

HIGHWAY MM: CORRIDOR OF OPPORTUNITY

PROJECT NARRATIVE

Grant Amount Requested: \$25,000,000

Project Type: Capital Project – Highway New Alignment & Railroad Crossing Closure

Applicant Name: Lead Agency – City of Republic, additional agencies: Ozarks Transportation Organization and Missouri Department of Transportation (MoDOT).



PROJECT DESCRIPTION

The Highway MM Corridor of Opportunity project aims to enhance [safety](#), provide for [alternative modes of transportation](#), and add [capacity](#) to a rural route that is rapidly becoming a regional economic hub. Missouri Highway MM connects Interstate 44 with US 360 and US 60. Highway MM is a developing corridor with companies that provide above average wages with manufacturing, construction, and warehouse employers.

The proposed project will provide for [safe community connectivity](#) by [closing three at-grade railroad crossings](#), building a new road alignment with an [overpass over the BNSF railroad](#), providing a [trail for bicycles and pedestrians](#), and turning a two-lane planned arterial into a [five-lane facility](#). The improvement will deliver the ability to manage the truck and commuter traffic along the corridor that connects Interstate 44 to multiple other major highways including US Highway 60 and US 360.

Project Description At A Glance

- Widening of Route MM to 5-lanes from 2-lanes.
- Widening of bridge over US 360 to accommodate 5-lanes and [pedestrian facilities](#).
- Two-lane roundabout on Route MM at Farm Road 160.
- Remove US 60 intersection and relocate away from railroad crossing.
- Build overpass over BNSF Railroad.
- Close 3 BNSF Railroad at-grade crossings.
- [Pedestrian trail](#) between Farm Road 160 and Route 60.
- ADA Sidewalks along corridor.



The project location between I-44 and US 60, as well as the access it provides to existing and future traffic generators, make it subject to **elevated levels of future freight congestion**.

Construction has accelerated along the corridor with new residential properties and commercial facilities such as Cox Health Center (medical center), Amazon STL3 Fulfillment Center (major warehouse employer), and Convoy of Hope World Headquarters (humanitarian aid distribution center). Additional commercial, retail and housing developments are currently planned along the corridor.

The City of Republic is one of the fastest growing regions in the state of Missouri and projects population growth up by approximately 15,000 to 18,000 people by the year 2040 (City of Republic). State Highway MM serves as a primary route to the Springfield-Branson National Airport as well as the Wilson's Creek National Battlefield. It is a major north/south connection for the region connecting Christian County and the west side of the City of Springfield to I-44. The Republic area serves several of the regional outlying communities as both a commercial and employment center. See Retail Service Area Map ([insert link](#)). Because of its unique logistical advantages, the project corridor has experienced rapid and sustained economic development that continues to generate traffic, especially freight traffic along the corridor.



Development Project Figures				
Year	Single-family Homes	Multifamily Dwellings	Commercial GFA (SF)	Industrial GFA (SF)
2019	163	-	128,977	108,425
2020	164	-	19,097	1,652,384
2021	277	110	23,306	490,000
2022	1,307	681	141,100	208,000
2023	471	3,219	342,328	400,000

