

Report of the

21st Century Missouri Transportation System Task Force

Recommendations to support economic competitiveness, transportation reliability, and highway safety

Submitted to the General Assembly

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1.0 Executive Summary

In 2017, the General Assembly adopted HCR 47, which established the *21st Century Missouri Transportation System Task Force*, a 23-member bipartisan panel comprised of participants from the House of Representatives, the Senate, the Executive Branch, and the private sector. The Task Force was directed to evaluate and make recommendations regarding our state transportation system and the funding of that system. This report contains a summary of the Task Force's activities and legislative recommendations.

The Task Force met 10 times throughout the state from June through December 2017. These public meetings enabled Missouri residents, elected officials, and civic and business leaders to discuss their transportation-related needs and concerns. The public hearings were well attended, with attendance at each ranging between 80 and 175 persons. The Task Force heard informational presentations from national and local participants, learned about the condition and performance of area highways and bridges, and received public testimony from concerned Missourians. In all, more than 100 individuals testified on a variety of transportation issues.

This report reflects the general consensus of the Task Force. Although not every recommendation is supported by every member, an effort was made to include in the report only recommendations that had the general support of the Task Force members, based on the Task Force discussion in the meetings. Executive Branch members on the Task Force provided subject-matter expertise and information related to their constitutional roles of carrying out and enforcing the laws; however, they were not asked to make specific policy recommendations. Still, each of the members' experience-based input to the Task Force was valuable.

The Transportation System and Its Condition

Testimony to the transportation Task Force reinforced the extreme importance of Missouri's transportation system. Our statewide system connects Missouri's people with every vital part of their lives: family, jobs, services and amenities. Manufacturers and farmers alike rely on the transportation system to get their products to market. For a business, the transportation system is the link between today's success and tomorrow's opportunity that brings to them supplies, services and customers. In short, a safe, convenient, efficient, and reliable transportation system is vital to a prospering economy.

Because of existing strengths, Missouri is poised (with strategic policymaking and proper investment) to have a world-class transportation and to be a leader in travel, logistics, and freight distribution. Missouri has a large system of road, highways, and bridges, including major interstate highway corridors that provide easy access for freight transportation. Business leaders testified to the Task Force that leveraging Missouri's geographic location, natural resources, and existing highway and intermodal systems through strategic policymaking and greater investment would substantially benefit the economy, improve the quality of life for Missourians, and spur job growth. They also expressed

concerned, however, that unaddressed transportation-infrastructure needs will threaten economic growth for the state.

The Task Force learned that Missouri has a large highway system that includes:

- 33,884 miles of roadway (America's seventh-largest state highway system); and
- 10,394 bridges (the sixth most nationally).

The highway system is aging. The oldest stretches of the Interstate highway system in the state, for example, were built in the 1950s with a 20-year life expectancy. Moreover, a large portion of state-maintained bridges have surpassed their 50-year design lives.

The Task Force also heard how the aging and deteriorating transportation infrastructure is reducing safety and constraining economic development. In a Report Card for Missouri's Infrastructure, produced by of the American Society of Civil Engineers, the state earned an overall infrastructure grade of a C minus. Related to transportation infrastructure, Missouri's roads received a C, bridges received a C minus, aviation received a C, railroads received a C, and inland waterways received a D.

The Task Force heard that highway safety in Missouri needs to be improved. MoDOT and the State Highway Patrol have implemented designs and procedures that have improved highway safety, such as road-shoulder rumble strips and median guard cables. But driver and passenger behavior continues to play a significant role in traffic crashes and roadway deaths. There were 947 traffic fatalities on Missouri's roadways in 2016—the highest number since 2008. Six out of ten people killed were not wearing seatbelts. Preliminary 2016 data also indicates cell phones were involved in 2,379 crashes—a 23-percent increase since 2014. Driver inattention is the leading cause of traffic accidents in Missouri.

Missouri ranks last among the states in preventable accidents by the National Safety Council in their 2017 *The State of Safety: A State-by-State Report*. In the report, Missouri was one of seven states receiving an "F" rating and was ranked last of all 50 states and the District of Columbia.

Funding the Transportation System

To pay for the transportation system, the State of Missouri draws on several revenue sources to raise the approximately $2.5 billion spent on its transportation system, with nearly two-thirds of revenue coming from state user fees and the other third coming from federal user fees.

The revenue generated to support roads and bridges is allocated among the state (70%), cities (15%), and counties (15%) through a formula set forth in the Missouri Constitution. The Missouri State Highway Patrol also receives transportation funding for administering and enforcing the state's motor-vehicles laws and traffic regulations.

User fees constitute the primary sources of road revenue for management of the Missouri highway system: fuel taxes, vehicle registration and driver licensing fees, and motor-vehicles sales taxes. In

fiscal year 2016, these revenue sources raised $2.468 billion (including state and federal sources). While this is a considerable sum, Missouri fares poorly in relation to other states. Missouri ranks just 47th in the nation in revenue raised per mile.

The largest source of user fee revenue comes from the 17-cent state motor fuel tax on each gallon of gasoline and diesel purchased in Missouri. This motor fuel tax is a flat amount added to each gallon of motor fuel sold; the amount does not increase (or decrease) when fuel prices change. Missouri's motor fuel tax is the fourth lowest among motor fuel taxes in the nation. It was last raised in 1996.

Missourians pay a relatively small amount of direct costs per month (about $30) to use the state system of roads and bridges. But the effective monthly cost per driver—because of hidden transportation costs in our underfunded system—is much higher. Such hidden costs include:

- Costs due to traffic congestion, including loss of productivity and opportunity, wasted fuel, and adverse effects on the quality of life;
- Costs in operating and maintaining a vehicle on rough roads, manifested in accelerated vehicle depreciation, additional vehicle-repair costs, increased fuel consumption, and increased tire wear; and
- Costs due to roadway crashes.

Missouri now struggles with transportation funding largely because the principal revenue source for transportation—the volume-based excise motor fuel tax—has continually lost purchasing power for decades. Over the past 20 years, inflation has eroded the purchasing power of the 17-cents-per-gallon tax to only eight cents today. This means that the excise fuel tax can purchase only 47 percent of materials and labor necessary for road construction that it purchased in 1996, the last time the state increased its motor fuel tax. To account for inflation over the past 20+ years, the motor fuel tax would have to be 27 cents today in order for it to have the same purchasing power as it did in 1996.

Most states, like Missouri, have for decades relied substantially on revenue from the motor fuel tax to fund transportation-infrastructure needs. Although the motor fuel tax has been an accurate proxy for highway usage, its long-term sustainability as the primary transportation-revenue source will be challenged due to the move towards high-efficiency vehicles, changing travel patterns, and electric or alternative fuels.

The Task Force learned that long-term funding neglect and shortfalls have left the state with approximately $825 million worth of unfunded transportation priorities annually. This gap means that:

- Roads and bridges aren't being improved sufficiently;
- The transportation system isn't as safe as it could be;
- Economic growth is being stifled;
- Travelers too often are delayed because of traffic congestion;
- Interstate highways need to be reconstructed but instead are merely maintained;

- Multimodal transportation options are neither enhanced nor increased.

The Task Force heard testimony that there is no "silver bullet" for funding the statewide transportation needs of today and that other states are using a diverse mix of revenue options to fund their transportation system improvements. This has been in response to declining federal funding support, rising construction and materials costs for needed transportation improvements, and the growing recognition that fuel taxes alone cannot address statewide transportation needs adequately.

In Washington D.C., 2017 heard conversations about a potential additional investment in transportation infrastructure, but little action was taken. The President and congressional leaders have expressed hope, though, that infrastructure will be a priority in 2018. In all the possible scenarios being mentioned, the general consensus is that states will have to come up with more matching dollars than they had to in the past to access federal dollars. States thus need to be ready with projects *and* state matching dollars. They'll need to explore new policies and approaches that leverage private-sector resources to fund and deliver important transportation projects.

Recommendations for Improving Transportation System: A 3-Part Roadmap

For more than six months, the 21st Century Missouri Transportation System Task Force talked with Missouri residents, taxpayers, business leaders, and transportation experts about a broad range of topics and issues related to our transportation system. It is clear from this ongoing statewide conversation that Missourians—and the Task Force—recognize that we need to invest more in our state transportation system in order to develop the modern, world-class transportation system that Missourians want and need.

Acting on the input provided to it in 2017, the Task Force has developed a three-part roadmap for funding and improving Missouri's transportation system. The roadmap envisions sets of short- and long-term strategies and steps for building and acting on a consensus around what that system looks like, how it operates, and how it should be funded. Meanwhile, the roadmap also calls for legislative action to improve highway safety and to improve our ability to better leverage existing transportation funding and emerging opportunities and innovations.

Part 1: Immediate-Impact Investment

An immediate investment package would involve stabilizing Missouri's transportation-system funding and making the transportation *safer* and more *economically beneficial*. The Task Force's recommendations would address immediate needs in the highway system and in multimodal transportation, while policy options for dealing with longer-term challenges are developed and implemented.

At every Task Force meeting, citizens and civic and business leaders provided public testimony that supported increased transportation funding. And an increase to the motor fuel tax was most often

cited as the best short-term solution. Missouri's current motor fuel ta is the 4th lowest in the nation. The proposed increase would still keep Missouri competitive with surrounding states and nationally.

To improve roads and bridges in Missouri, the Task Force recommends increasing the state excise tax on gasoline by 10 cents and on diesel by 12 cents per gallon. These adjustments would correct the inflation-driven value loss that has occurred since the motor fuel tax was last raised in Missouri. This additional investment by highway users would raise approximately $430 million annually to improve our roads and bridges. This would generate a total of approximately $4.3 billion over 10 years.

In addition, the Task Force recommends implementing a dedicated revenue stream of $50-$70 million annually for the state's multimodal transportation needs (*i.e.*, aviation, mass transportation, railroads, ports, waterways, waterborne commerce, and transportation of elderly and disabled persons). The Task Force recommends that the legislature look at potential, dedicated funding options for multimodal transportation that would involve no additional taxation of Missouri citizens.

Part 2: Sustainable and diversified transportation funding for the future

Missouri is confronted with an unprecedented amount of potential change as we plan for our transportation needs over the next 20 years and beyond. We need to anticipate the future landscape and decide how best to address the challenges and opportunities presented by increasing fuel efficiency and the emergence of automated, connected, electric, and shared-use vehicles, and complementary technologies and the impact they'll have on our transportation network and funding sources.

The Task Force heard from several presenters who shared that, because of these long-term funding sustainability considerations, states are actively evaluating or implementing new revenue options. These include road-user charges or vehicle-miles-traveled ("VMT") fees; tolling and congestion pricing through express managed lanes; leveraging private investment through public private partnerships; electric and hybrid vehicle fees and charges; indexing fuel with inflation, among many other new and emerging revenue options.

The Task Force recommends that the General Assembly consider many options for developing and implementing more sustainable and diversified transportation revenue. These include:

- Increased registration fees for electric vehicles;
- Excise fees or taxes on electric charging stations and systems;
- Increases to on non-fuel transportation user fees (driver's licenses, vehicle registrations, etc.) which haven't been adjusted since at least the 1980s;
- Index highway-user fees (*e.g.*, motor fuel tax, licensing & registration, etc.) to account for inflation;
- Revise the vehicle-registration schedule to be based on fuel efficiency (MPG) instead of on horsepower;

- Dedicate a portion of revenue from sales taxes on internet purchases for transportation purposes;
- Utilize optional express managed lanes on highways in metro areas to increase capacity, reduce congestion, and improve travel reliability;
- Consider better authorization for tolling on major bridges to pay for needed construction;
- Consider mileage-based road-user charges;
- Further capitalize the state infrastructure bank; and
- Enable local construction excise taxes.

Part 3: More Efficient Project Delivery; Improved Highway Safety; and Innovation

The Task Force encourages the General Assembly to explore transportation methods for **project delivery** that involve innovative partnerships and solutions. For example, states are using a variety of public private partnerships to improve efficiency to enable larger, more transformative projects to be completed faster and more economically by leveraging private-sector investment and involvement.

To **improve safety** on Missouri highways, the Task Force recommends legislation to:

- Prohibit distracted driving (in particular, texting while driving);
- Require seat belt use, enforced as a primary offense; and
- Provide more graduated driver's-license training requirements for young drivers.

Finally, the Task Force recommends that the Missouri legislature examine opportunities to leverage **innovation** in transportation to help grow the state's economic competitive advantage and improve the quality of life of Missouri's citizens.

2.0 The 21st Century Missouri Transportation System Task Force

The Missouri General Assembly in 2017 established the 21st Century Missouri Transportation System Task Force to answer a fundamental question:

> *What kind of state transportation system must we provide and fund to deliver the safety, economic vitality, and quality of life Missouri residents and businesses need to succeed personally and economically?*

This is a question Missouri has struggled to answer for many years. As Missouri's transportation infrastructure has been aging, alarms have been raised by the Missouri Department of Transportation (MoDOT), citizens, business groups, and legislators regarding potential impacts of long-term threats to the state's ability to design, build, and sustain an effective, efficient transportation system. Several factors contribute to this concern, including:

- Stagnant state motor fuel tax revenue;
- Lagging federal infrastructure revenue;
- Increasing construction, maintenance and fuel costs; and
- Transportation innovations requiring new investments while threatening the sustainability of traditional funding sources.

Over the past decade, there has been much discussion yet little resolution about how best to address Missouri's changing and expanding transportation needs. The state's 99th General Assembly hoped to address this when it adopted House Concurrent Resolution No. 47.[1] HCR 47 established the *21st Century Missouri Transportation System Task Force*,[2] a 23-member panel comprised of participants representing the legislative Branch, the executive branch, and the private sector. More specifically, the bipartisan panel includes five state senators, five state representatives, the governor (or his designee), the director of economic development, the superintendent of the highway patrol, the director of transportation, and nine Missouri private-sector representatives.

The **members** of the 21st Century Missouri Transportation System Task Force are:

Representative Kevin Corlew, Chair
Senator Dave Schatz, Vice-Chair
Senator Shalonn "Kiki" Curls
Senator Bill Eigel
Senator Jacob Hummel

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[1] HCR 47 is attached as Appendix A. *See also* http://www.house.mo.gov/billtracking/bills171/hlrbillspdf/2324H.02C.pdf (last visited December 27, 2017).

[2] The members of the Task Force are listed in this section of the report. *See* also http://house.mo.gov/Committees.aspx?category=all&year=2018&code=1 (last accessed Jan. 1, 2018); http://www.senate.mo.gov/mttf/ (accessed December 18, 2017).

Representative Greg Razer
Representative Bill Reiboldt
Senator Caleb Rowden
Representative Joe Runions
Representative Nate Tate
Governor Eric Greitens[3]
Director Patrick McKenna, Missouri Department of Transportation
Director Rob Dixon, Missouri Department of Economic Development
Colonel Sandra Karsten, Missouri State Highway Patrol
Rudolph Farber (appointed by Senate President Pro Tem)
Steve Halter (appointed by Speaker of the House)
David Hogan (appointed by Governor)
Gretchen Ivy (appointed by Speaker of the House)
Nathan McKean (appointed by Governor)
Gwen Moore (appointed by House Minority Floor Leader)
Craig Porter (appointed by Governor)
Thomas Schneider, Mayor, Florissant (appointed by Senate Minority Floor Leader)
Dale Williams (appointed by Senate President Pro Tem)

The Task Force was charged with reporting its activities, findings and any legislative recommendations to the General Assembly by January 1, 2018. Specifically, the Task Force was assigned to:

1. Evaluate the condition of the state highway system, including roads and bridges;
2. Evaluate current transportation funding in Missouri;
3. Evaluate whether current transportation funding in Missouri is sufficient to not only maintain the highway system in its current state but also to ensure that it serves the transportation needs of Missouri's citizens as we move forward in the 21st century;
4. Make recommendations regarding the condition of the state highway system; and
5. Make recommendations regarding transportation funding.

The Task Force held seven public hearings and three working sessions throughout the state from June through December 2018:

- June 28 -- Jefferson City, MO (Capitol);
- July 26 -- Kansas City, MO (Greater KC Chamber of Commerce, Union Station);
- August 23 -- Springfield, MO (Springfield Chamber of Commerce);
- September 20 -- Kirksville, MO (Truman State University);
- October 11 -- Jefferson City, MO (Capitol) (working meeting);
- October 18 – St. Louis, MO (St Louis Community College – Meramec Campus);
- November 8 – Jefferson City, MO (Capitol) (working meeting);

[3] The Governor was represented in Task Force meetings by Will Scharf, Policy Director, and Logan Spena, Deputy Policy Director.

- November 15 – Cape Girardeau, MO (Drury Plaza Convention Ctr., hosted by the Cape Girardeau Area Chamber of Commerce and the SEMO Port);
- December 13 – Columbia, MO (Stoney Creek Conf. Ctr., hosted by the Columbia Chamber of Commerce); and
- December 19 – Jefferson City, MO (Capitol) (working meeting).

These public meetings enabled Missouri residents, elected officials, and civic and business leaders to discuss their transportation-related needs and concerns. The public hearings were well attended, with attendance at each ranging between 80 and 175 persons. The Task Force heard informational presentations from national and local participants, learned about the condition and performance of area highways and bridges from MoDOT regional district engineers, and received public testimony from concerned Missourians. In all, more than 100 individuals testified on a variety of transportation issues.

This report reflects the general consensus of the Task Force. Although not every recommendation is supported by every member, an effort was made to include in the report only recommendations that had the general support of the Task Force members, based on the Task Force discussion in the meetings. Executive Branch members on the Task Force provided subject-matter expertise and information related to their constitutional roles of carrying out and enforcing the laws; however, they were not asked to make specific policy recommendations. Still, each of the members' experience-based input to the Task Force was of great value to Task Force deliberations. In addition, each Task Force member was given the optional opportunity to attach a one- to two-page letter to the report with any additional comments the member would like to have included in the record. Any such member comments are included in Appendix B.

3.0 What Missouri's transportation system currently looks like

Missouri's transportation system is a tremendous asset. Built at a cost of $55 billion in user fees over the years, it would cost more than $125 billion to replace the transportation system today. Missouri has the nation's seventh-largest state highway system, one that carries residents and travelers as they collectively travel more than 50 billion miles annually.

According to MoDOT's *Citizen's Guide to Transportation Funding in Missouri*[4]:



Interstate 64 in St. Louis

- The majority of travel in Missouri occurs on the state's interstates and major routes. These account for 5,517 miles of the 33,856 miles of highway in Missouri—or 16 percent of the total—but account for 76 percent of all travel in the state. Currently, 90 percent of these routes are in good condition as MoDOT has focused on improving and maintaining these routes over the last decade. (However, it's important to note that the first segment of Missouri's interstates was built in 1956, and that these critically important highways were built with a 20-year life expectancy. Missourians have known for years that I-70 needs to be reconstructed with added capacity to handle mounting levels of traffic, especially long-haul trucks. The project, though, has been and continues to be unaffordable. The state's other six interstates will also be facing improvement/preservation needs in the coming years.)
- Missouri's minor routes account for 17,450 miles. About 22 percent of all state travel occurs on these routes. Currently, 80 percent of these routes are in good condition.
- In addition to its network of highways, Missouri has 10,403 bridges of varying sizes, including 207 major bridges that are longer than 1,000 feet (about the length of three football fields). Currently, 883 bridges are in poor condition. MoDOT inspects these bridges on a regular basis to ensure they're safe for travelers. If a bridge is unsafe, it is closed until repairs can be made. Missouri also has 1,253 weight-restricted bridges, with 466 of them also in poor condition.

Finally, another way to look at the current condition of the Missouri state transportation system is to consider the cost to its users of increased crashes, congestion, fuel consumption and vehicular wear and tear. By this measure, even though a typical Missouri driver pays about $30 per month in direct highway-user fees, the costs imposed on travelers by condition shortfalls has been increasing and adds up to about $172 per month—costs that could be reduced by improving system conditions.

[4] *Citizen's Guide to Transportation Funding in Missouri*, available at http://www.modot.org/guidetotransportation/documents/CompleteGuide.pdf (last accessed Dec. 18, 2017). An overview of the information contained this *Citizens Guide* was presented to the Task Force by Patrick McKenna, Director, MoDOT, at the June 28, 2017 public hearing.

3.1. What the 21st Century Missouri transportation system should look like

Testimony to the transportation Task Force reinforced the extreme importance of Missouri's transportation system. It connects our people with every vital part of their lives: family, jobs, services and amenities. It's how they get home at night, to school each morning, and to every other thing that they do or rely on. Farmers rely on the transportation system to get their crops to market, a market which may include not just Missouri, but other states and other continents.[5] For a business, the transportation system is the link between today's success and tomorrow's opportunity that brings to them supplies, services and customers.



For businesses, the transportation system is the link between today's success and tomorrow's opportunity that brings to them supplies, services and customers.

It's no wonder, then, that Missourians expect such an important part of their lives to function in a way that is safe, reliable, and efficient; that it be kept in good condition; and that it be adaptable to new or changing needs. They also expect that such an important function of government as transportation should, in return for being appropriately funded, also leverage taxpayer support by sparking local and statewide economic growth and attracting direct or related private-sector investment.

The following written testimony submitted to the Task Force by a broad-based group is illustrative of remarks that the Task Force heard often:

> Strategic investment [in Missouri's transportation system] will enhance quality of life by providing:
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> - Convenient and reliable access to educational opportunities, jobs, and amenities;
> - A transportation system that facilitates recruitment, retention, and development of Missouri's workforce; and
> - A system that safely moves people and goods.[6]

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[5] *E.g.*, Testimony of Estil Fretwell, Missouri Farm Bureau (Kirksville hr'g) (Sept. 20, 2017).

[6] 6/28/2017 Letter from Jeff W. Glenn, Mercury Alliance, a broad-based statewide alliance of transportation supporters, including agriculture groups, airports, bicycle and pedestrian interests, chambers of commerce, contractors, corridor

Such feedback was heard throughout the state as the Task Force met with concerned Missouri residents, taxpayers and businesses. Similar feedback was heard in the extensive statewide citizen input that helped inform the development of the current Missouri Long-Range Transportation Plan[7]. These suggestions can be summarized as:

- Preserve investments we've already made by adequately maintaining existing highways and bridges (replacing those that cannot be efficiently repaired or rehabilitated);
- Improve safety throughout the system;
- Make targeted capacity additions where congestion negatively impacts travel time and reliability;
- Leverage long-term economic development with infrastructure improvements or expansions where possible; and
- Keep Missouri at the forefront of emerging technologies through legislative and regulatory flexibility to take advantage of new innovations and federal and private-sector opportunities.

Additionally, based on the presentations and testimony before the Task Force, Missourians clearly understand that there is no "one size fits all" transportation solution. Different parts of the state have different transportation needs and may develop new, innovative practices and approaches for satisfying those needs more quickly and more cost effectively if given the opportunity. A 21st-century transportation system will offer flexibility in terms of programming and funding in ways that enable cities and counties to focus on solutions that are tailored and meaningful to their needs while remaining compatible with the overall state transportation system.[8]

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interests, civil engineers, economic-development organizations, freight groups, planning groups, private businesses, state associations, trade unions, and transit organizations.

[7] http://www.modot.org/LRTP/.

[8] For example, Megan Clark, a member of the Southwest Missouri Planning Commission, testified in Springfield about the importance of infrastructure development for job creation and that local areas need flexibility and tools to be able to match federal and state funds. Several persons testified about the benefits of a cost-share program, including Terry Donaldson (Springfield hr'g) and Mary Beard (Kirksville hr'g). Rep. Kathy Swan (Cape Girardeau hr'g) noted the importance of local input and the participation of local communities with the state in addressing transportation needs. Yet several persons also stressed that, while local flexibility is important, we need to avoid disputes between different regions of the state and realize that having a statewide, interconnected *system*—and taking into account how one component of the system may impact another—is essential to the transport of people, goods, and services throughout the state. Such testimony was given by, among others, Carolyn Christman of the City of Adair Economic Development Office (Kirksville hr'g), Jeff Schwartz (Kansas City hr'g), and Steven Miller, former Commissioner, Missouri Highways and Transportation Commission (October working meeting).

3.2. Missouri's aging transportation-infrastructure's impact on economy

A convenient, efficient, safe, and reliable transportation system is vital to a prospering economy. That was the message delivered to the Task Force by many business organizations, citizens, farmers, and economic-development experts.



Barge service on the Missouri and Mississippi Rivers adds to the state's competitive advantage that transportation can offer.

