**Course Number**  
FHWA-NHI-133115

**Course Title**  
Advanced Work Zone Management and Design

This course provides participants with advanced levels of knowledge and competencies with technical and non-technical aspects of work zone traffic control practices including work zone planning, design, project management, and contract issues. The course is designed to provide maximum flexibility by including core, recommended, and optional lessons. Each participant receives a copy of the “Advanced Work Zone Management and Design” reference manual and a participant workbook that contains all lesson materials.

**Outcomes**  
Upon completion of the course, participants will be able to:

- Apply the latest safety and mobility design concepts as it relates to temporary traffic control (TTC) plans for work zones
- Identify the latest MUTCD principles as it relates to TTC plans for planning, design, project management, and describe the various contracting issues that may need to be resolved
- Demonstrate knowledge of the latest concepts as related to Parts 1, 5 and 6 of the MUTCD
- Demonstrate knowledge of key concepts in the AASHTO Design Guide and other standards as related to such items as worker and flagger apparel (such as ANSI and similar standard guides)
- Evaluate work zone temporary traffic control designs for nighttime and daytime issues
- Analyze and evaluate operational, safety and mobility impacts of work zones, including scheduling, scope, phases and alternate routes
- Consider the application of ITS technologies and where applicable apply ITS technologies to work zone planning, design and execution
- Consider alternative innovations, best practices and recent research findings in work zone planning, design and execution
- Develop temporary transportation management plans for safety and mobility
- List elements necessary for successful contracts and identify strategies for resolving contract issues, including best practices in work zone contracting, also identify tools to resolve conflicts with contracting issues
- Identify and resolve community issues, including impacts of work zones on affected residential and business areas. Apply public participation, outreach, and work zone strategies to minimize or mitigate community impacts with respect to work zones
- Identify and analyze specific (key) issues and concerns that affect work zone design and demonstrate ability to explain safety and mobility issues, impacts and alternatives to peers, public and/or decision makers
- Summarize work zone safety and mobility impacts and alternatives

**Target Audience**  
State, and local design engineers, traffic and safety engineers, senior work zone traffic engineers, transportation planners, employees of metropolitan planning organizations and board members, regional planners, regional construction engineers (with work zone experience), and senior engineering technicians.

**Training Level:** Accomplished  
**Fee:** 2020: $350 Per Person; 2021: N/A  
**Length:** 3 DAYS (CEU: 1.8 UNITS)  
**Class Size:** MINIMUM: 20; MAXIMUM: 30

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