

Draft

# FY 2020-2023

# TRANSPORTATION

# IMPROVEMENT PROGRAM

For Approval June 2019

Midland Area Transportation Study

Metropolitan Planning Organization

220 W Ellsworth Street, Suite 326

Midland, Michigan 48640

Phone: (989) 832-6333

info@midlandmpo.com

[www.midlandmpo.org](http://www.midlandmpo.org)

## Acknowledgements

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*MATS' FY 2020-2023 Transportation Improvement Program* was approved by the Midland Area Transportation Study Policy and Technical Committees on June 4, 2019. The minutes of the June 4, 2019 Policy Committee meeting, including discussion of the TIP and motion regarding resulting approval, are included in the Appendix, together with MATS' 2020-2023 TIP Resolution and Planning Process Certification.

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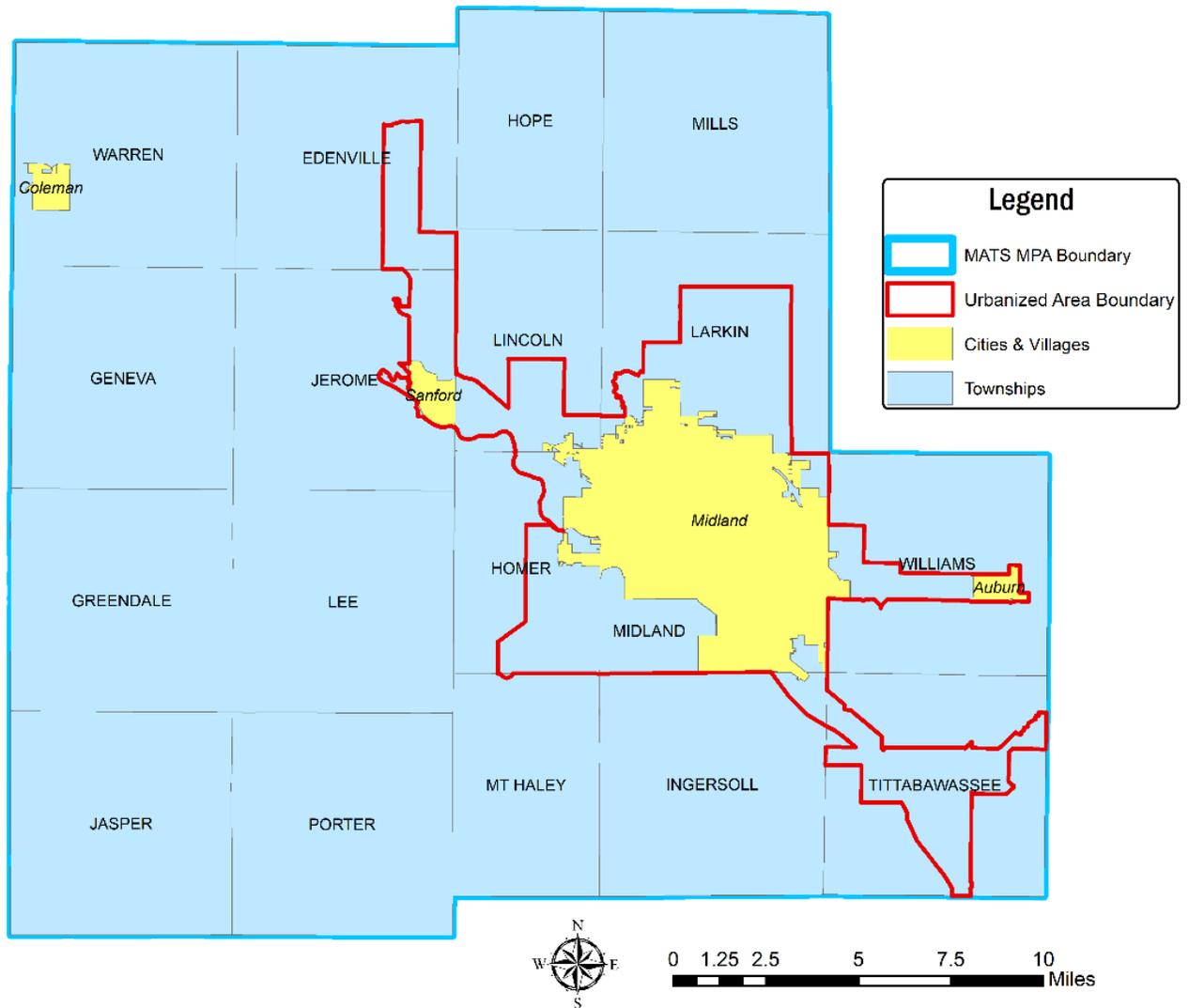
# Introduction

Recognizing that many transportation actions and their impacts are by nature regional in scope, the transportation planning process is aimed at creating a forum in which local, State and Federal agencies responsible for developing transportation improvements can act in a coordinated manner. This approach facilitates comprehensive and orderly development of transportation facilities and services. Every urbanized area with a population of more than 50,000 must have a designated Metropolitan Planning Organization (MPO) for transportation to qualify for federal highway or transit assistance. The United States Department of Transportation (USDOT) relies on the MPOs to ensure that highway and transit projects that use federal funds are products of a credible planning process and meet local priorities. USDOT will not approve federal funding for urban highway and transit projects unless they are on the MPO's program. Thus, the MPO's role is to develop and maintain the necessary transportation plan for the area to assure that federal funds support these locally developed plans. The MPOs have also been given the responsibility to involve the public in this process through expanded citizen participation efforts. The Midland Area Transportation Study (MATS) is the MPO for the Midland Urbanized area, designated by Governor Snyder on January 8, 2013, and redesignated to the current boundary on May 2, 2018.

MATS' goal is to assist in the development and preservation of a safe, effective, well-maintained, efficient, and economical transportation system for the Midland metropolitan area while minimizing negative impacts on the physical and social environments and related land uses. Its primary role is the programming of transportation projects. The agency will ensure participation from the public and the affected agencies in the area to further develop and improve the planning process. MATS recognizes its responsibility to provide fairness and equity in all of its programs and activities, and that it must abide by and enforce federal and state legislation related to transportation. The MATS metropolitan planning area is defined as all of Midland County, the City of Auburn and Williams Charter Township in Bay County, and Tittabawassee Township in Saginaw County. A map of the MATS planning area is included on following page.

The Transportation Improvement Program (TIP) is an integral part of the planning process. According to joint regulations of the Federal Highway Administration (FHWA) and the Federal Transit Administration (FTA), the TIP is "a prioritized listing/program of transportation projects covering a period of four years that is developed and formally adopted by a Metropolitan Planning Organization (MPO) as part of the metropolitan transportation planning process, consistent with the metropolitan transportation plan, and required for projects to be eligible for funding under Title 23 U.S.C. and Title 49 U.S.C. Chapter 53". The major purpose of the TIP is to identify and prioritize Federal-Aid projects and programs in local urbanized areas. An equally important objective of the TIP is to ensure that scheduled transportation improvements are consistent with current and projected financial resources. A TIP developed in consideration of the purposes mentioned above, provides for the efficient use of available financial resources in addressing the area's transportation needs in an orderly and efficient manner.

## Midland Area Transportation Study (MATS) Jurisdiction



This document represents the Transportation Improvement Program (TIP) for MATS for Fiscal Years 2020 – 2023 (October 1, 2019 through September 30, 2023). It was approved by the Policy and Technical Committees on June 4, 2019. The minutes of the June 4, 2019 Policy Committee meeting, including discussion of the TIP and motion regarding resulting resolution, are included in Appendix A, together with MATS Resolution regarding FY 2020-2023 TIP, and Planning Process Certification.

## TIP Overview and Development Process

The Federal Transportation Bill, *Fixing America's Surface Transportation Act (FAST) of 2015* and Title 23 USC Sec 134(a) and (h) /FTA-Sec 8(a) and (h) require that a TIP must be developed for each metropolitan area by its MPO in cooperation with the State, transit operators, and local road implementing agencies. It must include all projects to be funded under Title 23 and the Federal Transit Administration (FTA). This includes all federally funded highway, bridges, pavement, public transportation, safety, congestion, intermodal and non-motorized transportation projects, as well as any non-federally funded projects that are deemed regionally significant. The TIP must be updated and approved at least every four years by the MPO and State authority (Governor). Additionally, there must be a reasonable opportunity for public comment prior to TIP approval.

The TIP must cover a period of not less than four years and must include a priority list of projects to be carried out in the first four years. The TIP shall be financially constrained and include a financial plan that demonstrates how the projects can be implemented while the existing transportation system is being adequately operated and maintained. Only projects for which construction and operating funds can reasonably be expected to be available may be included. In developing the financial analysis, all projects and strategies funded under Title 23, U.S.C., and the Federal Transit Act, other Federal funds, local sources, State assistance, and private contributions need to be taken into account. The TIP must be consistent with the area's Long Range Metropolitan Transportation Plan. (MATS' Long Range Plan, *Towards 2045* can be found at this link: <https://www.midlandmpo.org/towards-2045>.) The approval of the TIP needs to be in accordance with the MATS' Public Participation Plan, which among other things ensures consideration of Environmental Justice concepts. An analysis of these concepts is included in this document.

For a more detailed description of the public participation process, see the MATS' Public Participation Plan at this link: <https://www.midlandmpo.org/public-participation-plan/>.

The selection of all projects to be included in the TIP is primarily the responsibility of the Technical Committee in consultation with MATS staff. The merits of each project are examined, based on local needs, priorities, and importance within the area-wide transportation system, and also on factors delineated in current federal transportation legislation. The Technical Committee evaluates the collection of proposed projects, selects, schedules, and sets overall program strategies for the four-year program. The entire TIP project list (including the selected Federal-aid projects and recommendations established by the Technical Committee and staff) is forwarded to the Policy Committee for review before release of the preliminary list for public comment. Following an appropriate comment period as required by law, it is then the responsibility of the Policy Committee to grant final approval of the project list that is included in the TIP document.