A number of groups told the Task Force how Missouri's intergenerational investments in transportation have provided the platform for Missouri's economic development for decades.[9] Missouri-headquartered companies, for example, such as Ameren, Bass Pro Shops, Enterprise, Graybar, Hallmark Cards, Kansas City Southern, Leggett & Platt and thousands of others have enjoyed national and international success in part due to the ease and efficiency with which customers and products were able to move on state highways, airports, railroads, ports, and waterways. The same is true for other companies and industries that have a significant presence in Missouri such as Ford, General Motors, automotive-supply companies, Boeing, Express Scripts, Anheuser-Busch, to name just a few.

Missouri's many fine higher-education institutions have benefitted from the transportation system, which has enabled generations of students from Missouri, other states, and the world to attend the institutions for degrees that they have used to attain jobs and build the economy. Not to mention that Missouri agriculture has thrived in part because of the ability of farmers to get their commodities to market via the highways, railroads, and waterways.

Yet the Task Force also heard how the aging and deteriorating transportation-infrastructure is now constraining economic development. In 2013, the Kansas City and St. Louis Sections of the American Society of Civil Engineers published a *Report Card* for Missouri's Infrastructure. Eleven different categories were evaluated, and the state earned an overall infrastructure grade of a C minus. Related to transportation infrastructure, Missouri's roads received a C, bridges received a C minus, aviation received a C, railroads received a C, and inland waterways received a D.[10]

The Missouri Chamber of Commerce told the Task Force that business owners are concerned that unaddressed transportation-infrastructure needs will threaten the recent gains Missouri has seen in its Gross Domestic Product relative to surrounding states and will pose problems for rate supply chain

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[9] *E.g.*, Dan Mehan, Missouri Chamber of Commerce & Industry (Springfield hr'g); Ray McCarty, Associated Industries of Missouri (Springfield hr'g).

[10] Brian Pallasch, ASCE (Columbia hr'g).

management, an essential component for economic development.[11] The Missouri Chamber further described a Gallup research study that concluded that "business owners that operate day-to-day in the state feel aging infrastructure as an increasing challenge for their operations."[12] A site selector in the same study commented, "Missouri has so many strengths by default in its central location and needs to take better advantage."[13]

Because of existing strengths, Missouri is poised (with strategic policymaking and proper investment) to have a world-class transportation and to be a leader in travel, logistics, and freight distribution. Missouri has a large system of road, highways, and bridges, including major interstate highway corridors that provide easy access for freight transportation. Missouri's roads and highways carry 74 billion miles of vehicle travel and $371 billion worth of freight annually, the third- and fourth-highest rate, respectively, among its surrounding states (behind Illinois and Tennessee in VMT and Kentucky in the freight-value carried).[14]



Missouri is home to an extensive rail system. Railroads are essential to the state's economy and the region's economic competitiveness. Missouri has the 10th largest number of railroad miles in the United States with approximately 4,800 miles of track, 2,500 miles of yard track and about 7,300 public and private highway-rail crossings. Nineteen freight railroads operate in the state, carrying the fourth largest amount of freight tonnage in the nation.

The nation's second- and third-largest railroad hub centers are at either side of the state, in Kansas City and St. Louis, respectively.[15] And Missouri has more than 1,000 miles of inland waterways with the Mississippi and Missouri rivers combined, and 14 public port authorities facilitate commerce on these rivers.[16]

A strong correlation exists between good infrastructure and a state's economy. As related to the Task Force, economic analyses have shown that:

- 12 of the top 20 states for infrastructure are also top states for employment growth;
- 14 of the top 20 states for infrastructure had GDP growth above 2 percent; and

[11] Dan Mehan, President & CEO, Missouri Chamber of Commerce and Industry (Springfield hr'g).
[12] Missouri Chamber President Dan Mehan (Springfield hr'g), citing *Missouri 2030: An Agenda to Lead* at 20-21.
[13] *Id.* In addition, Rob Dixon, Director, Missouri Department of Economic Development, testified at the Columbia hearing that Missouri's number-one asset in terms of economic development is its central location.
[14] Rocky Moretti, TRIP (Columbia hr'g).
[15] Lindsey Douglas, Union Pacific RR, on behalf of the Missouri Railroads Association (Cape Girardeau hr'g).
[16] Mandy Brink, Missouri Port Authorities (Cape Girardeau hr'g); *see also* Mo. House of Reps., *Report of the Interim Comm. on the Development & Improvement of Missouri Ports* (Dec. 7, 2015).

- 6 of the top 20 states for infrastructure are either neighboring states or direct competitors to Missouri.[17]

Confirming these findings, various economic-development experts testified to the Task Force that leveraging Missouri's geographic location, natural resources, and existing highway and intermodal systems through strategic policymaking and greater investment would substantially benefit the economy, improve the quality of life for Missourians, and spur job growth.[18]

As Missouri enters the seventh decade of Interstate Highway System operation, members of the Task Force agree that there is no funding "silver bullet" or single solution to this pressing issue. Testimony was received from the National Council of State Legislatures (NCSL) and others indicating that states are now using a diverse mix of funding and financing sources to meet their transportation system needs.[19]

There is also recognition that the federal government is looking to states to self-fund more of their transportation needs as the federal Highway Trust Fund deficit grows. The Task Force heard several reports suggesting that a potential new federal infrastructure-funding package will require greater state matches and competitive bidding to obtain the federal dollars.[20] **States that are able quickly to respond to federal infrastructure opportunities with matching dollars and shovel-ready projects will benefit the most from a potential federal infrastructure-funding package.**

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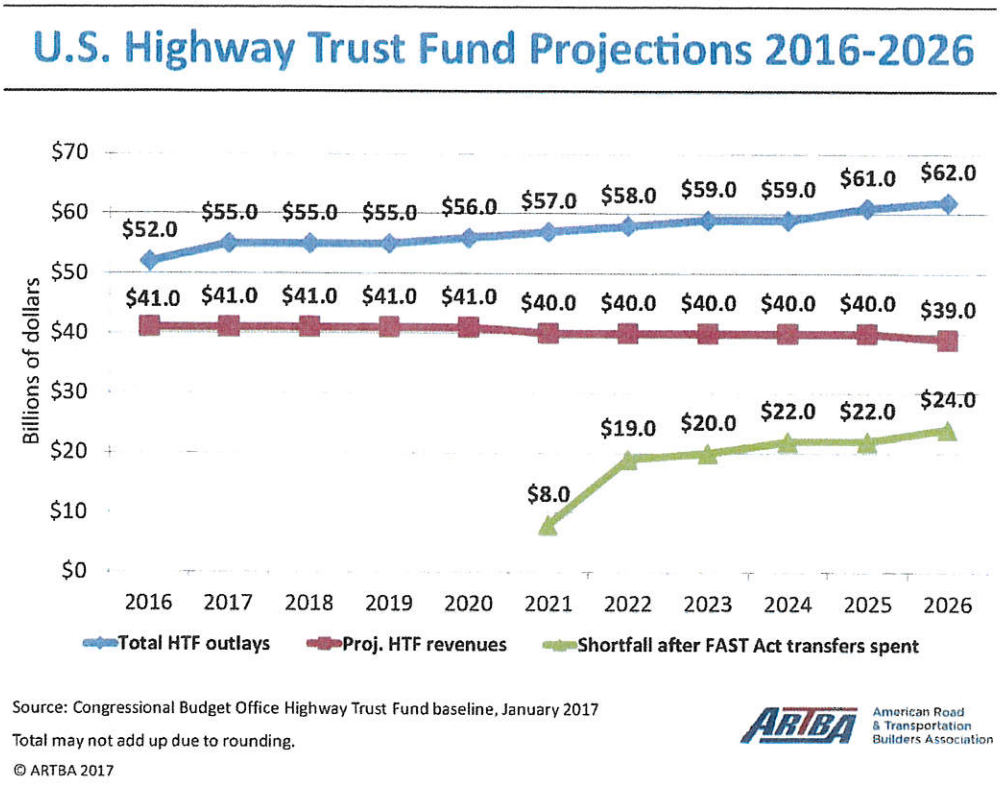
[17] Rob Dixon, Director, Missouri Department of Economic Development (Columbia hr'g).

[18] *E.g.*, Denise Hasty, Associated General Contractors of Missouri (Kansas City hr'g); Bob Wollenman, St. Joseph & Buchanan County Area (Kansas City hr'g); Dan Mehan, Missouri Chamber (Springfield hr'g); Ray McCarty, Associated Industries of Missouri (Springfield hr'g); Pat Peppin, Tri-State Development Area (Kirksville hr'g); Mandy Brink, Missouri Port Authorities (Cape Girardeau hr'g); Lindsey Douglas, Missouri Railroad Association (Cape Girardeau hr'g); Mary Lamie, St. Louis Freightway (Cape Girardeau hr'g).

[19] Kevin Pula, NCSL (Kansas City hr'g); Ananth Prasad, HNTB (former director of Florida DOT) (Kansas City hr'g); Denise Hasty, AGC of Missouri (Kansas City hr'g); Joung Lee & Jennifer Brickett, AASHTO (St. Louis hr'g); Adrian Moore, Reason Found'n (Cape Girardeau hr'g); Bob Poole, Reason Found'n (written testimony submitted for Columbia hearing); and others.

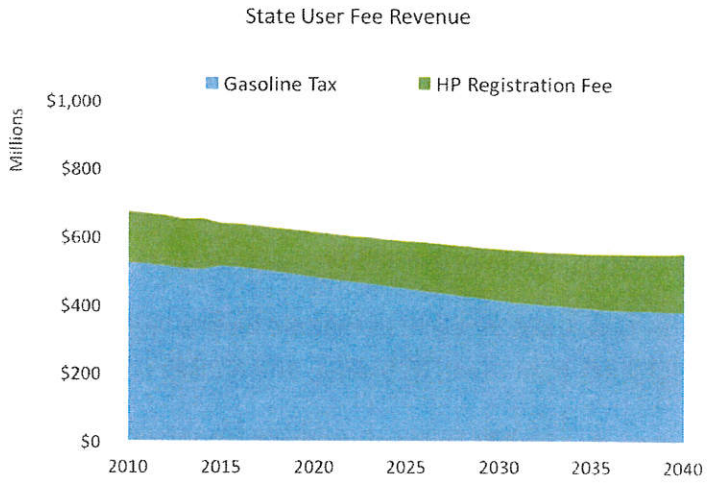
[20] Patrick McKenna, MoDOT (Kirksville hr'g) (reporting on meeting with federal and state transportation officials in Washington, D.C.); Bryan Nichols, Office of U.S. Representative Sam Graves (Kirksville hr'g) (remarking that the Trump administration favors more "skin in the game," such that federal matching funds will require more local and state funding); Joung Lee & Jennifer Brickett, AASHTO (St. Louis hr'g).

Figure 1: Projected Highway Trust Fund Shortfalls (billions of dollars)



As part of what is expected from any new federal funding for transportation infrastructure, states will need to explore new policies and approaches that leverage private-sector resources to fund and deliver important transportation projects. And the Task Force recognizes that many factors—ranging from inflation, increasing fuel efficiency of motor vehicles, the greater number of hybrid and electric vehicles, the coming proliferation of rideshare and autonomous vehicles options, and growing construction labor and material costs—have combined to make the existing substantial reliance on the state motor fuel tax (and to a lesser extent the vehicle sales tax) unsustainable in the long term.

Figure 2: Projected MoDOT Revenue Decline



Source: Missouri Dept. of Transportation

4.0 Missouri's transportation system needs

Our first century of paved highways has drawn to a close. The state's highways—having connected Missouri's citizens, farms and businesses to the global economy since the advent of commercial trucking and personal automotive ownership—continue to play a vital role in economic growth.

But ever-larger demands are being put on that system by changing patterns of personal use, commerce, and the global marketplace. And as those demands increase, there exists a persistently growing (yet continually deferred) need for funding resources to preserve Missouri's existing highway system and to improve the system, so that we can enhance our economic competitiveness in the 21st Century.

4.1 The benefits—and costs—of a large-scale transportation system

New demands on our system threaten Missouri's historic role as a transportation leader. Our long-time focus on connecting our citizens to each other, to Missouri destinations, to important services, and to potential economic opportunity has led us to create one of the nation's largest state transportation networks. **But all that we have accomplished in transportation is at risk because we lack sufficient funding for essential repair and maintenance, let alone adequate funds to adapt and expand the system to meet new and changing needs and prospects.**

In each of the public hearings, the Task Force heard from MoDOT's district engineers from the respective surrounding areas about the large numbers of roads and bridges that need significant repair and maintenance. These needs disrupt the economy and decrease highway safety. In addition, civic and business leaders described traffic congestion on metropolitan highways that hinder transportation reliability. They told about interchanges, additional highways lanes, and road extensions that need to be built (but haven't been due to lack of funds) to relieve traffic congestion, increase transportation reliability, and improve safety.

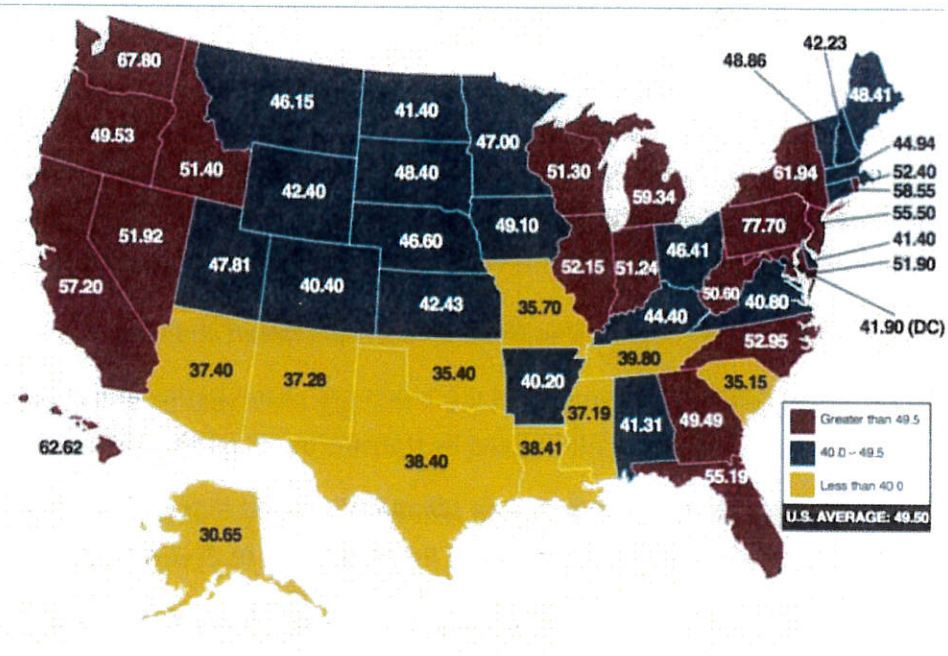


The Task Force recognizes that we have a large highway system. It consists of more miles of state highways than Iowa, Nebraska, and Kansas combined. Missouri has:

- 33,884 miles of roadway (America's seventh-largest state highway system); and
- 10,394 bridges (sixth most nationally);
- 97,000 miles of county roads and city streets, along with nearly 14,000 local bridges.

This robust transportation system is imperiled by Missouri's precarious transportation-funding situation. According to testimony and materials received by the Task Force, **Missouri has the fourth-lowest motor fuel tax in the country. Missouri ranks just 47th out of 50 states in terms of transportation revenues per centerline mile of state-maintained highway**. (Bordering states have two to five times as much revenue per centerline mile.) And Missouri does not have the benefit of user-based toll revenues (or Federal toll credits) enabled in several Midwestern peer states such as Kansas, Oklahoma, Kentucky, Illinois, Indiana and Ohio, among others.[21]

Figure 3: 2017 Fuel Tax Rates by State



Source: American Petroleum Institute

Questions were raised during Task Force meetings related to the large size of the state highway system and the geographic distribution of the state's available transportation revenues. However, through presentations, data and testimony provided by the Missouri Department of Revenue, MoDOT, and former Missouri highway commissioners, it was determined that the state is really dealing with a "size of the pie" funding issue and not a "slice of the pie" issue. Some concern was noted that the Highway Commission is not required to have a commissioner from every MoDOT geographical district. Still, the Task Force generally found that, on balance, the current funding distribution to be fair and equitable across state geographic regions.[22]

The size of Missouri's system—and the financial demands that imposes on the state—is issue enough. But other factors, like the age of the system, are problematic as well. Interstate 70, which runs through the heart of our state and connects Kansas City, Columbia, and St. Louis, carries nearly 30,000 vehicles

[21] *See, e.g.*, MoDOT, *Citizen's Guide to Transportation Funding in Missouri* (Nov. 2016); Kevin Pula, NCSL (Kansas City hr'g); Ananth Prasad, HNTB, former director of Florida DOT (Kansas City hr'g); Denise Hasty, AGC of MO (Kansas City hr'g) (submitting a comparison of Missouri's transportation statistics and contiguous states).
[22] Further discussed in sections 4.3 & 4.6.

per day in the rural areas, and as much as 100,000 vehicles per day in the metros. An estimated 3.8 million Missouri residents (more than 60 percent of Missouri's population) live in counties either through which I-70 travels or that are adjacent to such counties.[23] Interstate 70 is more than 60 years old, having begun construction in 1956 in Missouri as the first segment of the Interstate Highway System built in the United States.

Moreover, a large portion of state-maintained bridges have surpassed their 50-year design lives. The Task Force heard, for example, about the need to replace the Buck O'Neil Bridge (formerly known as the Broadway Bridge), which spans the Missouri River in Kansas City. The bridge first opened for traffic in 1956 and now carries traffic of 40,000 – 45,000 vehicles per day.[24] Accordingly, the necessity of securing additional transportation funding in Missouri is becoming increasingly dire.

4.2 Trends affecting Missouri transportation challenges and solutions

A variety of factors currently are at work that are exacerbating and accelerating the challenges Missouri is confronting in addressing its transportation needs. They include:

Future decline in quality and reliability of state highway system due to unfunded maintenance and construction needs leading to declining asset condition and performance.

In the short term, existing asset-management expectations from regions, cities, and counties will prove unsustainable. Major river bridges now "coming due" for replacement, several with costs as high as $200 million to $250 million, have no identified revenue source. Rural highways, many of which serve isolated communities, could see highway conditions and performance notably deteriorate, possibly resulting in a negative economic impact. Missouri farmers and manufacturers will likely face greater difficulty in getting their products to customers.

Costs resulting from underinvestment in infrastructure.

Missourians pay a relatively small amount of direct costs per month (about $30) in highway-user fees to use the state system of roads and bridges. But the effective monthly cost per driver—because of hidden transportation costs—is much higher. Such hidden costs include:

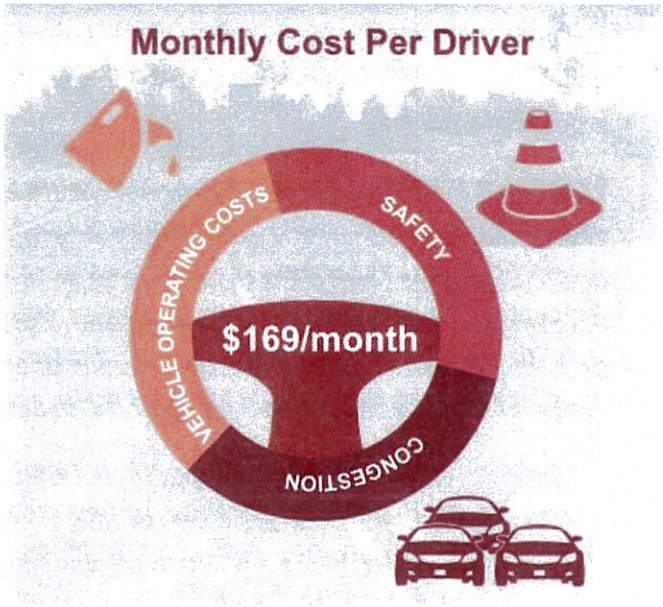
- Costs due to traffic congestion, including loss of productivity and opportunity, wasted fuel, and adverse effects on the quality of life;
- Costs in operating and maintaining a vehicle on rough roads, manifested in accelerated vehicle depreciation, additional vehicle-repair costs, increased fuel consumption, and increased tire wear; and
- Costs due to roadway crashes.[25]

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[23] Dan Atwill, Boone County Presiding Commissioner (Columbia hr'g) (discussing the need to improve I-70).
[24] Sly James, Mayor, Kansas City (Kansas City hr'g).
[25] MoDOT, *Citizen's Guide to Transportation Funding in Missouri* at 32-33 (Nov. 2016).

More specifically, traffic-data calculations show an annual economic loss of $575 million resulting from congestion in the urban areas of St. Louis and Kansas City and along rural Interstate 44 and Interstate 70. The cost of congestion in Kansas City and St. Louis have increased every year since 2013 along with the volume of traffic. The economic cost to Missouri drivers from congestion averages $43 per month per driver. The hidden additional costs of driving on rough roads in Missouri has been calculated to be $33 per month for Missouri drivers, or a total cost of $1.7 billion each year in the state.[26] And motor-vehicle crashes cost Missourians $4.8 billion each year, or about $93 per month for each driver. **When combined with the increased costs of vehicle operations due to poor road conditions, and the costs associated with crashes resulting from under investment in roads and the need for better highway-safety regulation, the total cost per month per driver is $169 per month.**[27]

Figure 4: Condition Cost for Missouri

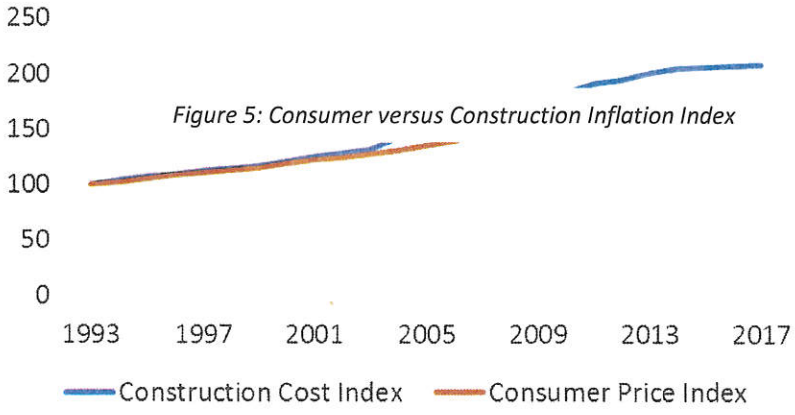


Source: Missouri Dept. of Transportation

Declining purchasing power and inflation.

Missouri struggles with transportation funding largely because the principal revenue source for transportation—the volume-based excise motor fuel tax of 17 cents per gallon for both gasoline and diesel[28]—has continually lost purchasing power for decades.[29] **Over the past 20 years, inflation has eroded the purchasing power of the 17-cent excise motor fuel tax to eight cents today.** This means that the excise fuel tax can purchase only 47 percent of materials and

Figure 5: Consumer versus Construction Inflation Index



Source: Missouri Dept. of Transportation

[26] One national transportation group estimates an even higher number for the cost to Missourians from driving on rough roads. Rocky Moretti of TRIP testified that TRIP estimates that the average annual cost to Missouri motorists is $604, higher than the national average of $553 per driver and higher than all of Missouri's surrounding states other than Oklahoma.
[27] *Id.* (citing Texas Transportation Institute, *2015 Urban Mobility Scorecard*; Road Information Program, *Missouri Transportation by the Numbers* (2015); and National Highway Traffic Safety Administration, *Economic and Societal Impact of Motor Vehicle Crashes*, 2010 (rev. 2015)).
[28] Mo. Rev. Stat. § 142.803.
[29] Patrick McKenna, Director, MoDOT (Jefferson City, Kansas City hr'g); Kevin Pula, NCSL (Kansas City hr'g) (discussing that the failure of many states to adjust for inflation has led to lagging transportation resources in many states);

labor necessary for road construction that it purchased in 1996, the last time the state increased its motor fuel tax. **To account for inflation over the past 20+ years, the motor fuel tax would have to be 27 cents today in order for it to effectively have the same purchasing power as it did in 1996.**

Compounding the problem, the federal gasoline tax (18.3 cents per gallon on gasoline and 24.3 cents per gallon on diesel), which is the primary source of federal transportation dollars, has not been adjusted since 1993. The federal gasoline tax has no gone longer than ever before without an adjustment in rate.[30]

Task Force members discussed how the nature of the motor fuel tax (*i.e.*, a static, volume-based amount) differs from many other forms of taxation that are percentage-based. **The motor fuel tax does not change regardless of what goes on in the market, unless it is statutorily changed.** Percentage-based taxes, on the other hand, like the state sales tax or property taxes, effectively *keep up with inflation without any required adjustment* to the rate because the costs of the goods or property that are being taxed go up or down according to inflation or other market conditions.

