



Transportation Resilience Project Guidance

The Transportation Resilience Project Guidance document aims to support regional agencies in identifying projects that will enhance the resilience of the region's transportation system and are good candidates for federal and other resilience investment funding. This Guidance document:



Overviews the Transportation Planning Board's (TPB) processes to support regional resilience coordination, including the development of the 2024 National Capital Region Transportation Resilience Improvement Plan (TRIP)



Helps to define a resilience project and provides examples and resources for practitioners



Describes the annual project submission process for inclusion in the TRIP Priority Project List



Provides guidance on developing strong project submissions for federal funding programs related to resilience.

For questions regarding this document or for more information about TPB's transportation resilience planning program, please contact Katherine Rainone at krainone@mwkog.org.

Understanding Resilience

What is transportation resilience?

The Metropolitan Washington Council of Governments (COG) 2030 Climate and Energy Action Plan states that a Climate Resilient Region will be achieved when the region has the **“ability to adapt and absorb against disturbances caused by current and future, acute and chronic climate impacts and successfully maintain essential functions.”** The Federal Highway Administration (FHWA) defines a resilient project as having the ability to anticipate, prepare for, or adapt to conditions or withstand, respond to, or recover rapidly from disruptions, including the ability to:

- Resist hazards or withstand impacts from weather events and natural disasters.
- Reduce the magnitude or duration of impacts of a disruptive weather event or natural disaster.
- Have absorptive capacity, adaptive capacity, and recoverability to decrease project vulnerability to weather events or other natural disasters.
- The consideration of incorporating natural infrastructure.¹

What are some examples of transportation resilience projects?

There is a wide range of potential projects that member agencies can leverage to increase systemwide transportation resilience in the region. These include planning and policy-based measures that can be implemented in advance of extreme events, such as updating infrastructure design standards to be climate-resilient and designating evacuation routes, in addition to implementing infrastructure upgrades and improvements. Member agencies can also use asset-level measures to build back better following extreme events. These can include upgrading stormwater management infrastructure or elevating roads or bridges to reduce impacts during flooding events. Table 1 provides an illustrative set of examples of resilience improvement strategies that are eligible under PROTECT.

¹ FHWA. Resilience Definitions. <https://highways.dot.gov/research/infrastructure/resilient-pavements/definitions>

Table 1. Select Examples of Resilience Improvement Strategies

Upgrades to or installation of stormwater management infrastructure



([NTM Engineering](#))

Upgrading or installing stormwater management infrastructure (e.g., culverts, pipes, drains, etc.) can reduce flooding risk by increasing the capacity of stormwater infrastructure to capture and store surface runoff during flooding events. This can help prevent culverts and drains from overflowing, preventing standing water on roads and reducing inundation of critical infrastructure.

Relocating or elevating roadways out of the floodplain



([Risk Factor](#))

Relocating or elevating roadways out of the floodplain can significantly reduce flooding risk by preventing inundation of the roadway. Elevating the roadway can be completed incrementally by adding pavement thickness to raise the road surface. For roadways with high risk of inundation, relocating the roadway out of the floodplain entirely may be a more effective option.

Implementing nature-based solutions to reduce flooding risk



([Fairfax County, VA](#))

Incorporating natural infrastructure in resilience projects can help reduce flooding risk in addition to providing environmental co-benefits. There are many nature-based solutions that can be implemented to reduce flooding risk to transportation infrastructure. For infrastructure located along streams and rivers, nature-based solutions can help reduce erosion and undercutting along the bank while also helping reduce water flow and riverine flooding. Examples include:

- Using vegetated riprap
- Placing large woody debris (fallen trees, logs, and branches) in streams



([LDP Watersheds](#))

Other nature-based solutions can be implemented in the built environment to help decrease stormwater runoff and consequently reduce the severity and duration of flooding events. Examples include:

- Installing retention/detention ponds and bioswales
- Planting vegetation buffers along roads

Installing shade structures along sidewalks and at outdoor transit stops



([Springer](#))

Installing temporary or permanent shade structures, such as canopies, shade sails, or trees, can reduce extreme heat impacts for people using sidewalks or waiting at outdoor transit stops or platforms.

