

# PROGRESS AND PLANS OF NATIONAL NANOTECHNOLOGY INITIATIVE (NNI) AGENCIES

June 2019

## Department of Transportation (DOT)<sup>1</sup>

### *Federal Highway Administration (FHWA)*

#### Summary

FHWA is pursuing nanotechnology-enabled solutions to improve the safety and performance of the Nation's transportation system. Innovative technologies and approaches to modernizing and renewing our transportation infrastructure are paramount to ensuring mobility, accessibility, and economic productivity for all Americans. Development and deployment of high-performance nanomaterials shows great promise for improving the durability, resilience, and long-term performance of extant and future transportation infrastructure.

#### Plans and Priorities by Program Component Area (PCA)

##### PCA 3. Nanotechnology-Enabled Applications, Devices, and Systems

The Federal Highway Administration is continuing to pursue advances in performance, durability and resiliency of transportation infrastructure materials. Prior innovations in nanoscale characterization techniques and modeling material interactions at multiple scales are being leveraged to enable increased use of recycled or waste materials in infrastructure applications.

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