To maintain the transportation system, periodic increases in the excise motor fuel tax must occur to prevent losses in purchasing power, or new transportation-revenue sources must be found, to keep the existing transportation system in proper shape and to add capacity for additional demands. In Missouri, adjustments in the fuel tax to account for these trends have not occurred for several decades, leading to the stressful funding situation at hand.

As this discussion illustrates, and as the Task Force heard from several persons, if insufficient resources cause the state to not adequately maintain the state's infrastructure assets, their repair or replacement eventually will cost the state more, *either* because the physical need to repair or replace will have gotten worse *or* because the construction costs will have increased due to inflation, *or both*. As President Ronald Reagan said when he signed legislation to increase the federal motor fuel tax in 1983, "Common sense tells us that it will cost a lot less to keep the system we have in good repair than to let it disintegrate and have to start over from scratch."[31]

Construction price index outpaces both general inflation and growth in motor fuel tax revenue.

Although consumers experience and understand price inflation generally, it affects specific sectors in distinct ways. One example of this is the construction industry, which recently has experienced higher inflation than consumers. The consumer price index (CPI) reports an increase of about 68 percent from 1993 through 2017. By contrast, the construction price index reports an increase of 209 percent from

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[30] Joung Lee & Jennifer Brickett, AASHTO (St. Louis hr'g).

[31] Ronald Reagan, *Remarks on Signing the Surface Transportation Assistance Act of 1982* (Jan. 6, 1983), as quoted by Chairman Kevin Corlew in the November 8, 2017 working meeting of the Task Force (Jefferson City).

1993. This means that, for every $1.00 spent on materials and labor inputs for a project in 1993, the same inputs would require $2.09 today.[32]

Increasing vehicle fuel efficiency flattens or depresses motor fuel tax revenue.

A volume-based excise fuel tax generally provides a steady revenue source for transportation. It provides growth, however, only when inflation is flat and motorists consume a greater volume of fuel commensurate to travel demand. Over the past two decades, inflation has been relatively low. But even relatively low inflation will, over time, erode the purchasing power of the dollar if motorists don't consume a lot more fuel and thereby pay more fuel taxes.

However, most vehicles have become more fuel efficient, not less, spurred largely by federal mandates imposed upon automotive manufacturers and partly by consumer preference.[33] Moreover, electric vehicles ("EVs"), both plug-in and hybrids, are becoming more popular and accessible to consumers. Plug-in EVs are expected to reach more than 7 percent of annual vehicle sales by 2025.[34] It is estimated that by 2040, most new vehicles will be either a plug-in EV or a hybrid.[35]

As a result, **vehicles in the state have become more fuel efficient and Missouri drivers are driving more miles, placing an even greater burden on the existing road system (at the same time that construction costs have risen[36]) without raising additional revenue**. The upshot is that there is *more wear and tear* on the system but *less revenue to pay* for the additional upkeep.

Missouri's unique horsepower-based registration fee is an outdated and unreliable funding source.

Missouri's current vehicle registration fee—the only one of its kind in the country—derives from a vehicle's "taxable horsepower," a figure calculated from the ratio of cylinder bore diameter to number of cylinders in the engine. When developed in 1910, taxable horsepower and engine horsepower were roughly equivalent and correlated with fuel consumption. However, evolving engine design (including the shift away from internal combustion engines to electric motors) means that the values for taxable horsepower and actual engine horsepower have diverged dramatically.

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[32] Several witnesses testified about increasing transportation-construction costs, including Patrick McKenna, MoDOT Director (Jefferson City, June); Zach Green, Delta Companies Inc. (Cape Girardeau hr'g); Kenneth Lieschedt, MO/KS Chapter American Concrete Pavement Association (Cape Girardeau hr'g); Chip Jones, Emery Sapp & Sons, Inc. (Columbia hr'g); and others.

[33] Several persons testified about fuel efficiency including Michael Demers, MoDOT (St. Louis hr'g), Kevin Pula, NCSL (Kansas City hr'g), among others.

[34] Edison Electric Institute, *Plug-in Electric Vehicle Sales Forecast Through 2025 and the Charging Infrastructure Required* at 1 (June 2017), submitted to Task Force at St. Louis hearing by Alex Eaton, representing Tesla.

[35] Michael Demers, MoDOT (St. Louis hr'g).

[36] Kevin Pula, NCSL (Kansas City hr'g) (discussing the impact of increasing CAFE standards in relation to construction-cost growth).

Because taxable horsepower calculations no longer reflect actual horsepower or correspond to fuel consumption, **the current registration system does not reflect the vehicle or driver use of the highway system**. This presents policy challenges around both fairness (*i.e.*, some pay a great deal while others pay nothing for use of the road network) and revenue sustainability. As more drivers shift to higher-MPG internal-combustion engines, gas tax revenues will decline on a per-mile basis. As they shift to electric vehicles which have zero taxable horsepower, owners would not only pay no motor fuel taxes, but also avoid the base registration fee (absent an alternative-fuel-decal fee).

Operational limitations may present a more significant issue in the short term. Vehicle manufacturers no longer publish calculations of taxable horsepower, and because hybrid, plug-in hybrid, and plug-in EVs have entered the consumer market, the Missouri Department of Revenue has had limited capacity to capture those vehicles accurately in its vehicle registration system. The most recent chart of taxable horsepower published by the state dates from 2014[37] and does not include EV makes such as Tesla or models such as Chevy Bolt. While these vehicles still represent a small portion of Missouri's total passenger fleet, their numbers are growing and will continue to grow.[38] In short, **current vehicle-registration-fee revenues will decrease over time, unless the calculation used to determine the registration fee is changed**.

Increasing demands on the transportation system.

Despite the stagnancy of State Road Fund revenues, as vehicles with greater fuel efficiency become a large portion of the statewide vehicle fleet, the amount motorists use the highway system—measured by total VMT—is expected to continue to increase. At present, there is no reason to assume that VMT will decline on a per capita basis, further supporting increased funding for highway and bridge preservation. Moreover, population increases and greater economic output in certain metropolitan areas mean that a more robust transportation network is needed in such areas.[39]

Motorists are expected to continue to drive an equal or greater number of miles per year. But they'll do so using increasingly fuel-efficient vehicles that will place a greater demand on the state highway

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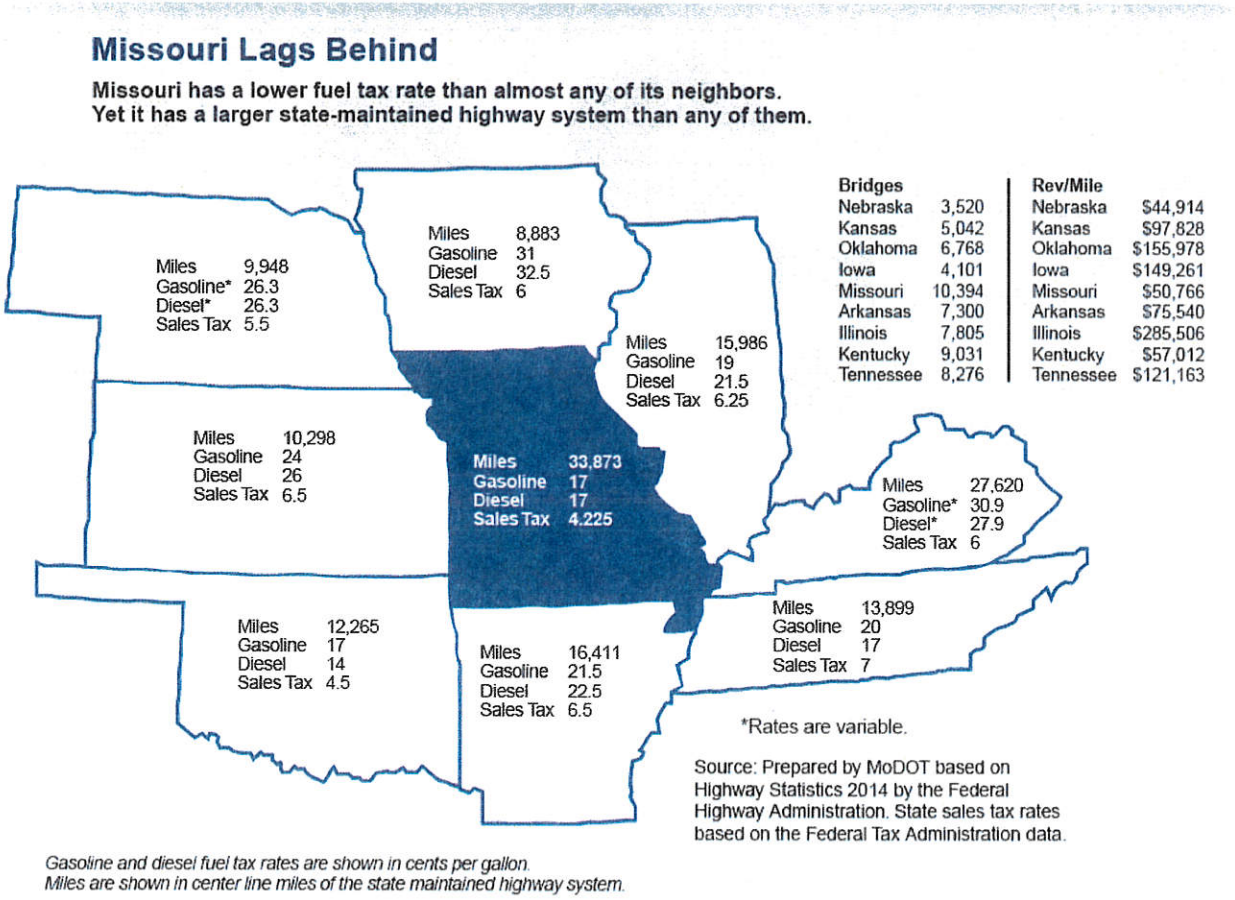
[37] http://dor.mo.gov/pdf/taxablehorsepowerchart.pdf

[38] Several automobile manufacturers have announced plans for more EVs. *See, e.g.*, Alex Davies, *General Motors is Going All Electric* (Oct. 2, 2017), *available at* https://www.wired.com/story/general-motors-electric-cars-plan-gm/ (last visited Jan. 1, 2018); Jack Ewing, *Volvo, Betting on Electric, Moves to Phase Out Conventional Engines*, NY Times (July 5, 2017), *available at* https://www.nytimes.com/2017/07/05/business/energy-environment/volvo-hybrid-electric-car.html (last visited Jan. 1, 2018); David Reid, *Toyota says all it cars will have an electric or hybrid option by 2025*, CNBC (Dec. 18, 2017), *available at* https://www.cnbc.com/2017/12/18/toyota-says-all-its-cars-will-have-an-electric-or-hybrid-option-by-2025.html (last visited Jan. 1, 2018).

[39] *See, e.g.*, Platte County EDC, *Why Platte County*, at https://www.plattecountyedc.com/start-locate-expand/why-platte-county/ (last visited Dec. 27, 2017) (stating that Platte County's population has increased 25 percent since 2000); Northland Regional Chamber of Commerce, *About the Northland*, at https://www.northlandchamber.com/northland (last visited Dec. 27, 2017) (stating that "Clay County over the past five years has averaged nearly 20 percent population expansion. Such population growth has not only brought considerable momentum to the region's retail markets, but also fueled a significant economic boom in the construction industry.").

system while less revenue will be generated from fuel taxes. Over time, this trend will create a trend of perpetual decline unless changes are made to existing transportation revenue structures in Missouri.

Figure 6: Missouri System Mileage and Tax Rates Compared with Surrounding States

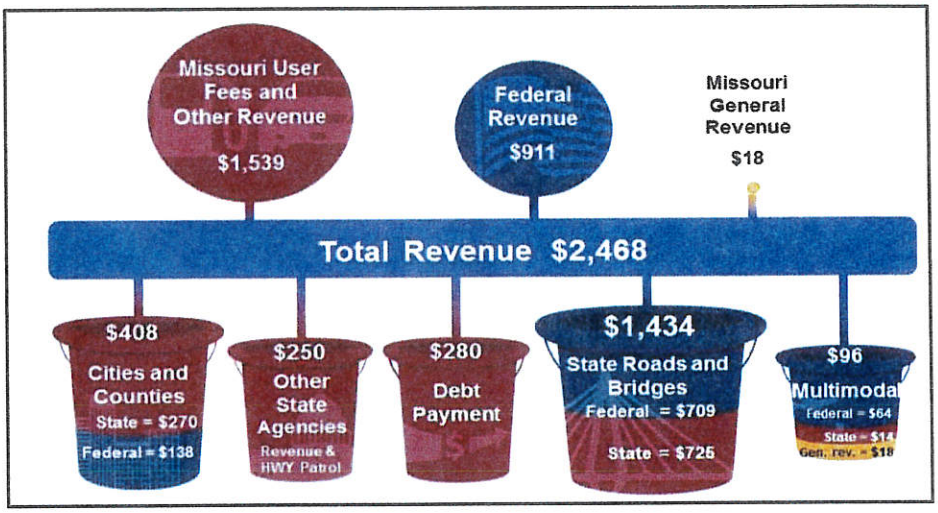


Source: Citizen's Guide to Transportation Funding in Missouri

4.3 Missouri's system needs – where the money goes

Missourians experience the work done by MoDOT and its more than 3,000 field employees in diverse ways: road and bridge construction; pavement repairs and sealing; striping; winter operations; bridge maintenance; traffic signs and signals; mowing; flood/road closures; ditches/drainage; litter/debris removal; incident response; and customer service. To pay for these activities and more, the State of Missouri draws on several revenue sources to raise the approximately $2.5 billion spent on its transportation system, with nearly two-thirds of revenue coming from state user fees and the other third coming from federal user fees. In 2016, funding was allocated as follows:

Figure 7: Missouri Transportation Revenue Allocations



Source: Citizen's Guide to Transportation Funding in Missouri

- $1,434 million (58 percent) to construct, operate and maintain the system, as well as capital resources for preservation and system expansion;
- $408 million (17 percent) for Missouri cities and counties;
- $280 million (11 percent) for debt service;
- $230 million (9 percent) to the State Highway Patrol to administer and enforce state motor vehicle laws and traffic regulations; and
- $20 million to the Missouri Department of Revenue to collect and administer the revenue.
- About four percent of revenues—derived from general appropriations and not the State Road Fund—also goes to multimodal transportation such as rail, waterways and ports, and transit.

More specifically, after the money is distributed to cities, counties, debt service, and the State Highway Patrol, MoDOT is left with just under 60 percent of transportation revenue for state roads and bridges. This is spent in five broad categories:

- The Construction Program is the largest expense category, totaling $808 million in 2016, and includes payments to contractors, engineering costs, and right-of-way acquisition.
- Maintenance totaled $430 million in 2016 and includes the cost for services performed by MoDOT such as snow plowing, mowing, bridge maintenance, signing, striping, sweeping, lighting, as well as the tools, utility costs, and materials within the maintenance buildings.

- Fleet, Facilities, and Information systems accounted for about $79 million in 2016 and includes the cost of purchasing MoDOT trucks, constructing and maintaining MoDOT buildings as well as providing staff with the technology to perform maintenance and engineering functions.
- Administration totaled $52 million in 2016 for salaries and benefits, among other expenses. MoDOT's administrative costs are the 2nd lowest in the country.
- Highway Safety Program accounted for $19 million spent in 2016 on costs for improving roads and bridges for reducing fatalities and injuries along with salaries and wages associated with the safety program and improvements.

Not included above is multimodal transportation, which, after mandated transportation expenditures for state roads and bridges, receives only about four percent of revenue. Multimodal transportation involves non-highway modes such as transit, aviation, railroads and waterways. MoDOT administered $95 million in 2017 for multimodal needs (with $62 million from federal funds)[35] including the following:

- Aviation - $38.7 million (including $30 million federal);
- Transit - $30 million (including $25 million federal);
- Rail - $17 million (including $7 million federal);
- Waterways - $4.5 million;
- Freight - $1 million; and
- Operating Costs to administer multimodal programs - $2.8 million (salaries, wages).

In addition, Missouri has identified several goals as part of the long-range 20-year transportation plan:

1. Take care of the transportation system and services we enjoy today. (Maintain Current System);
2. Keep all travelers safe, no matter the mode of transportation. (Safety);
3. Invest in projects that spur economic growth and create jobs. (Growth and Expansion); and
4. Give Missourians better transportation choices. (Options for Convenience).[40]

The Task Force also learned about the Missouri State Highway Patrol,[41] which receives funding for administering and enforcing the state's motor-vehicles laws and traffic regulations from the state road fund, as required by the state's constitution.[42] With the legislative genesis of the Missouri State Highway Patrol in 1931, employing 55 troopers and a handful of support staff, to a compliment now of 1,254 troopers and 1,126 civilian employees, the focus of serving the state of Missouri has not changed.

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[35] MoDOT Financial Snapshot, http://www.modot.org/about/documents/FinancialSnapshot.pdf
[40] Missouri Long Range Plan Update, http://www.modot.org/LRTP/documents/LRTPFactSheet92017.pdf
[41] Colonel Sandra Karsten, Missouri State Highway Patrol (Cape Girardeau hr'g).
[42] Mo. Const. art. IV § 30(b).

Funding for the Patrol's operations comes from a variety of sources, with a majority coming from state highway funds as required by the state constitution. In the Patrol's FY18 operating budget, 71.2% of its appropriations are Highway funded. Since FY05, the average yearly appropriation has been 71.5%. The Patrol is audited on an annual basis to ensure that its Highway funding is spent for highway-related purposes. The most recent audit shows that the Patrol is in compliance.

In addition to the main responsibilities on the roadways, the Patrol is also responsible for administering driver examinations, performing school-bus inspections, overseeing the motor-vehicle inspection program, enforcing commercial-vehicle regulations, as well as serving as the central repositories for criminal records and crash reports for the state.

The Missouri State Highway Patrol is also called on for responses to significant weather events, civil disturbance, and major highway incidents that affect travel on the highways around the state. Much of the planning and coordination for these events is done with MoDOT officials, with the overall goal of safety on Missouri's roadways.

Additionally, the Patrol provides criminal laboratory services to all Missouri criminal-justice agencies. The Patrol's Crime Lab received 28,678 total cases in 2016; 80% of which were from outside agencies. More than 600 outside agencies utilize the Patrol's Crime Lab. The services provided by the Patrol's Crime Lab were done at no cost to the submitting agencies.

Along with staffing, vehicles and facilities are required for the Missouri State Highway Patrol's daily operations. The Patrol's Fleet and Facilities Division directs the procurement, assignment maintenance, repair, and eventual sale of the Patrol's fleet of late model vehicles. Patrol vehicles log nearly 30 million miles each year. Major facilities around the state include nine troop headquarters, the General Headquarters and annex, along with the Patrol's Law Enforcement Academy. The average age of these facilities is 45 years, with the oldest, Troop I, built in 1949, and the newest, Troop C, built in 2008.

4.4 Unfunded transportation priorities in Missouri and how much it would cost to fund them

Based on that long-range plan and other needs identified by Missourians, MoDOT has identified an $825-million annual gap that would need filling to meet all unfunded needs.[43] These needs can be categorized as:

Improve Roads and Bridges

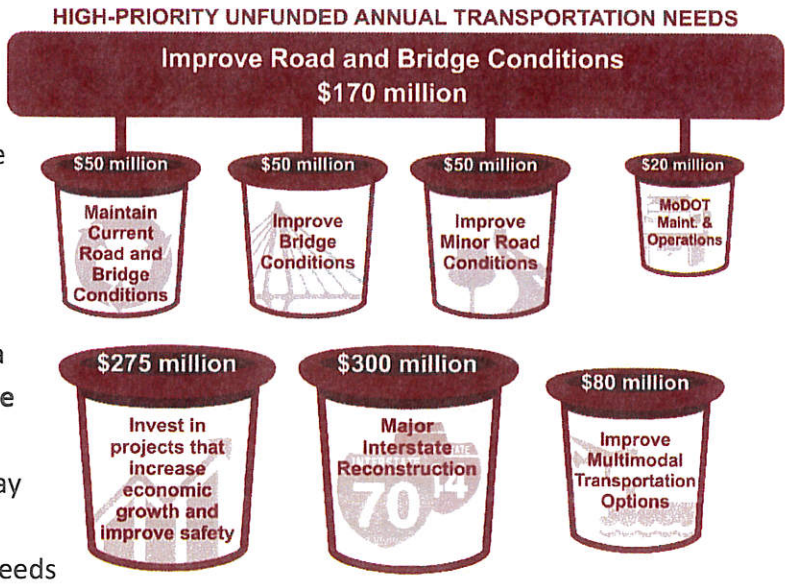
With an additional $170 million per year, all districts of Missouri would be able to maintain their existing system. This would be equivalent to a mere $3.30 per month from every Missouri driver.

[43] Because it would take an extensive, long-term, and expensive study to independently determine the amounts of unfunded transportation in Missouri, the Task Force generally accepts these amounts that were presented to it by MoDOT. The Task Force heard no substantiated testimony that called into question these figures.

Increase economic growth and improve safety

Projects in local communities that benefit residents daily, such as new interchanges, additional driving lanes, improved shoulders, and more rumble strips, could be accomplished with an additional $275 million per year ($5.34 per month per driver). MoDOT would collaborate with the metropolitan and regional planning organizations to allocate and prioritize projects across the state.

Figure 8: Unfunded Annual Transportation Needs

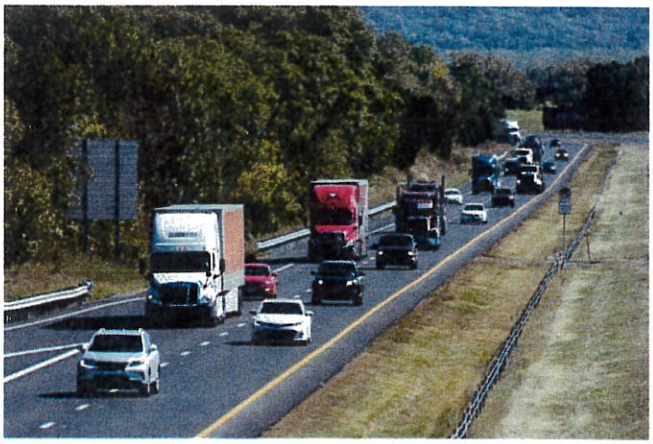


Source: Missouri Dept. of Transportation

Reconstruct Interstates

Missouri's interstate highways were constructed in the 1950s and 1960s with a 20-year life expectancy. **Improvements are long overdue, and we can no longer put them off.** Missouri highways are a mainstay for the increasing cross-country traffic, specifically long-haul trucks. The system needs additional capacity to handle its steady volume of customers. It would take an additional annual investment of $300 million ($5.82 per month per driver) to finally make this a reality.

Our failure to adequately reconstruct our interstates has a long-term, hidden cost for Missouri. When talking about the needs of I-70, I-44 and others, it is easy to frame the discussion as risking the diversion of truck traffic away from Missouri to other interstates, such as Interstate 80 to the north, and with it the loss of fuel purchases and other comparatively small commercial transactions. What often goes unsaid is the risk—if diversions become so great for such an extended period—that the manufacturers, distributors and others who generate the truck traffic will also move to those other corridors to eliminate delay, distance and inconvenience. Those losses—in jobs, local investments and tax



revenues—become permanent, putting Missouri at a competitive disadvantage sustained over years or decades.[44]

Improve Multimodal Transportation Options

Providing cost-effective multimodal options for Missouri businesses and residents would add efficiency and resiliency to our state's economy. Even a small investment of about $80 million (about $1.55 per month per driver) would allow MoDOT to give attention to transit, railroads, waterways, bike/pedestrian facilities, airports, and more. **Expanding the state's portfolio of transportation is an inexpensive way of attracting and retaining new and existing residents and businesses, especially as transportation preferences shift in new directions.**

Taken together, meeting all of Missouri's unfunded needs ($825 million annually) would cost Missouri drivers about $16.00 a month. Ironically, this likely would represent a decrease in the costs Missourians currently pay in hidden costs (due to congestion, vehicle wear and tear, fuel costs, and vehicle crashes)[45] for a system that fails to meet our pressing needs.

