2019 PRIORITY FREIGHT PROJECTS ST. LOUIS REGIONAL FREIGHTWAY

The St. Louis region is setting records and gaining national and international attention as a freight leader for our strong global and fast-growing market. Our world-class multimodal transportation system is not only ideally positioned at the nexus of the U.S. freight network but is also located in the center of the nation's agricultural heartland. Our tremendous logistical advantages are attracting more and more manufacturers and logistics industry companies who compete in domestic and international markets, and they have paved the way for a 15-mile stretch of the Mississippi River flowing through the St. Louis region to gain recognition as the Ag Coast of America. Maintaining those logistical advantages is a key objective of the St. Louis Regional Freightway.

With support from the East-West Gateway Council of Governments (EWGCOG) Board of Directors, leaders in manufacturing, logistics, industrial real estate, all modes of transportation, economic development and both the Illinois and Missouri Departments of Transportation (DOT), the Freightway has helped garner national recognition for the St. Louis region as a premier freight hub. We continue to build public-private partnerships to maximize infrastructure funding opportunities for the region's priority infrastructure projects.

Those infrastructure priorities are updated every year by the Freight Development and Needs Analysis Committee, chaired by Mike McCarthy, president of the Terminal Railroad Association of St. Louis. Project selection continues to be based on the following criteria:

- Economic ImpactMultimodal ImpactSafety and Security in Travel

Last fall, the EWGCOG Board of Directors endorsed the Freightway's multimodal project list, signifying the region's widespread support of industry leaders working hand-in-hand with both IDOT and MoDOT to set infrastructure priorities. This acclaimed model allows private sector representatives to help public sector leaders understand how freight travels through the region's infrastructure and how efficient and reliable transportation impacts on-time delivery costs.

The 2019 list includes projects that have advanced to construction, projects that were recently submitted for both federal and state grant funding, and recently added projects. Projects advancing to construction include the Merchants Rail Bridge Replacement over the Mississippi River (Freightway's #1 priority), J.S. McDonnell Connector Access Improvements project, North Park Access Improvements project, Earth City Access Improvements projects, and components of the I-270 Improvements from I-70 to Illinois Route 111 project.

The Freight Development Committee will continue to identify infrastructure funding opportunities through public-private partnerships that can be leveraged to advance additional priority projects. The committee will also identify high impact-low cost projects that help shippers and carriers improve service, making it possible to better predict on-time performance with greater accuracy and reducing transportation costs.

By keeping our focus on infrastructure improvements that can help ensure our freight network can accommodate future growth, we will be better positioned to capture a share of the 40 percent increase in national freight volume expected over the next 30 years.

Mary C. Lamie, P.E.

May C. Kamie

St. Louis Regional Freightway

Executive Director

Mike Me forthy

Freight Development and Needs Analysis Chairman Terminal Railroad Association of St. Louis President



2019 PRIORITY FREIGHT PROJECTS ST LOUIS REGIONAL FREIGHTWAY



The St. Louis Regional Freightway plays a critical role in the growth of regional manufacturing and distribution sections within the bi-state region including seven counties in Missouri and Illinois and the City of St. Louis.

The Freight Development and Needs Analysis Committee updated the project list for 2019.

Advanced to Construction

- Merchants Bridge (TRRA) Replacement over the Mississippi River (MO-IL)*
- I-270 Improvements from I-70 (MO) to Illinois Route 111 (MO-IL)* (Partial)
- J.S. McDonnell Connector Access Improvements (MO)
- North Park Access Improvements (MO)
- Earth City Access Improvements (MO)

Partially Programmed for Construction

- North Riverfront Commerce Corridor Improvements (MO)*
- Illinois Route 3 Access Improvements (IL)*
- Union Pacific Railroad Lenox Tower Replacement and Track Realignment (IL)
- St. Louis Lambert International Airport North Cargo Improvements (MO)
- America's Central Port Improvements (IL)

Concept Development or Planning

- I-270 Improvements from I-70 (MO) to Illinois Route 111 (MO-IL)* (Partial)
- I-70 Improvements from Warrenton to Stan Musial Veterans Memorial Bridge (MO)
- MidAmerica St. Louis Airport Distribution Improvements (IL)
- I-64 Improvements from Green Mount Road to Illinois Route 158 (Air Mobility Drive) (IL)
- Kaskaskia Regional Port District Improvements (IL)
- I-255 / Davis Street Ferry Road Interchange (IL)
- I-255 / Fish Lake (Ramsey Road) Interchange (IL)
- St. Louis Lambert International Airport Access Improvements (MO)
- Mississippi River Port Development Projects (MO)
- Illinois Route 158 (Air Mobility Drive) Expansion from Route 161 to Route 177 (IL)

Merchants Bridge (TRRA) Replacement over the Mississippi River (MO-IL)

Advanced to Construction

Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

TRRA and its shareholders decided to fund the Merchants Bridge replacement without federal grant assistance, recognizing that this critical bridge will go out of service in less then 10 years without action. Construction is anticipated to begin in mid-2018 and is expected to be complete in 2022.

Location: Mississippi River, Mile Marker 183

Estimated Cost: \$172 million

Owner: Terminal Railroad Association of St. Louis (TRRA)

Contact: Mike McCarthy, TRRA President, (314) 539-4704

The Merchants Bridge over the Mississippi River in America's heartland impacts national freight movement, the future of freight, and the future of farmers, manufacturers, and distributors who depend on it.

The Merchants Bridge serving the St. Louis region:

- Links America's eastern and western freight rail networks
- Carries more than 40 million gross tons annually
- Serves six Class I Railroads and Amtrak

The St. Louis region is the:

- 2nd largest freight rail interchange location in the nation
- 3rd largest freight rail interchange location by tonnage

Without funding, the Merchants Rail Bridge could be taken out of service within ten years. Meanwhile, in its current condition with restricted speed, single-track capacity, and rising maintenance costs, the bridge will continue to cause delays in the national multimodal freight rail and passenger service networks.

The nearly 130-year-old Merchants Rail Bridge spans the Mississippi River between St. Louis, Missouri and Venice, Illinois and is owned by the Terminal Railroad Association of St. Louis (TRRA). The Merchants Rail Bridge has rail connections to Amtrak's St. Louis Station and to six Class I railroads servicing BNSF Railway, CSX Transportation, Canadian National, Kansas City Southern, Norfolk Southern, and Union Pacific. The Class I railroads serve the St. Louis region's manufacturing and logistics companies that are part of an interdependent supply chain requiring access to markets on both sides of the Mississippi River, across the United States, and internationally, including: U.S. Steel, Conoco Phillips, Cargill, Archer Daniels Midland (ADM) Company, World Wide Technologies, General Motors, Hershey's, Unilever, Metro East Industries, Bunge, American Milling, Schneider Trucking, SCF Lewis & Clark Marine, FedEx, Boeing, and Kinder Morgan.

This project is the #1 priority for the St. Louis Regional Freightway.

Merchants Bridge (TRRA) Replacement over the Mississippi River (MO-IL)

Advanced to Construction

Owning the sixth busiest Mississippi River rail bridge in the country serving the nation's third largest rail hub, TRRA interfaces with the nation's 3rd and 8th largest inland port systems, the northern most year-round ice-free Mississippi River port providing services to America's Central Port (with container-on-barge capacity), Kaskaskia Regional Port District, and the St. Louis Port Authority. The Merchants Rail Bridge is in close proximity to four interstate freight corridors, I-70, I-64, I-44, and I-55, providing national north-south and east-west access. With improvements to the bridge, an estimated 185,676 truckloads could be diverted from these highways to rail, reducing vehicle miles traveled by trucks by 74 million miles and saving \$63 million in roadway damage over twenty years.

Illinois and Missouri's impact on the national freight movement (Association of American Railroads, 2012):

- Illinois ranked #1 and Missouri ranked #3 in rail cars carried
- Illinois ranked #3 and Missouri ranked #4 in rail tons carried
- Illinois ranked #2 and Missouri ranked #6 in freight rail employment

Economic Impact: TRRA spends an average of \$80.9 million per year in the St. Louis metropolitan statistical area for operation support, infrastructure repair and maintenance, and employee wages which support nearly \$237 million in overall economic activity for the region. With implementation of the project, TRRA estimates that the project impact will increase to generate more than \$456 million in local economic activity over a 20-year period. Construction of the project will also support nearly 1,100 jobs, including 150 direct jobs.

Current Restrictions: Currently, the Merchants Rail Bridge has speed, clearance, and load restrictions. Load restrictions prevent the crossing of two trains simultaneously, limiting the bridge to one track at all times. Since trains cannot pass on the bridge, they come to a complete stop on or near the approach grades. Load restrictions do not allow the bridge to accommodate modern loads, which impose costs of delay, braking, and startup.