Implementing agencies in the MATS area include: the Cities of Midland and Auburn, the Midland County Road Commission (MCRC), the Bay County Road Commission (BCRC), the Saginaw County Road Commission (SCRC), Village of Sanford, Dial-a-Ride Transportation (DART), County Connection of Midland, Bay Metro Transportation Authority (BMTA), and the Michigan Department of Transportation (MDOT). MDOT is the implementing agency for all state highway projects. These agencies plus officials from local townships have representation on both the Policy and Technical Committees of MATS.

The development of a new Transportation Improvement Program begins with the local road and transit agencies as well as the Michigan Department of Transportation (MDOT) recommending projects and programs that they identify as best meeting the transportation needs of their respective systems. Projects potentially utilizing MATS' local urban funds (STUL) are reviewed and selected in-house based on prioritization factors by an Initial Review Committee (comprised of representatives from each agency that submitted projects for urban funding). The Initial Review Committee then makes a recommendation to the Technical and Policy Committees regarding which urban projects should be selected. All other projects (trunkline, local rural, safety, bridge, transit, etc.) are initiated through external processes and are provided to MATS for review and potential inclusion in the TIP.

All transportation projects, or recognized phases of a project on the TIP (including pedestrian walkways, bicycle transportation facilities, transportation enhancement projects, para-transit plans and those projects that implement the plans), shall include descriptive material to identify the project or phase, estimated total cost, the amount of federal funds to be obligated during each program year, proposed source of federal and non-federal funds, identification of the recipient/sub-recipient and state and local agencies responsible for carrying out the project. If needed, projects included shall be specified in sufficient detail to permit air quality analysis in accordance with the U.S. EPA conformity requirements.

Amendments or administrative changes in the TIP may occur at scheduled intervals. When an amendment to the existing TIP is necessary, it must be drawn up and approved by both the MATS Technical and Policy Committees before it can be sent to MDOT/FHWA/FTA for their review and approval. MATS will seek public comment on all amendments before final approval. Conversely, administrative changes can be processed by MPO staff without prior approval by MATS Technical/Policy Committees. It is important to remember what constitutes an amendment and what represents an administrative change since each has a different process and approval procedures. The table on the following page provides guidance to assist local agencies and other interested parties in determining whether an amendment is needed for a project or if an administrative change is sufficient. Note: Refer to 23 CFR 450.104 for definitions of Amendments and Administrative Modifications.

Amendments	Administrative Changes
Adding new project(s). Include projects previously deleted from the TIP and then resubmitted at a later time for inclusion in the TIP.	Carrying a project from one approved TIP to the next as long as it is not a major capacity project and the carrying forward is done in the first quarter of the first fiscal year of the new TIP.
Deleting projects.	A minor change in scope of work. Generally, anything that is not mentioned in the "Amendment" column.
Extending the length of a previously approved project one-half mile or greater. *	Cost increases of 25 percent or less without a major change to the scope of the work and without over programming the TIP.
Adding a travel or turn lane one-half mile or greater to a previously approved project.*	Changing the source of federal aid.
Adding federal funds to a previously non-federally funded project. *	Changing the order of approved projects by year within the TIP.
Adding a new project phase to a previously approved project.*	Changing a federally-funded project to advance construct. The project must be shown in both the advance construct and payback years.
Cost increases by more than 25 percent with or without a major change in scope of work.	<i>*= Major Change in Scope</i>

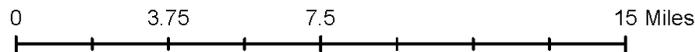
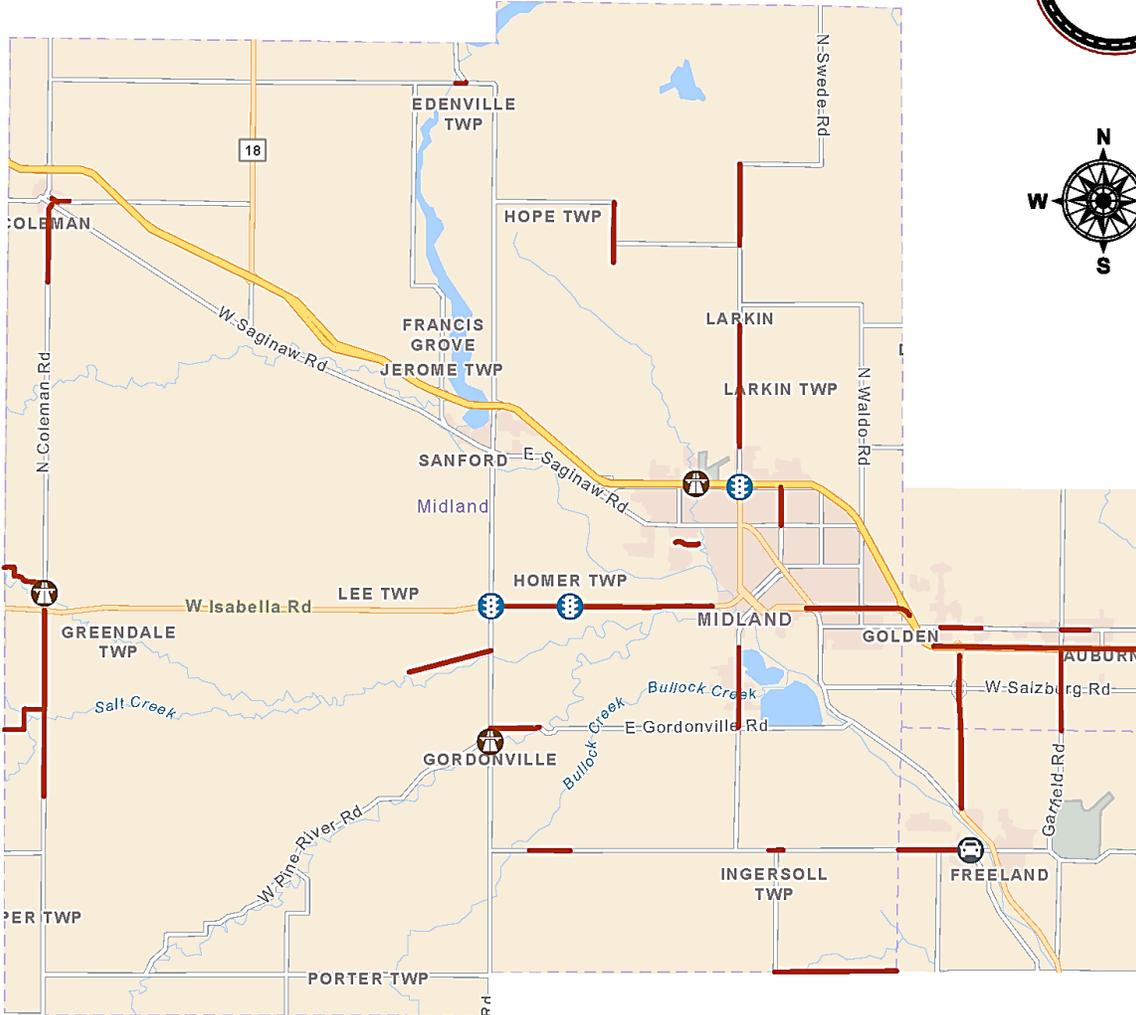
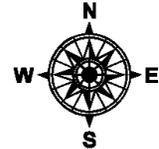
## MATS' FY 2020-2023 Transportation Projects

The orderly and efficient programming of prioritized transportation improvements is the primary reason for TIP development. A detailed listing of programmed projects within MATS planning area for fiscal years 2020-2023 is included on the following pages, grouped by year and containing funding sources and cost breakdowns. A map of the 2020-2023 TIP road projects is also provided. Note that although the complete FY 2020-2023 TIP program includes road and bridge rehabilitation, resurfacing and capital preventative maintenance projects, it also includes such things as transit operating and capital funds, region-wide safety and pavement marking projects, as well as duplicate entries for the engineering and construction phases of a project or various funding sources for a project. This explains the discrepancy between the numbers of entries on the complete list (86) versus the smaller number of projects on the map (35). Only road and bridge rehabilitation, resurfacing and capital preventative maintenance projects were mapped. The financial constraint table and other financial projections are provided in the Appendix of this document, along with a glossary of funding source abbreviations.

In May of 2018 Governor Rick Snyder officially re-designated the Metropolitan Planning Area (MPA) of the Midland Area Transportation Study and the adjoining Saginaw Metropolitan Area Transportation Study to eliminate a previously existing boundary overlap involving Tittabawassee Township and the Freeland area. The overlap in area had caused difficulty for MATS in gathering and reporting data, as well as creating an inconsistency with the Midland Urbanized Area (UZA) boundary, which the MPA boundary is required by Federal regulations to completely encompass. This document reflects the new revised boundary therefore.

