

Strengthening Mobility and Revolutionizing Transportation

Fiscal Year 2024 Stage 1 Planning and Prototyping Grants by State

Alaska

Recipient	Project Name	Award	Project	Project Summary
		Amount	Туре	
State of Alaska	Avalanche	\$1,128,799	Sensors	This project will use Remote
Department of	Mitigation Alert			Avalanche Control Systems (RACS)
Transportation and	Detection			and Advanced Forecasting
Public Facilities	(AMAD)			Technology (AFT) to address
				significant avalanche risks on the
				Seward Highway corridor, one of
				Alaska's highest-trafficked NHS
				routes.

California

Recipient	Project Name	Award Amount	Project Type	Project Summary
Metropolitan Transportation Commission Under Departmental Review	Data Platform for Connected and Shared Mobility (CSM) Infrastructure	\$1,543,299	Transit Innovation	This project will develop a cutting-edge map-based mobility data platform using Open Street Maps (OSM) to integrate critical systems throughout the San Francisco Bay Area and address operational inefficiencies relating to transportation improvement implementation.
Caltrans (California Department of Transportation) Under Departmental Review	Skate Deployment and Electric Bus Operations Optimization	\$2,000,000	Transit Innovation	This project will use Skate (an open-source bus operations software) to address operational challenges in managing battery electric buses and improve overall transit service reliability across multiple transit agencies in California.
San Francisco Municipal Transportation Agency Under Departmental Review	The Smart & Integrated Management and Fleet Charging (SIM-FC) Project	\$2,000,000	Transit Innovation	The Smart & Integrated Management and Fleet Charging (SIM-FC) project will use state-of- the-art platforms such as Software-as-a-Service (SaaS) combined with customer-side Internet of Things (IoT) devices, sensors, and advanced machine



mistakes and delays.

Florida

Recipient	Project Name	Award Amount	Project Type	Project Summary
Pinellas Suncoast Transit Authority	Automating the Verification Process for Eligibility Benefits	\$1,000,000	Transit Innovation	The project will use APIs to connect PSTA's reduced fare enrollment process to Login.gov to address the challenges prospective veteran and senior transit riders face to apply for free and reduced fares in Pinellas County, FL.

Hawaii

Recipient	Project Name	Award	Project	Project Summary
		Amount	Туре	
Hawaii	Al Sensing-	\$1,290,000	Connected	The objective of this project is
Department of	Empowered		Vehicles	to develop smart infrastructure
Transportation	SMART			and Al-driven video analytics
	Intersection			sensing systems around
Under	Safety			intersections to detect and
Departmental	Improvements for			predict vehicle, pedestrian,
Review	Vulnerable Groups			bicyclist position, speed, and
				trajectory for vehicle-
				pedestrian-bicycle collision
				avoidances based on real-time
				V2X communication, accurate
				positioning functions, and large
				amount of data transmissions.



Illinois

Recipient	Project Name	Award	Project	Project Summary
		Amount	Туре	
Chicago	Chicago	\$1,490,000	Smart	This project will use traffic signal
Department of	Accessible		Traffic	telemetry data through a smartphone
Transportation	Intersection		Signals	application to improve accessibility for
	Navigation			visually impaired pedestrians in the City
	Application			of Chicago.

Indiana

Recipient	Project Name	Award Amount	Project Type	Project Summary
Indiana Department of Transportation	Smarter and Safer Workzone Through Multimodal Intrusion Detection	\$1,980,988	Workzone safety	This project will use Workzone Data Exchange (WZDx), roadside sensors, and Digital Twin (DT) technology to address the problem of workzone intrusion and enhance safety for drivers and workers in Indiana's highways and urban areas.
Indiana Department of Transportation Under Departmental Review	Building Local Capacity for Aerial Surveys	\$2,000,000	UAS	This project will use small, unmanned aircraft systems (sUAS), sensors, data sharing and collaboration software to build local capacity for developing and delivering a National Defense Authorization Act (NDAA) complaint aerial survey program.

Maryland

Recipient	Project Name	Award	Project	Project Summary
		Amount	Туре	
Baltimore City	Smart Traffic	\$1,976,456	Smart	This project will use smart traffic
Department of	Signal Systems		Traffic	signal systems to address mobility,
Transportation	to Mitigate		Signals	safety, and logistics issues caused by
	Bridge Collapse			the Francis Scott Key Bridge collapse
	Impact in			in Baltimore City.
	Baltimore City			



Minnesota

Recipient	Project Name	Award Amount	Project Type	Project Summary
Red Lake Band of Chippewa Indians Under Departmental Review	Red Lake Nation E-Bike Smart Grid & Demonstration	\$595,866	Smart Grid	This project will use smart grid software and renewable-energy powered e-bike charging stations to address transportation insecurity issues, physical and mental health concerns, and an inherent belief in environmental protection for Tribal members of the Red Lake Nation, and to replicate benefits derived from the project for other Tribal communities and rural areas.
City of Moorhead	Far-Moor SMART Traffic Signal System	\$1,989,000	Smart Traffic Signals	The Far-Moor SMART Traffic Signal System will use a fully integrated advanced traffic management system (ATMS), advanced traffic signal performance measures (ATSPMs), traffic redistribution and routing, and transit signal priority (TSP), to enhance transportation safety, improve transit-time reliability, and improve equity through systemwide resiliency.