4.5 Efforts by the Missouri Highways and Transportation Commission and MoDOT to efficiently meet Missouri's transportation needs

As part of its evaluation, the Task Force inquired about MoDOT's efficiency. The Task Force learned that, anticipating the potential for future funding issues, the Missouri Highways and Transportation Commission ("MHTC") and MoDOT have in recent years undertaken several initiatives for operating more frugally and efficiently.[46] Consequently, **MoDOT currently ranks 12th nationally in highway performance and cost effectiveness despite its constrained funding situation.**[47] (It also ranks 2nd lowest in administrative costs and 50th among U.S. DOTs in terms of employee pay.)[48]

Practical Design was one of the earliest MoDOT efforts to improve efficiency.[49] In 2005, MoDOT created this systematic approach for developing efficient solutions that deliver the best value for the least cost over the entire life cycle of a project. The goal was to build the most efficient solution to meet exactly the requirements of a project—no more, no less—so that MoDOT can invest in more projects and address more transportation needs across the state.

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[44] The Task Force also heard that Missouri's reduced infrastructure investment has resulted in losses in jobs in the construction and materials industries. *See, e.g.*, Zach Green, Delta Companies Inc. (Cape Girardeau hr'g); Kenneth Liescheidt, MO/KS Chapter American Concrete Pavement Association (Cape Girardeau hr'g); Chip Jones, Emery Sapp & Sons, Inc. (Columbia hr'g); and others

[45] *See supra* notes 24-26, and accompanying text.

[46] Patrick McKenna, Director of MoDOT, provided testimony regarding efficiency measures taken by the department, as did Jim Anderson and Steven Miller, former Highway Commissioners.

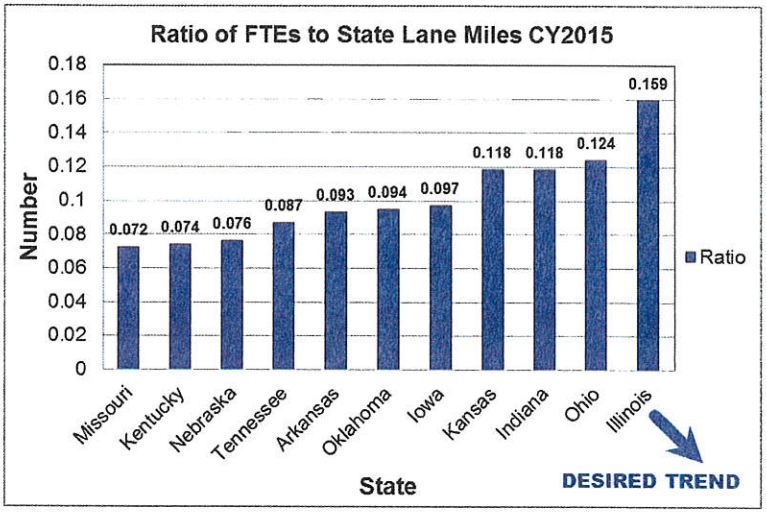
[47] MoDOT *Results* Report 2007-2016, presented to the Task Force at the June 2017 meeting in Jefferson City.

[48] *ibid*

[49] MoDOT, *Practical Design*, at http://www.modot.org/business/documents/PracticalDesignImplementation.pdf (last visited Dec. 27, 2017).

In 2011, the Missouri Highways and Transportation Commission (MHTC) approved the *Bolder Five-year Direction Plan* to reshape and resize MoDOT to operate more efficiently.[50] During the first five years, this effort achieved $512 million in savings from a combination of staffing, facility, and equipment reductions and redirected services and budgets. Such savings continue to accrue at approximately $100 million per year, bringing total savings to date over $800 million. More than 1,200 full-time staff positions were eliminated, 131 MoDOT facilities were closed and 740 pieces of equipment were sold. The savings were invested into the state highway system.

Figure 9: 2015 Ratio of FTEs to State Lane Miles



Source: Missouri Dept. of Transportation

In 2015, the MHTC announced the *Road to Tomorrow*, an initiative for making Interstate 70 available to the nation and the world as a laboratory for constructing the next generation of highways.[51] Private-sector entrepreneurs and innovators were invited to bring their products and ideas for collaborating with MoDOT on new and innovative ways to rebuild the aging highway with modern technologies and new means of funding transportation. The Task Force particularly heard about the importance of I-70 to the state's transportation network at the Kansas City and Columbia public hearings.

Task Force members heard some negative comments about the state's transportation-construction efforts in the 1990s. Some trace the beginnings of MoDOT's funding issues to the failure of its 1992 15-year transportation program.[52] When the program was suspended in 1998, the program was behind schedule. MoDOT projected that it would complete only 21 percent of scheduled projects eight years into the program.

Since then, however, MoDOT has worked diligently to win back the trust of Missourians, and the sense of the Task Force would suggest that MoDOT has succeeded. For the most part, public testimony

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[50] Patrick McKenna, Director, MoDOT (June 28, 2017, Jefferson City hr'g); *see also* http://boonslick.org/wp-content/uploads/2011/05/Rightsizing-Plan.pdf (last visited Dec. 27, 2017).

[51] MoDOT, News Release (June 3, 2015), *at* http://www.modot.org/road2tomorrow/documents/15-06-03FINALpressrelease.pdf (last visited Dec. 27, 2017).

[52] *See* MoDOT, *15-Year Plan Analysis* (1998), at http://www.modot.org/pdf/newsandinfo/15yrplan.pdf (last visited Dec. 27, 2017) (concluding that the 15-year plan was not financially viable because of flawed cost assumptions and lagging state and federal transportation funding).

regarding the performance and efficiency of MoDOT was positive. In addition, the Task Force was informed about recent positive results in a customer-satisfaction survey, including:

- 83 percent of Missourians are satisfied with MoDOT (28 percent very satisfied);
- 87 percent trust of Missourians MoDOT to keep its commitments; and
- 86 percent of Missourians want more transportation funding.[53]

The department enjoys high customer-satisfaction ratings despite some growing concerns about its ability to meet the public's transportation needs due to funding constraints. And the Task Force heard from business owners and Missouri citizens who believe that MoDOT is doing a good job of maintaining and improving the state's transportation system with the limited funding available today.

4.6 Other state efforts to resolve Missouri's system needs

Many of the efforts over the past couple of decades to find funding solutions overlapped with a period in which MoDOT was re-establishing to the satisfaction of Missourians that it could deliver meaningful projects on time and as promised. And there was some success as the department's reputation improved.

In 2000, the General Assembly empowered MoDOT to use bond financing up to $2.25 billion to accelerate highway improvements from 2002 to 2006. In 2004, voters approved Constitutional Amendment 3. It required all revenues collected from the sale of motor vehicles to be used for the purposes of roads and bridges. (Previously, half of the vehicle sales tax was used for roads while half went to the state's general revenue fund.) The amendment also required the Missouri Highways and Transportation Commission to issue bonds for building highway and bridge projects, using half of the revenue from the vehicle sales tax to pay back the bonds.

The General Assembly established Blue Ribbon committees in 2004 and 2012 to examine how best to meet the state's transportation needs. The 2004 committee's recommendations[54] led to many of the MoDOT programs and improvements discussed elsewhere in this document.

The 2012 commission's recommendations[55] helped spark a debate that led to the proposed Constitutional Amendment 7 being presented to Missouri voters in 2014. The ¾-cent sales tax could've raised $5.4 billion for state and local transportation projects, while freezing the fuel tax during the same 10-year period, but it was defeated 59 percent to 41 percent. Based on testimony before the Task Force, the 2014 proposal likely was rejected because it sought to impose a general *sales tax* (as

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[53] Patrick McKenna, Director, MoDOT (Dec. 13, 2017) (Columbia hr'g); *see* MoDOT, *A Report Card from Missourians*, Final Report (2017), *available at* https://library.modot.mo.gov/RDT/reports/TR201522/cmr17-011_FinalReport_red.pdf (last visited Jan. 1, 2018).

[54] *See* MO Highways & Transportation Comm'n, *MHTC Responses to Blue Ribbon Panel Recommendations* (Jan. 16, 2004), at http://www.modot.org/highlights/documents/Commissionresponse.pdf (last visited Dec. 27, 2017).

[55] *See* The Blue Ribbon Citizens Committee on Missouri's Transportation Needs, Final Report (Dec. 2012), *available at* http://mptaonline.typepad.com/2013combinedBRCReport.pdf (last visited on Dec. 27, 2017).

opposed to a direct user fee/tax, such as a motor fuel tax) in a state that already was ranked 14th in terms of sales-tax burden and the proposal was not focused sufficiently on highway funding, among other reasons.

The General Assembly has struggled to find support for long-term, sustainable transportation funding and delivery options. It has considered but not passed fuel tax increases, sales taxes, tolling, general revenue appropriations, and other alternatives.

In recent years, legislation has been introduced to reduce the number of roads MoDOT is responsible for maintaining by transferring roads to the counties in which they lie if those roads are not available to receive federal financial aid. (MoDOT spends $27 million on average annually on non-federal aid routes.[56]) Others have suggested that the "lettered roads" be transferred to counties for maintenance. While such legislation has not passed, the idea of transferring some of the farm-to-market roads to local jurisdictions to reduce the size of MoDOT's system (effectively "stretching" MoDOT's budget) was discussed during several of the Task Force meetings.

Although reducing the overall size of the system could increase the number of dollars MoDOT could spend on the state's interstate and highway system, testimony heard at the Task Force meetings in Kansas City, Springfield, and Kirksville, as well as others, brought to light the increased burden this would place on the counties.

Testimony received indicated that many counties across the state had neither the equipment nor the expertise to properly maintain the roadways that would be transferred to the counties. (Nor was a sustainable funding source identified for improving the roads before they would be handed over to county control, given that there currently is insufficient funding to repair or replace those roads) Also, local jurisdictions would not be able to match the buying power (or economy of scale) the state has in procuring materials, which effectively would increase the cost to maintain these roadways.

Furthermore, so as not to impose an unconstitutional "unfunded mandate" on local jurisdictions, it was discussed that the state would most likely have to provide funding to the counties along with transfer of the roads. Thus, there was a question whether it would be more efficient for the state to maintain control of the roads or for the counties to do so (albeit with state dollars). Ultimately, based on the volume of testimony received, the Task Force chose against reducing the size of Missouri's transportation system as a potential approach.

The Task Force also explored the option of legislatively finding efficiencies within the state general revenue fund that could be allocated to address state transportation-funding needs. Although Task Force members generally agree that more efficient governing is something to be strived for, there were expressed concerns with the notion of basing transportation-funding solutions on the state's

[56] Patrick McKenna, Director, MoDOT (June 28, 2017) (Jefferson City hr'g).

general revenue. Transportation would annually have to compete with other state needs (such as education and health care) for general-revenue appropriations in an already-tight state budget.[57] General revenue could be perceived as too far removed from a direct user fee for transportation use. The state general fund is also subject to short-term appropriations when transportation projects require multi-year commitments to fund and implement.

A general-revenue-funding method would require a "lockbox" to provide the necessary funding sustainability, similar to how the Missouri constitution cabins the use of motor fuel taxes and vehicle sales taxes only for transportation purposes. Across the country, states have seen that if they cannot secure this lockbox, the sustainability of the general revenue funding for transportation becomes challenging when faced the budget constraints for other state needs. For instance, Task Force members have heard the Kansas' transportation sales tax referred to in jest as the "Bank of Kansas" in recent years, and Illinois and Wisconsin have worked diligently to pass enabling legislation to lockbox their state's transportation funding.

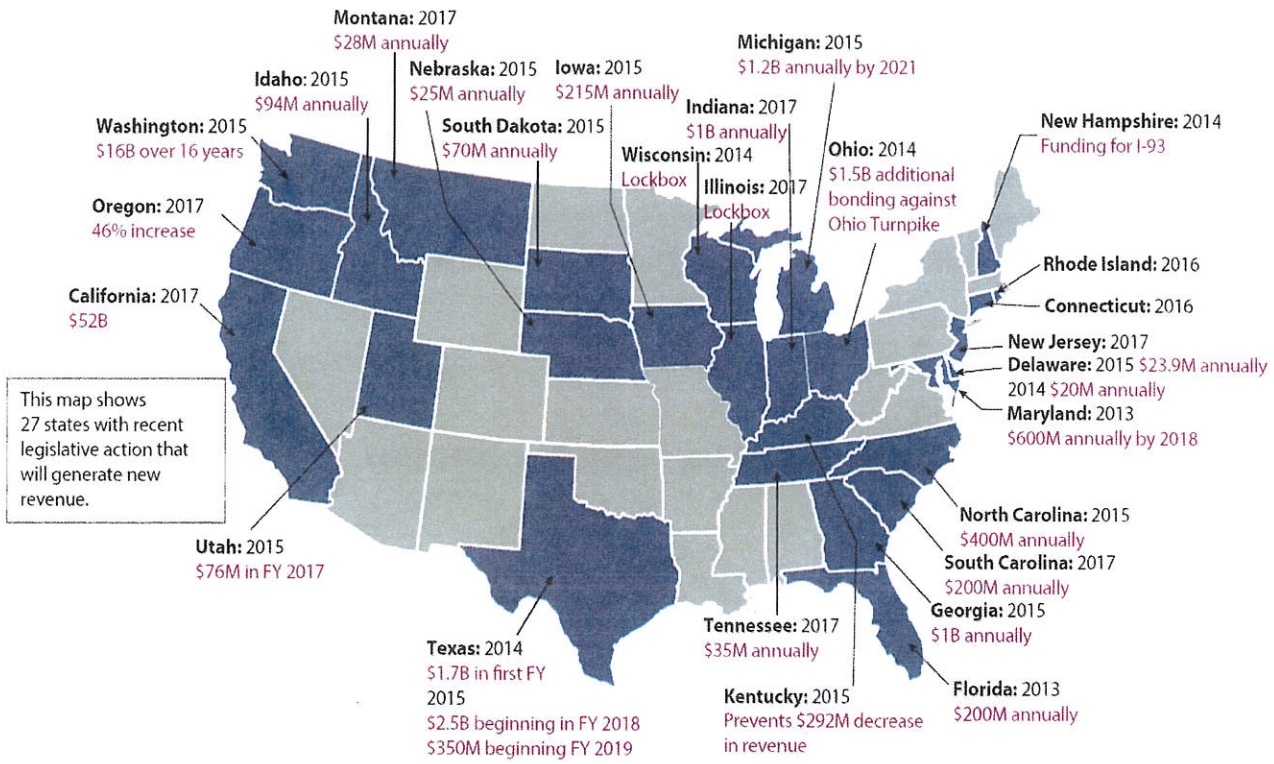
5.0 Revenue options to address transportation system needs: other states' experiences

The Task Force heard testimony from the National Conference of State Legislatures (NCSL) and several state and national organizations and businesses regarding what other states are doing to address their transportation-system revenue needs. At the Task Force meeting in Kansas City, the NCSL shared findings on what other states have done over the past several years to increase funding levels or, at a minimum, to "lockbox" their transportation revenues to protect them from being diverted to other state uses.[58]

As shown below, since 2014, 27 states have had recent legislative action that will generate new revenues for transportation – five are bordering states to Missouri (IA, NE, TN, KY, IL).

[57] The Task Force received a FY18 Budget Presentation from Chris Dunn from the Office of Representative Scott Fitzpatrick, House Budge Chair.
[58] Kevin Pula, NCSL (Kansas City hr'g).

Figure 10 – State Transportation Revenue Increases and Legislative Actions



Source: Data from the National Conference of State Legislatures

5.1 States use a mix of funding sources today to address transportation needs

The Task Force heard testimony that **there is no "silver bullet" for funding the statewide transportation needs of today and that other states are using a diverse mix of revenue options to fund their transportation system improvements.**[59] The NCSL noted that states are using more than 50 different funding mechanisms to address transportation funding needs today.

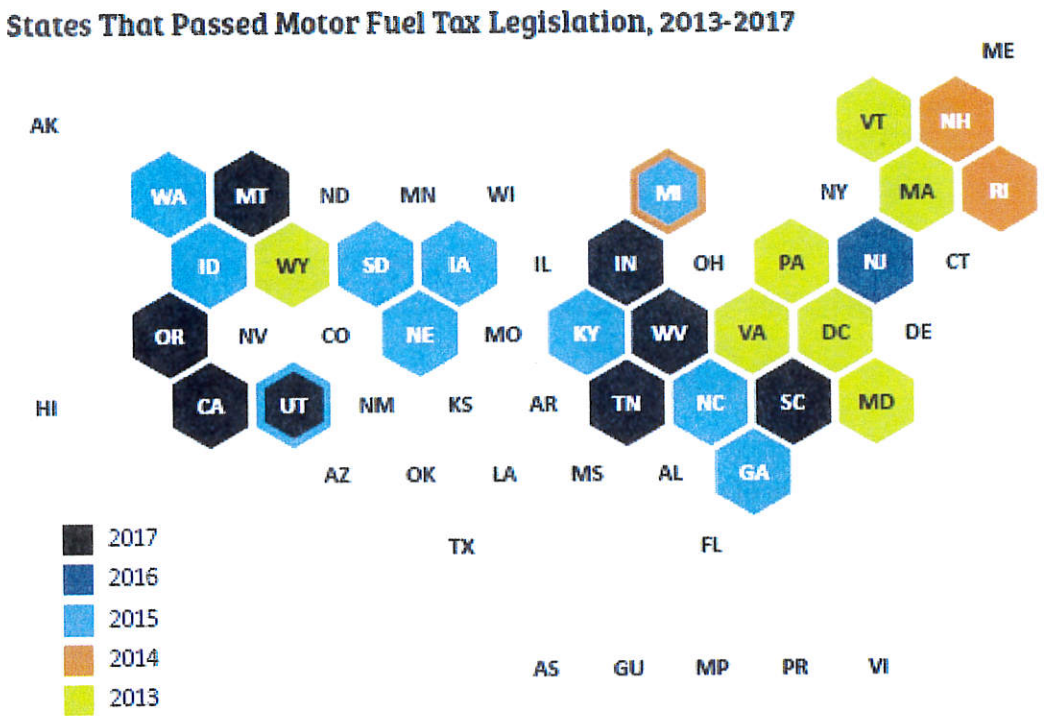
This has been in response to declining federal funding support, rising construction and materials costs for needed transportation improvements, and the growing recognition that fuel taxes alone cannot address statewide transportation needs adequately. As shown on Figure 10, many states, like Indiana, Georgia, North Carolina, Oregon and South Carolina, have recently passed transportation-funding

[59] *E.g.* Kevin Pula, NCSL (Kansas City hr'g); Ananth Prasad, HNTB (former director of Florida DOT) (Kansas City hr'g); Denise Hasty, AGC of Missouri (Kansas City hr'g); Joung Lee & Jennifer Brickett, AASHTO (St. Louis hr'g); Adrian Moore, Reason Found'n (Cape Girardeau hr'g); Bob Poole, Reason Found'n (written testimony submitted for Columbia hearing); and others.

legislation with a diverse combination of motor fuel tax increases, transportation fee increases, user-based tolling, and other funding taxes or fees to address transportation-system needs.[60]

The main transportation-revenue sources are not new to Missouri, which uses a mix of many these same funding sources (except for user-based tolling). **The challenge for Missouri is that these funding sources have not been increased in several decades**. Missouri has the fourth-lowest motor fuel tax and is ranked 47th in revenue per mile. In addition, the purchasing power of Missouri's 17-cent fuel tax is now around 8 cents and is not indexed for inflation or other market factors, further constraining Missouri's current funding situation. The figure below shows states that have passed motor fuels legislation since 2013.

Figure 11 – States That Passed Motor Fuel Tax Legislation, 2013-2017



Source: National Conference of State Legislatures

5.2 Long-term changes may require new funding sources

States are confronted with an unprecedented amount of potential change as they plan to address transportation needs over the next 20 years and beyond. States are evaluating how best to meet the

[60] The Task Force heard, for example, from Gary Salamido of the North Carolina Chamber of Commerce, who described a comprehensive transportation package focused on improving safety and economic growth. Mr. Salamido testified at the Springfield hearing, as part of a presentation by the Missouri Chamber of Commerce and Industry.

challenges and opportunities presented by the emergence of automated, connected, electric, and shared-use vehicles and complementary technologies and the impact they'll have on our transportation network and funding sources.

Most states, like Missouri, have for decades relied substantially on revenue from the motor fuel tax to fund transportation-infrastructure needs. **Although the motor fuel tax has long been an accurate proxy for highway usage, its long-term sustainability as the primary transportation-revenue source will be challenged due to the move towards high-efficiency vehicles, changing travel patterns, and electric or alternative fuels**.

The Task Force heard from several presenters regarding emerging trends in travel, vehicle choice, and automation.[61] The share of vehicles with autonomous and electric features is expected to increase gradually from the small number of models available today that are electrically powered or that can operate with reduced human input in certain situations. The progression is likely to be characterized by an increasing proportion of the total vehicles on the road capable of operating autonomously in increasingly complex operating domains, under electric power, and as parts of centrally managed fleets.

As noted by the National Conference of State Legislatures:

> When it comes to using gas, the cars Americans are driving today are drastically different than they were even 10 years ago. Fuel economy standards were 27.5 miles per gallon in 1985 and 30.2 mpg in 2011. But they are slated to reach 35.5 mpg in 2016. What's more, the growing number of hybrid or electric vehicles on the road today use gas only part of the time—or not at all.... Sales for non-gasoline vehicles are expected to rise by 400 percent by 2040 (accounting for nearly 55 percent of all light-duty vehicle sales).[62]

How fast—and how much—these changes will affect state transportation systems specifically is unknown. The best estimates nationally range from seeing significant impacts within the next decade to perhaps as late as 2040. The uncertainty stems from a combination of factors that will affect the rate at which this new world of transportation arrives: consumer acceptance, regulatory environment, business models, and other outcomes. What is certain, however, is that our transportation-related tax and fee system as currently set up will produce significantly less revenue over the long haul, even as new investments in our transportation infrastructure are needed.

Specific to Missouri, revenue declines are likely to be greater if Missourians increasingly buy electric vehicles or increase how much they travel on shared mobility services, such as Uber or Lyft. The Task

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[61] *E.g.*, Trey Davis, MO Energy Development Association, *Electrifying Missouri's Transportation Future: Trends, Challenges, & Opportunities* (Kirksville hr'g); Uber, *The Future of Urban Mobility* (St. Louis hr'g).

[62] http://www.ncsl.org/bookstore/state-legislatures-magazine/deep-dive-transportation-funding.aspx

Force heard testimony from Uber on the future of urban mobility. Today, ride-hailing accounts for four percent of all miles driven globally, but by 2030 it is expected to rise to 25 percent.

5.3 Changing conditions require sustainable funding

New technologies illustrate the need for long-term funding sustainability. **Over-reliance on one or two revenue sources pose an often-unseen threat to the sustainability of state transportation systems.** Changing economic or technological conditions in such an environment may produce stretches of years in which needed transportation improvements are delayed or abandoned, harming the state's safety and economic competitiveness. As states continue to evaluate more sustainable transportation-funding options, consideration should be given to assembling a package that, like a well-constructed portfolio, produces a positive outcome in virtually all foreseeable economic conditions.

In addition to new and emerging technologies, states often experience challenges in addressing large, transformational projects for state transportation systems, such as major river bridges, new or expanded highways, congested urban corridors, and major reconstruction of the interstate system. For these types of major projects, the implementation cost is significant and states are evaluating and implementing new revenue sources to address these major projects while still addressing their system wide maintenance and rehabilitation needs. The current federal administration is also offering new avenues for states to leverage private investment and take on a more self-help model at the state level. States are evaluating these forms of long-term transportation sustainability mechanisms to better leverage federal opportunities.

The Task Force heard from several presenters who shared that, because of these long-term funding sustainability considerations, **states are actively evaluating or implementing new revenue options. These include road-user charges or vehicle-miles traveled fees; tolling and congestion pricing through express managed lanes; leveraging private investment through public private partnerships; electric and hybrid vehicle fees and charges; indexing fuel with inflation, among many other new and emerging revenue options.**

The changes required to make transportation funding sustainable in the face of rapidly evolving needs and technologies also requires building and winning public support for new ways of approaching transportation issues.

State and local efforts across the country have been successful in finding new and increased transportation funding sources, according to Task Force testimony by NCSL, the Missouri Chamber of Commerce, the Associated Industries of Missouri, and others, when they:

1. Build a coalition of business, political and other leaders to address transportation needs;
2. Work with transportation network users to define a compelling transportation vision, need or goal; and

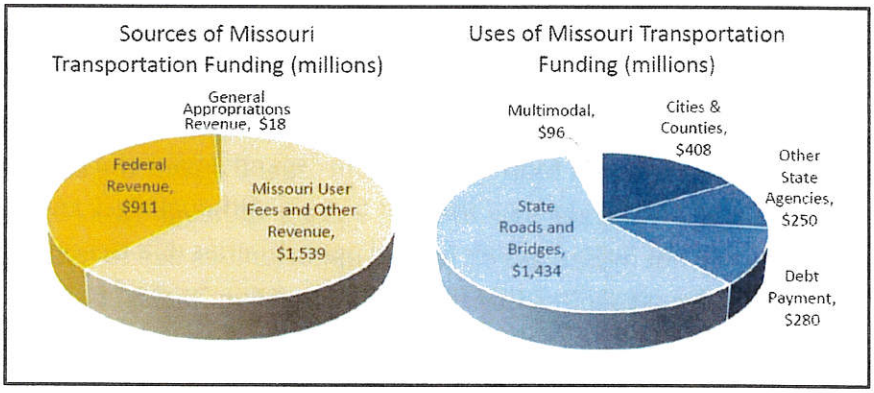
3. Demonstrate effectively how money raised will be effectively and efficiently spent to address local needs or opportunities.