# FY 2020-2023 MATS TIP Projects

## Midland Area Transportation Study (MATS) MPO Area



- TIP Projects**
- Road Projects
  - Bridge
  - Roundabout
  - Traffic Signal



Created by Midland County GIS  
March 2019

## MATS Transportation Improvement Program FY 2020-2023

Fiscal Year	Job Type	Job#	GPA Type	MPO	County	Region	Responsible Agency	Project Name	Limits	Length	Primary Work Type	Project Description	Phase	Phase Status	Fed Estimated Amount	State Estimated	Local Estimated Amount	Total Estimated Amount	Fund Source	Total Job Cost	Comments
<b>FY 2020</b>																					
2020	Local	119904	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>Freeland Road</b>	Five Mile Road to Homer Road	0.997	Road Rehabilitation	Resurface	CON	Abandoned	\$0	\$18,514	\$0	\$18,514	EDD		
2020	Local	119904	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>Freeland Road</b>	Five Mile Road to Homer Road	0.997	Road Rehabilitation	Resurface	CON	Abandoned	\$20,000	\$0	\$54,058	\$74,058	STL		
2020	Local	130266	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Coleman	<b>3rd Street</b>	Railway Street to Coleman city limits	0.434	Road Rehabilitation	Resurface	CON	Abandoned	\$120,000	\$0	\$30,000	\$150,000	STL		
2020	Local	130267	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>County Wide</b>	Various locations, Midland County Road Commission	4.418	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$0	\$73,388	\$0	\$73,388	EDD	830,000	
2020	Local	130267	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>County Wide</b>	Various locations, Midland County Road Commission	4.418	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$569,000	\$0	\$187,612	\$756,612	STL	830,000	
2020	Local	130268	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>Dickenson</b>	Coleman Road to Isabella County Line	1.479	Road Rehabilitation	Resurface	CON	Abandoned	\$0	\$61,106	\$0	\$61,106	EDD		
2020	Local	130268	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	<b>Dickenson</b>	Coleman Road to Isabella County Line	1.479	Road Rehabilitation	Resurface	CON	Abandoned	\$174,725	\$0	\$121,669	\$296,394	STL		
2020	Local	206159	Local Road	Midland Area Transportation Study (MATS)	Bay	Bay	Bay County	<b>S Garfield Rd</b>	Hotchkis Rd to US-10	2.018	Road Rehabilitation	Crush & Shape & Asphalt Resurfacing	CON	Programmed	\$568,000	\$0	\$832,000	\$1,400,000	STL	1,400,000	

2020	Local	129775	Local Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Eastman Ave	Commerce Drive to Monroe Road	1.065	Minor Widening	Add center left-turn lane, mill and pave with a one-course asphalt overlay	CON	Programmed	\$69,648	\$0	\$15,444	\$85,092	HIPS	1,263,862	Pro-Rata Method of funding per MATS Policy Committee decision. Fixed Price Variable Scope contracting method. Priority 1: Commerce to Monroe Section (left-turn lane, mill & pave with a one-course asphalt overlay). Priority 2: Monroe to Mier (mill & pave with a one-course asphalt overlay). This project to utilize MATS STUL carryover funding for any additional costs incurred beyond obligation amount.
2020	Local	129775	Local Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Eastman Ave	Commerce Drive to Monroe Road	1.065	Minor Widening	Add center left-turn lane, mill and pave with a one-course asphalt overlay	CON	Programmed	\$868,792	\$0	\$309,978	\$1,178,770	STUL	1,263,862	Pro-Rata Method of funding per MATS Policy Committee decision. Fixed Price Variable Scope contracting method. Priority 1: Commerce to Monroe Section (left-turn lane, mill & pave with a one-course asphalt overlay). Priority 2: Monroe to Mier (mill & pave with a one-course asphalt overlay). This project to utilize MATS STUL carryover funding for any additional costs incurred beyond obligation amount.
2020	Local	130425	Local Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Saginaw	Bay	Saginaw County	W Freeland Rd	Freeland Rd At River Rd intersection	0.533	Traffic Safety	Intersection improvements with roundabout	CON	Programmed	\$295,000	\$0	\$173,750	\$468,750	STUL	468,750	
2020	Local	207193	Local Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Multiple Routes, Midland County	Multiple Routes, Various Locations, Midland County	0.000	Traffic Safety	Upgrade curve warning signs	CON	Programmed	\$178,756	\$0	\$19,862	\$198,618	HSIP	198,618	

2020	Local	207254	Local Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Freeland Road	Freeland Road at Sasse Road, Midland County	0.344	Traffic Safety	Construct center left turn lane on Freeland Road, transverse rumble strips	CON	Programmed	\$453,240	\$0	\$50,360	\$503,600	HRRR	553,960	
2020	Trunkline	127506	Not Applicable	Midland Area Transportation Study (MATS)	Bay	Bay	MDOT	US-10 - WB	MATS MPO Study Area	9.940	Traffic Safety	Median Guardrail, Type TD	CON	Programmed	\$1,406,310	\$156,257	\$0	\$1,562,567	HSIP	3,409,239	
2020	Trunkline	127539	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	I-75 S	US-10 at M-47	1.376	ITS Applications	RWIS	CON	Programmed	\$138,170	\$30,330	\$0	\$168,500	ST	2,300,000	
2020	Trunkline	200829	Not Applicable	Midland Area Transportation Study (MATS)	Isabella	Bay	MDOT	US-127BR	none, None	0.000	Traffic Safety	Traffic Signal Modernizations; connected vehicle installations.	CON	Programmed	\$0	\$0	\$0	\$0	STG	2,070,136	
2020	Trunkline	202038	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	M-47 S	M-47 from Midland Rd to US-10	4.263	Traffic Safety	Freeway Signing Upgrade	CON	Programmed	\$247,250	\$0	\$0	\$247,250	NHG	564,500	
2020	Local	202396	Not Applicable	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	N Coleman Rd	Coleman Road over Chippewa River, Str# 6943	0.000	Bridge Replacement	Bridge Replacement	CON	Programmed	\$2,622,400	\$0	\$655,600	\$3,278,000	BRT	3,278,000	
2020	Trunkline	202649	Not Applicable	Midland Area Transportation Study (MATS)	Bay	Bay	MDOT	M-84 N	Signing Upgrade	29.048	Traffic Safety	Non-freeway Signing	PE	Programmed	\$10,000	\$0	\$0	\$10,000	STG	577,000	
2020	Trunkline	203157	Not Applicable	Midland Area Transportation Study (MATS)	Gratiot	Bay	MDOT	US-127	B05-3 & 4 of 56044 (US-10 EB/WB over Sturgeon Creek), B05-3 & 4 of 56044 (US-10 EB/WB over Sturgeon Creek)	0.000	Bridge CPM	Scour Protection	CON	Programmed	\$171,368	\$37,617	\$0	\$208,985	NH	741,405	
2020	Trunkline	204408	Not Applicable	Midland Area Transportation Study (MATS)	Midland	Bay	MDOT	M-20	M-30 to east of Currie Parkway	5.562	Road Rehabilitation	Milling and two course HMA overlay	PE	Programmed	\$1,109,318	\$233,258	\$12,730	\$1,355,306	NH	20,290,757	
2020	Trunkline	206483	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	Midland Area	2.948	Traffic Safety	Longitudinal pavement marking application on trunkline routes in Bay Region	PE	Programmed	\$1,100	\$122	\$0	\$1,222	HSIP	2,970,000	
2020	Trunkline	206483	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	Midland Area	2.948	Traffic Safety	Longitudinal pavement marking application on trunkline routes in Bay Region	CON	Programmed	\$165,788	\$18,421	\$0	\$184,209	HSIP	2,970,000	
2020	Trunkline	206487	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	Midland Area	4.513	Traffic Safety	Special pavement marking application on trunkline routes in Bay Region	PE	Programmed	\$411	\$46	\$0	\$457	HSIP	727,500	

2020	Trunkline	206487	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	Midland Area	4.513	Traffic Safety	Special pavement marking application on trunkline routes in Bay Region	CON	Programmed	\$39,528	\$4,392	\$0	\$43,920	HSIP	727,500	
2020	Trunkline	206558	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Pvmt Mrkg Retro Readings	All of MATS MPO	4.577	Traffic Safety	Pvmt mrkg retroreflectivity readings on trunklines in Bay Region	CON	Programmed	\$1,263	\$140	\$0	\$1,403	HSIP	23,000	
2020	Multi-Modal	203088	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements (5307)	City-wide	0.000	SP1801-preventative maintenance	Capital Preventive Maintenance	NI	Programmed	\$100,000	\$25,000	\$0	\$125,000	5307	125,000	
2020	Multi-Modal	203111	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvement	City-Wide	0.000	1110-Bus Rolling Stock	Bus Purchase	NI	Programmed	\$90,205	\$22,551	\$0	\$112,756	5339	112,756	
2020	Multi-Modal	205107	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Capital Improvements	County-Wide	0.000	1110-Bus Rolling Stock	Purchase 2 vans for veteran/medical transportation	NI	Programmed	\$56,208	\$14,052	\$0	\$70,260	STUL	70,260	Flexing STUL funds to transit (5311)
2020	Multi-Modal	205456	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Capital Improvements	County-Wide	0.000	1110-Bus Rolling Stock	Purchase Buses under the 5339 Program	NI	Programmed	\$149,157	\$37,289	\$0	\$186,446	5339	186,446	
2020	Multi-Modal	203082	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Operating	City-Wide	0.000	SP3000-operating except JARC and New Freedom	Transit Operating (5307)	NI	Programmed	\$658,099	\$888,397	\$658,099	\$2,204,595	5307	2,204,595	
2020	Multi-Modal	203671	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Operating	County-Wide	0.000	3000-Operating Assistance	Transit Operating	NI	Programmed	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	5311	2,782,626	Programming FY 2020-FY 2023 projects
2020	Trunkline	204384	Trunkline Road	Midland Area Transportation Study (MATS)	Midland	Bay	MDOT	M-20	West of Saginaw Road to US-10	2.591	Road Capital Preventive Maintenance	Milling and HMA Overlay	CON	Programmed	\$1,232,094	\$273,214	\$0	\$1,505,307	NH	1,575,022	
<b>FY 2021</b>																					
2021	Local	206083	Local Bridge	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	N Meridian Rd	Meridian Road over Pine River, Str# 6950, Midland County	0.000	Bridge Rehabilitation	Miscellaneous Rehabilitation	CON	Programmed	\$1,396,800	\$261,900	\$87,300	\$1,746,000	BHT	1,746,000	
2021	Local	206355	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Countywide	Various Locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$0	\$73,388	\$0	\$73,388	EDD	805,000	
2021	Local	206355	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Countywide	Various Locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$581,000	\$0	\$150,612	\$731,612	STL	805,000	
2021	Local	206503	Not Applicable	Midland Area Transportation Study (MATS)	Midland	Bay	Midland	W Sugnet Rd	Main Street to Northwood Drive	0.581	New Roads	New Road Construction	CON	Programmed	\$944,000	\$0	\$336,000	\$1,280,000	STUL	1,280,000	