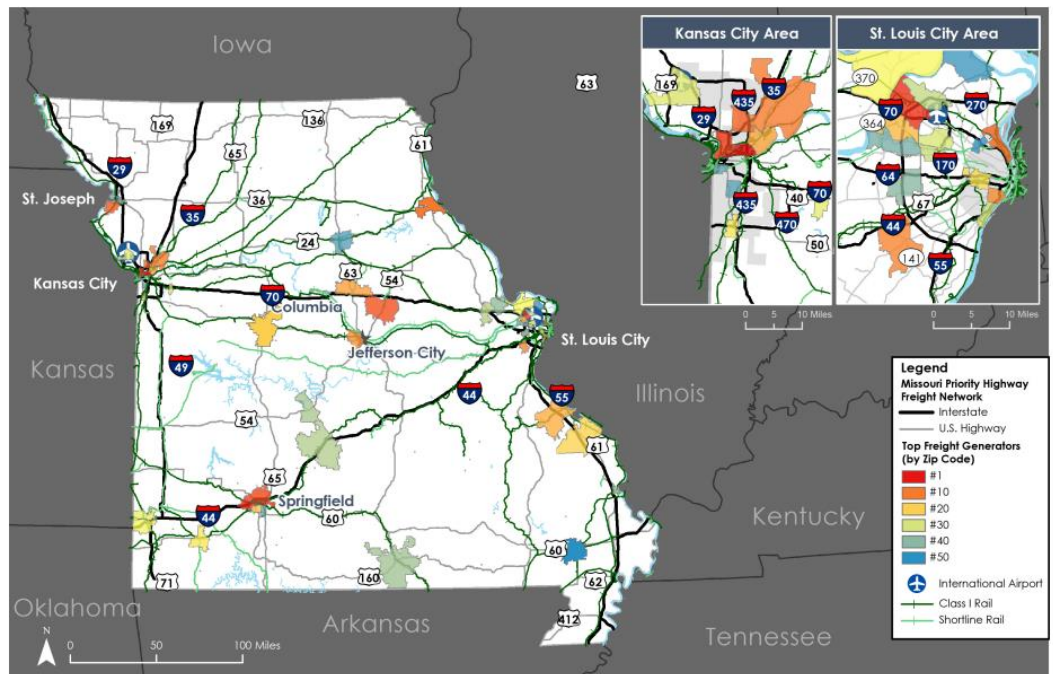
The project has two planned phases. Phase I consists of Highway MM from I-44 through the US 60 Intersection. Phase II is for Highway MM to Highway M from the US 60 Intersection through Highway M. This RAISE application is only for Phase I of the Highway MM Corridor project.

A continuous five-lane corridor of opportunity and multimodal safe connectivity cannot be completed without **RAISE Grant Discretionary funding**.

TRANSPORTATION CHALLENGES

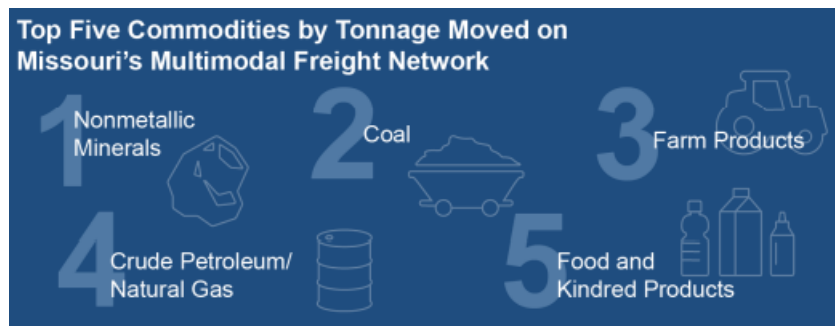


Highway MM connects two major corridors. I-44 has been identified as a critical freight corridor in the State of Missouri. See 2022 MISSOURI State Freight and Rail Plan here. (Insert Link) I-44 is identified as a Tier 1 high priority corridor per the State of Missouri's State Freight and Rail Plan. Highway



MM also connects to US 60. US 60 runs the entire length of Missouri connecting Oklahoma to Kentucky. US 60 is a major east-west route connecting Southwestern Arizona to the Atlantic Ocean in Virginia. These vital corridors transport vital products to the whole nation. Missouri is a national crossroads of highway, rail and pipeline networks. With the logistic challenges faced by the nation during the COVID pandemic, a strong freight infrastructure has become even more vital for transporting necessary supplies.

The project boundaries of Highway MM also contain four at-grade railroad crossings. Trains that move to, from, and through Missouri carry 43% of all freight, when compared to other travel modes. This segment is a busy rail corridor and is maintained by BNSF Railroad.



The planned project addresses both existing and future concerns due to growing traffic volumes within the Route MM Corridor. Route MM is already experiencing low levels of service and when current and future development is modeled the route will quickly be unable to handle the growing demand. Sections of the corridor are already performing at a level of service (LOS) D or



F (Greene County Route MM/ZZ Study). Most of the corridor is a two-lane facility. There is one three-lane section on Highway MM that is expected to exceed capacity between 2027-2032.