Broadly speaking, this approach has been the foundation for the 27 states that have successfully passed increased transportation funding since 2014, as well as hundreds of local initiatives, according to research by organizations such as the American Road Transportation Builders Association (ARTBA), American Public Transit Association (APTA), Center for Transportation Excellence (CTRE), Council of State Governments (CSG) and others. These examples included the bordering states of Iowa, Illinois, Kentucky, Tennessee and Nebraska—all of which have higher funding levels for transportation than Missouri.

6.0 Current revenue sources for Missouri's transportation revenue sources; uses and allocation

Missouri's transportation-related fees are paid by users of the highway system and legally dedicated for transportation use in the state by the Missouri Constitution. Except for a small percentage to pay for collection of the revenue, Missouri road-user fees can be used only for roads and no other purpose.

Figure 12: Sources and uses of Missouri transportation funds



Source: Citizen's Guide to Transportation Funding in Missouri, 2016

User fees constitute the primary sources of road revenue for management of the Missouri highway system: fuel taxes, vehicle registration and driver licensing fees, and motor vehicles sales taxes. In fiscal year 2016, these revenue sources raised $2.468 billion (including state and federal sources).

While this is a considerable sum, Missouri fares poorly in relation to other states. **Missouri ranks 47th in the nation in revenue raised per mile, generating $50,766 per mile compared to the national average of $216,533 per mile**.

6.1 Current revenue sources

6.1.1 State motor fuel taxes

The largest source of user fee revenue comes from the 17-cent state fuel tax on each gallon of gasoline and diesel purchased in Missouri. This motor vehicle fuel tax is a flat amount added to each gallon of fuel sold and does not increase (or decrease) when fuel prices change. One of the lowest fuel taxes in the nation, the General Assembly last increased the fuel tax in 1996. In fiscal year 2016, travelers on

Missouri's road system paid $698 million in state fuel taxes. This represents nearly one-half of the state user fees supporting the road system.

6.1.2 Other state revenue sources

Missouri motorists pay other user fees to sustain the state highway system, including vehicle registration fees and driver licensing fees. In fiscal year 2016, vehicle registration and licensing fees totaled $318 million.

The Missouri General Assembly last increased some of the registration fee and driver license fees in 1984, while others were last increased in 1969. Recently, Missouri's General Assembly enacted additional fees on alternative fuel vehicles.[63]

Revenues for state and local transportation also come from the state sales taxes paid on the purchase or lease of motor vehicles, totaling $398 million in fiscal year 2016. Other road revenues come from interest earned on invested funds. Furthermore, Missouri has dedicated taxes on aviation fuel to fund improvements to public-use airport in Missouri. And state railroad fees are used to improve safety at railroad crossings.

Finally, MoDOT typically keeps one year of construction revenue in reserve. In recent years, however, in the face of the current funding situation, the department has had to spend out of that reserve to advance projects and to make sure that state matches required for federal dollars have been met. The Task Force learned that MoDOT has had to "spend down" the construction reserve by about $75 million a year on average over the past 5 years. Although Task Force members were glad to learn that the state had not missed out on federal opportunities due to not having a sufficient state match, the Task Force also recognizes that this limited revenue "boost" out of a construction reserve is not sustainable.

6.1.3 Federal motor fuel taxes

Federal revenue also significantly supports Missouri's road system. The largest contribution comes from federal fuel taxes of 18.4 cents per gallon of gasoline and 24.4 cents per gallon of diesel. Missouri received federal reimbursement for highway improvements in fiscal year 2016 of $690 million to the state and $138 million for cities and counties. The U.S. Department of Transportation distributes federal revenues to states by formula.

6.1.4 Other Federal Sources

Missouri receives transportation funding from other federal sources such as taxes on tires, heavy truck and trailer sales, heavy-vehicle use tax, and general revenue. Federal funding in 2016 also covered reimbursements for multimodal ($64 million) and grants for highway safety ($19 million). Federal

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[63] *See* S.B. 8 (2017).

funding also covered non-highway transportation such as transit ($30 million), aviation ($28 million) and rail ($6 million).

6.2 Debt

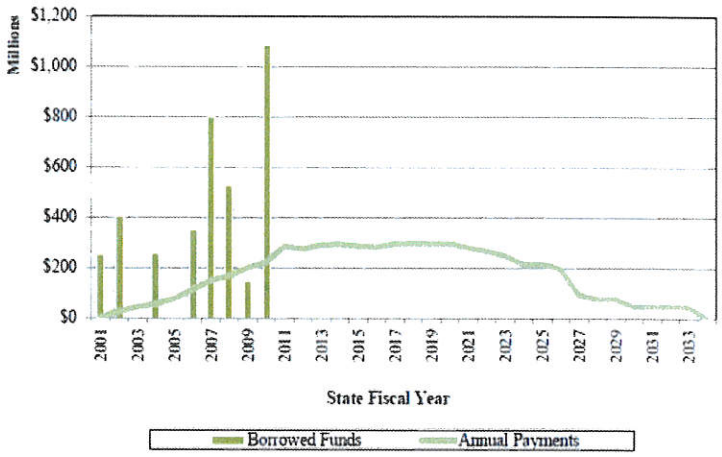
Often the use of debt in the form of bonds is discussed as if their use provides a new source of revenue. And indeed, bonding transportation projects provides some of the same immediate benefits as a sudden influx of money from other sources will do. But it comes at a long-term cost of debt repayment that may reduce available transportation funds significantly.

For example, to accelerate the implementation of highway improvements, the General Assembly authorized the state to sell bonds beginning in 2000. The debt-financed projects allowed Missouri to avoid the effects of inflation upon labor and materials and gave Missourians the benefit of highway improvements much earlier than otherwise would have occurred. At the time the bonds were issued, they could be financed at the comparatively low average interest rate of 2.98 percent.

Similar benefits accrued from bonds issued because of 2004's Missouri Fuel Tax Amendment. Amendment 3 required that all revenues from the existing motor vehicle fuel tax be used only for state and local highways, roads and bridges. The measure also required that vehicle taxes and fees paid by highway users be used only for constructing and maintaining the state highway system.

As part of this measure, half of the state sales tax on motor vehicles that had previously gone to the state General Revenue Fund were earmarked for the newly created State Road Bond Fund. This was for the exclusive purpose of repayment of state road bonds issued by the Missouri Highways and Transportation Commission. From 2005 through 2009, the Commission authorized and sold approximately $1.977 billion in bonds.

Figure 13: Debt Service by Fiscal Year



Source: Missouri Dept. of Transportation

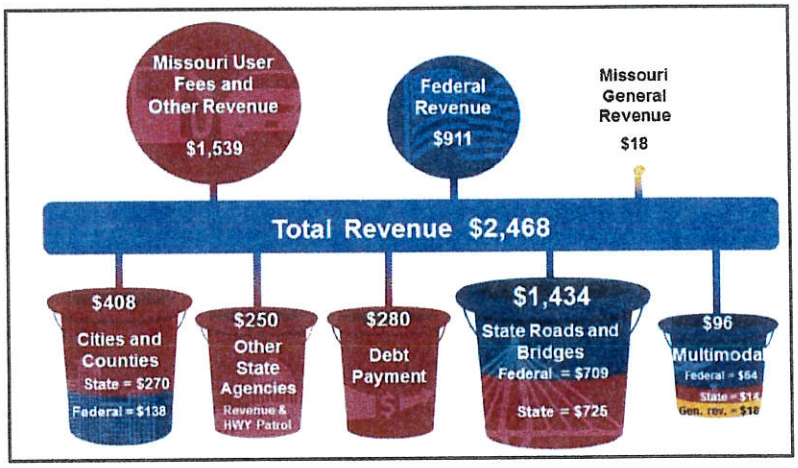
In 2016, debt payment to repay outstanding bonds equaled $280 million and will continue at about this level for the remainder of the decade. The state has three kinds of transportation bonds outstanding: senior bonds (authorized by the General Assembly in 2000), Amendment 3 bonds (authorized by Missouri voters in 2004), and federal Grant Anticipation Revenue Vehicle (GARVEE) bonds financing specific projects. The state will pay off the senior bonds by 2023, the Amendment 3 bonds by 2029, and the GARVEE bonds by 2033.

As the state approaches paying off these transportation bonds, it is important to note that, as shown in Figure 13, it will be a decade or more before there is a significant reduction in debt payments that might be used for transportation projects—assuming no changes in the state's current revenue sources.

6.3 Where the money goes

The $2.468 billion of revenue generated to support transportation is allocated among state, city, and county governments by the Missouri Constitution and a formula adopted by the Missouri General Assembly.

Figure 14: Missouri Transportation Revenue Allocations



Source: Citizen's Guide to Transportation Funding in Missouri

The state constitution also provides that the cost of the state highway patrol in administering and enforcing the traffic laws is to be paid out of the state road fund.[64] The highway patrol allocation from the road fund is set by the General Assembly's annual appropriations process, while debt services is made at the discretion of the Missouri Highways and Transportation Commission.

6.3.1 Initial allocations

The funding distribution formula starts with total available construction-program funds and is allocated in three phases:

- The first allocation goes to safety programs, with $3 million distributed to the statewide program and $32 million distributed to the seven districts based on three-year crash rates.
- The second allocation provides for asset management (preservation of existing highways) with $125 million distributed for statewide interstate and major bridge needs and $310 million distributed to districts based on the amount of highway travel, bridge size, and highway miles.
- The final allocation of remaining funds, if any, provides for flexible purposes based on population, employment and highway travel.

[64] Mo. Const. art. IV § 30(b).

In recent years, funding for asset management has fallen short in many districts, and many needs are not met—a situation that will not change without increasing safety and asset-management allocations to keep pace with inflation and needed preservation of system assets.

6.3.2 The STIP process

Following distribution of construction-program funds to the districts, the state works with regional planning groups to determine local priorities that eventually become Missouri's Statewide Transportation Improvement Program (STIP).

Table 1: Regional STP Allocation by District 2014 - 2016

District	3-year annual Average Spending (in millions)
Northwest	$105
Northeast	$93
Kansas City	$272
Central	$157
St. Louis	$293
Southwest	$214
Southeast	$162
Statewide	$154

Source: Missouri Dept. of Transportation

The STIP describes a rolling five-year plan for transportation improvements. The STIP is the final roll-up of local priorities that are incorporated into regional transportation improvement plans. These regional plans are assembled by regional planning groups, including nine Metropolitan Planning Organizations in urban areas and 19 Regional Planning Commissions in rural areas.

Typically drawn from city and county leadership and elected officials, these boards seek input from the local citizens to determine regional transportation needs. They then work with the state to prioritize needs using criteria such as road and bridge conditions, traffic safety, and overall mobility. They also work to balance local needs with available funding.

The Task Force took a substantial amount of time considering the distribution of state dollars to the seven MoDOT districts to make sure that funds were fairly allocated across the state system based on objective criteria.[65] Regional allocations delivered through MoDOT Districts, as approved by the Missouri Highway and Transportation Commission, are based on objective criteria in the categories of safety, asset management ("taking care of the system"), and flexible funding.[66]

In 2016, this meant the allocation of construction-program funds using the following formula:

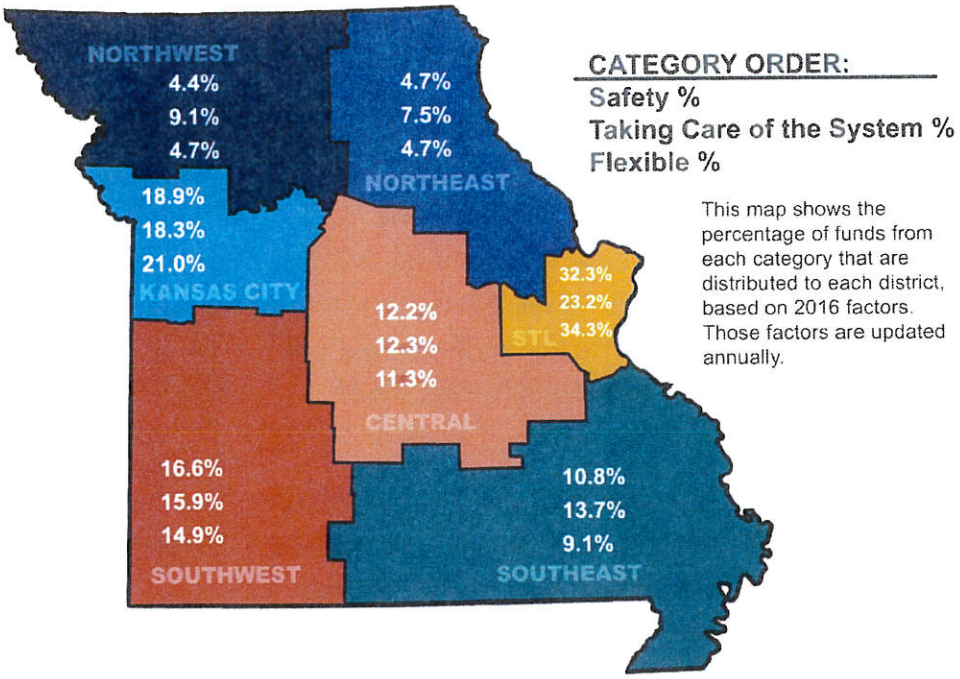
- Safety funds -- $3 million distributed for a statewide program, and $32 million distributed to Districts based on three-year crash rates; and
- Asset management funds ("Taking Care of the System") -- $310 million distributed based on highway travel (VMT), bridge size, and highway miles, and $125 million distributed for statewide interstate and major bridge needs;

[65] In addition to discussion on this topic at the task force hearings, nearly the entire working session in October was devoted to this topic. In addition to testimony from Machelle Watkins, MoDOT's Transportation Planning Director, information about the criteria used by the Missouri Highways and Transportation Commission (MHTC) to determine distribution was provided by former commissioners James Anderson (2001-2009) and Stephen Miller (2009 – 2016).

[66] Moot, *Citizen's Guide to Transportation Funding in Missouri* at 20 (Nov. 2016).

- Any remaining (flexible) funds (in 2016, about $200 million) are distributed on a basis derived from quantitative criteria including each District's proportional share of Missouri's population, employment, and highway miles.

Figure 15: Missouri Transportation Revenue Allocations by Districts



Source: Missouri Dept. of Transportation

It's important to note that consideration of VMT and the highway travel patterns it represents is important to understand the demand for personal mobility and freight connectivity *with* and *between* regions for allocation purposes. Consider these examples in which a Missouri resident may:

- Purchase a car manufactured in Texas but sold in Cape Girardeau;
- Drive from Springfield to see a relative in Columbia of Kansas City; or
- Transport his or her crops, grown outside St. Joseph, on highways throughout the state to St. Louis, to be loaded onto a barge headed for New Orleans and on to Asia.

In cases like this, VMT adds more understanding about transportation-network use, in addition to population and employment data, which can be geographically micro-targeted. The result is a more comprehensive and equitable distribution based on actual use of the state's highway system.

7.0 Recommendations to achieve a 21st Century transportation system

For more than six months, the 21st Century Missouri Transportation System Task Force talked with Missouri residents, taxpayers, business leaders and transportation experts about a broad range of topics and issues that determine how well we're served by our transportation system.

Among other things, our discussions involved:

- Transportation system size, attributes, needs and governance;
- Funding sources, amounts, uses and allocation;
- Factors affecting current and future purchasing power of transportation fuel tax and user fees;
- Current and future operational changes for making the most of existing funding;
- Changing vehicle-fleet technology and fuel-efficiency impacts on system needs and funding; and
- Ongoing and high-priority unfunded transportation needs and changing requirements.

It is clear from this ongoing statewide conversation that Missourians—and the Task Force—recognize that **we need to invest more in our state transportation system in order to develop the modern, world-class transportation system that Missourians want and need**. The Task Force learned that long-term funding neglect and shortfalls have left the state with approximately $825 million worth of unfunded transportation priorities annually.

This funding deficiency did not arise overnight, but over a period of years, as past political leaders have failed to recognize or act upon the need to address transportation-infrastructure investment. Many people who testified at the Task Force's hearings used the idiom of "kicking the can down the road" to describe the state's approach to addressing (or not addressing) transportation funding in recent years.

The Task Force recognizes that, just as we did not get here overnight, our transportation needs won't be met overnight. Our substantial funding gap in transportation cannot be closed in a single action with one "magic bullet" solution. It will take time in terms of public education, policy development, and fiscal prudence to craft a sustainable set of strategies and tactics to underpin a transportation system that effectively and successfully meets Missouri's needs well into the future.

The three-part roadmap to fund and improve Missouri's transportation system.

Acting on the input provided to it in 2017, the Task Force has developed a three-part roadmap for funding and improving Missouri's transportation system. The roadmap envisions sets of short- and long-term strategies and steps for building and acting on a consensus around what that system looks like, how it operates, and how it should be funded. Meanwhile, the roadmap also calls for legislative action to improve highway safety and to improve our ability to better leverage existing transportation funding and emerging opportunities and innovations.

A comprehensive three-pronged approach will sustain the vital role Missouri's transportation system plays in the lives of Missourians. Each part of the roadmap is as important as the other—they work in concert. Following these recommendations would enable the state to maintain its existing infrastructure. To improve safety and increase economic growth, it would enable Missouri to add new interchanges, more road shoulders and center lanes with rumble stripes, and new lanes to highways, producing the dual benefit of fewer fatalities and serious injuries while also creating jobs.

The approach would make possible the much-needed reconstruction and upgrading of Missouri's aging bridges and Interstate Highway System. Interstate 70, the nation's oldest interstate, has long needed reconstruction and added capacity to address its safety, congestion and incident management needs. (The state's other six Interstate Highways are not far behind I-70 for similar attention.) And the state's growing multimodal transportation needs related to freight and passenger railroads, ports, waterways, airports, mass transit, and other facilities could be addressed to best leverage our state's natural resources and central geographic location advantages as a freight hub and safely and efficiently move the state's transit users, including elderly and disabled persons, to needed services and jobs.

7.1 Immediate-Impact Investment (Part 1)

An immediate investment package would help stabilize Missouri's transportation-system funding and addressing immediate needs, while policy options for dealing with longer-term challenges are developed and implemented. The Task Force heard about a number of potential immediate-impact revenue streams that have been or could be tried. The Task Force deliberated over the various ideas and came up with short-term recommendations that the Task Force believes are viable and that will give our transportation system the boost that it needs. These recommendations are set forth below.

As an aside, given that immediate-impact investments may involve an increase in transportation user fees or taxes, the Task Force recognizes that public officials may choose to include the need to increase transportation funding in a broader policy discussion about tax policy or state-budgeting priorities. However, such a policy discussion goes beyond the Task Force's mission, as set forth in HCR 47, so the Task Force did not spend a lot of time delving into such issues.

The Task Force understands as well that its work is being done against the backdrop of other well-abled task forces and groups that recently have been set up to address broader tax and policy issues.[67] Although some of the same issues and concerns were occasionally brought up in the public hearings of the transportation Task Force, the Task Force tried to stick to its mission and to thus to stay focused on transportation system.

Nevertheless, given that the public is generally averse to measures that are perceived to be tax increases, the Task Force recognizes that a broader discussion related to overall tax policy, government

[67] *See, e.g.*, Governor's Committee on Simple Fair and Low Taxes (2017); Missouri Boards and Commissions Task Force (2017).

spending, and state-budging priorities may be necessary. In fact, the Task Force heard that in recent years some states have included an increase for transportation funding in packages that involved tax cuts, offsets, or efficiencies gained in other areas of state government in order to lessen or negate the overall burden of the transportation-funding increase.

The transportation Task Force thus understands that further discussion along such lines may be necessary, but the Task Force believes that it should be up to policymakers to engage in such conversations. In keeping with the Task Force's mission, this report focuses its attention solely on funding Missouri's 21st-century transportation system. To the extent that the recommendations involve efficiencies in other areas of the state government, they are included only with relation to how such funding savings could be used to fund transportation priorities.

Still, **an immediate-impact investment package of $400-500 million, as outlined below, would help stabilize Missouri's transportation-system funding**. Over 10 years, transportation-system users would be devoting more than $4 billion to improve and further develop a safe, reliable, world-class, 21st-century transportation system in Missouri.

According to the Business Roundtable,[68] for every dollar invested in transportation, the state of Missouri would expect to receive approximately $3 in economic activity. Representatives from the American Association of State Highway and Transportation Officials told the Task Force that experience has shown **state investment in transportation generates a multi-decade return on investment in the form of improved productivity and quality of life**. They also estimated that a dollars' worth of highway and bridge improvements will yield a benefit of $5.20 to citizens in the vehicle maintenance costs, reduced delays and fuel consumption, and improved safety. (The Task Force also heard from the North Carolina Chamber of Commerce that its state's increased investment in transportation is producing a 10-1 return on investment in the state's economy.[69]) Thus, it is no stretch to say that Task Force's recommended additional investment in transportation infrastructure would generate billions of dollars' worth of economic activity and consumer savings, resulting not only in safer highways, but also in economic opportunity and high-paying jobs.

The Task Force recognizes that the recommended investment would not completely solve all our transportation needs, but it would give us a firm foothold on the future while policy options for dealing with longer-term challenges are developed and implemented. The recommended increased investment in the state road fund and multimodal transportation would involve the following:

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[68] Road to Growth: The Case for Investing in America's Transportation Infrastructure (Sept. 2015), https://businessroundtable.org/sites/default/files/2015.09.16%20Infrastructure%20Report%20-%20Final.pdf

[69] Gary Salamido, North Carolina Chamber of Commerce (Springfield hr'g).

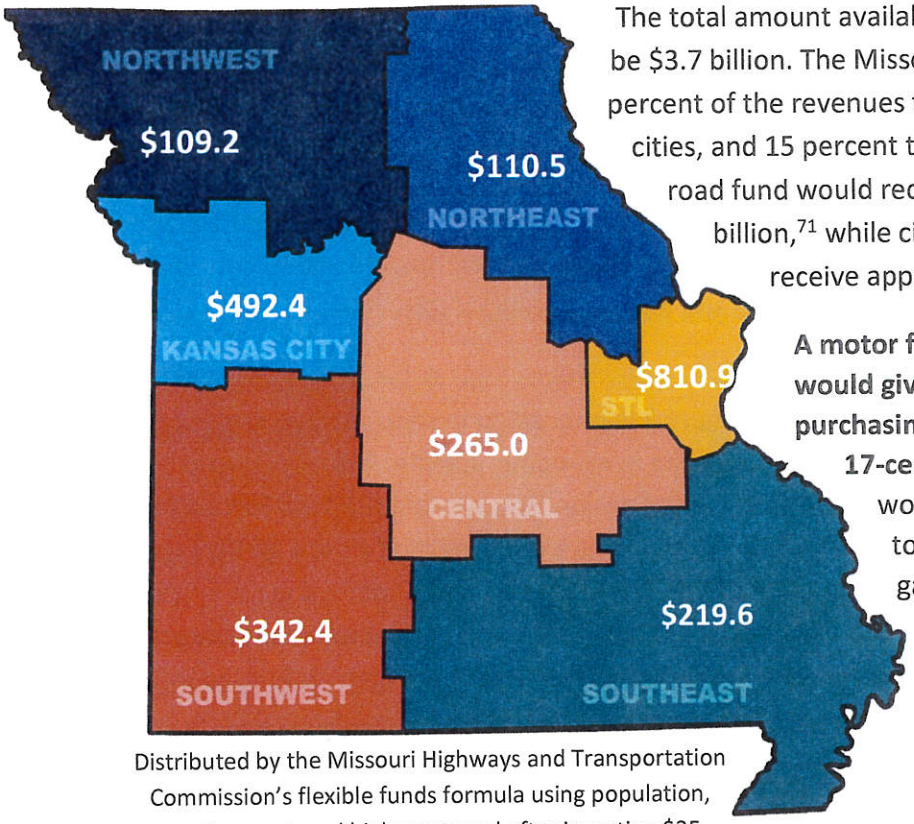
7.1.1. Motor Fuels Tax Increase

The Task Force recommends increasing the state excise tax on gasoline by 10 cents and on diesel by 12 cents per gallon. This additional investment by highway users would raise **approximately $430 million annually to improve our roads and bridges**. This would generate a total of approximately $4.3 billion over 10 years.