Project Details: The Merchants Rail Bridge replacement project includes removal and replacement of the three river-span trusses, seismically retrofitting the existing river piers, and improving the east approach. The new double track structure will provide additional capacity for increased freight and passenger rail. The double track will also provide more reliable movements and reduce grade crossing delays for motorists and emergency vehicles. All of these benefits will help reduce stress on the National Highway Freight Network that is anticipated to grow by 40 percent over the next three decades.

The Merchants Rail Bridge replacement is a model for public-private partnerships and the St. Louis Regional Freightway contributed over 80 letters of support for the project. TRRA and its shareholders decided to fund the Merchants Bridge replacement without federal grant assistance, recognizing the adverse impact a non-functional bridge would have on the regional and national economy without action. In July 2018, TRRA awarded the construction contract to Walsh Construction Company and the project is anticipated to be complete in 2022.

"In terms of the Merchants Bridge, it's one of the main east-west rail corridors in the region. It's an absolute vital artery in order to maintain efficient rail movement across the Mississippi River."

- Ryan Krull, Commercial Manager, Watco Terminal & Port Services



I-270 Improvements from I-70 (MO) to Illinois Route 111 (MO-IL)

Advanced to Construction / Concept Development or Planning

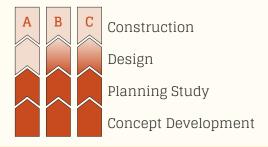
Project Location



Project Aerial



Project Status



Project Funding

(A) \$155 million is programmed in the STIP for improvements.

(B) Engineering design is in process. Final design and construction is funded in the IDOT Multi-Year Plan.

(C) Preliminary engineering for this segment is included in the IDOT Multi-Year Plan. Construction is funded for the IL-111 interchange with \$13.5 million in IDOT Competitive Freight Program funds.

Location: St. Louis County, Missouri and Madison County, Illinois

Estimated Cost: \$1.2 billion

Owner: Illinois Department of Transportation (IDOT)

Missouri Department of Transportation (MoDOT)

Contact: Jeff Keirn, IDOT Region 5 Engineer, (618) 346-3110 Tom Blair, MoDOT District Engineer, (314) 453-1800

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: economic impact, multimodal impact, efficiency impact, and safety and security in travel. Based on the criteria, the following project addresses regional freight needs and is considered one of the **highest priorities** for the region.

Project Need: The St. Louis region is home to national and international manufacturers and logistics businesses that are part of the global supply chain. The I-270 outer belt is one of the most traveled freight corridors in the St. Louis region and is a link to the national freight network with connections to I-70, I-64, I-44, and I-55. Northern segments of I-270 in St. Louis County and Madison County were identified as severe freight bottlenecks in the 2016 East-West Gateway Regional Congestion Report. The I-270 outer belt consists of a minimum of six lanes with the exception of a four-lane section of I-270 from Lilac Avenue in Missouri to Illinois Route 111 in Illinois.

Project Impact: The 22-mile I-270 corridor from I-70 to Illinois Route 111 is one of the most important regional freight corridors. In Missouri, it serves major freight generators, such as the Hazelwood Logistics Center, within and near St. Louis Lambert International Airport. In Illinois, I-270 feeds directly into the Lakeview Commerce Center and Gateway Commerce Center, two of the region's largest and fastest growing logistics parks. The I-270 corridor also offers easy access to major destinations in Illinois including the Conoco Phillips Refinery, America's Central Port, and Terminal Railroad Association Madison Yard.

With freight forecasted to grow heavily in the next few decades, traffic around these freight generators and users will continue to increase. The ability of this stretch of interstate to absorb this traffic will play a major role in the speed, efficiency, and cost to move freight through

I-270 Improvements from I-70 (MO) to Illinois Route 111 (MO-IL)

Advanced to Construction / Concept Development or Planning

the region. In addition, a portion of the corridor is in the top five percent of all locations in Illinois where a higher rate of crashes occur compared to roadways with the same physical characteristics. The following proposed improvements seek to improve safety, enhance efficiency, and meet future freight demands to positively impact multimodal access and economic development. Construction for the I-270 corridor is anticipated to occur over a 17-year time frame with up to 12 individual construction contracts. This construction schedule will create supply chain disruptions that will have significant impacts on the network of supplies and industry competitiveness.

Project Description (A) Improvements from I-70 to Mississippi River (MO): This project includes major modernization improvements to relieve growing traffic congestion at a severe freight bottleneck, enhance safety and resiliency, and improve mobility for freight and passengers. Improvements will include reconstruction of multiple interchanges, improved connections with and relocation of selected segments of the outer road, and the addition of travel lanes in the most heavily-traveled segments. A significant component of the improvements includes expanding I-270 from four lanes to six lanes along the 1.5-mile corridor from Lilac Avenue to the Mississippi River. The project (and Project C) would ensure that the I-270 outer belt in the St. Louis region would have a minimum of six lanes to better accommodate future freight flows and reduce bottlenecks. The improvements would also support continued redevelopment of a historically low-income and economically disadvantaged part of the state. Estimated cost for the total project is approximately \$700 million. Over \$155 million has been allocated for improvements in the Statewide Transportation Improvement Program (STIP).

Project Description (B) Mississippi River Chain of Rocks Bridge Replacement (MO-IL): This project includes replacement of the existing two structures, constructed in 1966, over the Mississippi River and construction of a new structure. The Chain of Rocks Bridge has experienced rising maintenance costs due to the age of the structure, increasing traffic volumes, and safety issues associated with narrow shoulders. In particular, there has been a significant increase in traffic from 19,800 vehicles per day in 1975 to over 51,500 vehicles per day. At four lanes wide, the current bridge creates a severe freight bottleneck and is not equipped to handle the large freight flow increases forecasted for the region. Engineering design is in process. \$223.3 million is included in the IDOT Multi-Year Plan for design and construction with \$2 million of the total cost allocated for design in FY19. IDOT is the lead agency for the project with MoDOT sharing equally in the bridge replacement and engineering costs.

Project Description (C) Widening from Mississippi River to Illinois Route 111 (IL): This project includes increasing the capacity of I-270 by expanding from four lanes to six lanes along the 5.3-mile corridor from the Mississippi River to Illinois Route 111. The project (and Project A) would ensure that the I-270 outer belt in the St. Louis region would have a minimum of six lanes to better accommodate future freight flows and reduce a severe freight bottleneck. Estimated cost for the total project is approximately \$250 million. The IDOT Multi-Year Plan includes funding for preliminary engineering in FY18-FY23. Construction is not funded. The I-270 and Illinois Route 111 interchange has become a separate component to accelerate implementation of the overall project. Construction of the Illinois Route 111 interchange is funded with assistance of \$13.6 million (as of June 2018) from the IDOT Competitive Freight Program.



ST LOUIS REGIONAL FREIGHTWAY

I-70 Improvements from Warrenton to Stan Musial Veterans Memorial Bridge (MO)

Concept Development or Planning

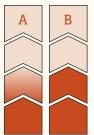
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

(A) The Envision I-70 planning study is currently ongoing. No funding sources or partnership have been identified beyond the planning study.

(B) \$3.4 million is programmed in the STIP for improvements.

Location: Warren, St. Charles, St. Louis Counties, and City of St. Louis

Estimated Cost: \$650 million

Owner: Missouri Department of Transportation (MoDOT)

Contact: Tom Blair, MoDOT District Engineer, (314) 453-1800

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: economic impact, multimodal impact, efficiency impact, and safety and security in travel. Based on the criteria, the following project addresses regional freight needs and is considered one of the highest priorities for the region.

Project Need: The I-70 corridor is a transcontinental highway stretching from Pennsylvania to Utah. In the St. Louis region, I-70 is an important link for freight due to the proximity of major corporations, industrial areas, hospitals, universities, and St. Louis Lambert International Airport. A majority of the 60-mile corridor through Missouri also experiences moderate to heavy congestion during peak hours.

The I-70 / I-64 interchange in St. Charles County was identified as one of the greatest freight bottlenecks in the St. Louis region in the 2016 *East-West Gateway Regional Congestion Report*. Additionally, the 20-mile section west of the I-64 interchange, the segment from Wentzville to Warrenton, experienced an estimated user delay cost of \$12.7 million in 2016. On a per-mile basis, this cost is over three times greater than the user delay cost for the remainder of rural I-70 combined (over 170 miles).

Project Impact: The project will enhance east-west freight mobility by providing more capacity where it is needed most, reducing congestion and associated vehicle crashes. Several of the region's highest activity industrial parks are located along this stretch of I-70 including a new 1.1 million square feet General Motors 3PL Facility in the Wentzville Logistics Center. Overall, improvement recommendations from the Envision I-70 planning study, discussed in further detail below, will provide a broad framework and implementation strategies to meet the desired future mobility and accessibility needs of this critical regional transportation link. Based on findings from the study, the project would address specific safety and congestion issues including interchange, bridge, and pavement improvements.