The intersection of US 60 & Route MM is currently performing at a LOS D during the AM peak hour and a LOS F during the PM peak hour. This existing intersection will be closed and a new intersection will be constructed as part of the road relocation.

Due to the proximity of the rail crossing at Route MM to US 60, traffic frequently backs onto US 60, when a train is occupying the crossing. This causes reliability issues along the US 60 Corridor. Delays of up to 20 minutes are experienced at the MM/US 60 intersection (reference the US 60 Study).

HOW IT WILL ADDRESS THOSE CHALLENGES

This project will address the following four challenges that will be explained in the Merit Criteria sections:

- Adding capacity to the roadway to manage the freight transports and commuters.
- Removing three at-grade rail crossings.
- Adding ADA sidewalk and pedestrian trail to allow access to the corridor that previously did not exist.
- Removing at-grade separation of MM crossing 600 feet from US 60 resulting in reduced backups on US 60.
- Reducing truck-passenger car conflicts by adding center turn lanes.

PROJECT HISTORY

In 2014, the City of Republic, Missouri made an innovative decision to annex the City of Brookline in order to facilitate the development of the Brookline Business Park. The City of Republic made historic infrastructure investments in water, and sewer totaling \$20 million over a 20 year period. The Springfield, MO utility, City Utilities also believed in the vision to bring quality jobs to the region and invested _____ in electric and natural gas infrastructure. The investment paid off when the development started. In _____ McLane became the first to build a new grocery distribution center. This was followed by Watson Metalcraft and _____ Holsters relocated to the corridor. Carnahan Evans fence company expanded operations in the area and Ashley Furniture added a warehouse facility. These are only a few of the successful businesses on the corridor. What once was open land with really great connections to essential road freight corridors, rail and the airport has become a booming freight corridor with businesses moving in rapidly.



The MM Corridor of Opportunity project became a high priority in 2020 when the Convoy of Hope World Headquarters and STL3 Amazon Fulfilment Center were built along the corridor. In 2021, Amazon constructed approximately \$4 million in transportation improvements to the Route MM corridor by upgrading to a three-lane roadway from Route 360 (James River Freeway) to Farm Road 160. Two public roadway intersections were improved including, Farm Road 156 which service commercial development and Haile Street which serves residences. Finally, traffic signals were added to the northern interchange ramp of US 360, Farm Road 156, and Haile Street. A two-foot shoulder was added along the east side of Route MM on this segment to add a greater clear zone between the large transmission power poles that encroach the roadway clear zone based on roadway speed and AADT. While Amazon made the improvements needed to facilitate the demands of traffic they caused, the remainder of the corridor is still experiencing congestion. Most of the corridor lacks adequate shoulders, turn lanes, and pedestrian connections. There are frequent conflicts with large trucks and passenger vehicles resulting in injury and death.

MoDOT completed a location and corridor study in February 2022. The study provides for the necessary information to identify the needed improvements and ensure that those improvements are adequate in the future. In addition, MoDOT conducted a study on the MM/I-44 Interchange and US/60 Study to analysis how the project as a whole will affect the system. Environmental work is underway, and an EA is anticipated. MoDOT has already begun the consultation process with other agencies and has identified only a few areas to be addressed. These areas are discussed in the Required Approvals section.

CONNECTIONS TO OTHER PROJECTS

The Ozarks Transportation Organization has located other high priority projects that connect directly to this project. Improvements to the interchange at Highway MM and Interstate 44 is currently included the Statewide Transportation Improvement Program for FY 2025. US 60 is the other main connection to Highway MM. US 60 is slated to become a six-lane highway from the relocated MM intersection to US 360. This project is in the Draft Statewide Transportation Improvement Program for FY 2026 and is slated as a high priority project through the area's MPO priority process. I-44 has been identified as one of the highest freight corridor priorities in the state. The section of I-44 that connects to Highway MM through US 65 has been identified as a high priority safety and capacity project. Sections of I-44 have been programmed in the STIP including the Highway MM Interchange at I-44. An Infrastructure for Rebuilding American (INFRA) Discretionary Grant application is planned for 2022 for I-44. Overall, this project helps complete a regional connectivity piece that will benefit the whole region.