2021	Trunkline	207279	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO	2.573	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	PE	Programmed	\$1,098	\$122	\$0	\$1,220	HSIP	3,180,000	
2021	Trunkline	207279	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO	2.573	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	CON	Programmed	\$173,484	\$19,276	\$0	\$192,760	HSIP	3,180,000	
2021	Trunkline	207281	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	2.020	Traffic Safety	Special pavement marking application on trunklines in Bay Region	PE	Programmed	\$549	\$61	\$0	\$610	HSIP	590,000	
2021	Trunkline	207281	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	2.020	Traffic Safety	Special pavement marking application on trunklines in Bay Region	CON	Programmed	\$31,842	\$3,538	\$0	\$35,380	HSIP	590,000	
2021	Trunkline	207305	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Retroreflectivity Readings	All of MATS MPO	1.737	Traffic Safety	Retroreflectivity readings on trunklines in Bay Region	CON	Programmed	\$1,208	\$134	\$0	\$1,342	HSIP	22,000	
2021	Multi-Modal	207201	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements (5307)	City-Wide	0.000	SP1801-preventative maintenance	Capital Preventive Maintenance	NI	Programmed	\$100,000	\$25,000	\$0	\$125,000	5307	125,000	
2021	Multi-Modal	207209	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Bus Replacement	City-Wide	0.000	SP1101-<30 foot replacement bus with or without lift	Bus Replacement 5339 Funding	NI	Programmed	\$90,205	\$22,551	\$0	\$112,756	5339	112,756	
2021	Multi-Modal	207292	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Capital Improvements	County-Wide	0.000	1110-Bus Rolling Stock	Purchase Buses (2) under the 5339 Program	NI	Programmed	\$149,157	\$37,289	\$0	\$186,446	5339	186,446	
2021	Multi-Modal	206848	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Operating	City-Wide	0.000	SP3000-operating except JARC and New Freedom	Transit Operating Funds (5307)	NI	Programmed	\$658,099	\$888,397	\$658,099	\$2,204,595	5307	2,204,595	
2021	Multi-Modal	207123	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Operating	County-Wide	0.000	3000-Operating Assistance	Transit Operating Funds (5311)	NI	Programmed	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	5311	2,782,626	
2021	Trunkline	203796	Trunkline Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Midland	Bay	MDOT	US-10BR	Bay Region Midland MPO	0.000	Traffic Safety	Signal modernizations, upgrade, and optimization.	CON	Programmed	\$234,192	\$0	\$0	\$234,192	STG	276,645	
<b>FY 2022</b>																					
2022	Local	129774	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Poseyville Rd	Gordonville Road to Midland City Limits	1.989	Road Capital Preventive Maintenance	Milling & One-Course Asphalt Overlay	CON	Programmed	\$600,000	\$0	\$600,000	\$1,200,000	STUL	1,200,000	

2022	Local	206356	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Countywide	Various locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$0	\$73,388	\$0	\$73,388	EDD	889,600	
2022	Local	206356	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	Countywide	Various locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$592,000	\$0	\$224,212	\$816,212	STL	889,600	
2022	Local	206432	Local Road	Midland Area Transportation Study (MATS)	Bay	Bay	Auburn	W Midland Rd	Garfield Road to Francis Street	0.680	Road Capital Preventive Maintenance	Milling and two course asphalt resurfacing	CON	Programmed	\$363,000	\$0	\$276,000	\$639,000	STUL	639,000	
2022	Trunkline	202649	Not Applicable	Midland Area Transportation Study (MATS)	Bay	Bay	MDOT	M-84 N	Signing Upgrade	29.048	Traffic Safety	Non-freeway Signing	CON	Programmed	\$50,000	\$0	\$0	\$50,000	STG	577,000	
2022	Trunkline	204408	Not Applicable	Midland Area Transportation Study (MATS)	Midland	Bay	MDOT	M-20	M-30 to east of Currie Parkway	5.562	Road Rehabilitation	Milling and two course HMA overlay	UTL	Programmed	\$245,550	\$51,632	\$2,818	\$300,000	NH	20,290,757	
2022	Trunkline	205858	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Retroreflectivity Readings	All of MATS MPO	2.634	Traffic Safety	Pavement marking retroreflectivity readings on trunklines in Bay Region	CON	Programmed	\$1,208	\$134	\$0	\$1,342	HSIP	22,000	
2022	Trunkline	207317	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO	1.399	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	PE	Programmed	\$1,098	\$122	\$0	\$1,220	HSIP	3,180,000	
2022	Trunkline	207317	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO, All of MATS MPO	1.399	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	CON	Programmed	\$173,484	\$19,276	\$0	\$192,760	HSIP	3,180,000	
2022	Trunkline	207319	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	3.252	Traffic Safety	Special pavement marking application on trunklines in Bay Region	PE	Programmed	\$549	\$61	\$0	\$610	HSIP	590,000	
2022	Trunkline	207319	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	3.252	Traffic Safety	Special pavement marking application on trunklines in Bay Region	CON	Programmed	\$31,842	\$3,538	\$0	\$35,380	HSIP	590,000	
2022	Multi-Modal	207204	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements	City-Wide	0.000	SP1801-preventative maintenance	Capital Preventive Maintenance, Bus Replacement	NI	Programmed	\$100,000	\$25,000	\$0	\$125,000	5307	523,400	4 buses & capital preventive maintenance
2022	Multi-Modal	207204	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements	City-Wide	0.000	SP1101-<30 foot replacement bus with or without lift	Capital Preventive Maintenance, Bus Replacement	NI	Programmed	\$318,720	\$79,680	\$0	\$398,400	5307	523,400	4 buses & capital preventive maintenance

2022	Multi-Modal	207213	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Bus Replacement	City-Wide	0.000	SP1101-<30 foot replacement bus with or without lift	Bus Replacement 5339 Funding	NI	Programmed	\$90,205	\$22,551	\$0	\$112,756	5339	112,756		
2022	Multi-Modal	207303	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Capital Improvements	County-Wide	0.000	1110-Bus Rolling Stock	Purchase Buses (2) under the 5339 Program	NI	Programmed	\$149,157	\$37,289	\$0	\$186,446	5339	186,446		
2022	Multi-Modal	206853	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Operating	City-Wide	0.000	SP3000-operating except JARC and New Freedom	Transit Operating (5307)	NI	Programmed	\$339,379	\$888,397	\$339,379	\$1,567,155	5307	1,567,155		
2022	Multi-Modal	207128	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Operating	County-Wide	0.000	3000-Operating Assistance	Transit Operating Funds (5311)	NI	Programmed	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	5311	2,782,626		
<b>FY 2023</b>																						
2023	Local	206107	Local Road	Midland Area Transportation Study (MATS)	Saginaw	Bay	Saginaw County	W Freeland Rd	Orr Rd to N. Gleaner Rd	0.988	Road Rehabilitation	Crush & Shape & Asphalt Resurfacing	CON	Programmed	\$0	\$20,000	\$0	\$20,000	EDD	870,000		
2023	Local	206107	Local Road	Midland Area Transportation Study (MATS)	Saginaw	Bay	Saginaw County	W Freeland Rd	Orr Rd to N. Gleaner Rd	0.988	Road Rehabilitation	Crush & Shape & Asphalt Resurfacing	CON	Programmed	\$653,800	\$0	\$196,200	\$850,000	STL	870,000		
2023	Local	206357	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	County Wide	Various Locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$0	\$73,388	\$0	\$73,388	EDD	900,000		
2023	Local	206357	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County	County Wide	Various Locations, Midland County	0.000	Road Rehabilitation	Milling and Two Course Asphalt Resurfacing	CON	Programmed	\$604,000	\$0	\$222,612	\$826,612	STL	900,000		
2023	Local	206507	Local Road	Midland Area Transportation Study (MATS)	Midland	Bay	City of Midland	N Jefferson Ave	Wheeler Road to Wackerly Road	0.940	Road Rehabilitation	Crush & Shape asphalt resurfacing	CON	Programmed	\$332,000	\$0	\$968,000	\$1,300,000	STUL	1,300,000		
2023	Local	206509	Local Road	Midland Area Transportation Study (MATS)	Saginaw	Bay	Saginaw County	W Freeland Rd	N. Gleaner Road to River Road	0.781	Road Rehabilitation	Crush & Shape and Asphalt resurfacing	CON	Programmed	\$400,000	\$0	\$200,000	\$600,000	STUL	600,000		
2023	Local	206515	Local Road	Midland Area Transportation Study (MATS)	Bay	Bay	Bay County	W Midland Rd	Carter Road to Flajole Road	0.992	Road Rehabilitation	Cold Milling	CON	Programmed	\$250,000	\$0	\$1,000,000	\$1,250,000	STUL	1,250,000		
2023	Trunkline	207154	Not Applicable	Midland Area Transportation Study (MATS)	Isabella	Bay	MDOT	M-20	Non-Freeway	92.399	Traffic Safety	Non-freeway signing upgrade	PE	Programmed	\$20,000	\$0	\$0	\$20,000	STG	1,485,000		
2023	Trunkline	207356	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO	3.494	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	PE	Programmed	\$1,098	\$122	\$0	\$1,220	HSIP	3,180,000		
2023	Trunkline	207356	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Longitudinal Pavement Markings	All of MATS MPO	3.494	Traffic Safety	Longitudinal pavement marking application on trunklines in Bay Region	CON	Programmed	\$173,484	\$19,276	\$0	\$192,760	HSIP	3,180,000		