North Carolina

Recipient	Project Name	Award Amount	Project Type	Project Summary
North Carolina Department of Transportation	Remote Emergency Support Program for Operational Needs & Delivery (RESPOND)	\$1,100,000	UAS	The Project will use innovative aviation technology (uncrewed aircraft systems) to create a drone disaster response and delivery network to address surface transportation and access challenges following natural disaster events in Lumberton, North Carolina.



Strengthening Mobility and Revolutionizing Transportation (SMART) Grants Program **Transportation (SMART) Grants Program**

New Hampshire

Recipient	Project Name	Award Amount	Project Type	Project Summary
City of Manchester	City of Manchester Smart Traffic Signal Corridors Project	\$2,000,000	Smart Traffic Signals	This project will install advanced traffic signal equipment, optimize corridor timing, improve vehicle, pedestrian, and bicycle detection, integrate connected vehicle technology, and improve the management of traffic signals through use of automated traffic signal performance measures (ATSPMs) to reduce delay and emissions while improving safety and communications in a disadvantaged neighborhood.
New Hampshire Department of Transportation	Procuring & Evaluating Mobile Command Vehicles for Critical UAS Missions Statewide in New Hampshire	\$459,284	UAS	This project will design and acquire a prototype mobile command unit in support of using unmanned aircraft systems (UAS) to address the inability to get real-time images and resource needs to transportation departments throughout New Hampshire during times of natural disasters and transportation emergencies.

New Mexico

Recipient	Project Name	Award Amount	Project Type	Project Summary
Bernalillo County	I-40 TradePort Corridor Intelligent Data Platform	\$1,939,762	Sensors	The I40DTw project, through Stage 1 planning and prototyping, will develop the intelligent data platform that will underlie a fully functional digital twin implemented in Stage 2 to address transportation challenges impacting safety, efficiency, productivity, and environmental sustainability of the I-40 Corridor in New Mexico and Arizona.



Strengthening Mobility and Revolutionizing Transportation (SMART) Grants Program **Transportation (SMART) Grants Program**

Nevada

Recipient	Project Name	Award	Project	Project Summary
		Amount	Туре	
Nevada	Enhancing	\$1,920,660	Sensors	This project will use
Department of	Corridor			automation/artificial intelligence,
Transportation	Communication			digitalization, connectivity, data
	Roadmap			standardization, and systems
				engineering to develop the
				requirements of a data exchange that
				can ultimately be used by the I-80 and
				I-35 coalitions.

New York

Recipient	Project Name	Award Amount	Project Type	Project Summary
The Port Authority of New York and New Jersey Under Departmental Review	C-V2X for Queuing and Merging Safety and Efficiency on Bridge Approach Corridors: A GW Bridge Pilot	\$1,999,999	Connected Vehicles	This project will use C-V2X technology to address a stretch of problematic roadway with daily vehicular collisions that leads to hours of traffic congestion and concentrated vehicular emissions at the Trans-Manhattan Expressway section of the George Washington Bridge in New York City.
New York City Department of Transportation Under Departmental Review	Adaptive Transit Signal Priority (TSP) Demonstration	\$2,000,000	Transit Innovation	This project will use adaptive Transit Signal Priority (TSP) technology to address bus performance to increase reliability and traffic signal inefficiencies on major corridors of the Bronx.
County of Dutchess Under Departmental Review	Autonomous High- Definition Aircraft Video Tracking & Data Collection System	\$1,931,850	Sensors	This project will use artificial intelligence, computer vision, robotics, high-definition cameras, and autonomous recording systems to address critical challenges in documenting



				and monitoring aircraft operations at the Hudson Valley Regional Airport, located in Dutchess County, NY, as well as several private and commercial airports nationwide.
City of Utica Under Departmental Review	Utica SMART Traffic Signals	\$1,809,957	Smart Traffic Signals	This project will use smart traffic signals to address pedestrian safety, emergency response times, and climate impact of excessive traffic congestion in a heavily traveled corridor within the disadvantaged City of Utica, NY.