Removing trees that are unhealthy, dead, or dangerous



([The Environmental Blog](#))

Trimming or cutting down unhealthy, dead, or dangerous trees can reduce the risk of trees bending or falling during extreme wind events. Preventing downed trees due to wind is especially important near critical roads, bridges, rail lines, and utility poles and wires.

Regional Resilience Planning

Why is regional resilience planning important?

Resilience planning considers vulnerability, risks, and proactive anticipation of hazards that could affect physical infrastructure and utilities, disrupt service, and displace or pose health and well-being threats for travelers. Planning for and adapting to the impacts of extreme weather and natural hazards is critical to ensure the region's transportation system is resilient to hazards such as extreme heat and flooding.

How does the TPB support regional resilience planning and investments?

The TPB is supporting regional adoption of climate mitigation and adaptation strategies by facilitating collaboration and helping regional transportation agencies identify risks and develop resilience projects to receive funding for implementation. The TPB has developed the TRIP Priority Project List and will conduct an annual solicitation process for resilience projects to add to the TRIP. The 2024 and 2025 TRIP Priority Project Lists included projects identified by regional agencies as priority resilience projects that could help reduce the vulnerability of the region's transportation system to extreme weather events and natural hazards. Additionally, the TPB is beginning to incorporate resilience into the National Capital Region Transportation Plan (NCRTP) by including resilience as a consideration in the submission form.

TPB Annual Project Submission Process

Why is TPB soliciting resilience projects?

While the region's transportation system was built to withstand a broad range of weather conditions, specific resilience projects are needed to increase system resilience to the increasing frequency and severity of

natural hazards. Currently, there are federal funding opportunities, such as the Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation (PROTECT) program to address these risks. Although the expected timing of the next PROTECT award cycle is unknown as of November, 2025, the TPB is helping to position the region to be highly competitive. The TPB collaboratively engaged member agencies and conducted a project solicitation process for project submissions to include in the 2024 TRIP. Per the PROTECT Program Guidance from FHWA, priority resilience projects included in the TRIP will receive extra evaluation points, does not have to complete a benefit-cost assessment, and will be eligible for a 7% reduction in the non-federal share of project costs for the [PROTECT Discretionary Grant Program](#). Projects are eligible for an additional 3% reduction if incorporated into the TPB National Capital Region Transportation Plan (NCRTP).²

To continue encouraging member agencies to consider resilience throughout the project design process and continue to identify eligible projects that may qualify for extra evaluation points and match reduction via PROTECT discretionary grants, the TPB will continue soliciting resilience projects annually. The TPB will update the TRIP priority project list annually with newly submitted projects and help support member agencies interested in applying for funding under the PROTECT Discretionary Grant Program.

What does TPB want to see in the project submissions?

The region’s transportation systems include different infrastructure types, ownership and asset management structures, and functionality. Resilience projects will vary for different types of transportation assets. TPB developed a set of resilience components to help **define a reasonable resilience project** in the context of regional and federal definitions to help member agencies think creatively about potential resilience solutions, including the use of nature-based solutions, especially in the context of being competitive for funding opportunities such as PROTECT. The TPB will continue to use resilience project components to evaluate project submissions for inclusion in the annual TRIP Priority Project List updates. Table 2 lists the resilience components that TPB **strongly encourages** member agencies to incorporate in their project submissions.

Table 2. Components of a Resilience Project

Resilience Criteria	Description
Eligible transportation asset	<p>TPB is collecting proposed projects for inclusion in the next TRIP priority project list update for the following transportation assets: roads and highways, bridges, public transit infrastructure, active transportation infrastructure, airports, maritime infrastructure, and stormwater infrastructure.</p> <p>Note, PROTECT discretionary grants can only be awarded to eligible highway projects, transportation facilities or services, intercity passenger rail facilities or services, and port facilities.</p>
Qualifying project type for PROTECT	<p>There are four types of grants that can be used for the following project types:</p> <ol style="list-style-type: none"> 1) Resilience Planning – Resilience planning activities, capacity building, and evacuation planning and preparation. 2) Resilience Improvements – Projects that make existing surface transportation infrastructure more resilient such as improving drainage, upgrades to meet or exceed design standards, relocating roadways, or elevating bridges. 3) Community Resilience and Evacuation Routes – Improvements to make evacuation routes more resilient or add capacity and redundant evacuation routes.