2023	Trunkline	207357	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	3.554	Traffic Safety	Special pavement marking application on trunklines in Bay Region	PE	Programmed	\$549	\$61	\$0	\$610	HSIP	890,000	
2023	Trunkline	207357	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Special Pavement Markings	All of MATS MPO	3.554	Traffic Safety	Special pavement marking application on trunklines in Bay Region	CON	Programmed	\$48,312	\$5,368	\$0	\$53,680	HSIP	890,000	
2023	Trunkline	207374	Not Applicable	Midland Area Transportation Study (MATS)	Saginaw	Bay	MDOT	Bay Regionwide Retroreflectivity Readings	All of MATS MPO	3.187	Traffic Safety	Pavement marking retroreflectivity readings on trunklines in Bay Region	CON	Programmed	\$1,208	\$134	\$0	\$1,342	HSIP	22,000	
2023	Multi-Modal	207205	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements	City-Wide	0.000	SP1801-preventative maintenance	Capital Preventive Maintenance, Bus Replacement	NI	Programmed	\$100,000	\$25,000	\$0	\$125,000	5307	324,500	2 buses, capital preventive maintenance
2023	Multi-Modal	207205	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Capital Improvements	City-Wide	0.000	SP1101-<30 foot replacement bus with or without lift	Capital Preventive Maintenance, Bus Replacement	NI	Programmed	\$159,600	\$39,900	\$0	\$199,500	5307	324,500	2 buses, capital preventive maintenance
2023	Multi-Modal	207215	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Bus Replacement	City-Wide	0.000	SP1101-<30 foot replacement bus with or without lift	Bus Replacement 5339 Funding	NI	Programmed	\$90,205	\$22,551	\$0	\$112,756	5339	112,756	
2023	Multi-Modal	207307	Transit Capital	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Capital Improvements	County-Wide	0.000	1110-Bus Rolling Stock	Purchase Buses (2) under the 5339 Program	NI	Programmed	\$149,157	\$37,289	\$0	\$186,446	5339	186,446	
2023	Multi-Modal	206865	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland Dial-A-Ride	Transit Operating	City-Wide	0.000	SP3000-operating except JARC and New Freedom	Transit Operating (5307)	NI	Programmed	\$498,499	\$888,397	\$498,499	\$1,885,395	5307	1,885,395	Programming MATS 2020-2023 TIP Projects
2023	Multi-Modal	207134	Transit Operating	Midland Area Transportation Study (MATS)	Midland	Bay	Midland County Board of Commissioners	Transit Operating	County-Wide	0.000	3000-Operating Assistance	Transit Operating Funds (5311)	NI	Programmed	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	5311	2,782,626	
2023	Trunkline	204979	Trunkline Traffic Operations And Safety	Midland Area Transportation Study (MATS)	Bay	Bay	MDOT	US-10 E	US-10 Between Bay City Rd Interchange and Flajole Rd, Bay County	0.490	Traffic Safety	Placement of a High Friction Surface	PE	Programmed	\$9,000	\$1,000	\$0	\$10,000	HSIP	450,000	

## Public Participation

Throughout the MATS' TIP development process, consideration needs to be given to public participation so that citizens, affected public agencies, transportation agency employees, private providers of transportation, and other interested parties have an opportunity to comment on the proposed TIP. The Public Participation Plan outlines who will be notified of MATS activities. It also provides an outline for participation activity within the context of the TIP development, the Long Range Transportation Plan, and for planning and corridor studies.

Per the requirements of the updated Public Participation Plan, the development of the TIP must involve the general public throughout the entire process by providing a public comment period and addressing any general public inquiries regarding the draft TIP. These comments are taken into consideration while making changes to the draft TIP. Also, a public open house is held to solicit comments from the general public and affected agencies of the future transportation projects.

In accordance with requirements, MATS has solicited public comment on the proposed 2020-2023 Transportation Improvement Program and advertised the Open House related to this document. This was done by means of public notices in April and May of 2016 in the Midland Daily News as well as on the MATS website. A copy of the public notice is included in Appendix A. MATS has also posted the TIP and other related documents on the MATS website. An informational flyer regarding the TIP was provided to local agencies to post/advertise at their respective offices. A public review period took place from April 10, 2016 - May 24, 2016. The Open House to discuss the proposed TIP took place May 12, 2016 from 4 to 7 PM at the Grace A. Dow Library, 1710 West St. Andrews Street, Midland, MI 48640. Prior to adoption of the TIP, a public hearing was held at the MATS Policy Meeting on June 7, 2016 at 11:44 AM in the Midland County Services Building, 220 West Ellsworth Street, Midland, MI 48640.

There were no public comments received during the 30-day plus review period, during the May 12, 2016 TIP Open House or during the June 7<sup>th</sup> Public Hearing.

# Consultation

The newly adopted Federal legislation (FAST Act) expands upon MAP-21's requirements stating that all MPOs consult with federal, state, and local entities within their planning areas responsible for the following programs:

- Economic growth and development
- Environmental protection
- Airport operations
- Freight movement
- Land use management
- Natural resources
- Conservation
- Historic preservation
- Human service transportation providers

The goal of this process is to eliminate or minimize conflicts with other agencies' plans and programs that impact transportation, or for which transportation decisions may impact them. As required, MATS will consult with all possible entities responsible for programs mentioned above and welcome their input on future transportation projects.

During the development of the 2020-2023 Transportation Improvement Program, MATS held discussions with various agencies responsible for carrying out transportation programs in the area as well as other interested and community agencies regarding any of their local plans and progress of the TIP. The agencies that were consulted regarding the proposed 2020-2023 TIP can be found below.

- City of Midland
- Bay County Road Commission
- Midland Dial-A-Ride Transportation
- Bay Metro Transit Authority
- Larkin Township
- Homer Township
- Lincoln Township
- City of Auburn
- Williams Charter Township
- Ingersoll Township
- East Michigan Council of Governments
- Jack Barstow Airport
- Bay City Area Transportation Study
- MDOT – Statewide Planning Section
- MDOT – Mt. Pleasant TSC
- Midland County Road Commission
- Saginaw County Road Commission
- County Connection of Midland
- Midland Charter Township
- Mount Haley Township
- Jerome Township
- Edenville Township
- Village of Sanford
- Tittabawassee Township
- Midland County
- MBS Airport
- FHWA
- FTA – Region V
- MDOT – Bay Region
- MDOT – Transportation Services Section

- Midland Non-Motorized Transportation Committee
- Midland Tomorrow
- Arnold Center
- Midland Faith Based Community
- Momentum Midland
- 211 Northeast Michigan
- Midland Area Community Foundation
- Saginaw Metropolitan Area Transportation Study
- Midland Family and Children’s Services
- Disability Network of Mid-Michigan
- United Way of Midland
- Legacy Center for Community Success
- Midland DDA
- Midland Open Door

## Air Quality Conformity

The Clean Air Act Amendments of 1990 (CAAA) established the mandate for better coordination between air quality and transportation planning. The CAAA requires that all transportation plans and transportation investments in non-attainment and maintenance areas be subject to an air quality conformity determination. The purpose of such determination is to demonstrate that the Long Range Transportation Plan and Transportation Improvement Program (TIP) conform to the intent and purpose of the State Implementation Plan (SIP). The intent of the SIP is to achieve and maintain clean air and meet National Ambient Air Quality Standards (NAAQS). Therefore, for non-attainment and maintenance areas, the Long Range Transportation Plan and the TIP must demonstrate that the implementation of projects does not result in greater mobile source emissions than the emissions budget.

On May 12, 2012 the United States Environmental Protection Agency (EPA) revoked the 1997 8-hour 0.080 ppm Ozone standard for the purposes of regional transportation conformity. On October 1, 2015, the EPA set the primary and secondary national ambient air quality standard (NAAQS) for ground-level ozone at 70 parts per billion (or 0.070 parts per million). MATS area is in attainment for Ozone under the EPA’s 8 hour 0.070 Ozone Standard. Therefore, there is no requirement to conduct a regional transportation conformity analysis for the Long-Range Transportation Plan or Transportation Improvement Program (TIP) for the MATS area.

# Financial Plan

## Introduction

The function of the TIP Financial Plan is to manage available federal-aid highway and transit resources in a cost-effective and efficient manner. Specifically, the Financial Plan details:

1. Available highway and transit funding (federal, state, and local);
2. Fiscal constraint (cost of projects cannot exceed revenues reasonably expected to be available);
3. Expected rate of change in available funding (unrelated to inflation);
4. Year of Expenditure (YOE) factor to adjust for predicted inflation;
5. Estimate of Operations and Maintenance (O and M) costs for the federal-aid highway system (FAHS).

## Available Highway and Transit Funding

The United States federal excise tax on gasoline is 18.4 cents per gallon and 24.4 cents per gallon for diesel fuel. The federal tax was last raised in 1993 and is not indexed to inflation, which increased by a total of 73 percent from 1993 until 2018. Beginning in 2022, fuel tax rates will be tied to inflation to help remedy the decline in purchasing power of the fuel tax. These funds are deposited in the Highway Trust Fund (HTF). A portion of these funds is retained in the Mass Transit Account of the HTF for distribution to public transit agencies and states. In recent years, the HTF has seen large infusions of cash from the federal General Fund, due to declining collections from motor fuel taxes. This is mostly due to increased fuel efficiency in conventionally-powered vehicles, as well as a growing number of hybrid and fully-electric vehicles that require little to no motor fuel.

Federal aid accounts for about 65 percent of the MDOT's Highway Capital Program, on average. In Michigan, PA 51 of 1951 (Act 51) prescribes the amount of federal aid to be utilized by the MDOT system and the local system. Act 51 states MDOT's share of federal aid is 75 percent of the federal apportionment and the local share is 25 percent, to be used on federal-aid-eligible roads.

There are a number of federal highway programs serving different purposes. Addendum A contains a list of these programs. Federal highway funds are apportioned to the states (distribution of funds according to formulas established by law) and then a portion is allocated to local agencies based on the population in each region. Local agencies within the MATS region receive approximately \$1.8 million in federal-aid highway funding each year. In addition, The Michigan Department of Transportation (MDOT) spends approximately \$3.5 million in Federal funding annually for capital needs on state-owned highways in the MATS area (I-, US-, and M-roads).

Like the highway programs, there are a number of federal transit programs, the list of which can also be found in Addendum A. Transit funds are distributed according to a complex set of distribution formulas. Two primary public transit agencies within the MATS region (City of Midland DART and County Connection of Midland) receive approximately \$1.6 million in transit operating and capital federal-aid funding each year.

On Nov. 10, 2015, Gov. Rick Snyder signed into law a funding package that provides more state transportation revenue. The nine-bill package included registration fee increases, motor fuel tax increases, and appropriations from the income tax revenue.

The new revenue package is expected to generate \$1.2 billion for transportation when it takes full effect in FY 2021: \$600 million from gas taxes and registration fees, and \$600 million from income tax revenues. Almost 94 percent of the new revenue will be distributed through the Act 51 formula for road agencies: 39.1 percent for state highways, 39.1 percent for Michigan's 83 county road agencies, and 21.8 percent for 533 villages and cities.

