## 

AASHTO Innovation Initiative [Proposed] Nomination of Innovation Ready for Implementation							
Sponsor	Nominations must be submitted by an AASHTO member DOT willing to help promote the innovation		State: Phone: DT willing to promote this innov red by the AASHTO Innovation				
Innovation Description (10 points)	The term "innovation" may include processes, products, techniques, procedures, and practices.	<ul><li>"state of play."</li><li>6. If appropriate, please attac or functionality of the innov attachments here.</li></ul>	Please describe the innovation. Describe how this innovation transforms your existing "state of play." If appropriate, please attach photographs, diagrams, or other images illustrating the appearance or functionality of the innovation (if electronic, please provide a separate file). Please list your attachments here.				
State of Development (40 points)	Innovations must be successfully deployed in at least one State DOT. The All selection process will favor innovations that have advanced beyond the research stage, at least to the pilot deployment stage, and preferably into routine use.	<ul> <li>following options. Please of</li> <li>Prototype is fully function</li> <li>Prototype demonstrate</li> <li>Technology has been of</li> <li>Technology is ready for</li> <li>9. What additional development resources—such as technical available to assist with the</li> <li>10. Has any other organization</li> </ul>	<ul> <li>following options. Please describe</li> <li>Prototype is fully functional and yet to be piloted</li> <li>Prototype demonstrated successfully in a pilot environment</li> <li>Technology has been deployed multiple times in an operational environment</li> <li>Technology is ready for full-scale adoption</li> </ul> 0. What additional development is necessary to enable routine deployment of the innovation? What resources—such as technical specifications, training materials, and user guides—are already available to assist with the deployment effort? 10. Has any other organization used this innovation? Yes or No: If so, please list organization names and contacts. Please identify the source of this information.				



Potential Payoff (30 points) Payoff is defined as the combination of broad applicability and significant benefit or advantage over other current practice (baseline).

**11.** How does the innovation meet customer or stakeholder needs in your State DOT or other organizations that have used it?

12. What type and scale of benefits have your DOT realized from using this innovation? Include cost savings, safety improvements, transportation efficiency or effectiveness, environmental benefits, or any other advantages over other existing baseline practice. Please identify the following benefit types:

Check boxes that apply	Benefit Types	Select a rating from the drop down menu
	Cost Savings	
	Shortened Project/Service Delivery Schedule	
	Improved Customer Service	
	Improved Quality	
	Environmental Benefits	
	Organizational Efficiency	
	Improved Safety	
	Improved Operational Performance	
	Improved Asset Performance	
	Others (please describe)	

Provide an additional description, if necessary:

**13.** Please describe the potential extent of implementation in terms of geography, organization type (including other branches of government and private industry) and size, or other relevant factors. How broadly might the technology be deployed?

14. What specific actions would another organization need to take along each of the following dimensions

Market Readiness (20 points) The All selection process will favor innovations that can be adopted with a reasonable amount of effort and cost, commensurate with the payoff potential.

to adopt this innovation?					
Check boxes that apply	Dimensions	Please describe:			
	Gaining executive leadership support				
	Measuring performance (e.g. benefits documentation)				
	Improving technology understanding				
	Overcoming financial constraints				
	Addressing legal issues (if applicable) (e.g., liability and intellectual property)				
	Acquiring in-house expertise				
	Resolving conflicts with existing regulations and standards				
	Other challenges				



**15.** What is the estimated cost, effort, and length of time required to deploy the innovation in another organization?

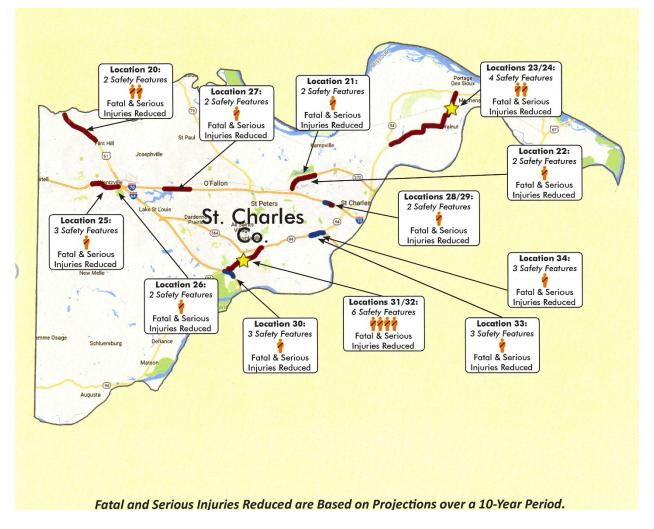
	Please describe:	
Cost		
Level of Effort		
Time		
including ve	ent should the implementation of this innovation require the involvement of third par indors, contractors, and consultants? If so, please describe. List the type of expertis implementation.	

Submit Completed form to: <u>http://aii.transportation.org/Pages/Solicitation-Submit-Nomination.aspx</u>

## Attachment: Safety Improvements Design Build Utilizing Data-Driven Safety Analysis

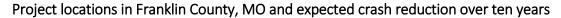
Graphics depicting the expected crash reduction for MoDOT's first implementation of this innovative approach

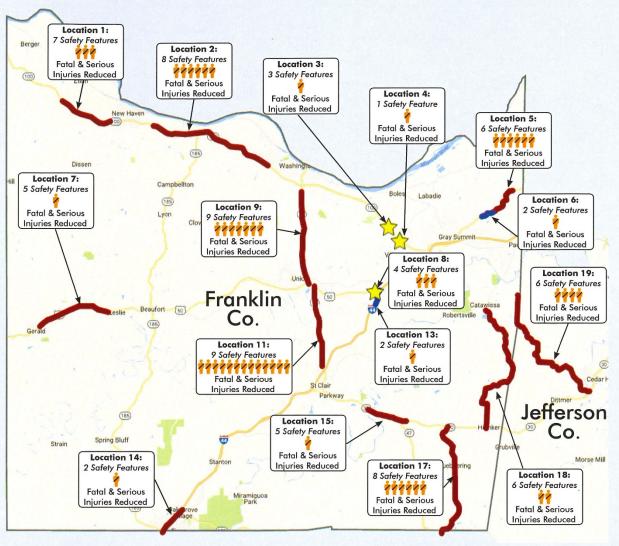
Project locations in St. Charles County, MO and expected crash reduction over ten years





## ATTACHMENT: SAFETY IMPROVEMENTS DESIGN BUILD UTILIZING DATA-DRIVEN SAFETY ANALYSIS





Fatal and Serious Injuries Reduced are Based on Projections over a 10-Year Period.

## Link to video discussing MoDOT's first implementation of this innovative approach

Direct link to video via MoDOT St. Louis District YouTube Channel <a href="https://www.youtube.com/watch?v=094XZUPk6w8">https://www.youtube.com/watch?v=094XZUPk6w8</a>