² FHWA. Promoting Resilient Operations for Transformative, Efficient, and Cost Saving Transportation (PROTECT) Formula Program Implementation Guidance. 2022.
https://www.fhwa.dot.gov/environment/sustainability/resilience/policy_and_guidance/protect_formula.pdf

Resilience Criteria	Description
	4) At-Risk Coastal Infrastructure – Projects that protect, strengthen, or relocate coastal highway and non-rail infrastructure.
Targets high priority risks	<p>The proposed project protects the most vulnerable and critical assets/services identified via the National Capital Region Transportation System Climate Vulnerability Assessment or identified through local studies and assessments, or areas with historic evidence of natural hazard damage.</p> <p>To view and explore the results of the TPB Climate Vulnerability Assessment and TPB Inland Flood Analysis, see the Interactive Mapping Tool on the TPB ArcGIS website. The Mapping Tool is a product of the Climate Vulnerability Assessment, which was conducted as part of the TPB TRIP development in 2023-2024. The Climate Vulnerability Assessment layered transportation asset, climate, and equity spatial data to identify highly vulnerable assets. Assets that score a 2.5 or above for any hazard are considered priority risks.</p> <p>While projects that protect the identified highly vulnerable critical assets/services may be prioritized, any resilience project for a transportation system(s) can be submitted.</p>
Reduces risks to impacts of extreme weather and natural hazards	<p>The proposed project reduces the risks associated with one or more natural hazards: extreme heat, inland flooding, coastal flooding, extreme winter conditions, and extreme wind. In addressing these risks, the proposed project ensures the continuity and/or reliability of the transportation service/system.</p> <p><i>Examples of projects that reduce risks to natural hazards include:</i></p> <ul style="list-style-type: none"> • <i>Elevating roadways and other critical infrastructure out of floodplains</i> • <i>Upgrading stormwater infrastructure to increase water storage capacity and reduce flooding during extreme storm events</i> • <i>Increasing shading around outdoor transit stops to reduce extreme heat impacts on passengers</i>

TPB also encourages agencies to consider other best practices while developing project submissions:

- Whether the proposed project incorporates **innovative solutions** to further increase the resilience of the transportation system and minimize potential negative impacts of project implementation. Examples of innovative solutions include nature-based solutions³ which can provide a wide range of co-benefits and increase the service life of certain types of infrastructure.
- Whether the proposed project provides **co-benefits** that can further increase community resilience. Examples include environmental co-benefits (such as restoring or improving natural systems and reducing greenhouse gas emissions); increasing the reliability of interdependent systems (such as emergency response services and other critical infrastructure); and economic benefits (such as decreased costs over time, increased job opportunities).

How do I submit my resilience project to TPB?





TPB will annually solicit resilience projects through the [Project Request Form](#). To include projects on the 2026 TRIP Priority Project List, submissions are due by January 30, 2026. See below for the Project Request Form fields. For more information, reach out to Katherine Rainone at krainone@mwco.org.

³ FHWA. 2020. Nature-based Resilience for Coastal Highways.
https://www.fhwa.dot.gov/environment/sustainability/resilience/ongoing_and_current_research/green_infrastructure/