STATEMENT OF WORK

Project	Budgetary Task	RAISE \$25 Million	Other Federal	Local	Total Cost
Route MM	Bridge	\$9,617,005			\$9,617,005
I-44 to US 60	Grading and Drainage	\$4,521,671	\$9,005,759	\$1,849,777	\$15,377,207
	Base and Surface	\$3,791,249	\$2,169,694	\$1,250,000	\$7,210,943
	Trail/Bike/Pedestrian Improvements	\$1,271,000			\$1,271,000
	Miscellaneous	\$1,895,075	\$2,040,502	\$3,389,919	\$7,325,496
	Estimated Contract Total	\$21,096,000	\$13,215,955	\$6,489,696	\$40,801,651
	Contingency/Inflation	\$848,000	\$571,732	\$457,000	\$1,876,732
	Total Contract	\$21,944,000	\$13,787,687	\$6,946,696	\$42,678,383
	PE	\$1,000,000	\$1,332,143	\$2,058,338	\$4,390,481
	CE	\$500,000	\$1,745,279	\$1,055,029	\$3,300,308
	ROW	\$562,000	\$2,703,390	\$1,530,888	\$4,796,278
	Utilities	\$994,000	\$1,965,765		\$2,959,765
	R/W Incidentals		\$208,000		\$208,000
	Rounded Totals	\$25,000,000	\$21,742,264	\$11,590,951	\$58,333,215

***Insert Design status chart (waiting for information from MoDOT)**

Describes in detail the project to be constructed.

Route MM is a 3.95-mile north/south minor arterial with two 12' wide lanes that connects to US 60 at its south end to I-44 at its north end. This route accommodates approximately 9,015 vehicle miles per day (2019) and was originally built in 1921. A signalized at-grade railroad crossing with BNSF rail and Route MM is located approximately 600' from the intersection of US 60. The existing intersection between route MM and Farm Road 160 is 1.2 miles north of US 60.

Project Construction Details

The proposed facility has a functional classification of arterial with a design average daily (ADT) traffic of 20,620. The design criteria will be used for the corridor:

- Design ADT 22,720-30,620
- Operational (Posted) Speed – 45 miles per hour
- Number of lanes – 5-lanes
- Roadbed Width – 82'
- Right-of-Way – 130' width, PCA control
- Includes curb and gutter
- Includes storm sewer facilities
- Includes ADA sidewalk facilities
- Includes 10-foot-wide pedestrian trail from US 60 to Farm Road 160.



Highway MM Corridor of Opportunity runs from the Highway MM/I-44 Interchange through the US 60 Intersection. This project adds lane capacity (two-lanes to five-lanes, though the section from US 360 to Farm Road 160 is currently 3-lanes due to Amazon's safety investment) and adds ADA sidewalk accommodation along the corridor. The roadway is currently posted at 55 mph and has been approved to reduced to 45-mph. There is currently a diamond interchange with James River Freeway. Existing access is provided on both sides of the corridor to the corridor businesses. Although any new access will be restricted to signalized intersections.

Part of the project will realign Highway MM from the current US 60/MM Intersection. It constructs a five-lane cross-section between US 60 and Farm Road 160. Constructs a new signalized intersection at US 60 and Route MM. It also permanently closes and removes three at-grade railroad crossings. A new overpass over the BNSF railroad is included with bicycle and pedestrian access. A 10-foot trail is proposed along the new alignment to give community connectivity and multimodal travel options. It includes a two-lane roundabout



on at Farm Road 160 in accommodate the anticipated growth.



PROJECT LOCATION

The City of Republic is in Greene County, MO and has a population of 18,750 per the 2020 decennial census. The proposed projects is located on the rural segment of Highway MM between Interstate 44 and US 60. It is considered a rural route per the 2010 census (per NOFO guidance). The project is located three miles from a major population center of Springfield, MO and connects the City of Willard commuters to the City of Republic community. The City of Republic serves as an urban hub to small urban communities that surround the City of Republic including, the cities of Willard, Clever, Billings, and Aurora. US 60 is a 2,655-mile (in total) east/west route that runs 340.8 miles from the Missouri-Kansas border at Seneca to the Missouri-Illinois border in Mississippi County. The project is in the Missouri Department of Transportations (MoDOT) Southwest District, the Ozarks Transportation Organization (OTO) Metropolitan Planning Organization planning area, and in the city limits of the City of Republic.

