DOT Office of Research, Development & Technology

Rural Autonomous Vehicle (RAV) Program NOFO Overview

UTC Directors' Annual Winter Meeting
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Rural Autonomous Vehicle Program (RAV) Funding Opportunity

Two awards to accredited non-profit institutions of higher education, or consortia, as cooperative agreements to conduct research to address challenges of bringing benefits of responsible integration of automated vehicles and associated technologies for surface and air mobility to rural and Tribal communities

$15 million for mobility of people
$10 million for movement of freight

Letter of Intent Due: **January 19, 2024**
Applications Due: **March 13, 2024**

https://www.transportation.gov/policy/ost-r/rdtrav

Letter of intent to be submitted via email to RAVProgram@dot.gov
Informational Webinar on January 19, 2024, 11am-12:15pm, Registration link on https://www.transportation.gov/policy/ost-r/rdtrav

RAV Program NOFO – Rural Community Needs

- **Disparities in mobility and economic development opportunities in rural communities lead to high levels of transportation insecurity**
  - **People are unable to get to where they need to go to meet the needs of their daily life regularly, reliably, & safely, and to get necessary goods delivered**

- ***Crash fatality rate on rural roads is two times higher than on urban roads***
  - While only 19% of the U.S. population live in rural areas, 47% of all roadway fatalities, and 34% of all public highway-rail grade crossing fatalities occur on rural roads

- **Emergency response times are more than twice as long in rural areas**

- **Almost 25% of Americans 65 and older reside in rural communities**

RAV Program NOFO – Rural AV Challenges

- AVs have the potential to enhance roadway safety and increase mobility options for all Americans, however, they have substantial challenges to overcome to bring these anticipated benefits to rural communities

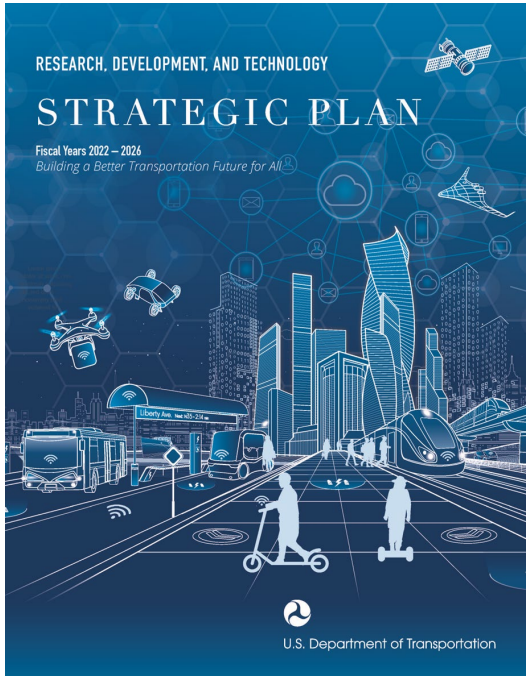
- <u>Examples of rural AV challenges</u>
  - differing types and conditions of roadways (i.e., paved, and unpaved)
  - lighting limitations
  - non-standard signage
  - irregular design and markings
  - mapping discrepancies
  - under resourced emergency services
  - Wi-Fi and cellular network limitations

RAV Program underpinnings

The RAV program research should address the unique challenges rural and Tribal communities face related to mobility and economic development, including isolation, transportation cost burden, and traffic safety

The program research should focus on applications of automated vehicle technologies for rural communities that support:

- FY 22-26 U.S. DOT Strategic Plan
- U.S. DOT RD&T Strategic Plan (FY 2022-2026)
- U.S. DOT National Roadway Safety Strategy (NRSS)
- https://www.transportation.gov/priorities/transformation/us-dot-innovation-principles



https://www.transportation.gov/dot-strategic-plan

RAV NOFO- Eligible Applicants

- Eligible applicants shall include a consortium of two or more non-profit institutions of higher education

- Additional consortium members may include State, local, Tribal, and territorial (SLTT) Departments of Transportation and Departments of Public Works, metropolitan and regional planning organizations, the private sector, the philanthropic sector, and non-profit organizations

RAV Program NOFO – Evaluation Criteria

1. The ideas, concepts, and approaches to rural automated vehicle research and development that will support the Department's efforts towards the research, development, and deployment of automated vehicle technologies in U.S. rural and Tribal communities.

2. The institutions' relevant experience in automated vehicle and rural and/or Tribal areas research.

3. How the eligible applicant will implement and collaborate with other transportation and non-transportation stakeholders to maximize the effectiveness of RAV Program research.

4. Support of Equity and Underserved Communities (*Proposal clearly shows how the program will engage local communities, increase their affordable transportation options, and improve their safety and access to resources and quality of life.*)

RAV NOFO – Anticipated Award Summary

Funding instrument type	Cooperative agreement
Federal amount for two awards	• $15,000,000 for mobility of people award • $10,000,000 for movement of goods award
Anticipated program start date	Late Spring 2024
Duration	Up to six-year period
Program phases	• Research • Demonstration • Deployment
Rural area	In RAV, rural is defined as outside U.S. Census-designated urban area with a population of 50,000 or more

THANK YOU!