Resilience Project Request Form	
Lead Agency	Provide lead agency name.
Lead Agency Entity Type	<input type="checkbox"/> State (including DC) <input type="checkbox"/> Metropolitan Planning Organization <input type="checkbox"/> Unit of local government <input type="checkbox"/> Special purpose district or public authority with a transportation function <input type="checkbox"/> Multi-State or multijurisdictional group of entities <input type="checkbox"/> Other _____
Secondary Agency	Provide secondary agency name if applicable.
Secondary Agency Entity Type	<input type="checkbox"/> State (including DC) <input type="checkbox"/> Metropolitan Planning Organization <input type="checkbox"/> Unit of local government <input type="checkbox"/> Special purpose district or public authority with a transportation function <input type="checkbox"/> Multi-State or multijurisdictional group of entities <input type="checkbox"/> Other _____
Project Asset Type	<input type="checkbox"/> Roadway system (Functional Class 1-3, 5) <input type="checkbox"/> Local street system (Functional Class 4, 7) <input type="checkbox"/> Facility or service for public transportation <input type="checkbox"/> Facility or service for intercity passenger rail <input type="checkbox"/> Active transportation (not eligible for PROTECT funding) <input type="checkbox"/> Maritime infrastructure (not eligible for PROTECT funding unless connected to a port facility) <input type="checkbox"/> Airports (not eligible for PROTECT funding) Other _____
Project Name	State the project name.
Project Location/Description	<p>Identify the project location and asset(s) and describe the project activities and intended outcomes. Identify the system or route where the project is located, including the beginning project limit or location of a spot improvement and the distance in miles of the complete project. For bridges, provide the federal or state bridge asset identification number.</p> <p>Describe the natural hazard(s) impacting the asset(s) and what resilience measure(s) will be completed through the project. Describe the proposed project timeline and indicate the estimated year for project completion.</p>
Cost	Provide an order of magnitude estimated cost. Describe any current funding commitments for the project.
PROTECT Grant Application	Indicate whether this project has been included in an application to the PROTECT program.
Related Plans	Indicate if the project has been identified through another planning process or is included in an existing agency policy or planning document.
High Priority Risk	<p>Indicate if the project addresses a high priority risk identified through the TPB Climate Vulnerability Assessment, TPB Inland Flood Analysis, local studies and assessments, or historic evidence of natural hazard damage.</p> <p>If your organization has additional data or records of historical incidents indicating at-risk transportation assets that are not represented on the Interactive Mapping Tool, please describe how this data was used to inform the project.</p>
Resilience Measures	Describe how the project will reduce the risks associated with one or more natural hazards and ensure the continuity and/or reliability of the transportation service/system.
Optional: Additional Considerations	Describe any additional strengths of the project (e.g., incorporates innovative solutions like nature-based solutions).

What are some examples of projects included in the TRIP Priority Project List?
 Table 3 provides three examples of projects submitted by TPB members for the 2024 Project List.

Table 3. Three Project Examples from the 2024 TRIP Priority Project List

DDOT and District DOEE: Nannie Helen Burroughs Avenue DC-295 Underpass ⁴	
	<p>Location: Nannie Helen Burroughs Avenue NE underpass beneath DC-295 in DC.</p> <p>Description: The Nannie Helen Burroughs Avenue experiences frequent flash flooding due to the impermeable surfaces in the nearby Watts Branch watershed. Flooding happens quickly, leaving disadvantaged neighborhoods with vulnerable populations between DC-295 and the Anacostia River isolated with little warning. The proposed Engineering Feasibility Study would identify methods to improve the flood resilience of transportation infrastructure while creating additional greenspaces between the Anacostia River and Kenilworth Park and the Nannie Helen Burroughs Avenue Commercial Corridor.</p>
Charles County Government: Cobb Island (MD-254) - Bridge Approach	
 	<p>Location: MD-254 (Cobb Island Road) between MD-257 and the Cobb Island Bridge.</p> <p>Description: While the Cobb Island Bridge was recently replaced in 2020, the bridge approach and surrounding roadways still experience tidal flooding and inundation from sea level rise. There is ongoing planning for this project, and possible options include a range of nature-based and innovative interventions to address flood vulnerability from multiple hazards.</p>
Virginia Railway Express (VRE): Manassas Line Track Heat Vulnerability & Mitigation Strategies Analysis	
	<p>Location: Track infrastructure on VRE’s Manassas Line between the Broad Run station and “AF Interlocking.”</p> <p>Description: Temperatures that continue to rise and that remain elevated for longer periods threaten the structural integrity of rail tracks. This project will identify the appropriate mitigation strategies to address the adverse effects of heat on track and ancillary facilities identified as high risk in the TPB vulnerability assessment. This study would detail potential effects of heat events on the track infrastructure and will propose, at a planning level, conceptual projects that could mitigate or eliminate the adverse condition(s) through the horizon planning year.</p>

⁴ This project received PROTECT funding in 2024.