The total amount available in today's dollars would be $3.7 billion. The Missouri Constitution allocates 70 percent of the revenues to the state, 15 percent to cities, and 15 percent to counties.[70] Thus, the state road fund would receive approximately $2.6 billion,[71] while cities and counties would each receive approximately $557 million.

A motor fuel tax increase in this range would give today's gas tax the same purchasing power as the value of the 17-cents gas tax in 1996. In other words, a gas tax of 27 cents today would simply adjust the gas tax to the same value it had at 17 cents in 1996.

Figure 16: State Road Fund Share over 10 years by District of a Potential Increase of 10-cent per gallon to Gas Tax and 12-cent per gallon to Diesel Tax. **($ millions)**



Distributed by the Missouri Highways and Transportation Commission's flexible funds formula using population, employment, and highway travel after investing $25 million/year for MoDOT maintenance and operations needs.

Source: Missouri Dept. of Transportation

Increasing the motor fuels tax was mentioned the most during testimony as the preferred form of funding increase. Several reasons were cited, including:

- The motor fuel tax is user-based;
- Consumers recognize its significant nexus to travel on the highway system;
- The tax is paid by Missouri citizens *and* out-of-state motorists as they travel through Missouri;

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[70] Mo. Const. art. IV § 30(a).

[71] Besides road-and-bridge maintenance and construction, the state constitution contemplates that some of this amount would be allocated to the Missouri State Highway Patrol as well as a small collection reimbursement made to the Missouri Department of Revenue.

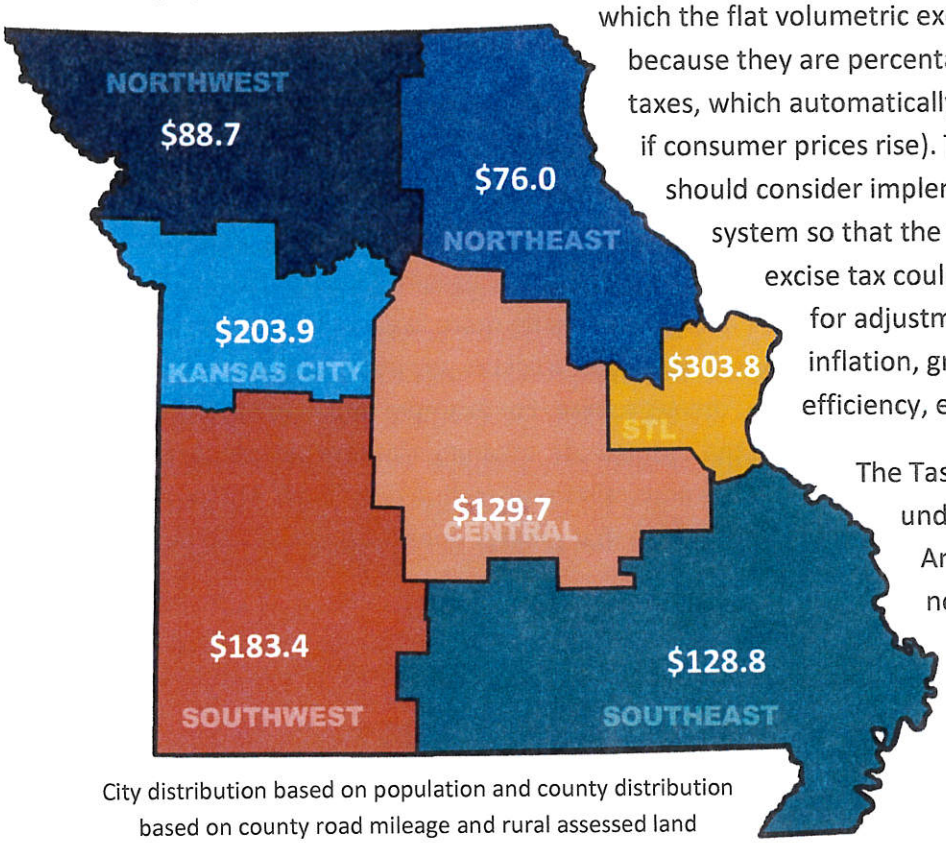
- Missouri already has a constitutional lockbox on a motor fuel tax, such that the generated revenue can be used only for the highway system;
- There is an efficient means of collecting the revenue already in place;
- Missouri's current motor fuels tax burden is low (46th in the nation);
- The average Missouri driver would only pay an additional $5 per month if the motor fuels tax was increased; and
- Even with this modest increase, Missouri would remain competitive with its neighboring states.

Task Force members heard from Missourians who believe that diesel fuel should be taxed at a slightly higher rate than gasoline because of the greater wear and tear on the roads that stems from the heavier weight of trucks as compared to passenger vehicles. Based on testimony and discussions at the Task Force meetings, as well as what members heard in meetings with Missouri citizens throughout the state, the Task Force generally feels that the public would be more likely to support an increase to the motor fuel tax with the proposed differential. However, truckers pay more to support our transportation system than many Missouri drivers realize. For example, the average truck burns more than three times as much fuel per mile as the average car, meaning truckers pay nearly four times the fuel tax per mile. They also pay higher vehicle and trailer registration fees under Missouri's current fee schedule. Nevertheless, the Task Force determined that greater public support would be achieved with a rate differential.

The Task Force further recommends that the General Assembly consider adjusting or indexing the flat gasoline and diesel excise tax to account for future inflation and fuel-efficiency improvements in the light vehicle fleet. According to the NCSL, 20 states, representing 57% of population, now index their state motor fuel tax to keep up with growing costs and inflation.[72] Additionally, other taxing measures in the state automatically have inflationary factors, which the flat volumetric excise fee does not have, because they are percentage-based (such as sales taxes, which automatically generate more revenue if consumer prices rise). Therefore, the legislature should consider implementing an indexing system so that the flat gasoline and diesel excise tax could be adjusted to account for adjustments to account for inflation, growing costs, fuel efficiency, etc.

The Task Force recognizes that, under the state's Hancock Amendment, it will be necessary to put a proposed increase of 10 cents per gallon on gas and 12 cents per gallon on diesel to a vote of the people. This may pose challenges in terms of mustering the political will and needed coalition to advance this substantial short-term fix, educating the public as to the immediate need as well as the long-term direction for fixing our broken transportation-funding system, and ultimately winning the support of an electorate that many would argue are distrustful of large-scale government initiatives.

Figure 17: <u>City and County Share</u> over 10 years by District of a Potential Increase of 10-cent per gallon to Gas Tax and 12-cent per gallon to Diesel Tax. **($ millions)**



City distribution based on population and county distribution based on county road mileage and rural assessed land valuation.

Source: Missouri Dept. of Transportation

On the other hand, there may be no better time than now to undertake this effort. The national and state economies have improved. Motor fuel prices are relatively stable. Missourians are familiar with and understand how the motor fuel tax works. They understand Missouri's fuel tax rate has not kept up with inflation and is very low compared to other states, so there would be little competitive impact

[72] Kevin Pula, NCSL (Kansas City hr'g).

to increasing it. **At every Task Force meeting, citizens and business leaders provided public testimony that supported increased transportation funding. Most of them cited an increased motor fuel tax as the best short-term solution**.

And it may bode well for such a campaign that this potentially could be the last motor fuel tax increase voters will be called upon to approve. The Task Force recognizes that the motor fuel tax needs to be raised because it has lost its purchasing power due to inflation; however, the Task Force also recognizes that adjusting the motor fuel tax may be a relatively short-term fix. Increasingly rapid changes in fuel efficiency, technology, and ownership of electric and hybrid vehicles, along with other factors, pose a threat to the continued viability of motor fuel taxes as now constituted. Longer term, the state will have to consider and adopt a different funding source or sources to maintain a sustainable transportation system capable of meeting the needs of the 21st century, and the recommendations set forth below these realities.

Nevertheless, **the Task Force believes that this an opportune time to stabilize the transportation system over the next 10-15 years and secure our economic future by additional investments in transportation infrastructure by means of the motor fuel tax**. The additional investment of over $400 million annually (or $4 billion over 10 years) that this proposed tax adjustment would generate would produce significant results in **improving safety, building capacity, and modernizing our roads and bridges**.

To determine specific expected results, the Task Force envisions that regional planning organizations, area leaders, and citizens would be involved to identify priority transportation projects in their specific regions. MoDOT already extensively collaborates with regional planning groups to identify local transportation needs and priorities. There are two types of regional planning groups in the state: urban areas have Metropolitan Planning Organizations, and rural areas have Regional Planning Commissions. Board members for each of these groups are typically city and county leadership, elected officials and local business owners. The regional planning groups reach out to local citizens to identify transportation needs. MoDOT staff assists regions to prioritize those needs based on road and bridge conditions, traffic safety data and overall mobility. The prioritization process also includes balancing priorities with available funds. As shown in Figures 16 & 17, the recommended additional investment would mean that many priority projects they've identified could be completed to enhance Missouri's roads and bridges.

The Task Force received testimony, for example, that the Buck O'Neil Bridge on Highway 169 in Kansas City needs to be replaced; that the 1-70 Rocheport Bridge in central Missouri will soon need to be replaced; that the I-270 North corridor in the St. Louis region needs to be modernized; that I-49 in southwest Missouri needs to be completed; and that even basic road and bridge condition improvements throughout northern and southeastern Missouri are desperately needed. The Task Force expects that these types of projects could be completed—improving safety and enhancing the

quality of life and the economy—with the additional recommended investment in Missouri's roads and bridges.

7.1.2 Implement a dedicated multimodal revenue stream

A greater investment in our multimodal transportation systems would help our state be more competitive as a world-class distribution network, and would provide better access to services and jobs for our citizens. Investing in multimodal transportation also ensures that our state is maximizing our central geographic location and natural resources.

As a result, **the Task Force recommends implementing a dedicated revenue stream of $50-$70 million annually for the state's multimodal transportation needs (*i.e.*, aviation, mass transportation, railroads, ports, waterways, waterborne commerce, and transportation of elderly and disabled persons).**

Currently, state support of multimodal transportation is low (approximately $18-25 million annually). Today, state funds for multimodal needs are allocated from the state general fund, which has significant competing statewide funding needs. This means that year-over-year funding for multimodal transportation needs can vary substantially depending on competing budgetary needs.



The Task Force believes that an annual dedicated stream of $50-$70 million would greatly enhance the vitally important area of multimodal transportation. The Task Force has discussed potential, dedicated funding streams for improvements in multimodal transportation for aviation, mass transportation, railroads, ports, waterways, waterborne commerce, and the transportation of the elderly and disabled. As an outcome, the Task Force recommends that the legislature look at potential, dedicated funding options for multimodal transportation that would involve *no additional taxation of Missouri citizens*.

One option for securing multimodal revenue would be to revise Missouri's Timely Filing Discount on retail sales and withholding taxes. Missouri allows retailers to retain two percent of the sales and use taxes they collect from customers if they remit those taxes to the state in a timely manner. This vendor

discount is uncapped and is the second-most generous in the country, and cost Missourians about $115 million in 2016.[73]

In addition to the timely filing discount, Missouri is the only state that provides discount to companies for filing employee withholding tax on time.[74] The "timely filing discount" for employers cost Missouri $29 million in 2016.

Bringing these outdated "timely filing" discounts in line with other states would allow our state to make much needed multimodal investments that would strengthen our quality of life and economic competitiveness. A discount at a lesser percent or implementation of a cap would provide revenue savings—which could then be directed to multimodal transportation—*without increasing the tax burden on Missouri citizens*. Any potential savings should be statutorily designated to go into the non-highway transportation fund.

For example, if merely a $50 million annual revenue stream were implemented for multimodal, the funds would total $500 million over 10 years. This would be distributed by the Missouri Highways and Transportation Commission's under a flexible-funds formula that is based on objective criteria. Although no specific project list has been developed, significant needs already have been identified.

For example, the Missouri Port Authority has estimated that about $85 million in capital improvements is needed to make Missouri ports more competitive. Missouri waterways currently move an average of $4.1 billion of cargo annually and provide low-cost transportation benefits to businesses from around the globe. Additional and ongoing investment will help Missouri's ports further develop and improve their terminals, so they can provide greater transportation services. This, in turn, would generate increased traffic for the truck and railroad lines that service the ports. A greater use of the waterways not only will provide economic growth, but it may even provide some relief to the highway system, because a 15-barge tow carries the same amount of cargo as 870 large semi-trucks would carry.[75]

Additional multimodal investment would also improve Missouri's transit system, which currently is funded at only 46th in the nation, lower than all of our surrounding states.[76] Missouri operates the largest rural transit network in the nation and has public transportation networks in its major cities. Investments to support transit-capital needs will increase mobility in all regions for those without access to personal vehicles and will help ease traffic congestion in urban areas.

Improved and increased transportation options will benefit the economy, because Missouri residents of all incomes will have better access to employment, education, and civic opportunities that will

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[73] *See* Office of Missouri State Auditor Nicole Galloway, *Cost of Tax Incentives and Exemptions*, Rep. No. 2017-113, at 12 (Oct. 2017).
[74] *Id.* at 15.
[75] Mandy Brink, Missouri Port Authorities (Cape Girardeau hr'g); *see also* Mo. House of Reps., *Report of the Interim Comm. on the Development & Improvement of Missouri Ports* (Dec. 7, 2015).
[76] AASHTO, *Survey of State Funding for Public* Transportation, Final Rep. 2017 – FY 2015 Data, at Table 1-7.

enrich their lives and have positive impacts on their wellbeing and on the business community. Moreover, reliable transportation provides community health benefits, as our state's neediest residents are better connected with needed medical services, not to mention employment and physical-activity opportunities that help to achieve optimal health and wellbeing.[77]

As an aside, the Task Force evaluated raising the state's general sales tax by 0.1 percent to better fund multimodal transportation. Such a voter-approved measure would increase the state rate from 4.225 percent to 4.325 percent and raise about $70 million annually for multimodal transportation.

However, the Task Force heard testimony stating that Missouri already has the 14th-highest average overall sales tax rate in the country at 7.89 percent in 2017. While the actual state sales tax of 4.225 is relatively law, the overall sale-tax rate is aggregated by high local tax rates in some areas of the state to fund local needs. Thus, many Missouri citizens live or work in communities in which the sales-tax rate exceeds 10 percent.

Members of the Task Force thus were hesitant to recommend an increase to the general sales tax (as the 2014 Amendment 7 would've done) because of an already-high sales tax burden on Missouri citizens. The Task Force also heard from municipal leaders who advised against the state's adding to the sales tax burden because this taxing measure is the primary funding mechanism local cities and counties rely on today to meet their needs.

Finally, policymakers may discuss other means to obtain the revenue needed to boost multimodal investment. Nevertheless, the assumption underpinning these potential multimodal funding sources is that none of the revenue would go for highway transportation projects. Instead, multimodal revenue would be deposited into the existing State Transportation Fund authorized under Mo. Rev. Stat. § 226.225. Doing this also would mean that existing budgeted general revenues for similar purposes could be redeployed by the General Assembly for other statewide priorities.

7.2 Long-term sustainability and diversification of revenue streams (Part 2)

Missouri is confronted with an unprecedented amount of potential change as we plan for our transportation needs over the next 20 years. **We need to anticipate the future landscape and decide how best to address the challenges and opportunities presented by increasing fuel efficiency and the emergence of automated, connected, electric, and shared-use vehicles, and complementary technologies and the impact they'll have on our transportation network and funding sources.**

Missouri's transportation system and its funding sources will likely continue to be disrupted by emerging technologies and changing personal and business travel patterns. *Before significant impacts occur*, **the Task Force <u>recommends</u> that the General Assembly further study potential options for**

[77] 12/12/2017 Letter from Bridget McCandless, Health Care Foundation of Greater Kansas City (discussing the "critical role that transportation plays in the health and wellbeing of Missouri residents").

replacing fuel taxes with new transportation funding sources and processes that can sustainably support a 21st-century state transportation system.

The Task Force recognizes that these longer-term recommendations that are brought forward for consideration ultimately must be economically and politically acceptable to the state voters who may be called upon to approve them in the voting booth. Therefore, **the Task Force recommends that the legislature put in place a *next-generation task force* or other mechanism to monitor changes in transportation and to consider the many different funding options that exist or that are emerging with regularity.**

Options for sustainable and diversified revenue include:

7.2.1 Electric Vehicle and Hybrid Vehicle Fees; Electric-usage Fees

Electric and hybrid vehicle fees are fees charged to vehicle owners who otherwise would pay no fuel tax and consequently would not pay their fair share of road upkeep. Costs vary depending upon the price of electricity, gas and the car's efficiency, but according to the Missouri Energy Development Association, it can run about $5 to drive an electric car for 100 miles.

Currently, 17 states impose a fee on electric and/or hybrid vehicles, including Colorado, Indiana, Nebraska, Oklahoma, Tennessee, and Missouri. These fees vary, with pure EV fees ranging from $50 to $300.

Missouri has provided incentives to promote adoption of electric vehicles, but also imposes small EV registration fees to help fund transportation use. In Missouri, the state collects fees for alternative-fuel vehicles, including EVs, through an alternative-fuel decal. There is a $75 decal fee for electric vehicles, and a $37.50 decal fee for hybrids.[78] As of August 2017, the Missouri Department of Revenue has 2,099 electric vehicles registered in Missouri, and there are 677 electric charging stations in Missouri.[79] However, all but six of these charging stations are free to the consumer, and therefore impossible to tax. In addition, many electric vehicle owners charge at home or work, which is not taxable to transportation. Kansas City Power & Light (KCP&L) is an industry leader in EV charging.[80] The regulatory environment in Missouri is also flexible, placing the state in an advantageous position to leverage its early successes with electric and hybrid vehicle user adoption.

For funding sustainability as more Missouri drivers utilize EVs and hybrids, **the Task Force recommends that the Missouri legislature consider doubling the registration fees for electric vehicles to $150 for electric vehicles and $75 for hybrid vehicles.**

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[78] Mark Siettman, MO Dep't of Revenue (testified in Jefferson City and Springfield).
[79] *Id.*
[80] Trey Davis, MO Energy Development Association, *Electrifying Missouri's Transportation Future: Trends, Challenges, & Opportunities* (Kirksville hr'g).

The legislature should also study options for electric fees/gasoline-equivalence charges on electric charging stations and home-charging systems. This is an area where much study is being done today through pilot projects and grant opportunities, and Missouri should leverage this research when evaluating possible charging mechanisms.

7.2.2 Increased Non-Fuel User Fees (License, Registrations, etc.)

Non-fuel transportation user fees in Missouri include vehicle registration and driver's licensing fees. The fee amounts vary based on vehicle horsepower for passenger cars, vehicle weight for trucks and class of driver's license. In Missouri, most of these transportation fees have not been increased since 1984, while some were last increased in 1969. In fiscal year 2016, Missourians paid $318 million of vehicle registration and driver's licensing fees.

The Task Force recommends the Missouri legislature consider a modest increase of 10 percent or greater for non-fuel transportation user fees. Based on 2016 numbers, such an increase would provide an additional approximate amount of $30 million for transportation need. (An across-the-board increase may not be needed if the vehicle registration schedule is revised to account for MPG, as discussed below in section 7.2.4.) An indexing system could also be implemented so that the fees keep up with inflation, as discussed below.

7.2.3 Indexing User Fees

Indexing is a process for automatically adjusting a tax or fee to account for inflation. Indexing of user fees can be done based on factors such as the consumer price index, fuel efficiency, population and other applicable growth factors. **Indexing would increase or decrease the revenue raised to reflect the current state of the economy and to preserve the purchasing power of the money raised.** In Missouri, for example, the fuel tax is not indexed. As a result, the purchasing power of fuel tax revenues has eroded from $0.17 to an effective rate of $0.08 due to the impact of inflation on purchases of services and materials.

Twenty states, representing 57 percent of the U.S. population, now index their state motor fuel tax. The Task Force heard testimony from the North Carolina Chamber of Commerce, for example, on its state's legislation for indexing the state's fuel tax. North Carolina increased their transportation revenues through a mix of funding sources, including indexing the state gas tax based on a variable motor fuel tax formula.[81]

The Task Force recommends that the legislature consider implementing an indexing system, so that the flat gasoline and diesel excise tax, as well as the flat registration fees, could be adjusted to account for adjustments to account for inflation, growing costs, fuel efficiency, etc.

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[81] Gary Salamido, NC Chamber of Commerce (Springfield hr'g).

7.2.4 Motor Vehicle Registration Fee Schedule Revision

As discussed earlier, Missouri's registration fee schedule utilizes an archaic and no longer relevant factor of horsepower. **The Task Force recommends that the state's vehicle registration fee schedule be revised to be based on MPG instead of on horsepower.**

Influencing the final shape of that recommendation is the receipt by MoDOT in FY 2016 and 2017 of federal grants to study a new innovative registration fee schedule based on estimated miles per gallon.

The Surface Transportation System Funding Alternatives (STSFA) is a grant opportunity made available through the federal Fixing Americas Surface Transportation (FAST) Act. The purpose of the STSFA program is to provide grants to States to demonstrate user-based alternative revenue mechanisms that utilize a user-fee structure to maintain the long-term solvency of the Federal Highway Trust Fund.

MoDOT received monies for implementation and deployment of an MPG equity registration fee. The current registration fee schedule in Missouri is based on taxable horse power. Missouri is the only State using taxable horse power to assess vehicle registration fees. Taxable horse power is an archaic measure and does not represent vehicle power, weight, or impact caused on infrastructure. The initial work and deliverables from MoDOT STSFA pre-deployment activities are to model how an MPG fee could be used to supplement and or replace the current registration fee schedule.

MoDOT staff informed the Task Force that the department currently is working with the Missouri Department of Revenue to explore existing system capabilities to collect this type of fee and to identify technology gaps. To fully adopt and deploy the new MPG registration fee, the state will need to execute economic models with system-gap implementation of new hardware and software, implement a system concept of operations and business process transformation, utilize technology to collect the registration fee, and educate the public on how the new MPG registration fee works. Principal project goals for generating revenue are to ensure user privacy and security, implement a fair and equitable fee for Missouri drivers, and utilize technology to collect the fee. The results of this grant award could establish a new miles-per-gallon rating for motor vehicle registration fees that could be a model for the country.

The Task Force recommends that the General Assembly provide any legislative changes that may be needed for implementation of a new MPG-based vehicle registration fee.

7.2.5 Internet Sales Tax Revenue for Transportation

Further collection of Internet Sales Tax is an option for future transportation funding. Under this revenue option, **the Task Force recommends that a certain percentage of any collected Internet sales tax be designated to transportation purposes.** The Task Force heard testimony from AASHTO that certain states are doing just that. There is a growing recognition that as more retail purchases are

made online, the more that the state's transportation system is burdened with delivery and distribution needs.

In addition to Internet sales taxes that are already being collected from businesses that have a Missouri presence, the legislature could pass legislation to allow Missouri to participate in the *Streamlined Sales and Use Tax Agreement*. Today, the U.S. Supreme Court's holding in the 1992 *Quill* case significantly restricts a state's ability to collect sales tax from out-of-state companies. But the Supreme Court may consider a case soon, which would provide better clarity on the use of this potential funding source. The Task Force encourages the legislature to continue to monitor and implement better means for collecting the already-existing (but not sufficiently collected) tax and then designate a percentage of additional revenue for transportation.

7.2.6 Express/Managed Lanes

Optional express/managed lanes are **dedicated highway lanes operated in ways that relieve congestion and improve travel times and trip reliability**. This usually is done by using vehicle type, occupancy (*e.g.*, high occupancy vehicle (HOV)) or a user fee (such as a cashless toll) to distribute traffic between the express/managed lanes and the adjacent general-purpose lanes. **Modern technologies allow these added lanes to be tolled through open-road processes and don't require any physical barriers** to accessing the optional lane. Tolled express/managed lanes provide a premium service by choice, ensure that the fair share of funding for the facility goes to local communities, generate a portion of the overall corridor funding, and offer sustainable ongoing operations and maintenance funding.