I-70 Improvements from Warrenton to Stan Musial Veterans Memorial Bridge (MO)

Concept Development or Planning

Project Description (A) Improvements from Wentzville to Stan Musial Veterans Memorial Bridge: A Planning and Environmental Linkages study for the I-70 corridor from the I-64 interchange in Wentzville, Missouri to the Stan Musial Veterans Memorial Bridge was included as a recommendation in the region's 2045 Long-Range Transportation Plan. MoDOT, in collaboration with regional planning partners such as Metro and East-West Gateway Council of Governments, initiated the Envision I-70 study in 2017 to advance this effort. The study focused on developing a comprehensive multimodal vision that incorporates sustainable mobility, economic competitiveness, freight and port distribution needs, and the relationships between community character and transportation. Final recommendations from the study are currently being developed. Over \$70 million in bridge,

interchange, and pavement improvements are currently included in the Statewide Transportation Improvement Plan (STIP) at various locations along the corridor. Estimated cost for the total project is approximately \$500 million. Construction is not funded.

Project Description (B) Expansion from Wentzville to Warrenton:

This project includes reconstruction and expansion of the existing four-lane interstate to six lanes for a 20-mile segment from Wentzville to Warrenton. The project will improve the safety, reliability, and capacity of I-70 for freight and passenger vehicles. The additional travel lanes would ensure that the I-70 corridor towards downtown St. Louis would have a minimum of six lanes to better accommodate future freight flows and improve a critical bottleneck at the I-64 interchange. Estimated cost for the total project is \$150 million. Approximately \$3.4 million has been allocated for associated improvements in the Statewide Transportation Improvement Program (STIP).

"When we look at the St. Louis region and the infrastructure we have here, it's vital to our operators. We're excited about the growth in St. Louis and the investment being made in infrastructure." - Matthew Freix, Vice President, DNJ Intermodal Services

"I can't think of any place in the country whose history is more closely linked with trade than St. Louis. That's what we're talking about - trade. It's about commerce. It's about expanding economic opportunity." - Gregory Nadeau, Federal Highway Administration



Union Pacific Railroad Lenox Tower Replacement and Track Realignment (IL)

Partially Programmed for Construction

Project Location



Project Aerial



Project Status



Project Funding

Union Pacific is partnering with IDOT to help advance portions of the project. Approximately \$10.0 million (track realignment) of the \$14.8 million total project cost remains unfunded.

Location: Mitchell, Illinois

Estimated Cost: \$14.8 million

Owner: Union Pacific Railroad (UPPR)

Contact: Paul Hinton, Service Unit Superintendent, (314) 331-0663

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: Built in 1924, the existing Lenox Tower at the junction of Union Pacific rail corridors in Mitchell, Illinois controls a major railroad junction where five of the region's railroads operate services: Union Pacific, BNSF Railway, Kansas City Southern, Norfolk Southern, and Alton & Southern. An average of 66 trains pass through the interlocking junction daily. The junction includes a complex system of signals and switches controlling freight and passenger rail routing. The existing tower and its associated switching equipment are obsolete and unable to accommodate the growth in rail traffic.

Project Description: Realigning the trackage through the Lenox Tower interlocking will increase freight train speed limits from the 10-30 mph range to the 40-60 mph range through the junction. Passenger train speeds could also increase from the 40-60 mph range to nearly 80 mph. Increased velocity will reduce the existing bottleneck and increase the capacity and efficiency of the St. Louis region's rail network. In 2018, the Lenox Tower will be removed and dispatching control will be automated and incorporated into Union Pacific centralized dispatching in Omaha, Nebraska (A). This coordination would optimize local rail traffic and allow the railroads to increase velocity through the St. Louis terminal, which creates a competitive advantage with other rail interchange locations such as Chicago. Approximately \$10 million in track realignment work remains unfunded (B).

Project Impact: This modernization project would reduce freight train delays by 43 hours a week for combined freight, or more than 10 hours per day. The increase in velocity would reduce delays at highway-



2019 PRIORITY FREIGHT PROJECT ST LOUIS REGIONAL FREIGHTWAY

Union Pacific Railroad Lenox Tower Replacement and Track Realignment (IL)

Partially Programmed for Construction

rail grade crossings due to passing trains, thereby decreasing traffic delays for nearby communities and reducing emissions from idling vehicles. The project would also consolidate six operator positions, eliminate tower facility expenses, and lower track maintenance. Overall, the project will enable freight, including four Class I rail carriers, and passenger trains to travel through the region more safely and efficiently while allowing rail traffic to be better integrated into system-wide patterns.

Left (Bottom): An average of 66 trains pass through the Lenox Tower interlock, which is located at the intersection of four railroads: Union Pacific, Kansas City Southern, Norfolk Southern, and Alton & Southern. Movements are restricted by diverging turnouts and a specialty track switch known as a single slip switch.

Right (Top): The Lenox Tower's interior houses the operator's office and the interlocking equipment., which consists of the interlocking machine and track model board. The Lenox Tower is one of the last three manually operated interlocking plants in the St. Louis Area in Illinois.

Right (Bottom): The 80-lever G pistol-grip electric interlocking machine is housed in a large wooden console. A track model board above the console shows the 80 switch location on each of the railroad tracks.

"Velocity, the ability to move equipment efficiently on a railroad is vitally important. Time is money. The more efficient a railroad can be because of infrastructure, the higher they velocity they can have, and the more efficient and cost competitive they can be."

- Rick Ortyl, Vice President, Metro East Industries







St. Louis Lambert International Airport North Cargo Improvements (MO)

Partially Programmed for Construction

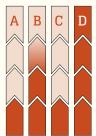
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

(B) St. Louis County has programmed \$1.13 million for design in 2022, but construction is currently unfunded.

(D) Construction of the \$6.1 million project was completed in 2017.

Remaining projects are currently unfunded. No funding sources or partnerships have been identified.

Location: St. Louis County, Missouri

Estimated Cost: \$20.7 million

Owner: St. Louis Lambert International Airport

Contact: Jerry Beckmann, Airport Deputy Director, (314) 551-5034

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: St. Louis Lambert International Airport (STL) in St. Louis County is the largest and most utilized airport in Missouri. Positioned within Foreign Trade Zone 102, it is an attractive destination for logistics businesses due to its multimodal transportation infrastructure combined with available and accessible land for business growth. Current air cargo facilities are conveniently located on both sides of the primary parallel runways and are designed to expedite the flow of freight and handle both current and next-generation air cargo aircraft.

Project Impact: St. Louis Lambert International Airport is moving forward with an international air cargo facility, which includes construction of a new terminal with ramp for freighter aircraft. The airport is also pursuing several infrastructure projects to improve service delivery for air cargo facilities including FedEx, UPS, and Forward Air. The airport continues to attract new businesses to increase its revenue base and utilize 1,000 acres of land for industrial development. These efforts include a development agreement with Bi-National Air Cargo to develop 60 acres of airport property referred to as the Northern Tract. The airport is also in the final stage of approval to become a USDA port of embarkation to allow live animal charters to depart from St. Louis. In addition to the airport, several industrial areas are located nearby including Aviator Business Park, Hazelwood Logistics Center, and Park 370 Business Center. The following projects further these goals to provide safe, efficient, and multimodal access near the St. Louis Lambert International Airport and industrial areas along with potential economic benefits for the region.

St. Louis Lambert International Airport North Cargo Improvements (MO)

Partially Programmed for Construction

Project Description (A) Norfolk Southern Railroad Spur on Northern Tract: This project includes constructing a 1,200-foot long railroad spur from Norfolk Southern mainline track to connect to the Northern Tract of the airport. The spur would support the 60-acre logistics and air cargo center under development at this site. Estimated cost is approximately \$2.5 million.

Project Description (B) Banshee Road Reconstruction: This project includes rebuilding Banshee Road from J.S. McDonnell Boulevard to Lindbergh Boulevard, including a structure over Coldwater Creek, in order to accommodate heavy commercial truck traffic. The three-lane roadway currently has issues with drainage and roadway geometry that make it unconducive to major freight flows. The project would support the Northern Tract air cargo center. Estimated cost is approximately \$9.1 million. St. Louis County has programmed approximately \$1.13 million for design in 2022. Construction is currently unfunded.