The gasoline tax increased from 19 to 26.3 cents per gallon on Jan. 1, 2017, and the diesel fuel tax increased from 15 to 26.3 cents per gallon. The motor fuel tax was applied to natural gas (CNG) as well. Beginning in 2022, fuel tax rates will be tied to inflation to help remedy the decline in purchasing power of the fuel tax.

Registration fees for most cars and trucks increased 20 percent on Jan. 1, 2017. New electric car fees of \$100 per year, and \$30 per year for plug-in hybrid cars, equalize road-user fees for vehicles that use little or no taxed fuel.

Local funding is much more difficult to predict. There is a patchwork of transportation millages, special assessment districts, downtown development authorities, and other funding mechanisms throughout the region. Therefore, this Financial Plan does not attempt to quantify current non-federal funding or forecast future non-federal funding revenues, except for MTF and CTF.

## Fiscal Constraint and Project Selection

The most important financial consideration when creating and/or maintaining a TIP is fiscal constraint. This means that each year's list of projects cannot exceed the amount of funding reasonably expected to be available in the fiscal year. Funding is considered "reasonably expected to be available" if the federal, state, and local funding amounts are based on amounts received in past years, with rates of change developed cooperatively between MDOT, transportation planning agencies, and public transportation agencies. Note that these rates of change are **not** the same as inflation; rather, they are forecasts of the amount of funding that will be made available by the federal, state, and local governments. In Michigan, this cooperative process is facilitated by the Michigan Transportation Planning Association (MTPA), whose members include the aforementioned agencies, plus the Federal Highway Administration (FHWA) and Federal Transit Administration (FTA). The MTPA has determined that recent federal transportation funding shortfalls make it prudent to hold federal funding levels at a two percent annual rate of increase for all four years of the FY 2020-FY 2023 TIP (see Addendum B).

In the MATS area, there are various implementing agencies eligible for federal-aid funding including MDOT which is responsible for proposing/implementing trunkline highway projects. Each of the following agencies (City of Midland, Midland County Road Commission, City of Auburn, Bay County Road Commission, Saginaw County Road Commission, and Village of Sanford) may submit projects to be considered for MATS annual allocation of local urban funds. These projects are then reviewed/approved based on MATS’ adopted project selection process. Projects are generally selected based on pavement condition, traffic volumes, crash history, and/or other factors. Local rural projects (proposed by Midland County Road Commission) are selected by a Rural Task Force (RTF) comprised of individuals from various regional county road commissions and MDOT; generally four CRCs sit on a RTF. The local public transit agencies (County Connection of Midland and Midland Dial-A-Ride) are issued targets with the amount of federal-aid transit funding expected; their projects are programmed based on these figures. Transit agencies select projects based on internal assessment of capital and operations needs.

### Year of Expenditure (YOE)

When MDOT, MPOs, and public transit agencies program their projects, they are expected to adjust costs using year of expenditure (YOE) dollars. YOE simply means that project costs have been adjusted for expected inflation. This is not the same as expected rates of funding change (see previous section). MDOT has developed YOE factors for itself and any agency that hasn’t developed its own. For the upcoming FY 2020-FY 2023 TIP cycle, they are five percent for FY 2020 and FY 2021, 4.5 percent for FY 2022, and four percent for FY 2023. See Addendum B for more details.

### Summary: Resources available for capital needs on the federal-aid highway system

Table 1 contains a summary of the predicted total resources (federal, state, local) that will be available for capital needs on the federal-aid highway system in the MATS area over fiscal years 2020 through 2023. Federal funding beyond FY 2020 is estimated to grow about 2 percent annually, the rate assumed throughout the FAST Act. Note that MDOT projects (NHPP) for FY 2020-2023 are still being developed; funding projections for these projects have been included.

**Table 1. Forecast of Resources Available for Capital Needs on the Federal-Aid Highway System in the MATS area**

Funding	2020	2021	2022	2023
<b>STP Urban</b>	\$1,802,872	\$1,280,000	\$1,839,000	\$3,150,000
<b>STP Rural</b>	\$2,230,000	\$805,000	\$889,600	\$1,770,000
<b>NHPP</b>	\$5,080,142	\$4,117,000	\$4,174,000	\$4,234,000
<b>CMAQ</b>	Not Eligible	Not Eligible	Not Eligible	Not Eligible
<b>Local Safety*</b>	\$702,218	\$620,000	\$620,000	\$670,000
<b>Local Bridge*</b>	\$3,278,000	\$1,746,000	\$1,900,000	\$1,900,000
<b>Total</b>	<b>\$13,093,232</b>	<b>\$8,568,000</b>	<b>\$9,422,600</b>	<b>\$11,724,000</b>

\*Based on proposed grant funding and therefore is variable.

# Estimate of Operations and Maintenance Costs for the Federal-Aid Highway System

Almost all federal-aid highway funding is restricted to capital costs; i.e., the cost to build and maintain the actual physical assets of the federal-aid highway system (essentially, all I-, US-, and M- designated roads, plus most public roads functionally classified as “collector” or higher). Operations and maintenance (O and M) costs, such as snow and ice removal, pothole patching, rubbish removal, electricity costs to operate streetlights and traffic signals, etc. are the responsibility of MDOT or local road agencies, depending on road ownership. Nevertheless, federal regulations require an estimate of O and M costs on the federal-aid highway system over the years covered by the TIP.

Addendum B explains the method and assumptions used to formulate the estimate. Table 2 contains a summary O and M cost estimate for roads on the federal-aid highway system in the MATS area. These funds are not shown in the TIP, because most highway operations and maintenance costs are not eligible for federal-aid. The amounts shown are increased by the agree-upon estimated YOE (i.e., inflation factors (see Addendum B for a discussion of YOE adjustments).

**Table 2. Forecast of Operations and Maintenance Costs on the Federal-Aid System in the MATS area**

<b>FY</b>	<b>Estimate - MDOT</b>	<b>Estimate - LOCAL</b>	<b>Total</b>
<b>2020</b>	\$6,621,528	\$6,900,000	<b>\$13,521,528</b>
<b>2021</b>	\$6,753,959	\$7,038,000	<b>\$13,791,959</b>
<b>2022</b>	\$6,889,038	\$7,178,760	<b>\$14,067,798</b>
<b>2023</b>	\$7,026,819	\$7,322,335	<b>\$14,349,154</b>
<b>Total</b>	<b>\$27,291,344</b>	<b>\$28,439,095</b>	<b>\$55,730,439</b>

## Summary: Resources available for capital needs of Public Transit Agencies

Transit agencies receive their funding from a variety of sources: federal, state, and local. Federal funding is distributed, in large part, according to the population of the urbanized area and/or state. Section 5307 funds are distributed to federally-specified transit agencies in urbanized areas; Midland Dial-A-Ride, operating within the MATS area, receives an annual allocation of Section 5307 funding.

Other sources of funding are more specialized, such as Section 5310 (Transportation for Elderly and Persons with Disabilities) and Section 5311 (for rural areas). County Connection of Midland receives 5311 funding with amounts divided and distributed annually by MDOT. See Addendum A for more information on federal transit resources.

The State of Michigan, through the MDOT Office of Passenger Transportation (OPT), also distributes CTF funding to match federal-aid, for job access reverse commute (providing access to available employment for persons in low-income areas), and for local bus operating (LBO). LBO funds are very important to the agencies as federal-aid funding for transit, like federal-aid funding for highways, is almost entirely for capital expenses.

Local funding can come from fare box revenues, a community’s general fund, millages, and other sources. As with local highway funding, local transit funding can be difficult to predict. Therefore, this chapter will only include federal and state resources available for transit.

Table 3 contains a summary of the predicted resources that will be available for capital and operating for public transit agencies in the MATS area during fiscal years 2020 through 2023. Federal funding reasonably expected to be available is included. CTF funding expected to be distributed by the MDOT Office of Passenger Transportation to public transit agencies in the MATS area is also included.

**Table 3. Forecast of Total (Federal, State and Local) Resources Available for Public Transit Operating and Capital Needs in the MATS area**

<b>FY</b>	<b>Estimated Available Funding</b>
<b>2020</b>	\$6,658,828
<b>2021</b>	\$6,756,279
<b>2022</b>	\$6,857,045
<b>2023</b>	\$6,960,946
<b>Total</b>	<b>\$27,234,098</b>

### Demonstration of Financial Constraint, FY 2020 - FY 2023

After determination of resources available for federal-aid highway and transit capital needs in the MATS area from FY 2020 through FY 2023, and matching those available resources to specific needs, a four-year program of projects is created within the context of the region’s transportation policies. The list must be adjusted to each year’s YOY factor and then fiscally constrained to available revenues (see Addendum B). Table 4 contains a summary of the cost of highway and transit projects programmed over the four-year TIP period, matched to revenues available in that same period. This table shows that the FY 2020 through FY 2023 TIP is fiscally constrained. Note: Operations and maintenance costs of the federal-aid highway system are included in the text of this chapter. However, these costs are not included in the TIP itself, as nearly all highway operations and maintenance costs are ineligible for federal-aid funding.

Table 4. Demonstration of fiscal constraint, FY 2020 through FY 2023 TIP

	2020	2021	2022	2023
<b>Estimated Available Highway Funding</b>	\$13,093,232	\$8,568,000	\$9,422,600	\$11,724,000
<b>Programmed Highway Projects</b>	\$13,093,232	\$4,296,504	\$3,309,912	\$5,179,612
<b>Estimated Available Transit Funding</b>	\$6,658,828	\$6,756,279	\$6,857,045	\$6,960,946
<b>Programmed Transit Projects</b>	\$6,473,423	\$6,473,423	\$6,234,383	\$6,353,723
<b>Estimated Available Total Funding</b>	\$19,752,060	\$15,324,279	\$16,279,645	\$18,684,946
<b>Programmed Total Projects</b>	\$19,566,655	\$10,769,927	\$9,544,295	\$11,533,335
<b>Difference</b>	\$185,405	\$4,554,352	\$6,735,350	\$7,151,611

Differences regarding FY 2021-2023 constraints are primarily due to MDOT projects that have not yet been programmed.