Oklahoma

Recipient	Project Name	Award Amount	Project Type	Project Summary
Cherokee Nation	Cherokee AirCARE SMART Grant	\$1,460,805	UAS	This project will use Unmanned Aircraft Systems (UAS) technology to deliver medical supplies and pharmaceuticals to support Community Health Nurses that are providing care in rural areas to patients who face transportation barriers and cannot travel to a clinic.
Choctaw Nation of Oklahoma	Intelligent Aerospace System Networks with Secure Unattended Hubs	\$1,918,409	UAS	This Stage 1 project will use Secure Unattended Hubs, advanced Uncrewed Aviation Systems (UAS), and intelligent ground robotics to address safety and resiliency, and build supply chain reliability in the Choctaw Nation of Oklahoma's healthcare logistics system.



Pennsylvania

Recipient	Project Name	Award Amount	Project Type	Project Summary
Southeastern Pennsylvania Transportation Authority	Improving SEPTA'S Accessibility using GTFS-Pathways	\$634,294	Transit Innovation	This project will use GTFS-Pathways to improve accessibility and navigability of SEPTA transit by enabling turn-by-turn routing for riders within Metro stations in Philadelphia and Upper Darby, Pennsylvania.
Pennsylvania Department of Transportation	Freight Signal Priority Project	\$1,327,358	Connected Vehicles	This project will use freight signal priority implementation to address critical air quality issues and freight related congestion in several areas in central Pennsylvania.

Rhode Island

Recipient	Project Name	Award Amount	Project Type	Project Summary
City of East Providence	The East Providence Traffic Circulation Improvements Project	\$549,770	Smart Traffic Signals	The Project will use intelligent sensor-based technology and SMART technology traffic signals to better manage congestion that directly impacts the traditional City Center's downtown which includes the City's high traffic density and pedestrianscale Taunton Avenue, where City Hall, small local retail and service businesses, schools and neighboring residential neighborhoods are located.



South Dakota

Recipient	Project Name	Award Amount	Project Type	Project Summary
South Dakota	South Dakota	\$1,995,931	Smart	This project will use
Department of	Statewide Advanced		Traffic	advanced traffic
Transportation	Traffic Management		Signals	management system
	System			technology to integrate
Under				disparate intelligent
Departmental				transportation systems
Review				throughout South Dakota.

Tennessee

Recipient	Project Name	Award Amount	Project Type	Project Summary
Tennessee Department of Transportation	Tennessee Truck Parking Availability System	\$1,986,000	Sensors	This project will use truck parking availability system (TPAS) technology to address the truck parking shortage in Smith County.
Nashville Metropolitan Transit Authority	Fixed-Line Transit 2.0: Real-Time Optimization of High- Frequency Transit Service	\$1,982,235	Transit Innovation	This project will use Computer Aided Dispatch/Automated Vehicle Location systems, headway-conditional Transit Signal Priority, traffic-adaptive signals, machine vision, and Artificial Intelligence/Machine Learning to address unreliable transit service, especially unstable bus headways, that cause long and unpredictable customer wait times at transit stops in the Murfreesboro Pike corridor in Southeast Nashville/Davidson County, Tennessee.



Strengthening Mobility and Revolutionizing Transportation (SMART) Grants Program **Transportation (SMART) Grants Program**

Texas

Recipient	Project Name	Award Amount	Project Type	Project Summary
Waco Metropolitan Planning Organization Under Departmental Review	Smart Technologies for Businesses, Students, and Transit: Equitable Access in Mobility Systems	\$1,440,405	Smart Traffic Signals	This project will use AI Edge sensors and the MobiMaestro algorithm to improve pedestrian, bike and transit usage, VRU safety, and human scale access to businesses in Waco downtown.
City of Galveston Under Departmental Review	Galveston Rapid Evacuation and Transportation System (GREATS)	\$1,999,970	Smart Traffic Signals	The project will deploy Aladaptive smart traffic signal technology and intelligent, sensor-based transportation infrastructure to improve emergency evacuation operations and optimize surge traffic flow across the City of Galveston during severe weather and visitor events.
City of El Paso	El Paso Downtown International Port ITS Design & Regional Integration Project	\$2,000,000	Sensors	The Project includes designing intelligent transportation systems (ITS) for two international ports of entry and integrating existing ITS via Dynamic Traffic Assignment (DTA) operational simulation modeling.

Virginia

Recipient	Project Name	Award Amount	Project Type	Project Summary
City of Alexandria	SmartScan: Alexandria's AI-Driven Roadway Infrastructure Monitoring	\$900,000	Sensors	This project will use Alpowered camera technology to collect unbiased real-time condition information about our infrastructure.



Washington

Recipient	Project Name	Award Amount	Project Type	Project Summary
Intercity Transit	AI-Powered Smart Sensors & Integrated Data Management Dashboard	\$2,000,000	Sensors	This project will use/install smart sensors to identify where conflicts occur, the nature of those conflicts and the severity to better manage the traffic signals around the Lacey Transit Center and the adjacent South Puget Sound Community College campus to reduce conflicts and improve transit reliability and performance, as well as implement an integrated data management dashboard.