Applying for PROTECT Discretionary Grants

What kinds of projects have been funded by PROTECT?

The PROTECT Discretionary Grant Program offers four types of grants for qualifying activities. In April 2024, FHWA awarded **\$830 million** in funding under the four different grant types to 80 projects in 37 states, the District of Columbia, and the Virgin Islands (see Figure 1).⁵



Figure 1. Summary of the 2022-2023 PROTECT Discretionary Grant recipients. The full list of grant recipients and project details can be found on the [PROTECT Discretionary Grant Program website](#).

An example of a project funded in the national capital region and of a project awarded to a TPB member agency include:

- **DDOT: Nannie Hellen Burroughs Avenue DC-295 Underpass Flood Mitigation Planning Grant.** \$1 million to conduct an engineering study and develop an implementation plan to improve flood resilience of the Nannie Helen Burroughs Avenue NE underpass beneath DC-295. The roadway provides a critical access route for several surrounding historically disadvantaged neighborhoods that can be cut off during heavy rain events. The study will also investigate opportunities for economic development while addressing flooding risks.
- **VDOT: Modernizing Operations for Virginia’s Evacuation Resilience (MOVER) Community Resilience and Evacuation Route Grant.** Over \$5.4 million to install a weather and traffic monitoring system that will facilitate emergency evacuations due to extreme weather events in Virginia’s Tidewater and Chesapeake region. The project will include the use of flood sensors, stream gauges, and traffic cameras to promote data-driven decisions in hazardous conditions, including flood, wind, fire, and landslides.

⁵ FHWA. April 2024. PROTECT Discretionary Grant Program Award Recipients.
https://www.fhwa.dot.gov/environment/protect/discretionary/grant_recipients/

What makes a strong project submission for PROTECT?

Table 4 provides a summary of the merit criteria that PROTECT discretionary grant applications were evaluated against in the FY22-23 award cycle. Criteria for future award cycles has not yet been released. The stronger the response to each criterion, the better an application will score. These criteria are also useful to keep in mind when submitting projects to TPB for the next update to the TRIP priority project list or when developing future projects.

Table 4. Summary of PROTECT Discretionary Grant Program Merit Criteria

Merit Criteria ⁶	Description
Vulnerability and Risk	<p>The application:</p> <ul style="list-style-type: none"> • Describes the current or future weather events, natural disasters, or changing conditions that the project area is exposed to. • Assesses how the project will reduce the exposure and sensitivity of the asset/system and increase its adaptive capacity. • Demonstrates that the risk to the asset/system is high.
Criticality to Community	<p>The application:</p> <ul style="list-style-type: none"> • Demonstrates the critical need for the project. • Identifies critical facilities and destinations to which the project provides continued access. • Demonstrates that resilience improvements are needed in the near-term. • Describes how the project is critical to supporting community functions, such as access for disadvantaged populations and emergency operations during evacuations.
Design Elements	<p>The application:</p> <ul style="list-style-type: none"> • Identifies the anticipated service life and describes how the anticipated service life was determined. • Demonstrates how the design elements will reduce current and future vulnerabilities and risks. • Considers and uses nature-based solutions as appropriate. • Includes a detailed maintenance plan for the anticipated life of the facility.
Public Engagement, Partnerships and Collaboration	<p>The application provides a detailed public engagement, partnerships, and collaboration plan, including how public engagement will be conducted and what partnerships with community stakeholders and other agencies will be carried out.</p>
Equity and Justice⁴⁰	<p>The application:</p> <ul style="list-style-type: none"> • Demonstrates how meaningful public involvement will occur throughout the project's life cycle. This includes involving disadvantaged communities. • Includes an equity assessment that explains how the project will support equity/Justice40 goals. • Demonstrates that at least 40% of the benefits of the project are targeted towards disadvantaged communities.

