



## Pedestrian and Bike Forum

### *Update on Secretary of Transportation's Mayors Challenge*

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As mentioned in the [Summer 2015](#) edition of this newsletter, U.S. Secretary of Transportation Anthony Foxx in Fall of 2014 announced an initiative to reduce the growing number of pedestrian and bicyclist injuries and fatalities through a comprehensive approach that addresses infrastructure safety, education, vehicle safety and data collection.

As part of that initiative, the Secretary also urged participants at a U.S. Conference of Mayors meeting in January 2015 to spend a year working to make their cities safer for bikers and walkers. Due to the positive feedback and increased sign-ups, the U.S. Department of Transportation (USDOT) announced the "Mayor's Challenge for Safer People, Safer Streets" would be extended by 6 months, to September 2016. At that time, the Secretary expects to recognize some of the mayors and cities

with an [award ceremony](#) to celebrate their accomplishments. Through both the awards and a survey, USDOT is working to identify best practices from these communities. USDOT hopes that cities and towns across the country will continue to make progress long after the Mayors' Challenge ends.

"We are thrilled with the interest in the Secretary's initiative and the Mayors' Challenge," says Barbara McCann, director of USDOT's Office of Safety, Energy and the Environment. "We feel confident going forward that this initiative is helping more and

more communities [improve safety] for people who are walking and bicycling. The Mayors' Challenge cities are showing the way for a growing number of communities across the United States to recognize that creating a safe walking and bicycling environment is critical for giving residents safe ways to reach jobs, schools, and other sources of opportunity, as well as for individual and community health."

To sign up for the challenge, email [pedbikesafety@dot.gov](mailto:pedbikesafety@dot.gov). For more information, visit the [Mayors' Challenge website](#).

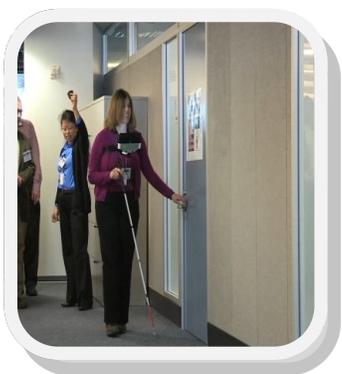


## *FHWA Developing Assistive Technologies for Visually Impaired*



The Federal Highway Administration's Exploratory Advanced Research (EAR) Program (which focuses on longer term, higher risk research with a high payoff potential), funded the development of three research projects to examine new technology solutions for wayfinding and navigation guidance for people with vision impairment and other disabilities, including:

1. A system that can recognize and detect stationary objects; read and recognize important text and signage based on a user's query; and detect, track, and represent moving objects and dynamic changes.
2. A navigation aid that will be able to track the location of a user anywhere, including areas where GPS is not available. Such a tool will help to increase the mobility of people with vision disability by providing them spatial awareness for long-path planning and guidance.
3. A navigation system that can present information to a visually impaired user when it is critical and needed, whether they are indoors or outdoors. The system is designed to fill the many gaps where GPS navigation is not sufficient, such as in parks, airports, intersections, and general pedestrian zones.



The EAR Program asked the three research teams (TRX Systems, Auburn University, and City College) developing the systems to exhibit their technology for Federal staff and stakeholders in demonstrations that took place in November 2015 and March 2016. Routes were created outside and inside the USDOT headquarters building in



Washington, DC.

All of the teams were able to show the potential of the technology for assisting pedestrians with vision impairments using current or near market smart phone technology combined with other low cost sensors. The technology is not a substitute for good navigation skills using a cane or guide dog, and route planning. Combined with good navigation skills, the technology has the potential to enhance the confidence and safety of pedestrians with vision impairments when crossing signalized intersections or should they encounter unexpected detours or want to find points of interest such as a restroom or cafeteria in a building that they had not traveled to previously.

In the future, additional investment could result in the development of commercially available systems comprising a combination of software for smartphones and accessory devices similar to those currently sold for self-monitoring for exercise and physical activity. In addition, the integration of local low-cost sensors, such as those found on smartphones, wireless data, and strong algorithms could provide safety and convenience benefits for a range of travelers. New methods for conveying situational awareness that limit distraction from the task of maneuvering through dynamic environments will provide fundamental benefits across a range of travelers on foot, on a bicycle, driving a motorcycle or car, or operating a commercial vehicle.

For more information on these projects, contact [david.kuehn@dot.gov](mailto:david.kuehn@dot.gov).

## *Incorporating On-Road Bicycle Networks into Resurfacing Projects*

FHWA announced the availability of a new report on [Incorporating On-Road Networks into Resurfacing Projects](#) at the National Bike Summit. Installing bicycle facilities during roadway resurfacing projects is an efficient and cost-effective way for communities to create

connected networks of bicycle facilities.