Project Description (C) McDonnell Boulevard / Airport Road Intersection Reconstruction: This project includes reconstruction of the intersection of McDonnell Boulevard and Airport Road. The intersection plays a critical role in freight movement for the St. Louis Air Cargo Facility currently used by FedEx, UPS, and Forward Air. The existing intersection has a complex series of turning movements within a confined area and experiences numerous crashes. The project would improve roadway geometry, eliminate difficult turning movements, and meet updated design standards in order to accommodate current and future users. St. Louis County manages this facility and no improvements are currently programmed for the intersection. Estimated cost is approximately \$3.0 million.

Project Description (D) Taxiway Victor Connector to

Cargo Ramp: This project included construction of a full-strength concrete taxiway capable of supporting the largest jets. It provides common-use access to Trans States Airlines, Airport Terminal Services ramps, and the Bi-National Air Cargo ramp. MoDOT partnered with the St. Louis Lambert International Airport to finance the Taxiway Victor Connector project and issued a grant to fund construction. Construction of the \$6.1 million project was completed in 2017.

"From a shipping point of view, if you are only going to have one spot, the St. Louis region is it. From an infrastructure point of view, our location in Hazelwood is close to all the highways and the airport. We have the ability to do some very late shipping by air if needed. There's also a very large USPS facility."

- Tod Yazdi, Principal, TAGG Logistics



America's Central Port Improvements (IL)

Partially Programmed for Construction

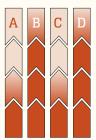
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

(B) Construction is funded with assistance of \$1.09 million in IDOT Competitive Freight Program funds.

(D) Construction is funded with assistance of \$1.59 million in IDOT Competitive Freight Program funds.

Remaining projects are currently unfunded. No funding sources or partnerships have been identified.

Location: Granite City, Illinois

Estimated Cost: \$22.5 million

Owner: America's Central Port

Contact: Bill Stahlman, Director of Engineering, (618) 452-8450

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: America's Central Port in Granite City, Illinois is at the center of the multimodal freight transportation system in the United States with direct access to three major modes of transportation: river, rail, and road. The Port offers over 1.7 million square feet of rail-served warehouse space located in secured industrial park settings within Foreign Trade Zone 31.

Project Impact: The Port recently opened the new Madison Harbor expansion in 2016. The new harbor offers the northern-most lock-free and ice-free access to the Gulf of Mexico on the Mississippi River. It also offers additional opportunities for container-on-barge industry. America's Central Port is seeking several improvements to enhance the new expansion.

These improvements also support recent alliances with the Port of New Orleans and the Port of Plaquemines, both located in Louisiana along the Gulf of Mexico, to promote international and inland trade routes along the Mississippi River. This location is part of America's Agriculture Coast or "Ag Coast" that supports a 15-mile section of the Mississippi River with the highest level of barge handling capacity anywhere along the river. The St. Louis region's port system was ranked as the most efficient inland port district in terms of tons moved per river mile during 2015, the most recent year for which data is available. The St. Louis region's port system plays a critical role int he nation's global supply chain.

America's Central Port Improvements (IL)

Partially Programmed for Construction

Project Description (A) Granite City Harbor Lead Track Revitalization: This project includes upgrades to the rail track that serves the Granite City Harbor and its four main terminals, including U.S. Steel, with track capable of handling 286,000 pound rail cars delivered by unit trains. The track will be replaced with 115RE rail sections, new cross ties, and improved drainage. Approximately 9,800 feet of track, three at-grade crossings, and 14 turnouts will be upgraded. The project will allow tenants to operate more efficiently, reduce costs, and better compete in the global market. Estimated cost is approximately \$8 million.

Project Description (B) Granite City Harbor General Cargo Dock Revitalization: This project includes upgrades to the general cargo dock at the Granite City Harbor that serves two main terminals, including U.S. Steel. A pipe pile fender system will be installed to protect the steel sheet pile wall, the deck will be paved over with reinforced concrete, an improved drainage system will be installed, and approximately 3,450 feet of railroad track will be upgraded to handle 286,000 pound rail cars. Estimated cost is approximately \$6.8 million. Construction is funded with assistance of \$1.09 million (as of June 2018) from the IDOT Competitive Freight Program.

Project Description (C) Union Pacific / Kansas City Southern
Connection Through A&K Yard: This project includes construction
of new railroad track from the Union Pacific Railroad / Kansas
City Southern Railway mainline through the A&K Granite City
rail yard into the Port. Approximately 3,200 feet of new railroad
track will be laid along with a new No. 15 turnout at the mainline.
The new connection will allow direct deliveries from two Class
I rail carriers, providing lower shipping costs and transparent
competition amongst all carriers for Port shippers. Estimated
cost is approximately \$4.5 million.

Project Description (D) New Port Entrance at Illinois Route 3:

This project includes construction of a new right-in, rightout entrance to the Port industrial park and other associated roadway upgrades. The connection will provide for the safe movement and flow of traffic between Illinois Route 3 and the interior routes of E Street and 1st Street. Approximately 3,900 feet of new concrete roadway will realign traveling vehicles along 1st Street away from the warehouse loading docks to enhance access, improve safety, and expand traffic volume capacity into the industrial campus of the Port. Estimated cost is approximately \$3.2 million. Construction is funded with assistance of \$1.59 million (as of June 2018) from the IDOT Competitive Freight Program.

"The St. Louis region is the envy of the barge industry. Location in the heart of the nation and strategically positioned at the northernmost ice-free lock-free point on the Mississippi River."

- Gary LaGrange, CEO, Port of New Orleans

"St. Louis regional ports were ranked by the U.S. Army Corps of Engineers as the most efficient inland port district in terms of tons moved per river mile in 2015. The St. Louis region is two and a half times more efficient on its river usage than its closest competitors. The numbers reinforce the St. Louis region's critical role in the nation's freight network and further solidifies its position as the Ag Coast of America."

- American Journal of Transportation, 2017



ST LOUIS REGIONAL FREIGHTWAY

MidAmerica St. Louis Airport Distribution Improvements (IL)

Concept Development or Planning

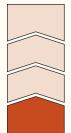
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

This project is currently unfunded. No funding sources or partnerships have been identified.

Location: Mascoutah. Illinois

Estimated Cost: \$45 million

Owner: MidAmerica St. Louis Airport

Contact: Tim Cantwell, Airport Director, (618) 266-5240

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a **high priority** for the region.

Project Need: MidAmerica St. Louis Airport (BLV) is a commercial/ cargo and passenger airport co-located with Scott Air Force Base in Mascoutah, Illinois. MidAmerica offers air cargo facility development of over 2,500 acres within Foreign Trade Zone 31 and an Enterprise Zone, making it an ideal location for modern freight needs with an emphasis on e-commerce businesses. Located along I-64 with on-site customs services and easy airplane-to-truck processes, the airport makes air cargo transfer highly efficient by reducing time on the ground and cost of operations. The airport serves major tenants including Boeing and North Bay Produce. To better accommodate these operations and attain manufacturing and distribution businesses, the land surrounding the airport requires improved access to the freight network.

Project Description: This project includes building an approximately two-mile rail spur from the Norfolk Southern mainline at the southern edge of the airport, enabling freight rail access for businesses on the eastern side of the airport.

Project Impact: The improvements would provide MidAmerica St. Louis Airport and surrounding businesses easy access to the rail network, giving this cluster of existing businesses and available sites access to three of the four primary modes of freight transportation.

"Our facility at MidAmerica Airport is a huge piece of our operation. Building this facility knocked days off the transportation time, and more importantly, providing more shelf life for the grocers."

- Jon Wall, Manager, North Bay Produce

J.S. McDonnell Connector Access Improvements (MO)

Advanced to Construction

Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

The project is funded through construction. Construction will begin in mid-2018 and is anticipated to be complete in early 2019.

Location: Berkeley, Missouri

Estimated Cost: \$2.4 million

Owner: St. Louis County Department of Transportation

Contact: Stephanie Leon Streeter, Deputy Director, (314) 615-8501

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: One of the St. Louis region's greatest assets is the extensive manufacturing base, particularly in defense and aerospace-related businesses. These facilities are served by a deteriorated roadway that forms part of a route between James S. McDonnell Boulevard and Hanley Road, and forces manufacturers in the vicinity to use the I-170 on-ramp at Frost Avenue and the I-170 ramp off-ramp at Airport Road to make this connection. Part of this patchwork of roads traverses the Formerly Utilized Sites Remedial Action Program contamination area, requiring coordination with the U.S. Army Corps of Engineers to develop adequate procedures and specifications for any excavation necessary in this area.

Project Description: This project involves the reconstruction of a deteriorated roadway, Eva Avenue, between Frost Avenue and McDonnell Boulevard. The reconstruction will improve truck access between McDonnell Boulevard and Hanley Road, two important arterial roadways, and will eliminate the current unsafe practice of using the I-170 ramp at Frost Avenue and the I-170 off-ramp at Airport Road to make this connection. In addition to roadway reconstruction, the deteriorated Norfolk Southern railroad crossing at Frost Avenue will be replaced. These improvements will improve access for multiple manufacturers in the vicinity. Construction will begin in mid-2018 and is anticipated to be complete in early 2019.