This is a strategy most often used in urbanized areas and has been successfully deployed across the country in California, Florida, Georgia, Illinois, Indiana, Maryland, Michigan, Minnesota, Nevada, New Jersey, New York, Ohio, Pennsylvania, Texas, Virginia, Washington and Wisconsin. Missouri has no tolled express/managed lanes (although there is a non-tolled express lane on I-70 in the St. Louis urbanized area). Missouri Supreme Court's interpretation that the state constitution prohibits tolling introduces another layer of complexity in considering this option, so a vote of the people on limited tolling opportunities may be required. Also, the Missouri legislature may consider making express managed lanes subject to local approval, as is done in North Carolina.[82]

The Task Force <u>recommends</u> that the legislature consider the use of express managed lanes in metro areas to increase highway capacity, reduce congestion, and improve travel reliability.

7.2.7 Major Bridge Tolling

The U.S. Department of Transportation allows tolling of bridges on the National Highway System and Interstate System for reconstruction, safety and widening needs. **With major bridge replacement costs**

[82] Testimony by Gary Salamido, NC Chamber of Commerce (Springfield hr'g).

often exceeding several hundred million to over a billion dollars in construction costs, states (including Missouri) are struggling to pay for these needed projects with traditional taxing and fee sources. Toll financing has become an option to pay for these significant bridge replacement projects, especially major river crossings. Major bridge tolling would impose a dedicated, user-toll charge on vehicles crossing a new or reconstructed major bridge within the state. (In Missouri, there are 212 major bridges out of 10,405 bridges overall.)

Most states using tolling on bridges now do so under an open-road tolling system in which tolls are collected electronically (in other words, cashless tolls). Under the interpreted constitutional prohibition on tolling in Missouri, this approach currently could only be done by turning a bridge over to local or private control. **The Task Force recommends the Missouri legislature to consider better statutory authorization or limited constitutional authorization for the state and local communities to consider major bridge tolling**. Additionally, open-road tolling would require specific enforcement processes and penalties to be adopted to ensure payment of tolls incurred by drivers.

7.2.8 Mileage-Based Road-User Charges

Mileage-based road-user fees are direct charges levied for the use of roads in lieu of or in addition to fuel taxes. They can include road tolls, fees based on miles traveled, congestion charges, or fees designed to discourage use of certain classes of vehicles or fuel sources. States are exploring various road-user options in response to consumers' buying less gasoline due to electric, hybrid or more-efficient combustion vehicles.[83] In addition to searching for a way to replace declining fuel tax revenue, some argue that road-user charges are more equitable than motor fuel taxes because, with a motor fuel tax, drivers unable to afford fuel-efficient vehicles may end up funding an increasing percentage of the transportation system.

To supplement or eventually replace fuel taxes, vehicle miles traveled (VMT) user fees would charge drivers for use of the transportation system rather than for the purchase of fuel. Potential obstacles to a VMT-based system include safeguarding against fee evasion, phasing in metering equipment installation on older vehicles, and privacy concerns.

NCSL reports that in 2016, for example, 13 state legislatures considered legislation, with four more looking at the issue in 2017. The Task Force heard testimony from Dr. Adrian Moore from the Reason Foundation regarding approximately a dozen states that have or are performing pilot projects to study VMT/road-user-charge systems, including Oregon, Delaware, California, Colorado, Minnesota, Hawaii and Washington.

The Task Force recommends that the Missouri General Assembly monitor the pilot projects being done across the nation regarding mileage-based road-user charges to better understand their lessons learned and success stories and to determine whether such road-user charges would be a

[83] Adrian Moore, Reason Foundation (Cape Girardeau hr'g).

viable option for *replacing* the motor fuel tax in Missouri in the future. The state should explore a flexible system that would give consumers various options for determining VMT—from low-tech options to high-tech options. It should also study the collection process to determine an efficient means of collecting revenue.

7.2.9 Local Revenue Sources and Flexibility

7.2.9.1 State Infrastructure Bank

A State Infrastructure Bank is a tool by which a state sets aside money that can be invested in transformative transportation projects that emerge in response to new federal funding or private-sector development opportunities. Since 2013, five states—Alabama, Louisiana, Nebraska, New Jersey and South Carolina—have passed enabling legislation setting up state banks. Another eight considered such banks but ultimately no action was taken by their legislatures. The states vary in how they fund the banks and for what kind of projects the money may be used. The banks have been capitalized in many ways, including using new or diverted fuel tax and registration fee revenue, general appropriation "nontax sources" and bonding.

Missouri currently operates an Infrastructure bank in the form of the *Missouri Transportation Finance Corporation* (MTFC).[84] It has been capitalized largely with federal dollars. This revolving fund was incorporated in August 1996 as a not-for-profit corporation that would fund Missouri highways and transportation projects by offering financing options such as low-interest direct loans to private and public entities. Current loans tend to be small; in Fiscal Year 2017, the MTFC approved five loans totaling $34.5 million—a significant increase over previous years were loan totals had fallen as low as $2 million.

Unfortunately, Missouri's transportation needs increasingly tend to be large and complex. For example, replacing the Buck O'Neil Bridge in Kansas City is estimated to cost approximately $200 million, an estimate that may go higher if and when the project gets underway. By comparison, at the end of Fiscal Year 2017, the MTFC's net position was only $106,792,000. Without finding an additional source or sources of funding for the bank, its ability to be a significant player in unlocking local public- or private-sector resources for solving transportation challenges is limited.

The Task Force recommends that the General Assembly use state dollars to further capitalize the infrastructure bank. If the legislature were to appropriate additional general revenue for transportation purposes, the Task Force suggests that further **state capitalization of an infrastructure bank would be a good place to put the money to promote transportation-infrastructure projects and to provide more financing options for local communities**. As the Task Force heard, future transportation-infrastructure projects are going to require greater participation from local and state

[84] *See* http://www.modot.org/partnershipdevelopment/mtfc.htm (last visited Dec. 27, 2017).

entities in order to draw down matching federal dollars. An enhanced infrastructure bank could be a source by which local-dollar matches could be met.

7.2.9.2 Local Construction Excise Tax

MoDOT has indicated that it is often able to participate in cost shares with political subdivisions to improve road safety and construct new infrastructure to better serve traffic and transportation safety. Some neighboring states, such as Kansas, allow political subdivisions to enact an excise tax on the development of new neighborhoods in which the developer pays a tax into a non-revolving fund that is used by the political subdivision for the purpose of constructing and maintaining local roads within a specific region. This type of tax is generally collected prior to releasing a plat for development.

The Task Force recommends that the Missouri General Assembly evaluate legislation that would enable political subdivisions to enact local construction-excise taxes to be used for transportation infrastructure. This would improve the ability of local communities to plan and implement adequate transportation systems in growing areas.

7.3 Legislative actions to improve transportation system, increase efficient project-delivery options, better leverage federal dollars, enhance highway safety, and encourage innovation (Part 3)

7.3.1 Project Delivery

Sometimes the best action a legislature can take to advance the interests of its constituents is to simply remove the impediments to local or statewide action by the public or private sectors. This is especially true when the public or specific stakeholders have multiple and/or differing needs that somehow must be addressed. Removing obstacles they may encounter—or empowering them to explore innovative partnerships and solutions—can unleash powerful solutions not previously envisioned.

In this context, there is a broad range of relatively small and inexpensive steps the General Assembly could take that would address the changing options that residents and businesses want to explore for meeting their transportation needs—from simple transit and bike/pedestrian improvements to far larger or complex endeavors like the proposed HyperLoop link between Kansas City and St. Louis.[85] These small changes could include, but are not limited to, the following steps to help leverage existing infrastructure processes, programs and funding sources.

Public-Private Partnerships (P3) for transportation involve contractual arrangements between the state (through one of its agencies) and a private-sector entity. A contract specifies how the skills and assets of both parties will be used to deliver a critical transportation improvement. Missouri was one of the

[85] The Task Force heard about the potential of HyperLoop from Andrew Smith, Vice President, Entrepreneurship and Innovation, St. Louis Regional Chamber of Commerce (Columbia hr'g).

first states in the nation to adopt modern public-private partnership enabling legislation for transportation projects. Since then, 35 states, the District of Columbia and Puerto Rico have enacted legislation enabling P3s for transportation projects.

Today, Missouri uses a form of P3 known as *Design Build* to deliver needed major transportation projects within the state. Such projects have included the Christopher S. Bond Missouri River bridge in Kansas City, the US 60 Corridor in Springfield, the I-70 bridge replacements in Columbia, and the I-64 Corridor and Daniel Boone Missouri River Bridge in St. Louis. *Design Build* has allowed MoDOT to deliver many major bridge and highway corridor needs *faster* and with significant *cost savings*.

Based on this experience, it has become clear that P3s could perhaps be used more extensively in Missouri for transportation projects if revisions to current state law were made to exempt P3 projects from certain local sales taxes; specify sources of funding that could be accessed by private partners to pay for construction of the project; and clarify procurement processes to be used.

The Task Force recommends that the Missouri legislature continue to evaluate greater flexibility in enabling state P3 legislation for transportation projects as a way to gain greater efficiencies in transportation and to enable larger, more transformative projects to be completed faster and more economically by leveraging private-sector investment and involvement.

7.3.2 Highway Safety

The Task Force heard testimony from the Missouri State Highway Patrol,[86] MoDOT,[87] and Missouri businesses and citizens about the need to provide a safe and secure transportation system. Safety is the both the State Patrol's and MoDOT's top priority. But the Task Force determined that **a lack of state legislation related to certain safety measures impacts the state's ability to provide a safe transportation system for its citizens and travelers**. This is especially true for preventable crashes due to factors such as distracted driving, seat belt usage, child passenger restrictions, speeding and teenage drivers.



Currently, **Missouri ranks last among the states in a national safety report on preventable accidents**.[88] Missouri was one of seven states receiving an "F" rating and was ranked last of all 50 states and the District of Columbia. These safety ratings were in large part because Missouri has a lack of legislation

[86] Lieutenant Michael Watson, MSHP (Columbia hr'g).
[87] Nicole Hood, P.E., MoDOT State Highway Safety and Traffic Engineer (11/8/17 meeting, Jefferson City).
[88] National Safety Council, *The State of Safety: A State-by-State Report* (2017).

related to preventable crashes. For instance, Missouri is one of three states without an all-driver texting ban and one of 16 states without a primary seat belt law in place.

According to MoDOT, there were 947 traffic fatalities on Missouri's roadways in 2016—the highest number since 2008—and six out of ten people killed were not wearing seatbelts. And in 2017 the Missouri safety-belt use rate is 84%, which is lower than the national average of just over 90 percent. Preliminary 2016 data also indicates cell phones were involved in 2,379 crashes—a 23-percent increase since 2014. People are 23 times more likely to be in a critical incident when a driver texts and drives. The State Highway Patrol told the Task Force that driver inattention is the leading cause of traffic accidents in Missouri.[89]

In response to these conditions, MoDOT has initiated a *Buckle Up, Phones Down* campaign to highlight the need for safety awareness on Missouri's transportation system.[90] The Missouri State Highway Patrol has also conducted special education campaigns and enforcement operations to encourage safer driving behaviors. According to the Patrol's *Statistical Analysis Center*, as of December 21, 2017, there were 895 fatalities on Missouri's roadways and 64 percent were not wearing seatbelts.[3]



The Missouri State Highway Patrol has been a key partner with MoDOT in terms of safety on Missouri's roadways for 86 years.[91] Enforcement and education projects for all divisions within the Patrol related to traffic safety remain a priority, as evidenced by the following numbers:

- As of November 11, 2017, troopers had issued 124,758 citations for speeding, 61,799 seat belt citations, rendered assistance to 17,051 motorists, investigated 35,994 crashes, and arrested 7,316 impaired drivers.
- Commercial-vehicle-enforcement troopers and commercial-vehicle inspectors had completed 77,540 commercial-vehicle safety inspections as of December 21, 2017. From these inspections, 37,305 driver violations and 98,286 vehicle safety violations were discovered. The Commercial Vehicle Enforcement Division also coordinates five enforcement projects each year focusing on the top 20 counties in the state with the highest number of crashes involving commercial motor vehicles.
- The Missouri State Highway Patrol Driver Examiners conducted 586,996 written tests and 208,820 skills tests in 2016.
- The Patrol's Motor Vehicle Inspection Division facilitated 12,047 school-bus inspections in 2017, and needed to place only 2.1% out of service.

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[89] Lieutenant Michael Watson, MSHP (Columbia hr'g).
[90] Nicole Hood, P.E., MoDOT State Highway Safety and Traffic Engineer (11/8/17 meeting, Jefferson City).
[91] Lieutenant Michael Watson, MSHP (Columbia hr'g).

- To date, troopers and Public Information and Education Division staff have provided 935 traffic-safety programs for 45,589 people across the state.

Since the acquisition of an Augmented Reality System (ARS) coupled with the Forward Looking Infrared (FLIR) camera, pilots with the Aircraft Division and officers on the ground this year have successfully tracked and taken into custody 23 of 26 drivers involved in pursuits in which this system was used. Technology continues to play an important role in safety for the motorists and officers in addition to the reduced liability for the state. As an organization, the Patrol reports that it will continue to evolve in the areas of technology and services to the public.

Additionally, MoDOT implements roadway-safety strategies including paved shoulders, rumble strips, improved pavement friction, curve warning signs, guard cable and guardrail, and intersection improvements to improve safety conditions on Missouri's transportation system. The department also actively explores innovative safety measures such as high-friction surface treatment to improve safety on Missouri's roadways.

The federal government also provides a wide range of grants designed to promote safety. While many grants may be small, they still provide considerable additional transportation funding and have the greater benefit of improving the overall safety of Missouri's streets and highways. As we struggle to find adequate funding for important transportation needs, no funding source is too small to warrant legislative consideration.

The Task Force recommends that the General Assembly continue to advance legislation that can make our transportation system safer and more secure for motorists and their passengers. Based on the testimony and information received in the hearings, **the Task Force recommends that the Missouri General Assembly enact the following highway-safety measures:**

- Enhanced distracted driving legislation;
- Primary seat belt use and enforcement; and
- Graduated driver's license training requirements (geared towards young drivers).

7.3.3 Innovation

Technological changes and innovations will transform how our transportation system is designed, funded, built, operated and maintained. How quickly these changes occur—and how beneficial they'll be to Missouri residents and businesses—often will depend on how soon and how flexibly we can investigate and consider their benefits and costs to the state. Staying on the leading edge of technology advancements is a competitive business in today's economy. It is vital that Missouri has the flexibility to fully leverage these new innovations, so we do not miss out on federal and private investment opportunities and lose out to the 27 other states that have been able to raise new revenues for transportation since 2014.

Unfortunately, the state's ability to investigate the impact of innovative approaches to solving transportation issues is constrained by existing legislative statutes in some instances. For example, Missouri's legal prohibition to tailgating prevents the state from examining the potential benefits and implications of commercial motor-vehicle platooning. (Platooning is a wireless connectivity between trucks that would allow for the second truck to follow at a close distance for better fuel economy, efficiency and safety.) This trend potentially has significant impacts on safety and transportation efficiency, as well as on efforts to rebuild our Interstates, like I-70, and to maintain Missouri's leadership role as a logistics center for the nation. However, Missouri has been unable to authorize a pilot project involving platooning of commercial motor vehicles due to current state law.

It is likely that other examples like this will arise as new and expanded transportation technology innovations come on line. As a result, **the Task Force recommends that the General Assembly explore options for empowering MoDOT, the Missouri State Highway Patrol, or other entities, with appropriate legislative authorization, to propose and initiate pilot projects to test various policy, operational, or enforcement innovations to improve safety, efficiency, and economic benefits provided by the state's transportation system.**

The Task Force recommends that the Missouri legislature examine opportunities to leverage innovation to help grow the state's economic competitive advantage and improve the quality of life of Missouri's citizens through the following means:

- Missouri should be open for business and open for innovation in our transportation system.
- As transportation-related technology advances, additional revenue streams and increased transportation efficiency may become apparent;
- Consider innovation-enabling legislation that would empower the private sector to develop market-based transportation solutions using autonomous and connected vehicle technologies;
- Institute a review of all statutes and regulations to see if changes are needed to allow autonomous vehicle (AV) use or other driver-assist or connected-vehicle technologies.
- Consider the guidelines and best-practice recommendations for automated-vehicle technology by the U.S. Department of Transportation and the National Highway Traffic Safety Administration (NHTSA) as set forth *in Automated Driving Systems (ADS): A Vision for Safety 2.0*[92]; and
- Set up a task force on innovative transportation methods to monitor emerging trends in technology innovations such as EVs, AVs, connected vehicles, rideshare and modern forms of transit, among others. This task force would help "future proof" Missouri's transportation system and its funding by positioning the state to take full economic advantage of emerging

[92] U.S. DOT & NHTSA, *Automated Driving Systems, A Vision for Safety 2.0* (Sept. 12, 2017), *available at* https://www.nhtsa.gov/press-releases/us-dot-releases-new-automated-driving-systems-guidance (last visited Dec. 27, 2017).

trends in transportation choices, technologies and revenues. Some regulation may be needed, but the Task Force recommends that any regulation be market-based (with input and direction from the private sector) and encouraging of (rather than restrictive of) technological advancements.

8.0 Conclusion

During its 7-month evaluation process, the 21st Century Missouri Transportation Task Force learned that the state's transportation system plays a vital part in the lives of Missouri residents and the economy. But the transportation system isn't as optimal as it needs to be. Although Missouri has the seventh largest state highway system in America, with the sixth highest number of bridges, the state funds its transportation system at only 47th in the nation in revenue per mile. Consequently, our aging transportation-infrastructure system is deteriorating, the safety of highway travelers is put at risk, and declining transportation reliability is threatening economic growth, despite the best efforts of the Missouri Department of Transportation.

The Task Force thus recommends further investment to maintain and further develop a safe and reliable, top-notch transportation system that Missouri's residents and business need and want. A comprehensive three-pronged approach will sustain the vital role Missouri's transportation system plays in the lives of Missourians both now and in the future.

First, the Task Force recommends an immediate investment, in roads and bridges as well as in multimodal, to begin to address the annual shortfall of $825 million represented in unfunded and unmet transportation priorities. Roads and bridges can be improved through raising the motor fuel tax by 10 cents for gasoline and 12 cents for diesel.

As President Ronald Reagan said of the motor fuel tax when he signed legislation to increase the federal tax in 1983:

> When we first built our highways, we paid for them with a gas tax, a highway user fee that charged those of us who benefited most from the system. It was a fair concept then, and it is today. But that levy has not been increased in more than 23 years. And it no longer covers expenses.[93]

The same can be said for Missouri's motor fuel tax. It hasn't been adjusted in more than two decades. Because it is a static, volume-based excise tax, its purchasing power and revenue generation do not keep up with inflation unless the rate per gallon is adjusted periodically. To have the same purchasing power today as the 17-cent gas tax had in the mid-1990s (the last time it was changed) the gas tax would have to be increased by 10 cents to be 27 cents per gallon. This adjustment is what the Task

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[93] Ronald Reagan, *Remarks on Signing the Surface Transportation Assistance Act of 1982* (Jan. 6, 1983), as quoted by Chairman Kevin Corlew in the November 8, 2017 working meeting of the Task Force (Jefferson City).

Force recommends. Without it, our transportation revenue will continue to fall short and Missouri will continue to fall behind in highway safety and economic growth.

Revenue from the proposed tax increase, expected to be about $430 million annually, would be used to address transportation-infrastructure needs. More particularly this additional investment in transportation would improve roads and bridges, enhance road safety, and increase economic growth in Missouri.

This proposal will require a vote of the people. Based on public testimony received, the Task Force believes that the Missourians will support the measure. For a successful vote, it will be important to:

- Build a coalition of business, political, and other leaders to address transportation needs;
- Work with transportation network users to define a compelling transportation vision, need or goal; and
- Demonstrate how money raised will be effectively and efficiently spent to address local needs or opportunities.

Furthermore, an annual investment in multimodal transportation of $50-70 million would add transportation efficiency, provide more cost-effective multimodal options for Missouri businesses and residents, improve safety, take advantage of Missouri's central geographic location and natural resources, and push the state to being a leader in travel, logistics, and freight distribution.

Second, while an immediate investment is needed to give Missouri's transportation a much needed "shot in the arm" over the next 10-15 years, the Task Force is also aware of the challenges that changes in transportation choices and technologies will present to transportation revenue in the future. The emergence and increased use of electric, automated, connected, and shared-use vehicles means Missouri will have to further diversify and develop more sustainable transportation-revenue options. Thus, Task Force recommends that the state raise registration fees on electric and hybrid vehicles and change the vehicle registration schedule from being horsepower-based to being MPG-based. Further, the state needs to evaluate and consider implementing transportation-revenue options such as mileage-based road-user charges, tolling and congestion pricing through express/managed lanes and major-bridge user charges; leveraging private investment through public private partnerships; indexing fuel with inflation, among many other new and emerging revenue options discussed in the report.

Third, the Task Force recommends that the legislature improve highway safety by enacting better distracted-driving legislation and encouraging increase seat-belt use through a primary-enforcement law.

Finally, the state should examine opportunities to leverage innovation in transportation (*e.g.*, modern design approaches, road-safety innovations, autonomous vehicles, etc.) to help grow the state's

economic advantage and improve the quality of life of Missouri's citizens by providing more safe and reliable transportation options.

The Task Force has worked diligently to hear from Missouri residents, to become as informed as possible on transportation issues that affect Missouri citizens and businesses, and to make attainable recommendations that will have substantial positive impacts—both now and in the future—for a world-class transportation system. Under HCR 47, the Task Force remains established through 2018 and is available if further action is needed to help see these proposals take shape.

Appendix A – House Concurrent Resolution 47 (2017)

Appendix B – Task Force Member Letters

Appendix C – Glossary

FIRST REGULAR SESSION

HOUSE COMMITTEE SUBSTITUTE FOR

House Concurrent Resolution No. 47

99TH GENERAL ASSEMBLY

2324H.02P D. ADAM CRUMBLISS, Chief Clerk

WHEREAS, Missouri's transportation system plays a vital part in the lives of Missouri's citizens. It is counted on to safely and reliably connect people with family, jobs and services, businesses with suppliers and customers, students with schools, and visitors with destinations; and

WHEREAS, among the states, Missouri has been a leader in transportation; the first interstate highway project in the United States to begin construction after the passage of the Federal-Aid Highway Act of 1956 was in Missouri; and

WHEREAS, there is a total of 33,884 miles of roadway within the state of Missouri, which makes the state highway system the nation's seventh largest state highway system. Missouri also ranks sixth nationally in the number of bridges with 10,394. These numbers do not include the city and county system of roads and bridges, which includes an additional 97,000 miles of county roads and city streets, and nearly 14,000 bridges; and

WHEREAS, Missouri's transportation infrastructure is aging; and

WHEREAS, the primary sources of revenue provided to the Missouri Department of Transportation to manage the state transportation system are user fees: fuel taxes, registration and licensing fees, and motor vehicle sales taxes; and

WHEREAS, when compared to other states, Missouri ranks 47th in the nation in revenue per mile:

NOW THEREFORE BE IT RESOLVED that the members of the Missouri House of Representatives, Ninety-ninth General Assembly, First Regular Session, the Senate concurring therein, hereby create the 21st Century Missouri Transportation System Task Force; and

BE IT FURTHER RESOLVED that the mission of the task force shall be to:

(1) Evaluate the condition of our state transportation system, including roads and bridges;

(2) Evaluate current transportation funding in Missouri;

(3) Evaluate whether current transportation funding in Missouri is sufficient to not only maintain the transportation system in its current state but also to ensure that it serves the transportation needs of Missouri's citizens as we move forward in the 21st century;

(4) Make recommendations regarding the condition of the state transportation system; and

(5) Make recommendations regarding transportation funding; and

BE IT FURTHER RESOLVED that the task force shall consist of the following members:

(1) Five members of the House of Representatives, with three members to be appointed by the Speaker of the House of Representatives, at least one of whom is a member of the Joint Committee on Transportation Oversight, and two members to be appointed by the Minority Leader of the House of Representatives, at least one of whom is a member of the Joint Committee on Transportation Oversight;

(2) Five members of the Senate, with three members to be appointed by the President Pro Tempore of the Senate, at least one of whom is a member of the Joint Committee on Transportation Oversight, and two members to be appointed by the Minority Leader of the Senate, at least one of whom is a member of the Joint Committee on Transportation Oversight;

(3) The Governor or his or her designee;

(4) The Director of the Department of Transportation or his or her designee;

(5) The Director of the Department of Economic Development or his or her designee;

(6) The Superintendent of the State Highway Patrol or his or her designee; and

(7) Nine Missouri residents or representatives from non-governmental organizations within Missouri, two of whom shall be appointed by the Speaker of the House of Representatives, one of whom shall be appointed by the Minority Leader of the House of Representatives, two of whom shall be appointed by the President Pro Tempore of the Senate, one of whom shall be appointed by the Minority Leader of the Senate, and three of whom shall be appointed by the Governor; and

BE IT FURTHER RESOLVED that the Speaker of the House of Representatives shall designate the chair of the task force and the President Pro Tempore of the Senate shall designate the vice chair of the task force; and

BE IT FURTHER RESOLVED that the staffs of House Research, Senate Research, and the Joint Committee on Legislative Research shall provide such legal, research, clerical, technical, and bill drafting services as the task force may require in the performance of its duties; and

BE IT FURTHER RESOLVED that the task force, its members, and any staff assigned to the task force shall receive reimbursement for actual and necessary expenses incurred in attending meetings of the task force or any subcommittee thereof; and

BE IT FURTHER RESOLVED that the task force shall meet within two months from adoption of this resolution; and

BE IT FURTHER RESOLVED that the 21st Century Missouri Transportation System Task Force shall report a summary of its activities and any recommendations for legislation to the General Assembly by January 1, 2018; and

BE IT FURTHER RESOLVED that the task force is authorized to function during the legislative interim of both the first and second regular sessions of the Ninety-ninth General Assembly, as authorized by *State v. Atterbury*, 300 S.W.2d 806 (Mo. 1957); and

BE IT FURTHER RESOLVED that the task force shall terminate on January 1, 2019; and

BE IT FURTHER RESOLVED that the Chief Clerk of the Missouri House of Representatives be instructed to prepare properly inscribed copies of this resolution for the Governor, the Director of the Department of Transportation, the Director of the Department of Economic Development, and the Superintendent of the State Highway Patrol.