⁶ FHWA. 2023. PROTECT Discretionary Grant Program Notice of Funding Opportunity. <https://www.grants.gov/search-results-detail/347585>

Merit Criteria ⁶	Description
Climate Change and Sustainability	<p>The application demonstrates that the project will:</p> <ul style="list-style-type: none"> • Significantly reduce greenhouse gas emissions. • Incorporate evidence-based climate resilience measures or features. • Address the disproportionate negative environmental impacts on disadvantaged communities. • Avoid adverse environmental impacts to air/water quality, wetlands, and endangered species.

How will FHWA measure project success for awarded projects under the PROTECT program?

FHWA recently published draft metrics for evaluating the effectiveness and impacts of a representative sample of projects funded under the PROTECT Discretionary Grant Program.⁷ Metrics are included for five categories: equity, robustness, redundancy, rapidity, and resourcefulness. A subset of the draft metrics is provided in Table 5. **It is important to note that FHWA's metrics are not yet finalized and would only be used if a grant is awarded, and the project is selected to test the metrics.** However, the draft metrics may still be a useful resource to help member agencies understand how to evaluate the success of resilience projects in their jurisdictions.

As resilience to extreme weather and natural hazards becomes increasingly important in transportation planning across the National Capital region, monitoring and evaluating the success of resilience projects will be essential for identifying best practices for advancing transportation resilience.

Table 5. Example Draft Metrics from FHWA

Category	Example Metrics
Robustness	<ul style="list-style-type: none"> • Change in Projected or Actual Annual Maintenance/Repair Costs • Percent change in number of coastal and other low-lying roadway overtopping or inundation events • Number of hydraulic countermeasures, structural measures, or road drainage features installed or enhanced in the project area
Redundancy	<ul style="list-style-type: none"> • Reduction in detour length (miles) because of the project
Rapidity	<ul style="list-style-type: none"> • Annual percent change in observed closure hours for roads or facilities in project area • Percent change in travel times before, during, and after evacuation event
Resourcefulness	<ul style="list-style-type: none"> • Number of warning systems or sensors that were used to improve transportation system performance

Applying for USDOT BUILD Grants

Although the priority project list included in the TRIP is primarily geared toward the PROTECT Discretionary Grant Program, member agencies may be interested in applying for other federal grants to increase their resilience. The U.S. Department of Transportation's (USDOT) [Better Utilizing Investments to Leverage Development \(BUILD\) grant program](#) is another funding opportunity for resilience projects, providing grants

⁷ FHWA. March 2024. Promoting Resilient Operations for Transformative, Efficient, and Cost-Saving Transportation Discretionary Program Metrics. <https://www.federalregister.gov/documents/2024/03/21/2024-05934/promoting-resilient-operations-for-transformative-efficient-and-cost-saving-transportation>

for surface transportation infrastructure projects with significant local or regional impact. BUILD was previously known as the Rebuilding American Infrastructure with Sustainability and Equity (RAISE).

What kinds of projects have been funded by USDOT BUILD?

The BUILD program has two eligible project categories:

- **Capital Projects:** Projects that expand, improve, or construct surface transportation infrastructure, such as roads, bridges, transit, rail, ports, and intermodal facilities, to advance the goals of the program.
- **Planning Projects:** Projects that support the planning and design of future capital projects, such as studies, community engagement, environmental review, and integrated land use and transportation plans.

For the Fiscal Year 2024 grant cycle, USDOT awarded **\$1.3 billion** to 109 recipients.

What makes a strong project submission for USDOT BUILD?

Table 6 provides a summary of the merit criteria that USDOT BUILD grant applications have been evaluated against in the past. The stronger the response to each criterion, the better an application will score. These criteria are also useful to keep in mind when submitting projects to TPB for the next update to the TRIP priority project list or when developing future projects.