## Addendum A

### List of Available Federal-Aid Highway and Transit Resources

#### Highway Resources

**Surface Transportation Program (STP):** The purpose of this funding source is to maintain and improve the federal-aid highway system. Activities eligible for STP funding include construction, rehabilitation, or reconstruction of highways, bridges, and tunnels; transit capital projects; infrastructure-based intelligent transportation systems (ITS) capital improvements; border infrastructure; highway and transit safety projects; traffic monitoring, management, and control facilities; non-motorized projects (including projects eligible under the former Transportation Alternatives Program); and bridge scour countermeasures.

**Highway Safety Improvement Program (HSIP):** Utilized to decrease highway deaths and injuries. Activities eligible for HSIP funding include Intersection safety improvements; pavement and shoulder widening; rumble strips or other warning device; improvements for pedestrian or bicyclist safety or safety of persons with disabilities; Construction and improvement of a railway-highway grade crossing safety feature, including installation of protective devices; traffic calming features; elimination of a roadside hazard; and installation, replacement, and other improvement of highway signage and pavement markings, or a project to maintain minimum levels of retro-reflectivity, that addresses a highway safety problem consistent with a State strategic highway safety plan; roadside safety audits.

**Congestion Mitigation and Air Quality Improvement Program (CMAQ):** The intent of CMAQ funding is to reduce emissions from transportation sources. Activities eligible for funding include installing dedicated turn lanes; signal retiming, interconnection, or actuation; constructing

roundabouts; diesel retrofits; projects to reduce single-occupant vehicle travel; new or reduced-headways transit routes.

**National Highway Performance Program (NHPP):** The purpose of this funding source is to maintain and improve the National Highway System (NHS) (i.e., the subset of the federal-aid highway system that includes roads classified as principal arterials or above). Eligible activities include construction, rehabilitation, or reconstruction of highways, bridges, and tunnels; transit capital projects on the NHS; infrastructure-based intelligent transportation systems (ITS) capital improvements on the NHS; highway and transit safety projects on the NHS; certain bicycle and non-motorized activities; and construction, rehabilitation, or reconstruction of highways, bridges, and tunnels on federal-aid highways not on the NHS, as long as they are within the same corridor as a segment of the NHS.

**National Highway Freight Program:** This program provides funding for infrastructure improvements that increase economic competitiveness and productivity; reduce congestion on the National Highway Freight Network; reduce shipping costs; and improve the safety, efficiency, and reliability of that network. Activities eligible for funding include construction, reconstruction, rehabilitation, real property and equipment acquisition, and operational improvements directly related to system performance; ITS improvements; rail/highway grade separation; geometric improvements to interchanges and ramps; truck-only lanes; climbing and runaway truck lanes; adding/widening shoulders; and truck parking facilities.

**Transportation Alternatives Program (TAP):** These funds can be used for a number of activities to improve the transportation system environment, including, but not limited to, non-motorized projects, preservation of historic transportation facilities, outdoor advertising control, vegetation management in right-of-ways, and the planning and construction of projects that improve the ability of students to walk or bike to school. Transportation agencies from the MATS area are eligible to apply for grants under this program through MDOT's statewide competitive on-line application process. As this is a grant program, it is uncertain the funding amounts that the Midland area will receive over the life the TIP.

## Transit Resources

**Section 5304, State Planning and Research Program:** Funds are available to carry out the state transportation planning and programming requirements of the joint FTA/FHWA planning regulations, as well as a range of activities under other eligible programs. These activities provide for the development and integrated management and operation of transportation systems and facilities that will function as an intermodal transportation system. This source of funding has been utilized for a Midland County Public Transportation Study.

**Section 5307, Urbanized Area Formula Grants:** Funding for basic transit capital needs of transit agencies in urbanized areas. Eligible activities include Capital projects, transit planning, and projects eligible under the former Job Access Reverse Commute (JARC) program (intended to link people without transportation to available jobs). Some of the funds can also be used for operating expenses, depending on the size of the transit agency. One percent of funds received are to be used by the agency to improve security at agency facilities.

**Section 5310, Elderly and Persons with Disabilities:** The purpose of 5310 funding is to improve mobility options for seniors and disabled persons. Activities eligible include Projects to benefit seniors and disabled persons when service is unavailable or insufficient and transit access projects for disabled persons exceeding Americans with Disabilities Act (ADA) requirements. Section 5310 incorporates the former New Freedom program.

**Section 5311, Non-Urbanized Area Formula Grants:** This funding is utilized to improve mobility options for residents of rural areas. Eligible activities include capital, operating, and rural transit planning activities in areas under 50,000 in population.

**Section 5339, Bus and Bus Facilities:** Provides funding for basic transit capital needs of transit agencies, including construction of bus-related facilities. Eligible activities include replace, rehabilitate, and purchase buses and related equipment, and construct bus-related facilities.

## Addendum B Financial and Operations and Maintenance Assumptions

### **Funding Growth Rates**

These rates are not Year of Expenditure (i.e., inflation). Funding growth rates are the forecast of what is expected to be apportioned and/or allocated to the state and the MPOs. These funds are not indexed for inflation: There is no “cost of living” adjustment. Assumptions are made based on information known at a given point in time. What we know as we develop our current estimates is:

1. On December 4, 2015, the FAST Act was signed into law. The FAST Act authorizes \$305 billion in federal funding for the nation’s surface transportation system over the next five years. The legislation breaks the cycle of short-term funding authorizations that have characterized the federal program for the past 10 years and, in covering nearly five full fiscal years, represents the longest surface transportation authorization bill enacted since 1998.
2. In the 10 years before passage of the FAST Act, federal funding for Michigan’s highways fluctuated. Apportioned program funding to Michigan first exceeded \$1 billion in 2004. In 2016, apportioned program funding to Michigan still barely exceeded \$1 billion. The FAST Act is expected to break this trend of level funding by providing a modest increase through FY 2020. These increases are assumed to continue through FY 2025, as the plan assumes a 2 percent growth rate through this period.
3. Beginning in FY 2019, \$150 million will be appropriated from Michigan income tax revenues into the MTF for distribution through the Act 51 formula for state funding. Income tax revenues will increase to \$600 million per fiscal year beginning in FY 2021. The forecasted income tax revenue of \$600 million annually from FY 2022 to 2025 is included based on current state law, with this revenue distributed to road agencies under the current Act 51 formula.

Although the FAST Act has increased funding stability over the next five fiscal years, funding increases are modest at best. In keeping with the modest increases outlined in the FAST Act, MDOT is recommending two percent per year funding increases between FY 2020 and FY 2023.

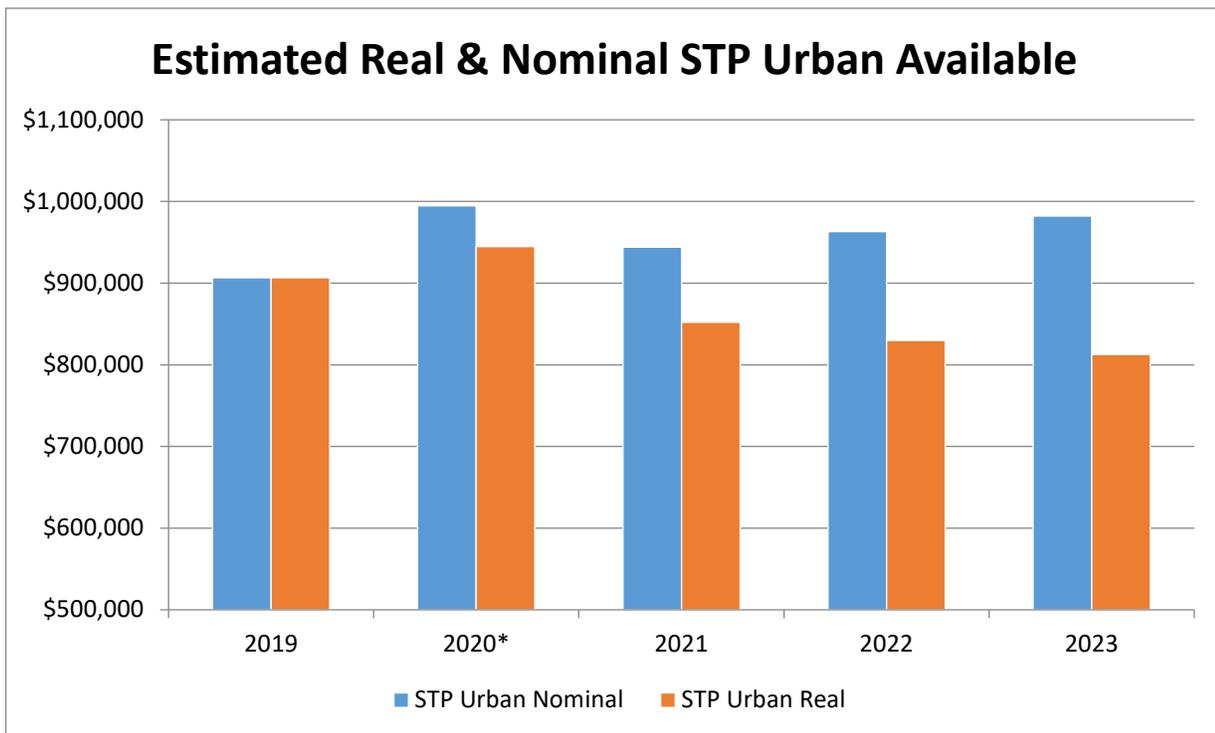
### **Year of Expenditure (YOE) Rates**

These rates represent the forecast of how much the cost of implementing transportation projects will increase each year, on average. In other words, YOE is the expected inflation rate in the transportation agencies’ cost of doing business. YOE adjustments to project costs are essential to show the true relationship between costs and resources. In recent years, highway and transit agencies have been increasingly squeezed by this phenomenon, since the inflation rate on transportation costs has increased faster than funding growth rates. Thus, although the rate of nominal funding growth has hovered essentially around 2.47 percent, the inflation rate means that less work can be done per allocated dollar. When viewed from the point of view of purchasing power, the states and MPOs have experienced a sharp decline in funding resources.

Based on past experience, MDOT, in cooperation with MTPA, will use the following YOY factors:

1. 2019, base year;
2. 2020, five percent above 2019;
3. 2021, five percent above 2020;
4. 2022, 4.5 percent above 2021; and
5. 2023, four percent above 2022.

