via the TMIP website. Length: Varies. For more information, go to [tmip.dot.gov](http://tmip.dot.gov) or contact [brian.gardner@dot.gov](mailto:brian.gardner@dot.gov), [sarah.sun@dot.gov](mailto:sarah.sun@dot.gov) or [eric.pihl@dot.gov](mailto:eric.pihl@dot.gov).