Project Impact: The project supports existing and new facilities by linking to the freight network. This will also provide additional flexibility for freight flows within the manufacturing cluster north of St. Louis Lambert International Airport.



ST LOUIS REGIONAL FREIGHTWAY

I-64 Improvements from Green Mount Road to Illinois Route 158 (Air Mobility Drive) (IL)

Concept Development or Planning

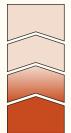
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

This project is currently unfunded. No funding sources or partnerships have been identified. Location: O'Fallon, Illinois

Estimated Cost: \$20 million

Owner: Illinois Department of Transportation (IDOT)

Contact: Jeff Keirn, IDOT Region 5 Engineer, (618) 346-3110

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: The I-64 corridor is an important link between businesses and industrial areas near downtown St. Louis and the MidAmerica St. Louis Airport (BLV), a commercial/cargo and passenger airport approximately 20 miles to the east of downtown St. Louis. The I-64 corridor is generally a minimum of six lanes from downtown St. Louis until the interchange with Green Mount Road in Illinois, which is located just west of the MidAmerica St. Louis Airport. For the remaining three-mile corridor to the airport, I-64 is only a four-lane roadway.

Project Description: This project would widen I-64 to six lanes from Green Mount Road to Illinois Route 158 (Air Mobility Drive). Other safety and capacity improvements would be incorporated into the project as needed.

Project Impact: The interstate widening would increase capacity and access to MidAmerica St.

Louis Airport and surrounding developments. The airport offers air cargo facility development of over 2,500 acres within Foreign Trade Zone 31 and an Enterprise Zone, making it an ideal location for modern freight needs with an emphasis on e-commerce businesses.

"From a truck perspective, we have a large number of interstates that converge in the St. Louis area, which is a major competitive advantage as it gives us a good outlet for trucks going [to] major cities that are within a half-day drive."

- Ryan Krull, Commercial Manager, Watco Terminal & Port Services

Kaskaskia Regional Port District Improvements (IL)

Concept Development or Planning

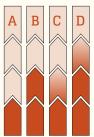
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

(B) An \$85,000 planning study was completed and outlined the need for approximately \$6 million in outbound movement improvements.

(D) A \$120,000 planning grant was approved to create a site plan for a third dock on land recently purchased by the Port.

Location: New Athens, Illinois; Red Bud, Illinois

Estimated Cost: \$8.2 million

Owner: Kaskaskia Regional Port District

Contact: Ed Weilbacher, General Manager, (618) 282-3807

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: Kaskaskia Regional Port District (KRPD) is the 9th largest inland port district in the country. The Port owns several facilities and partners with operators who lease, develop, and operate within the facilities. In addition to existing terminals, the Port is developing the new Fayetteville Port, which will serve as the closest river terminal to Scott Air Force Base and provide an additional 128 acres for development. Two other ports (KRPD #1 and KRPD #2) are also slated for upgrades and expansion to handle new commodities.

Project Impact: The projects provide improvements to meet existing customer needs and attract new industrial opportunities. The projects would enhance economic development opportunities on the Kaskaskia River, the fastest growing tributary in the inland waterway system.

Project Description (A) Fuel Pipeline Feasibility Study: This project includes a feasibility study for a proposed fuel pipeline to connect Scott Air Force Base with the uppermost terminal, the Fayetteville Terminal, on the Kaskaskia River. The pipeline would provide an alternate method for fuel delivery to Scott Air Force Base and allow for increased market choices in sourcing fuel. The pipeline could also serve a redundancy function for Scott Air Force Base to ensure critical needs are met at all times. Estimated cost for the feasibility study is approximately \$125,000.

Project Description (B) Outbound Conveyor Upgrade and Retrofit: This project includes upgrades to an outbound conveyor to accommodate new business prospects. Port Terminal #1 (River Mile 24.5) is located

Kaskaskia Regional Port District Improvements (IL)

Concept Development or Planning

in rural New Athens, Illinois and was constructed in the late 1970s to handle outbound coal. Over the years, more than 50 million tons of coal have been shipped through the facility. In the 1990s, the coal mines closed and this outbound terminal was out of service. Since then, a new inbound conveyor was installed to supply scrubber stone to the Prairie State Power Plant. Recently, other business prospects indicated interest in shipping outbound products through the facility, which would require structural upgrades, new conveyor belts, electrical upgrades, and other improvements as needed. The Kaskaskia Port District completed an \$85,000 planning study for Terminal #1 to review the outbound movement. Improvements include reconfiguring the loop track to accommodate two movements at the same time. A new outbound conveyor, second interior track, and track location is also needed. New cargo will include grain, gypsum, and fly ash. This will include adding a second track to the existing loop track and a second dump pit. Estimated cost is approximately \$6 million.

Project Description (C) Container-on-Barge Capacity:

This project includes infrastructure improvements to Port Terminal #2 (River Mile 18.0) to develop a container-on-barge inbound and outbound handling facility. The Port has an existing 50-ton overheard crane that is ideally suited for handling containers. Additional infrastructure improvements would include a new scale, laydown yard, additional chassis, a staging area, and on-site handling equipment. Estimated cost is approximately \$1.6 million.

Project Description (D) Port Secondary Access: This project includes access expansion at Port Terminal #2 (River Mile 18.0) to accommodate a high volume of trucks entering and leaving the site each day. A second entrance and expansion at both Gateway FS and The Material Works would reduce congestion and facilitate additional truck movement through the terminal. Estimated cost is approximately \$430,000. The Port has also been approved for a \$120,000 grant to create a site plan for a third dock on land recently purchased by the Port.

"The Port of Plaquemines [Louisiana] to St. Louis route would be a key component of the service American Patriot Holdings intends to implement through the Mississippi River basin. There are a wide variety of opportunities we are exploring, which include utilizing the vessels and port facilities for agricultural products, including refrigerated cargo. The timing is right for us to market this new option, which will move large numbers of containers via the Mississippi River - our nation's greatest river highway."

- Sandy Sanders, Executive Director, Plaquemines Port Harbor & Terminal District



North Riverfront Commerce Corridor Improvements (MO)

Partially Programmed for Construction

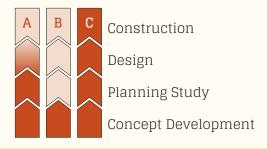
Project Location



Project Aerial



Project Status



Project Funding

(A-1) \$4.3 million in STP funds (TIP 6744) is programmed for partial construction in FY19.

(A-3) \$5.3 million in NHPP funds (TIP 6705K) and \$700,000 in CMAQ funds are programmed for construction in FY19.

(C) The project will be complete in May 2018.

Location: St. Louis, Missouri

Estimated Cost: \$33.9 million

Owner: City of St. Louis, Missouri

Contact: Robert Orr, Deputy Executive Director, (314) 657-3738

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered one of the highest priorities for the region.

Project Need: The North Riverfront Commerce Corridor is a 3,000 acre multimodal logistics and business district located in the north end of downtown St. Louis. With access to highways, rail, and barge shipping, the area is home to dozens of major manufacturers and warehouses. The location also includes the BNSF Railway North St. Louis Yard, Norfolk Southern Luther Yard, Terminal Railroad Association Bremen Yard, and the Municipal River Terminal. Manufacturers and logistics companies within the corridor are part of a global supply chain and require access to markets on both sides of the Mississippi River, across the United States, and internationally. In addition, several existing and new shippers are in the process of expanding, resulting in a significant increase in the quantity and diversity of goods shipped throughout the region. Major industrial real estate in the area includes North Riverfront Business Park, Hall Street corridor, and North Broadway Distribution area.

Project Impact: Despite these regional benefits, the North Riverfront Commerce Corridor suffers from mobility and circulation issues. The following projects were identified in the *North Riverfront Commerce Corridor Land Use Plan* as a high priority. The projects will improve supply chain reliability, increase efficiency, and lower costs.

Project Description (A) Hall Street and Riverview Drive Improvements: This project includes improvements to two primary corridors that trucks utilize to access I-70 and I-270 from the riverfront corridor. Estimated cost for the total project is approximately \$27.3 million. This project includes three segments:

North Riverfront Commerce Corridor Improvements (MO)

Partially Programmed for Construction

(A-1) Hall Street from Grand Avenue to Adelaide Avenue: This segment includes a road diet (lane/width restriction) to improve roadway condition and control speeds. A bicycle path from Grand Avenue to Prairie Avenue will provide a future connection to the riverfront trail. Estimated cost for this segment is approximately \$4.3 million. Approximately \$3.0 million is programmed in STP funds for partial construction. Metropolitan Sewer District (MSD) will also provide an additional \$1.3 million in funding for stormwater improvements. Design is scheduled for 2018 and construction is anticipated to begin in 2019.