Table 6. Summary of USDOT BUILD Merit Criteria

Merit Criteria ⁸	Description
Safety	The application describes how the proposed project will: <ul style="list-style-type: none"> • Target a documented safety problem with clear, data-driven analysis. • Protect travelers, including pedestrians, bikers, and transit users. • Reduce fatalities and serious injuries. • Implement recognized strategies and plans (e.g., NRSS, FTA guidance).
Environmental Sustainability	The application describes how the proposed project will: <ul style="list-style-type: none"> • Cut transportation emissions and travel demand. • Increase climate resilience of at-risk assets. Protect communities and ecosystems by reducing exposure to pollution.
Quality of Life	The application describes how the proposed project will: <ul style="list-style-type: none"> • Expand affordable, multimodal travel choices. • Improve equitable access to daily destinations through coordinated land use, housing, and transportation planning. • Enhance public health by mitigating urban heat islands.
Mobility and Community Connectivity	The application describes how the proposed project will: <ul style="list-style-type: none"> • Improve system-wide connectivity and close network gaps. • Reconnect communities by providing direct, affordable travel options. • Increase accessibility through Universal Design/Complete Streets that go beyond Americans with Disabilities Act (ADA).
Economic Competitiveness and Opportunity	The application describes how the proposed project will:

⁸ DOT BUILD FY 2025 Notice of Funding Opportunity: https://www.transportation.gov/sites/dot.gov/files/2025-01/BUILD%202025%20NOFO%20Amendment_0.pdf

Merit Criteria ⁸	Description
	<ul style="list-style-type: none"> Strengthen the regional economy by creating and improving jobs and catalyzing local entrepreneurship. Unlock productive land use through public/private investment and main street revitalization.
State of Good Repair	<p>The application describes how the proposed project will:</p> <ul style="list-style-type: none"> Restore and modernize core assets at/near end of life. Cut lifecycle costs and maintenance burdens. Address current/projected vulnerabilities.
Partnership and Collaboration	<p>The application describes how the proposed project will:</p> <ul style="list-style-type: none"> Engage residents and community-based organizations throughout the project lifecycle. Formalize partnerships (e.g., public-private/joint ventures) to expand infrastructure or economic capacity and participate in the Thriving Communities Network.
Innovation	<p>The application describes how the proposed project will:</p> <ul style="list-style-type: none"> Deploy innovative technologies (e.g., Connected and Automated Vehicle (CAV) readiness, Advanced Driver Assistance Systems (ADAS)). Leverage innovative financing and demand management (e.g., TIFIA, RRIF, private activity bonds).

Appendix: Glossary of Terms

Adaptation: Changes in behavior and the built environment in order to reduce vulnerability to a hazard.

Climate Adaptation: The process of adjusting to the effects of climate change to build long-term resilience. Adaptation may include changing behavior, adapting infrastructure, supporting natural systems and more.

Adaptive Capacity: An institution's ability to adjust to disturbance, moderate damage, take advantage of opportunities, and cope with consequences of transformations that occur.

Climate Hazard: Climate-related physical events or trends that may cause damage and loss when it occurs.

Climate Risk: The potential for adverse consequences for human or ecological systems, recognizing the diversity of values and objectives associated with such systems..

Exposure: Unprotected populations, assets, services, resources, and infrastructure that could be adversely affected.

Greenhouse Gas (GHG): Natural and anthropogenic gaseous constituents of the atmosphere, such as carbon dioxide or methane, that absorb and emit radiation in such a manner that it can cause global temperature increase.

Mitigation: A decrease in a possible harmful effect.

Climate Change Mitigation: The reduction in greenhouse gas emissions that drive global climate change.

Hazard Mitigation: Investment in physical or operational strategies to reduce known vulnerabilities and risks.

Nature-Based Solutions: Sustainable planning, design, environmental management, and engineering practices that weave natural features or processes into the built environment to promote human well-being, ecosystem services, resilience, and biodiversity benefits.

Resilience: A system's capacity to accommodate future disruptions. Climate and social resilience compose overall resilience.

Climate Resilience: The ability to anticipate, prepare for, and adapt to changing climate conditions and to be prepared to withstand, respond to, and recover quickly from extreme weather events.

Social Resilience: The capacity of individuals, communities, businesses, institutions, and governments to adapt to changing conditions and to prepare for, withstand, and recover from disruptions to everyday life.

Sensitivity: Condition of being easily affected by a change in surrounding conditions.

Vulnerability: Pre-event inherent characteristics that have the possibility of being adversely affected.