✓

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December 28, 2017

The Honorable Kevin Corlew, Chairman of the 21st Century Missouri Transportation Task Force
The Honorable Dave Schatz, Vice Chairman of the 21st Century Missouri Transportation Task Force
Missouri General Assembly
201 West Capitol Ave.
Jefferson City, MO 65101

HNTB

Dear Representative Corlew and Senator Schatz:

Thank you for the honor and privilege of serving on the 21st Century Missouri Transportation System Task Force and taking part in its important work to find a solution for the state's pressing transportation needs.

All of us at HNTB, and within the transportation engineering industry, commend you for your leadership in seeking to build a statewide consensus on how best to shape and sustain our transportation system to remain competitive in an increasingly global marketplace. We appreciate your understanding that, if we wait much longer to tackle this challenge, Missouri may be left behind as other states move aggressively to build transportation systems that reward them with increased safety and innovation, greater economic growth and improved quality of life.

With the federal government moving towards a new national infrastructure plan, it already is clear that states that will benefit most will be those with the resources to fully match federal or private investment to underwrite projects with significant safety and economic growth benefits. Our hope is that Missouri will be one of them.

As a Missouri-based, national leader in transportation, HNTB knows many of Missouri's competitor states will be on the list. Five of Missouri's bordering states have passed or taken up consideration of significant transportation funding increases in the past five years. These are states that compete with Missouri for the benefits that come with a well-planned, well-funded transportation network – increased federal funding, new business investment, job creation and greater economic growth (to the tune of about 22 percent return on every transportation dollar, according to federal estimates.)

Missouri's transportation challenges did not arise overnight, and we recognize they will not be fully addressed in one fell swoop. But we believe the Task Force has taken the first crucial step towards building consensus around the need to fix Missouri's transportation system and its funding constraints. We support the Task Force recommendations as a key step in creating a long-term, sustainable solution - one that can win the confidence of taxpayers, legislators and the Governor of Missouri - the kind of transportation system that will help make the state successful in the 21st-century global marketplace in which we live.

Best regards,

Gretchen Ivy, P.E.
HNTB Vice President; Director of Transportation Planning

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Representative Kevin Corlew, Chairman
Missouri House of Representatives, 14th District
201 W Capitol Ave Room 201 B-A
Jefferson City, MO 65101

Senator Dave Schatz, Vice-Chairman
Missouri House of Representatives, 26th District
201 W Capitol Ave Room 433
Jefferson City, MO 65101

Gentlemen,

I'd like to first thank you for your leadership as Chair and Vice-Chair of the 21st Century Transportation Systems Task Force. It has been a pleasure serving with you on this committee.

As we traveled around the state this year listening to various stakeholders we heard the same similar themes. Missourians are fed up with the economic malaise that has affected much of our state for the past decade. Missourians are tired of being the embarrassment of the greater Midwest when benchmarked against our peers. Lastly, Missourians from every part of the state are frustrated with the lack of investment in our transportation systems and infrastructure.

As we all know, Missouri is perfectly geographically centered in the lower forty-eight and many times it seems as though we aren't having the right public conversation and debate about where we stand in the United States. With Missouri's incredible inherent assets, with our massive network of interstate highways, rail, river, port and airport capacity, there is no reason we shouldn't be the transportation, distribution and logistics capitol for the United States as well as a major player in a truly global economy. This needs to be the conversation going forward as we work to define Missouri's place in the global landscape.

In the private sector we all know that capital flows towards projects that are conducive to great returns. In the public sector, the positive economic impact and the multiplying effect of a robust, long term transportation and infrastructure investment is quantifiable and it is massive. The economic development opportunities on the backside of this investment are also quantifiable and they too are massive. Governor Greitens went to Jefferson City on a mission to provide "more jobs, higher pay and safer streets". I can't think of a single greater investment that would provide all three.

I want Missouri to be a place that attracts and welcomes businesses. I want Missouri to be a place that families want to move to and not from. Investing in our inherent natural advantages is critical to this mission.

It has been twenty five years since we last addressed our transportation funding. The time is now for bold vision and bold leadership. The time is now for us to put aside party differences and partisan politics and commit to working together to immediately implement a robust and long term, innovative and sustainably funded transportation and infrastructure investment for Missouri. The future of our state depends on it.

With great respect,

Nathan G. McKean
Chief Executive Officer
Breckenridge Material Company

From: Gwen Moore, Chair
Missouri Coalition for Better Transportation
http://www.mocbt.org/
contactus@mocbt.org

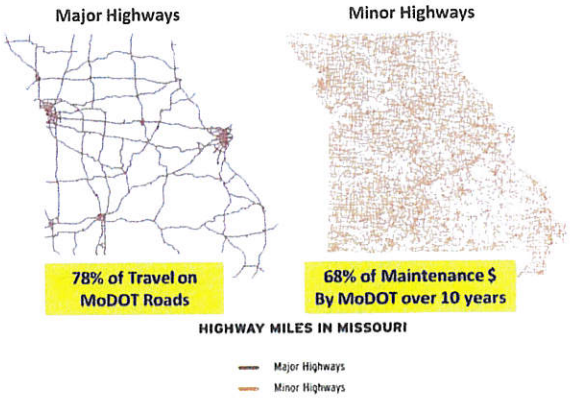
To: Representative Kevin Corlew, Chairman
and Sen. Dave Schatz, Vice Chair
21st Century Missouri Transportation
System Task Force

Missouri Transportation Harms Everyone, and Is Unlike Other States

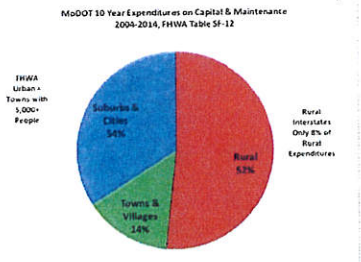
Executive Summary: Missouri's unique funding structure for all public highways, bridges, streets and transit mean that no area is funded appropriately, or as in other states. MoDOT has almost TRIPPLE the road miles expected for a state this size in land area and population – more than Iowa, Nebraska, and Kansas COMBINED. Unlike most other states: The MODOT system is over-weighted with rural roads and spends a disproportionately high amount (52%) in rural areas. MoDOT also has 36 times the median of roads which are not Federally Funded (mainly rural) held by other DOT's. The amount of funds sent to local governments is also disproportionately directed to rural areas. Missouri does not have any local gas taxes. Also gas taxes do not subsidize transit or any multimodal transportation. This leaves all Missouri citizens underserved by Missouri transportation – and voters distrust our transportation system. This explains why voters have turned down all tax increases for transportation since 1992.

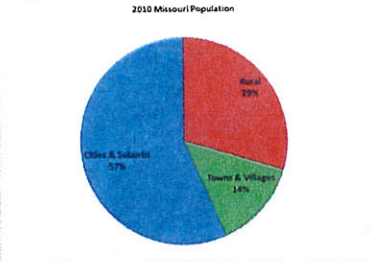
Missouri's Spending on Transportation
Penalizes People in Suburbs, Large & Small Cities, Villages and Towns (5,000+)

MoDOT Underfunds the Majority of Taxpayers: Compared to 49 other states, over 10 years Missouri underfunded suburbs, cities, towns & villages with 5,000+ people by $2.5-3.2 BILLION[i]. **In Missouri, urban taxpayers received only 35¢ on their transportation tax dollar. Rural taxpayers received $4.31.**[ii] More than half of our drivers (52%) and our motor vehicles (53%) are in the 11 urban counties (only 10% of all counties in MO)[iii].



More than HALF (52%) of MoDOT funds were spent where less than a third (31%) of the people live, over 10 years per MoDOT.







All Rural Roads are in a better condition than all Urban Roads per MoDOT. The majority of bridges built were Rural (72%) yet the majority of traffic on poor bridges are still Urban (75%).

Rural Transportation Harms

T.R.I.P. reports that the traffic fatality rate on public Rural Roads is 2-3 times that of other areas[iv]. The **Missouri Rural Health Association** recognizes how critical transportation is to family health. Pregnant women cannot walk 2 miles to a bus in cities, nor 20-50 miles to a clinic in rural areas. While the highest infant mortality number is in cities, the highest infant mortality rate is in rural counties.

No Transportation Tax Increase until Laws and the System is Changed!

Since the MO Constitution on transportation was passed in the 1950's, Missouri has grown half as fast as the rest of the nation, losing half of our Congressional Districts.

1. Require Equal Distribution of 80% of Gas & Vehicle Taxes by Congressional Districts. Georgia has proven that this ensures FAIR treatment for EVERYONE. Most Missourians believe they are treated unfairly under the current system.

2. Require the remaining 20% of funds for Rural Interstates from State Taxes. Funding should be based on traffic & needs – not politics.

3. Allow **Local** Transportation Taxes on Gas & Vehicle Sales.
   - Only a small portion of Property taxes or Regressive Sales taxes trickle down to transportation.
   - Twenty-seven states allow local driver taxes – Missouri allows ZERO.
   - As must be clearly stated on a ballot, local transportation taxes would be designated exclusively for local needs and determined by the related local government.

4. Subsidize Transit with Gas & Vehicle taxes.
   - Most states allocate 15-20% to mass transit while Missouri allows ZERO.
   - Transit provides cost effective help for cities, suburbs and rural areas alike.
   - Transit bus & light rail, elderly & handicapped options, plus bike & pedestrian solutions mean economic growth, flexibility and greater responsiveness.

5. Require Ongoing Engineering Performance Audits on the use of all transportation taxes. Both rural and urban Missourians distrust MoDOT.

6. Majority, DBE & MBE highway contractors can ALL win more bids & provide more jobs.

Improving & monitoring Missouri transportation law will result in:

- Designing, building & maintaining safer roads & bridges;
- Saving taxpayers $1,500 per year per vehicle due to lower gas use, repairs & maintenance;
- Cleaner air; and
- Economic development across the state.

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[i] Compared to the percent of urban funding by other states per Federal Highway Administration Table SF-12 https://www.fhwa.dot.gov/policyinformation/statistics.cfm

[ii] MoDOT 10-Year Capital & Maintenance Expenditures (FHWA SF-1https://www.fhwa.dot.gov/policyinformation/statistics.cfm; averaged plus FY14 County Aid Road Trust Fund Distribution http://dor.mo.gov/publicreports/

[iii] Department of Revenue 2013, "Total Motor Vehicle License Plates by Type by County," and "Total Drivers by Age within County" http://dor.mo.gov/publicreports/#dlrep

[iv] T.R.I.P,'s "Missouri Transportation by the Numbers Report", dated 04/30/2015

LaTonya Percival

From: Mayor Schneider <mayorschneider@florissantmo.com>
Sent: Wednesday, December 20, 2017 6:05 PM
To: Kevin Corlew
Cc: City Council; pkelly@stlmuni.org; Dan Ross (dross@mocities.com); Rebecca Zoll; JOHN@STLBCTC.ORG; Lou Jearls; gina@ginawalsh.com
Subject: FW: Position Statements for Highway Funding

To:
Missouri State Representative Kevin Corlew
Chairman of the Missouri 21st Century Transportation Task Force

From:
Florissant Mayor Thomas P. Schneider

Topic:
Correspondence to attach to the panel recommendation as per Chairman invitation at December 19 meeting in Jeff City.

Please note that below are the official positions of the Missouri Municipal League and also the Municipal League of Metro St. Louis.

COPIED AND PASTED FROM THE LEGISLATIVE PRIORITIES OF THE MISSOURI MUNICIPAL LEAGUE PAGE 11;

TRANSPORTATION INFRASTRUCTURE
The MML recognizes the importance of transportation infrastructure to Missouri economic development and supports continuing reviews of the structure of the Missouri Department of Transportation (MoDOT) and of funding resources to address transportation needs that:
1. Consider the economic importance of connectivity.
2. Provide for mass transit.
3. Maintain existing infrastructure.

COPIED AND PASTED FROM THE LEGISLATIVE PRIORITIES OF THE MUNICIPAL LEAGUE OF METRO ST. LOUIS;

#3 - Transportation Funding - Missouri faces a transportation funding crisis and since the statewide transportation sales tax failed, state leaders have been reluctant to consider any other types of funding options. The League has long supported a gas tax as a fair and equitable way to fund transportation needs.

Given the importance of the States infrastructure, the League supports legislation to create a long-term funding source to maintain and improve highways, roads and bridges throughout the State

ADDITIONAL COMMENTS;

In addition we heard from numerous stakeholders including Rebecca Zoll of North County Incorporated, John Nations of Bi State Development (also known as Metro Transit), John Stiffler, the head of the St. Louis Building and Trades Council, Kansas City Mayor Sly James, County Commissioners, Construction materials manufacturers, Trucking industry executives, Engineering Professionals, economist, Chamber of Commerce representatives, and many others from a wide cross section of Missouri Stakeholders in favor of more transportation funding and soon.

We also heard expert and detailed testimony from our Missouri Department of Transportation and I believe we all came away convinced that MODOT has delivered quality results with their limited resources.

I am honored that Senator Gina Walsh appointed me to this important panel and it was an additional honor to serve under the admirable leadership of Representative Kevin Corlew. I as well as every stakeholder I have spoken with believe that the time is now to take action to increase funding for MODOT and our other aging transportation infrastructure. I am in complete agreement with the Chairman's summary and conclusion that the consensus of the task force is to recommend to the General Assembly that a 10 cent increase in gas tax and a 12 cent increase in diesel fuel be placed before the voters of Missouri as soon as possible.

Thank you for the excellent job you did as Chairman of the Task Force.

Appendix C - Glossary

American Association of State Highway and Transportation Officials (AASHTO)

A standards-setting body which publishes specifications, test protocols and guidelines which are used in highway design and construction throughout the United States. Despite its name, the association represents not only highways but air, rail, water, and public transportation as well.

American Road & Transportation Builders Association

A federated, non-partisan organization whose design, build, manage and advocate for the Interstates and the nation's intermodal surface transportation network.

Autonomous Vehicles (AVs)

The U.S. Department of Transportation (USDOT) and the National Highway Traffic Safety Administration (NHTSA) have established 5 levels of vehicle automation:

Level 0: No Automation -- Zero autonomy; the driver performs all driving tasks.

Level 1: Driver Assistance -- Vehicle is controlled by the driver, but some driving assist features may be included in the vehicle design.

Level 2: Partial Automation -- Vehicle has combined automated functions, like acceleration and steering, but the driver must remain engaged with the driving task and monitor the environment at all times.

Level 3: Conditional Automation -- Driver is a necessity, but is not required to monitor the environment. The driver must be ready to take control of the vehicle at all times with notice.

Level 4: High Automation -- The vehicle is capable of performing all driving functions under certain conditions. The driver may have the option to control the vehicle.

Level 5: Full Automation -- The vehicle is capable of performing all driving functions under all conditions. The driver may have the option to control the vehicle.

Blue Ribbon Commission

A group usually comprised of public- and private-sector representatives, along with technical experts, who area appointed to investigate, study or analyze a given issue and develop policy recommendations for consideration by an elected body.

Buckle Up, Phones Down

A MoDOT program for motivating individuals and companies to commit to always using seat belts and never using cell phones while driving.

Cashless tolling

A system for tolling that assesses and collects a vehicle fee electronically.

Centerline mile

A centerline mile is a measure of the length of a highway as measured along the highway's centerline.

Constitutional Amendment 3 (2004)

Missouri voters approved Constitutional Amendment 3 in 2004, which requires all revenues collected from the sale of motor vehicles go to transportation. Previously, half of the sales tax went to the state road fund and half to the state's general revenue fund. It also required the Missouri Highways and Transportation Commission to issue bonds for building highway and bridge projects and use the additional revenues to pay back the bonds.

Constitutional Amendment 7 (Proposed 2014)

In 2014, Missouri voters turned down Constitutional Amendment 7, which would have raised the state sales tax by ¾-cent for 10 years to fund more than 800 locally prioritized projects on the state system across all modes of transportation. The proposal did not involve the motor fuel tax.

DOT – Department of Transportation

A federal or state agency responsible for overseeing the transportation system.

Excise fuel tax

Excise fuel taxes are taxes paid when fuel, such as gasoline, is purchased.

Express lanes

A traffic lane intended for faster traffic that has more limited access than the roadway it is associated with.

Fixing America's Surface Transportation Act (FAST)

A 2015 funding and authorization bill to govern United States federal surface transportation spending. Provides long-term (5-year) funding certainty for surface transportation infrastructure planning and investment.

Federal Highway Administration (FHWA)

A division of the United States Department of Transportation that specializes in highway transportation. The agency's major activities are grouped into two "programs," the Federal-aid Highway Program and the Federal Lands Highway Program.

Grant Anticipation Revenue Vehicle (GARVEE)

A type of bond or similar financing method issued by a state or state infrastructure bank under the guidelines of the National Highway System Designation Act of 1995 to provide upfront transportation project funding when a specific revenue source exists for paying back the grant.

General revenue fund
Revenue that a state or local government raises through taxation and that may be used for any purpose.

Hancock Amendment
A 1980 amendment to Missouri's Constitution that imposes restrictions on the amount of personal income used to fund state government and the amount by which fees and taxes can be increased.

Highway Trust Fund (HTF)
A federal government fund established to hold federal highway user taxes that are devoted for highway and transit related purposes.

Hybrid vehicle
A vehicle with a gasoline engine and an electric motor, each of which can propel it, that are used in different situations based on need and ability to maximize fuel economy.

HyperLoop
A proposed system of transport that would see "pods" containing people or goods travel at high speeds through a tube that has been pumped into a near-vacuum.

Indexing
Linking the price of something to the underlying value of an index (inflation rate, prices, wages or other payments) so that the price automatically adjusts to the value of a price index.

Interstate Highway System
A network of U.S. highways connecting the 48 contiguous states and most of the cities with populations above 50,000, begun in the 1950s and estimated to carry about a fifth of the nation's traffic.

Lockbox
A legislative mechanism that attempts to isolate, or "lock away," government revenue as a protected source of funds for a specific purpose.

Managed lane
A type of highway lane that is operated using a management framework, such as lane use restrictions or variable tolling, to optimize traffic flow, vehicle throughput, or both.

Miles per gallon (MPG)
A measure of the average distance traveled per gallon of fuel consumed.

Missouri General Assembly
The state legislature of the State of Missouri composed of two chambers: the House of Representatives and the Senate.

Missouri Department of Revenue (MDOR)
A Missouri state government agency that is responsible for ensuring the proper functioning of state and local government through the collection and distribution of state revenue.

Missouri Department of Transportation (MoDOT)
The Missouri state agency created to provide a safe, efficient transportation system for Missouri residents, businesses and travelers.

Missouri Highways and Transportation Commission (MHTC)
A six-member board that governs the Missouri Department of Transportation. Commissioners are appointed by the governor.

Missouri Long-Range Transportation Plan (LRTP)
MoDOT's strategic plan for ensuring that over the long-term Missouri's transportation system safely and reliably meets the mobility needs of Missouri residents, businesses and travelers.

Missouri Transportation Finance Corporation (MTFC)
Missouri's State Infrastructure Bank created under the authority of the National Highway System (NHS) Designation Act of 1995. It serves as a revolving loan fund that can offer loans and non-grant forms of credit assistance to public and private entities to finance a wide variety of transportation projects through loans and credit enhancements. Money from a SIB is loaned out to entities for transportation projects, repaid and then loaned out again

National Council of State Legislators (NCSL)
NCSL is a bi-partisan research and advocacy group for state legislatures that aims to improve the quality and effectiveness of state legislatures by promoting policy innovation and communication among them.

National Highway Traffic Safety Administration (NHTSA)
An agency of the Executive Branch of the U.S. government, part of the Department of Transportation. It describes its mission as "Save lives, prevent injuries, reduce vehicle-related crashes."

National Transportation Safety Board (NTSB)
An independent U.S. government investigative agency responsible for civil transportation accident investigation and investigating cases of hazardous materials releases that occur during transportation.

Practical design
A project management approach that focuses decision-making on maximizing the potential performance benefit to the transportation system rather than on maximizing project features or benefits.

Public-private partnerships (P3s)
A contractual arrangement between a public agency and a private-sector entity for delivering a service or facility to the public in which significant risk and management responsibilities are shifted to the

private sector party who, in return, is compensated for meeting construction, operation, and maintenance performance measures.

Regional Integrated Transportation Information System (RITIS)

An automated data fusion and dissemination system that provides an enhanced overall view of the transportation network and how it is operating.

Road to Tomorrow

A MoDOT initiative for seeking innovative approaches to funding, designing, delivering and operating transportation services on the state's roadways and highways.

Road-user charge

A direct charge levied for the use of roads and which may include road tolls, distance- or time-based fees, congestion charges, and charges designed to discourage use of certain classes of vehicle, fuel sources, or more polluting vehicles.

Safety Campaigns

The Missouri State Highway Patrol participates in MoDOT's Highway Safety campaigns. These safety campaigns include *Click It or Ticket*, youth seatbelt enforcement, youth alcohol enforcement, and *Move Over* campaign, which requires motorists to move over and change lanes to give a safe clearance for law enforcement, emergency vehicles, and highway workers.

Special Education Campaigns

Efforts coordinated by the Missouri State Highway Patrol's Public Information and Education Division (PIED) to inform the public and media on traffic and traffic safety-related issues, furthering the Patrol's mission. Safety programs are tailored for all age groups, including grade- and middle-school children on how to ride safely in vehicles. A long-term focus has been on the young drivers who are the most overrepresented age group in the categories of fatality crashes, injury crashes, and overall crashes. In 2016, the Patrol released the "Don't Violate the Trust" traffic safety video. This is the latest in a series of teen-driving videos that are released every three years. In addition, the Patrol has become increasingly active promoting traffic safety on social media.

Special Enforcement Operations

Traffic and traffic safety-related visibility and enforcement projects furthering the Missouri State Highway Patrol's purpose to enforce the traffic laws and promote safety upon the highways. These projects include added and roadway specific operations during holiday periods such as the 20-mile trooper and the Crash Awareness Reduction Effort (CARE) programs. Other projects include seatbelt enforcement operation, driving while intoxicated saturations, distracted driving detection, commercial

vehicle enforcement safety checks, railroad-crossing safety enforcement, and High Intensity Drug Trafficking Area (HIDTA) projects.

State Highway Patrol

The state agency created with the primary purpose to enforce the traffic laws and promote safety upon the highways.

Statewide Transportation Improvement Program (STIP)
The STIP is a staged, multi-year, statewide intermodal program of transportation projects, consistent with the statewide transportation plan and planning processes as well as metropolitan plans, transportation improvement programs (TIPs), and planning processes.

Toll
A user charge collected so that a vehicle may use a bridge or road.

Transportation Investment Advocacy Center (TIAC)
An advocacy resource designed to help private citizens, legislators, organizations and businesses successfully grow transportation investment at the state and local levels through the legislative and ballot initiative processes.

Transportation Research Board (TRB)
A division of the National Research Council of the United States which serves as an independent adviser to the President of the United States of America, the Congress and federal agencies on scientific and technical questions of national importance.

United States Department of Transportation (U.S.DOT)
The federal Cabinet department of the U.S. government concerned with transportation.

Vehicle miles travelled (VMT)
A measurement of miles traveled by vehicles within a specified region for a specified period.