(A-2) Hall Street from Adelaide Avenue to Riverview Drive: This segment includes roadway resurfacing, median improvements, and stormwater improvements. Estimated cost for this segment is approximately \$17 million. Metropolitan Sewer District (MSD) has also committed funds for stormwater improvements. If funded, construction is anticipated to begin in 2020 with completion by 2022.

(A-3) Riverview Drive from Hall Street to I-270: This segment includes pavement improvements as well as intersection improvements at the Hall Street and Riverview Drive intersection. Estimated cost for this segment is approximately \$6.0 million. The approximately \$5.3 million roadway resurfacing project is anticipated to begin construction in 2019. The approximately \$700,000 intersection improvement project is in final design with construction in 2019. National Highway Performance Program (NHPP) funds are programmed for the roadway resurfacing project while Congestion Mitigation and Air Quality (CMAQ) funds are programmed for the intersection improvement project. Metropolitan Sewer District (MSD) may seek future funding for associated stormwater improvements. Construction is anticipated to begin in 2019.

Project Description (B) Branch Street Improvements: This project includes improvement to Branch Street from Levee Road to 14th Street, which provides truck traffic access between I-70 and the Municipal River Terminal. As trains have continued to grow in length, rail delays have increased and are impacting growth. The project will improve the at-grade crossings and the speed and efficiency of current freight flows to prepare the area for future traffic demands. Improvements would also provide continuous access to the Municipal River Terminal if the Market Street floodwall gate is closed. Estimated cost for the project is approximately \$5 million. The project is not currently funded.

Project Description (C) I-70 Westbound Off-Ramp to North Broadway Relocation: This project includes relocation of the westbound I-70 off-ramp to Carrie Avenue. The ramp will be configured and lengthened to allow westbound vehicles on I-70 to exit and turn south on North Broadway Street. Estimated cost for the project is approximately \$1.58 million. This project will be completed in May 2018.

"The North Riverfront Commerce Corridor improvements are a prime example of collaboration contributing to the success of projects in the region that are vital to the freight network and are helping to improve freight velocities."

- Rob Orr, Deputy Executive Director, St. Louis Development Corporation

"We [Proctor & Gamble] have purchased land next to our North St. Louis facility for expansion. The labor workforce, freight availability, and cost of living are good, but seeing improvements to key road infrastructure will be a big win for us."

- Herbert Hall, Product Supply Warehouse Leader, Proctor & Gamble



Illinois Route 3 Access Improvements (IL)

Partially Programmed for Construction

Project Location



Project Aerial



Project Status



Project Funding

(B) \$12.8 million of the total \$22.0 million project costs has been programmed for construction.

Segment 2 has a funding shortfall of approximately \$6.1 million with additional funds needed to complete the connecting segments and intersections. The project received \$1.1 million in IDOT Competitive Freight Program funds.

Location: St. Clair County, Illinois

Estimated Cost: \$147 to \$192 million

Owner: Illinois Department of Transportation (IDOT), Village of Sauget

Contact: Jeff Keirn, IDOT Region 5 Engineer, (618) 346-3110 Richard Sauget, Village of Sauget Mayor, (618) 274-2990

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered one of the highest priorities for the region.

Project Need: Illinois Route 3 is the backbone of a nearly 60-mile long, five-mile wide economic corridor in Southwestern Illinois. The corridor provides access through the industrial heart of the region including Wood River, Granite City, East St. Louis, Sauget, and Dupo. The corridor is responsible for 215,000 jobs and a \$9.2 billion annual payroll. A significant portion of the region's freight generators and users are located in the area, including America's Central Port, Union Pacific Dupo Intermodal Yard, American Milling, and business parks such as Gateway Commerce Center and Lakeview Commerce Center. A 2.2-mile segment of the corridor from approximately Monsanto Avenue to Illinois Route 157 was identified as a freight bottleneck in the 2018 IDOT Freight Competitive Program.

Project Impact: The state has made significant investments in recent years in this important north-south transportation link, but Illinois Route 3 is still in need of improvements. Completion of the improvements will:

- Support long-term, high-paying job growth in manufacturing and transportation sectors
- Improve access to the I-70 Stan Musial Veterans Memorial Bridge,
 Sauget Industrial Park, and St. Louis Downtown Airport
- Accelerate the redevelopment of brownfield sites and underutilized properties along the corridor

This corridor is part of America's Agriculture Coast or "Ag Coast" that supports a 15-mile section of the Mississippi River with the highest

Illinois Route 3 Access Improvements (IL)

Partially Programmed for Construction

level of barge handling capacity anywhere along the river. The St. Louis region's port system was ranked as the most efficient inland port district in terms of tons moved per river mile during 2015, the most recent year for which data is available. The St. Louis region's port system plays a critical role int he nation's global supply chain.

Project Description (A) Illinois Route 3 Relocation: This project includes new construction of a 2.1-mile corridor of Illinois Route 3 from River Park Drive in East St. Louis, Illinois south to Monsanto Avenue in Sauget, Illinois. The project will consider a two-lane option and a four-lane option with potential phasing. The majority of the north section between River Park Drive and Trendley Avenue would be on structure due to existing railroads. The south section between Trendley Avenue and Monsanto Avenue requires two grade separation structures over railroads. The proposed additional lanes and grade-separated structures will decrease congestion, improve safety, address clearance issues, and better accommodate truck and freight movements. Estimated cost is approximately \$125 million for the two-lane option and approximately \$170 million for the four-lane option. Construction is currently not funded and no partnerships have been identified.

Project Description (B) Falling Springs Road / Illinois Route 3 Railroad Bypass: This project includes construction of the Falling Springs Diversion bypass loop with a structure that carries traffic from Illinois Route 3 over the Alton & Southern Railroad between Monsanto Avenue and Queeny Avenue. Without improvements, this location will continue to experience significant delays of 20 to 30 minutes for each unit car train, resulting in hours of through-traffic delays each day. In addition, it is also anticipated that nearby rail barge offload facilities will increase the number of units in the immediate future. The project has multiple benefits to the region in terms of improving access to the growing business community, encouraging future business development, and opening up to 220 acres of dormant industrial land for active use adjacent to a community of chronic economic distress. The project will bypass the existing heavily used Illinois Route 3 at-grade crossings using local roads such as Monsanto Avenue, Queeny Avenue, and Falling Springs Road. Improvements will include a grade-separated structure where two railroads (Alton & Southern Railroad and Terminal Railroad Association) converge, eliminating two public crossings along Falling Springs Road. A new segment of Falling Springs Road will be constructed and intersection improvements will also be needed to effectively move vehicles to the proposed grade separation.

Estimated cost for the total project is approximately \$22.0 million. The project is phased into four segments and four intersections. Approximately \$11.7 million has been programmed through multiple funding sources including IDOT, Illinois Commerce Commission (ICC), Congestion Mitigation & Air Quality (CMAQ), and Surface Transportation Program (STP). The largest funding gap relates to Segment 2, the relocation of Falling Springs Road and grade separation project, which currently has a funding shortfall of approximately \$6.1 million (local match to ICC funds). Additional funds are also needed to complete the connecting segments and intersections.

Construction is partially funded with assistance of \$1.1 million (as of June 2018) from IDOT Competitive Freight Program funds. Engineering on various phases is currently underway with anticipated completion of all phased improvements, excluding Segment 2, by 2022. If funding is acquired for Segment 2, construction may be complete by 2023.

"When I think of the St. Louis region, and I think of logistical advantage, I can come up with very few areas that can offer the same width and depth of modal systems as the Illinois Route 3 corridor."

- Rick Orytl, Vice President, Metro East Industries

I-255 / Davis Street Ferry Road Interchange (IL)

Concept Development or Planning

Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Anticipated Project Funding

\$16.0 million (TIP 4593) is programmed for partial construction.

The \$14 million local share is currently unfunded.

Location: Dupo, Illinois

Estimated Cost: \$40 million

Owner: Illinois Department of Transportation (IDOT)

Contact: Jeff Keirn, IDOT Region 5 Engineer, (618) 346-3110

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: The new I-255 / Davis Street Ferry Road interchange would replace the existing interchange at Exit 9 (Old Illinois Route 3 / Main Street) with improved roadway geometry. A combination of the Union Pacific Railroad intermodal terminal in Dupo, the Columbia Quarry, and new and expanding truck facilities have added to the volume of heavy truck traffic traveling through Dupo. The new interchange will serve existing Dupo traffic as well as new traffic from industrial and commercial developments that are planned or underway. The existing interchange at Exit 9 was not configured optimally to handle the projected increase in truck traffic and village officials and emergency responders are aware of safety concerns at the existing ramp/intersections related to Exit 9 in Dupo.