This workbook provides recommendations for how roadway agencies can integrate bicycle facilities into their resurfacing program. The workbook also provides methods for fitting bicycle facilities onto existing roadways, cost consid-

erations, and case studies. The workbook does not present detailed design guidance, but highlights existing guidance, justifications, and best practices for providing bikeways during resurfacing projects.



## *FHWA's New Safety Performance Measures on Ped and Bike Safety*

FHWA published new safety performance measures as part of its national safety program, calling for State and regional targets to help reduce highway deaths and injuries. The new regulations, which became effective on April 15, call for improved data on roadway features and a consistent definition of serious injuries.

The safety performance measures come as part of new rules to implement the Moving Ahead for Progress in the 21st Century Act (MAP-21) perfor-

mance management requirements for safety and to update the Highway Safety Improvement Program (HSIP). Major provisions involve requirements for all states to evaluate and report more effectively on surface transportation safety across the country.

The regulations will require reporting on the number and rate of all traffic fatalities and serious injuries, as well as a combined non-motorized pedestrian and bicycle injury and fatality measure. States and regional

targets and progress on all 5 measures will be available through a public reporting system and will be aggregated at the national level.

State departments of transportation and metropolitan planning organizations will be required to use the information in their investment programming and will be accountable to achieving their targets annually. For more information, visit [this web site](#)

*“The Department has been working hard with communities around the country to reduce the growing number of pedestrian and bicyclist injuries and fatalities.. Having a uniform national performance measure will help us all work together to save lives.”*

*-U.S. Transportation Secretary Anthony Foxx.*

## *Countermeasures that Work*

[Countermeasures that Work](#) (released November 2015) is a basic reference guide designed to assist State Highway Safety Offices and others in selecting and implementing effective, evidence-based countermeasures to address traffic safety problem areas.

The publication describes major strategies and countermeasures that are relevant, summarizes them and provides references to the most important research summaries and individual studies. It includes chap-

ters on pedestrian and bicycles among others.

For more information about **Countermeasures that Work**, contact Kristie Johnson at [Kristie.Johnson@dot.gov](mailto:Kristie.Johnson@dot.gov).



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This *Pedestrian and Bike Forum* is available on the Web at [http://safety.fhwa.dot.gov/ped\\_bike/pedforum/](http://safety.fhwa.dot.gov/ped_bike/pedforum/)

To receive information on future newsletters, please use the e-subscription service provided on this site: <http://safety.fhwa.dot.gov/esubscribe.cfm#ped>. Scroll down to “Pedestrian and Bicycle Safety” and select “subscribe” next to “Pedestrian Forum.”



U.S. Department of Transportation  
**Federal Highway Administration**

*Helping Communities to provide safe and convenient transportation choices to all citizens, whether it's by walking, bicycling, transit, or driving is a high priority of the U.S. Department of Transportation and the Obama Administration. Each year, unfortunately, pedestrian and bicyclist fatalities comprise about 16 percent of all traffic fatalities and there are approximately 5,500 pedestrian and bicyclist deaths. Another 130,000 pedestrians and bicyclists are injured in roadway crashes annually. Pedestrian and bike safety improvements depend on an integrated approach that involves the four E's: Engineering, Enforcement, Education, and Emergency Services. The Pedestrian and Bike Forum highlights recent pedestrian and bike safety activities related to the four E's that will help save lives.*

## *GAO Concludes Study on Bicyclist and Pedestrian Safety*

The Government Accounting Office (GAO) recently conducted an audit on pedestrian and bike safety and released a final report titled, [Pedestrians and Cyclists: Cities, States, and DOT are Implementing Actions to Improve Safety](#) (GAO-16-66, December 10, 2015).

The GAO's audit objectives were to determine:

- (1) what have been the trends in cyclist and pedestrian crashes, fatalities, and injuries within the last decade,
- (2) what cyclist and pedestrian safety initiatives have states implemented and what challenges remain in addressing this issue, and
- (3) what initiatives have Federal agencies implemented to improve cyclist and pedestrian safety and what gaps exist, if any, in the Federal response

The GAO did not issue any audit recommendations and identified the following main points:

-Pedestrian and bicyclist fatalities and injuries represent a growing percentage of all traffic fatalities and injuries.

-Various factors--working separately or in combination--may have contributed to these fatalities and injuries, including increased walking and cycling trips; alcohol use; distracted road users; or road design practices.

-Officials from states and cities in GAO's review reported that they have implemented a number of efforts, but face challenges – such as: prioritization of safety funding, data reliability, engineering, and funding availability – in addressing pedestrian and cyclist safety.

As documented in previous editions of this newsletter and on the first page of this one, the USDOT has implemented and is planning to take further actions to help improve pedestrian and cyclist safety, including: the Mayor's Challenge - *Safer people, Safer Streets*; a pilot project on trip-counting technologies and updating guidance for states on data to include in crash reports; and DOT guidance on supporting flexibility in the design of pedestrian and cyclist facilities and to help reduce motorist speed.