Table showing geographic location

Project Segment	Rural/Urban	Latitude	Longitude	Project Length
Section 1	Rural	37° 11' 20"	93° 25' 24"	1.2730 Miles
Section 2	Rural	37° 10' 53.66" N	93° 25' 25.49" W @ northern limit	1.3373 Miles



		@ northern limit (Carnahan St.)		(FR 160 to Carnahan St.)
Section 3	Rural	37° 09' 41.88" N @ northern limit (FR 160)	93° 25' 27.47" W @ northern limit	0.8975 Miles (US 60 to FR 160)

***Insert PDF of Project Map**

Area of Persistent Poverty

The City of Republic is located in Greene County. Greene County is identified as an Area of Persistent Poverty. See Appendix G – 2020 Low Income Areas.

Historically Disadvantaged Area

The project is not in a historically disadvantaged community. Jobs created in this corridor provide opportunities for the disadvantaged communities in census tracks, [REDACTED]. (attach census track maps for historically disadvantaged communities to census).

C. Census -designated urbanized area in which the project is located

The project is located outside the Springfield Missouri Urbanized area and is designated as rural per the 2010 Census.

Federal Designated Community Development Zones

ect is not in a federally designated community development zone.



GRANT FUNDS, SOURCES AND USES OF ALL PROJECT FUNDING

RAISE Funding is critical to successfully delivery the Highway MM Corridor project. There is currently no identified funding for the segment between US 360 and Farm Road 160. This will result in a bottleneck of freight traffic. The match contributions represent the maximum match that MoDOT is able to contribute. There is local match on a state system that demonstrates the need for this project.

The total estimated cost of the project is \$58,333,215. The USDOT RAISE Grant Administration will contribute an estimated \$25,000,000 or 43% of the overall project cost. Any additional costs beyond that would be provided by the Missouri Department of Transportation, City of Republic, and other federal sources. These are estimates only and cover work that will be required regardless of other design that MoDOT, the City of Republic, and USDOT implement. All funds



in the project will be spent in a rural area. The Project Funding Table below shows the expected contributions towards the project.

Evidence of these pledged contributions are provided in the Appendix. All non-federal funds are immediately available and are not subject to a fixed time period.

Non-Federal	
Greene County	\$ 1.500 Million
City of Republic	\$ 1.527 Million
State of Missouri	\$ 8.564 Million
Total Non-Federal	\$11.591 Million

MoDOT's portion of the funding for the project is \$8,563,951 of state funds, generated from a non-federal funding source. The state funds are derived from Missouri user fees and include fuel taxes, registration and licensing fees, and motor vehicle sales taxes. The City of Republic's portion of the project funding is \$1,527,000 generated from a non-federal funding source from the city's transportation tax revenue (Innovative Financing).

Other Federal Funds

Federal	
Surface Transportation Block Grant (STBG)	\$19,886 Million
Federal Safety Funds	\$.919 Million
Open Container Penalty	\$.564 Million
Transportation Alternative Program (TAP)	\$.374 Million
RAISE	\$25.000 Million
Total Federal	\$46,743 Million

The project is utilizing \$564,000 in Open Container Funding, \$374,000 in Transportation Alternatives Program (TAP), and \$919,000 in Safety Funds. Approximately \$19,886,000 of the funds will be Federal Surface Transportation Block Grant Funds.

Dependency of Other Funding Sources.

Part of the project is programmed in the FY 2024 & FY 2025 Statewide Transportation Improvement Program (STIP) to utilize TAP, Open Container and Advanced Construction (Surface Transportation Block Grant) funds. These funds are part of the States allocated funding and has been prioritized for the project in the STIP as available funding sources for the project. There is no commitment to spend RAISE Grant dollars by a specific date, other than that agreed upon by the USDOT, MoDOT, and the City of Republic pending successful award of the RAISE Grant.