Project Description: The proposed I-255 / Davis Street Ferry Road interchange project would include a diverging diamond interchange with a system of connecting roads to serve the emerging 2,000-acre industrial area along Davis Street Ferry Road. Improvements also include a future grade-separated structure at the southern end of the intermodal yard, crossing five rail tracks near Davis Street Ferry Road. The project will improve access and enable more cost-effective traffic into the intermodal facility, thus enhancing the ability of the Dupo Discovery Business Park to attract business development and further the potential for the creation of thousands of new jobs.

Estimated construction cost is approximately \$29.9 million. Estimated total cost for the project including right-of-way acquisition, utility relocations, and design is approximately \$40 million. \$16.0 million

I-255 / Davis Street Ferry Road Interchange (IL)

Concept Development or Planning

in HPP (High Priority Projects) funds are programmed for partial construction, but the local share is currently unfunded. Overall, the project has an approximately \$14 million local funding shortfall.

Project Impact: By improving access from I-255 to Davis Street Ferry Road, truck traffic will be re-routed to improve safety, capacity, and traffic operations in Dupo. From an economic perspective, this project is a unique situation in the St. Louis region that will provide a competitive advantage to value-added rail freight movement and business development opportunities. The development is conservatively comprised of approximately 1,000 to 2,000 acres in the first several phases of the business park development with extensive adjacent acreage for additional future expansion. Phase I of Discovery Business Park includes approximately 9 million square feet of commercial, retail, office, and light industrial space on approximately 840 acres. Phase II of the project involves the development of 13 million square feet of commercial and industrial space on approximately 1,000 acres. Both phases combined would total an estimated 22 million square feet of building space on an estimated 1,840 acres. The surrounding development is estimated to bring thousands of jobs to the area as the project progresses. The interchange project would be a key benefit for the Dupo Intermodal Yard in order to expand operation and remain competitive, as well as support development near the proposed interchange.

I-255 / Fish Lake (Ramsey Road) Interchange (IL)

Concept Development or Planning

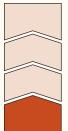
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

This project is currently unfunded. No funding sources or partnerships have been identified. Location: Columbia, Illinois

Estimated Cost: \$27 million

Owner: Illinois Department of Transportation (IDOT)

Contact: Edie Koch, Monroe County Economic Development, (618) 939-8681

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: The Dupo Intermodal Yard in Illinois is one of the region's largest intermodal assets. Access to the yard includes several at-grade crossings with Union Pacific mainline tracks, causing delays to trucks serving the facility and creating safety issues for motorists. The site also lacks enough storage for intermodal containers, necessitating off-site storage. The storage issues, combined with congestion at the at-grade crossings, makes current expansion of the site unattractive. Without better access, Union Pacific may be forced to expand its facilities outside the region in an attempt to meet growing demand.

Project Description: This project would improve the current Fish Lake (Ramsey Road) overpass into a full highway interchange. The interchange would provide additional access to the Union Pacific Dupo Intermodal Yard, enabling further expansion of the facility. The new highway interchange would also complement proposed improvements at the I-255 / Davis Street Ferry interchange.

Project Impact: The project would increase the growth of manufacturing and distribution businesses, which would mutually benefit the Village of Dupo as well as economic development south of I-255 in the City of Columbia.



St. Louis Lambert International Airport Access Improvements (MO)

Concept Development or Planning

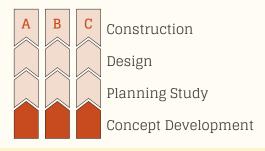
Project Location



Project Aerial



Project Status



Project Funding

Improvements are included in the region's 2045 Long-Range Transportation Plan, but the projects are currently unfunded. No funding sources or partnerships have been identified. Location: St. Louis County, Missouri

Estimated Cost: \$30.25 million

Owner: St. Louis Lambert International Airport

Contact: Jerry Beckmann, Airport Deputy Director, (314) 551-5034

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a high priority for the region.

Project Need: St. Louis Lambert International Airport (STL), located in St. Louis County, is Missouri's largest and most used airport. It is positioned within Foreign Trade Zone 102 and is an attractive destination for logistics businesses due to its multimodal transportation infrastructure, including three interstates, combined with available and accessible land.

Project Impact: St. Louis Lambert International Airport has over 1,000 acres of commercial and industrial land adjacent to the airport that is ideal for logistic businesses and airborne cargo users. The following projects will attract more freight-centered development.

Project Description (A) Cargo City Access Analysis: This project includes a study of the logistics center for air freight, Cargo City. Access to Cargo City from the interstate system is circuitous and not conducive to truck movements as entry requires trucks to intermingle with passenger vehicles. The project will analyze and develop alternatives for improving truck access to Cargo City from the interstate network. Estimated cost of the study is approximately \$250,000.

Project Description (B) Fee Fee Road Bridge Improvement: This project includes a proposed Fee Fee Road bridge over the Norfolk Southern mainline and a new intersection between Fee Fee Road (City of Bridgeton) and Missouri Bottom Road (City of Hazelwood). The existing intersection is substandard as the geometry is not suitable for heavy truck traffic and the available land envelope does not provide any opportunity for improvements. The project would construct a new

St. Louis Lambert International Airport Access Improvements (MO)

Concept Development or Planning

intersection suitable for heavy vehicle movements, bridge the Norfolk Southern mainline, and connect to Fee Fee Road. The improvements will provide commercial vehicles access to 250 acres planned for commercial and industrial development at the airport. By creating a new intersection, development along Fee Fee Road becomes more attractive to heavy freight users. Estimated cost is approximately \$10 million.

Project Description (C) Gist Road Upgrade: This project includes upgrading and realigning Gist Road (City of Bridgeton) between the Norfolk Southern mainline and the I-270 bridge. Gist Road is a two-lane road with an asphalt surface designed for light vehicle traffic. The upgrade provides a signalized crossing at the Norfolk Southern mainline and expands the road to two-lane concrete pavement with a center turn lane suitable for heavy truck traffic. The project will provide interstate access to 300 acres identified for commercial and industrial development at the airport and strengthen the region's intermodal options. Estimated cost is approximately \$20 million.

"The nearby airport isn't the point of the marketing arrow, but certain buyers do like proximity to an international airport. They also like that it's at the intersection of two interstates [I-70 and I-270] as well as being served by two interchanges on I-170."

- Pat Reilly, Senior Vice President, Jones Lang LaSalle



ST LOUIS REGIONAL FREIGHTWAY

Mississippi River Port Development Projects (MO)

Concept Development or Planning

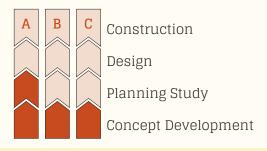
Project Location



Project Aerial



Project Status



Project Funding

All three projects have requested funding in the FY18-22 Capital Improvement Program.

Project	Million	Year	
Project A	\$8.5	FY18-FY22	
Project B	\$2.0	FY21	
Project C	\$5.0	FY18-FY22	

Location: Jefferson County / St. Louis County / City of St. Louis, Missouri

Estimated Cost: \$17.5 million

Owner: Jefferson County Port Authority, St. Louis County Port Authority, City of Saint Louis Port Authority

Contact: Neal Breitweiser, Director at Jefferson County, (636) 797-6168 Joe Bannister, Vice President for Real Estate, (314) 615-7692 Susan Taylor, Director at City of St. Louis, (314) 657-3740

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a **high priority** for the region.

Project Need: Inland waterborne transportation is a key component of regional goods movement as the St. Louis region is centrally located on the Mississippi and Missouri Rivers. The region is ideally suited as a year-round, central node for consolidating agricultural and mining goods produced in the Midwest and northern Great Plains and shipping bulk cargo on the Mississippi River.

Project Impact: In 2015, about 35 million tons of waterborne cargo moved through the St. Louis region. Three Missouri ports located in the St. Louis region - Jefferson County Port Authority, St. Louis County Port Authority, and City of Saint Louis Port Authority - are seeking to enhance waterborne freight flow.

Project Description (A) Crystal City Port Development with Access

Roadway: This project includes land acquisition and preliminary engineering for a public freight harbor located on the Mississippi River approximately 20 miles south of downtown St. Louis in Crystal City, Missouri. The project will allow Jefferson County Port Authority to move forward with the phased construction of the proposed multimodal port facility that will capitalize on the transportation of bulk commodities and containers via barge, rail, and truck (and a small airport located within two miles). Initial discussions with the Port of Plaquemines have also focused on loading operations at a centralized location in Jefferson County, such as the Crystal City Port,

Mississippi River Port Development Projects (MO)

Concept Development or Planning

with feeder services throughout the bi-state region. The proposed facility is well positioned for aggregate, sand, and grain shippers. The facility also has intersecting rail lines from the Union Pacific and BNSF Railway, and these rail carriers also provide connections to the Norfolk Southern and CSX Railroad. The proposed Crystal City Port will assist in creating additional flexibility and connectivity to the region's freight system while assisting in repurposing existing industrial sites. The current roadway network available to provide access would force traffic supporting port operations through the core of Crystal City via narrow, often brick, two-lane roadways with skewed intersections. As a result of the planned regional port development and significant growth potential at the Crystal City Port, access improvements are needed to enhance traffic flow between the port and I-55 via a Crystal City connector. Overall, the Crystal City Port Development project provides freight movement options away from congestion in the downtown St. Louis area and affords unobstructed access to the Gulf of Mexico. Estimated cost is approximately \$8.5 million. The FY18-FY22 Capital Improvement Program includes \$8.5 million in funding for property acquisition, rail design, permitting, site work, and rail construction. Estimated total cost to complete the port is \$240 million.

Project Description (B) City of St. Louis South Riverfront Site Preparation: This project includes clearing, remediation, and preparation of a site along the south riverfront for intermodal development. The National

Geospatial-Intelligence Agency is expected to vacate the 20-acre site due to relocation and expansion of a new \$1.75 billion facility. A portion of the site covers a former rail yard that has immediate access to the Union Pacific Railroad and Patriot Rail, a national shortline railroad. While the site does not currently provide river access, the location is an ideal spot for last-mile truck and rail transfer of goods. Both railroads have indicated strong support for an intermodal facility at the site. Estimated cost is approximately \$4 million. The FY18-FY22 Capital Improvement Program includes \$2 million in funding for site preparation in FY22.

Project Description (C) St. Louis County Port Development North / South Sites: This project includes the exploration of building ports in northern and southern portions of St. Louis County. Estimated cost is approximately \$5 million. The FY18-FY22 Capital Improvement Program includes \$1 million annually for the project. County locations to assess for development have not yet been identified, and are therefore not depicted on project location or aerial maps. Estimated total cost to complete the project is approximately \$25 million.

"The relationships we are building with ports like Jefferson County and the neighboring ports in and around St. Louis are important first steps in creating a transportation network between Plaquemines Port and upper ports along the Mississippi River. We plan to move thousands of containers from our port to theirs utilizing the American Patriot Holdings unique container transport vessels. This is a real job multiplier."

- Sandy Sanders, Executive Director, Plaquemines Port Harbor & Terminal District

"The St. Louis region is a rail and interstate highway gateway. It's more effective to move commodities into, out of, and through St. Louis by combinations of truck, rail, and barge than points upstream on the Mississippi and Illinois Rivers."

- David Jump, President, American Milling



ST LOUIS REGIONAL FREIGHTWAY

Illinois Route 158 (Air Mobility Drive) Expansion from Route 161 to Route 177 (IL)

Concept Development or Planning

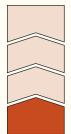
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

This project is currently unfunded. No funding sources or partnerships have been identified.

Location: Shiloh, Illinois

Estimated Cost: \$10 million

Owner: Illinois Department of Transportation (IDOT)

Contact: Jeff Keirn, IDOT Region 5 Engineer, (618) 346-3110

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a **high priority** for the region.

Project Need: MidAmerica St. Louis Airport (BLV) is a commercial/ cargo and passenger airport co-located with Scott Air Force Base in Mascoutah, Illinois. MidAmerica Airport offers air cargo facility development of over 2,500 acres within Foreign Trade Zone 31 and an Enterprise Zone, making it an ideal location for modern freight needs. To better accommodate growth and retain clustered manufacturing and distribution businesses, the land surrounding the airport requires improved access to the freight network.

Project Description: The project includes a one-mile extension of Illinois Route 158 (Air Mobility Drive), the main gateway from I-64 to MidAmerica Airport and Scott Air Force Base. The extension from Illinois Route 161 (Carlyle Avenue) to Illinois Route 177 (Mascoutah Avenue) would extend a two-lane roadway along a growth corridor.

Project Impact: This location is one of the highest potential corridors for supporting industrial real estate development and freight transportation, and the roadway expansion would facilitate this future growth. In addition to growth at the airport, Scott Air Force Base also provides a \$3 billion annual impact on the regional economy, a 40 percent increase in the past decade. The base expansion has fueled business growth and available property for expansion around the base and the airport has exceptional community support.

"The airport brings inherent advantages. We are also on a major highway, so for the truck access, it couldn't get any better.

- Jon Wall, Manager, North Bay Produce



ST LOUIS REGIONAL FREIGHTWAY

North Park Access Improvements (MO)

Advanced to Construction

Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Project Funding

The project is funded through construction and construction is anticipated to begin in 2019.

Location: Berkeley, Missouri

Estimated Cost: \$3.0 million

Owner: St. Louis County Department of Transportation

Contact: Stephanie Leon Streeter, Deputy Director, (314) 615-8501

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a **high priority** for the region.

Project Need: North Park is a premier 550-acre business park located east of St. Louis Lambert International Airport at the junction of I-70 and I-170. The development is capable of hosting over 5 million square feet of building area within a Foreign Trade Zone and an Enhanced Enterprise Zone. North Park is the only urban redevelopment project in the nation located at the intersection of two major highways, an international airport, and a university. North Hanley Road, the major corridor serving North Park and other businesses, requires improvements to accommodate existing and future businesses.

Project Description: This project includes phased safety and capacity improvements along Hanley Road from I-70 to Madison Avenue. This two-mile corridor provides direct connections to I-270, I-170, and I-70 and links freight to North Park and other development zones east and west of the airport. The infrastructure improvements include repair and replacement of deteriorated roadway surface to improve drivability and drainage as well as adding a new Superpave wearing surface. The proposed roadway improvements would improve traffic safety and access, increase pedestrian safety, and support local businesses. Design is complete and construction is anticipated to begin in 2019.

Project Impact: North Park partners have invested over \$291 million dollars, creating over 5,000 permanent jobs. Other nearby industrial areas include Aviator Business Park and Hazelwood Logistics Center. Several major corporations are located in North Park including Express Scripts Corporation, Schnucks, SFR, and Vaterott College.



ST LOUIS REGIONAL FREIGHTWAY

Earth City Access Improvements (MO)

Advanced to Construction

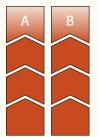
Project Location



Project Aerial



Project Status



Construction

Design

Planning Study

Concept Development

Anticipated Project Funding

(A) The project is funded through construction, \$2.1 million (TIP 6607B-17) is programmed with additional local funding to meet total construction costs.

(B) The project is funded through construction, \$1.75 million is programmed for pavement repairs. Location: Earth City, Missouri

Estimated Cost: \$4.01 million

Owner: St. Louis County Department of Transportation

Contact: Stephanie Leon Streeter, Deputy Director, (314) 615-8501

The St. Louis Regional Freightway conducted a regional needs analysis to identify network constraints. Projects were evaluated based on four primary criteria: safety and security in travel, efficiency impact, multimodal impact, and economic impact. Based on the criteria, the following project addresses regional freight needs and is considered a **high priority** for the region.

Project Need: Earth City is one of the largest industrial areas in the St. Louis region. The site contains numerous industrial facilities as well as office complexes, agricultural land, and entertainment venues. The 12,700-acre site also has approximately nine miles of river frontage along the Missouri River. Many arterial roadways serving the area, with connections to I-70 and I-270, require improvements accommodate existing and future business access and traffic volumes.

Project Impact: Several The Earth City area serves the City of Bridgeton industrial and warehouse district as well as major corporations including UPS, FedEx, Spectrum Brands, Save-A-Lot, and U.S. Cellular.

Project Description (A) St. Charles Rock Road Preservation: This project includes critical preservation of the existing network by resurfacing the 1.3-mile St. Charles Rock Road corridor from Tausig Road to Earth City Expressway (Route 141). Additional intersection improvements to enhance safety and capacity will also be incorporated. Preliminary engineering will be complete in Spring 2018 and construction is anticipated to begin in late 2019. Estimated cost is approximately \$2.26 million. Approximately \$2.1 million is programmed in the STIP (Statewide Transportation Improvement Plan) with additional local funding to meet total construction costs.

Project Description (B) Arterial Roadway Repairs: This project includes additional pavement repairs in the Earth City area. Phase 1 of Rider Trail South is currently under construction. Phase 2 of the remaining arterial roadways will begin construction in late 2018 or early 2019. Approximately \$1.75 million is budgeted for these repairs.