The table and chart below provide an example that illustrates the difference between what we will officially receive in STP Urban funding over the life of the FAST Act (i.e., nominal funding), and what that funding will be worth relative to the purchasing power of the base year (i.e., real funding)



**Table 5. Available STP Urban Funding**

	STP Urban Nominal	STP Urban Real
<b>2019</b>	\$906,428	\$906,428
<b>2020*</b>	\$994,648	\$944,916
<b>2021</b>	\$944,000	\$851,960
<b>2022</b>	\$963,000	\$829,998
<b>2023</b>	\$982,000	\$812,519

Note: Includes \$69648 of supplemental HP funds.

## Estimate of Operations and Maintenance (O and M) Costs on the Federal-Aid Highway System

Repair and improvements to capital assets are only part of the total cost of the federal-aid highway system. Operations and maintenance (O and M), defined as those items (other than repair/replacement of capital assets) necessary to keep the highway infrastructure functional for vehicle travel, is just as important. Federal-aid funds cannot be used for O and M, which covers activities like grass cutting, trash removal, and snow removal. However, federal transportation planning regulations require an estimate of those costs on the federal-aid highway system.

The O and M estimate was derived in the following manner:

1. MDOT's estimate of total O and M funding available for the state trunkline system throughout Michigan is approximately \$710 million in FY 2019.
2. The total lane miles for the entire state trunkline system is determined and used as the denominator in the fraction \$710 million/27,452 total state trunkline lane-miles to determine a per-mile cost.
3. Approximately 0.9 percent of the lane miles in the state trunkline system are located in the MATS area.
4. Assuming a roughly equal per-lane-mile operations and maintenance cost throughout the state trunkline system, MDOT should spend approximately \$6,491,695 in FY 2019 in the MATS area on these activities.
5. Locally owned roads on the federal-aid highway system will have their costs estimated based on local data and a historical 2% annual increase from the 2016 baseline.
6. The sum of costs from Steps 4 and 5 will constitute the required O and M estimate.
7. This base estimate is adjusted according to the inflation factors noted above in each fiscal year since this is the cost of O and M, not a particular funding source.

# Environmental Justice

## Introduction

In 1997, the U.S. Department of Transportation (DOT) issued the DOT order on environmental justice to address Environmental Justice in Minority Populations and Low-Income Populations (DOT Order 5610.2). The order generally describes the process for incorporating environmental justice principles into all DOT programs, policies, and activities.

Environmental justice is an important part of the planning process and must be considered in all phases of planning. This includes public participation plans and activities as well as the development of transportation plans and improvement programs prepared and adopted by MATS. There are three fundamental concepts of environmental justice:

- To avoid, minimize, or mitigate disproportionately high and adverse human health or environmental effects, including social and economic effects, on minority populations and low-income populations.
- To ensure the full and fair participation by all potentially affected communities in the transportation decision-making process.
- To prevent the denial of, reduction in, or significant delay in the receipt of benefits by minority populations and low-income populations.

MATS has identified Census block groups where low-income and minority populations live so that their needs can be recognized and addressed, and the benefits and burdens of transportation investments can be fairly distributed. However, this cannot be achieved without the involvement of the public, community groups, and other organizations. These individuals and groups advance the intent of environmental justice in transportation when involved in public participation activities (meetings, hearings, advisory groups) to help MATS understand community needs, perceptions, and goals. In order for the MPO to better understand the needs of everyone in the community, members of each respective group are invited to participate in meetings and other gatherings to voice their opinions and to offer their input.

## Definitions

For the purposes of Environmental Justice analysis and understanding, a couple of terms need to be defined; these are “low-income” and “minority”.

“Low-income” is defined as a household income at or below the Department of Health and Human Services (HHS) poverty guidelines. These guidelines change every year due to inflation and vary with the number of people residing in the household. According to the US DOT Order 5610.2, the following groups are defined as a “minority”:

1. African American (a person having origins in any of the black racial groups of Africa).
2. American Indian and Alaskan Native (a person having origins in any of the original people of North America and who maintains cultural identification through tribal affiliation or community recognition).
3. Asian American (a person having origins in any of the original people of the Far East, Southeast Asia, or the Indian subcontinent).
4. Hispanic (a person of Mexican, Puerto Rican, Cuban, Central or South American, or other Spanish culture or origin, regardless of race).
5. Native Hawaiian and Other Pacific Islander (a person having origins in any of the original peoples of Hawaii, Guam, Samoa or other Pacific Islands).
6. Other minorities (a person having origins from the regions not included in "African American," "American Indian and Alaskan Native," "Asian American," "Hispanic," or "Native Hawaiian and Other Pacific Islander")

## Development

For the purpose of the environmental justice analysis, MATS has identified areas within the MPO boundaries where the percentage of minority populations and percentage of households below the poverty level (2010 Redistricting data, which may differ from SF1 data) are higher than the overall MATS average. The minority populations that are considered are African-American, Native American, Asian, Hispanic, and Hawaiian. All other minority groups are combined into one and a category has been included that describes a person of two or more races. To measure minority population, Census blocks were utilized, and block groups utilized for poverty data. The maps in this chapter portray blocks with higher than average minority or low-income populations.

The data that was used in the minority maps is based on individuals, while the data for low-income is based on households. In order to show if there are minority populations or households below poverty within a certain distance of each road project, those census blocks or block groups are indicated on the map in yellow. Utilizing census blocks for the minority population, and only utilizing block groups for the poverty calculation better matches the scale of the typical road project to that of the potentially affected population by geographic area. Thereafter, the percentage of each group was calculated for all of the blocks (again, block groups for the poverty calculation). Once the percentage of minorities and below-poverty households were calculated within the impact area, it was compared to the average of the whole MATS area and shown graphically based on how much the actual value differed from the average. The results of this analysis are shown in the maps following this section.

## Analysis and Results

The MATS area is predominately white in terms of race (94.12%) with minorities representing 5.88%. Further, there are 3,932 below-poverty-level households in the MATS area representing 9.98% of all households.

The following table shows the summary of the minority populations and households below poverty level for the MATS area and the percentages of each group located within the census blocks adjacent to the 2020-2023 TIP projects. Each percentage was calculated by taking the actual number of each minority group within the impact area and dividing it by the total population number in the impact area. The impact area percentages can be compared across column to overall MATS data to determine how the population makeup matches. **As the data shows, there are not any groups that are disproportionately neglected or overexposed in terms of proposed transportation projects.** For each minority group, the percentage within the Impact Area is roughly equal to or higher than the percentage in the whole MATS area. This shows that the minorities' needs are being taken into consideration with respect to future transportation improvements. The same is true for low-income population. The 10.12% of below-poverty-level households are within the Impact Area of proposed transportation projects, which is roughly equal to the overall percentage in the whole MATS area (9.98%). **This shows that the low-income population within the MATS area is neither disproportionately burdened nor neglected with respect to future transportation improvements.**

Table 6  
Population Breakdown within MATS area and proximity to TIP projects

2010 Population	MATS MPO		2020-2023 EJ Census Blocks	Impact Area %
<i>Area</i>	598.8 sq. miles	---	89.28 sq. miles	---
<i>Total Population</i>	100,371	---	16,061	---
<i>White</i>	94,472	94.12%	15,382	95.77%
<i>African American</i>	1,924	1.92%	120	0.75%
<i>American Indian/Alaska Native</i>	451	0.45%	79	0.49%
<i>Asian</i>	1,637	1.63%	205	1.28%
<i>Hispanic (any race)*</i>	2,157	2.15%	329	2.05%
<i>Hawaiian</i>	51	0.05%	3	0.01%
<i>Other Races</i>	406	0.40%	52	0.32%
<i>Two or More Races</i>	1,430	1.42%	220	1.37%
<i>Total Households</i>	39,372	---	6,184	---
<i>Households Below Poverty Level</i>	3,932	9.98%	3,080 out of 30,435	10.12%

\*Note: Hispanic can be of any race, and thus do not add in total population or percentages.

35 road projects within the MATS area were evaluated for Environmental Justice, which excludes such things as transit operating and capital funds, region-wide safety and pavement marking projects, as well as entries on the larger list for engineering phases or various funding sources for a single project. In total, there are 5 projects that are in or adjacent to an area of significant minority population, herein defined as over twice the average density in the MATS area. In addition, there are 9 projects that are located in or adjacent to block groups with above average households below the poverty level. It is concluded, the road projects presented in this TIP will improve way of life of all residents including low-income and minority populations.

The following table shows a slightly different assessment; it compares the minority populations within the Impact Area to the total population within the Impact Area. In this case, the impact area percentages should be compared up & down the column to the Total Population percentage to see if any minority group or low-income population is more concentrated therein. This analysis shows that similar percentages of most minority groups and low-income population are represented within impact areas of proposed transportation projects. **Accordingly, it is concluded that imminent transportation system investments are affecting all involved in a similar manner. These projects do not disproportionately burden nor fail to meet the needs of any segment of the population.**

**Table 7**  
**Percent Concentrations within Projects' Impact Area**

	<b>MATS MPO</b>	<b>2020-2023 EJ Census Blocks</b>	<b>% Concentration per category within Impact Area</b>
<i>Area</i>	598.8 sq miles		---
<i>Total Population</i>	100,371	16,061	16.00%
<i>White</i>	94,472	15,382	16.28%
<i>African American</i>	1,924	120	6.24%
<i>American Indian/Alaska Native</i>	451	79	17.51%
<i>Asian</i>	1,637	205	12.52%
<i>Hispanic (any race)*</i>	2,157	329	15.25%
<i>Hawaiian</i>	51	3	5.88%
<i>Other Races</i>	406	52	12.80%
<i>Two or More Races</i>	1,430	220	15.38%
<i>Households Below Poverty Level</i>	3,932 out of 39,372	3,080 out of 30,435	9.98% vs. 10.12%

\*Note: Hispanic can be of any race, and thus do not add in total population or percentages.

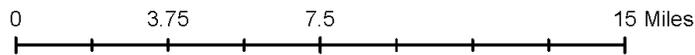
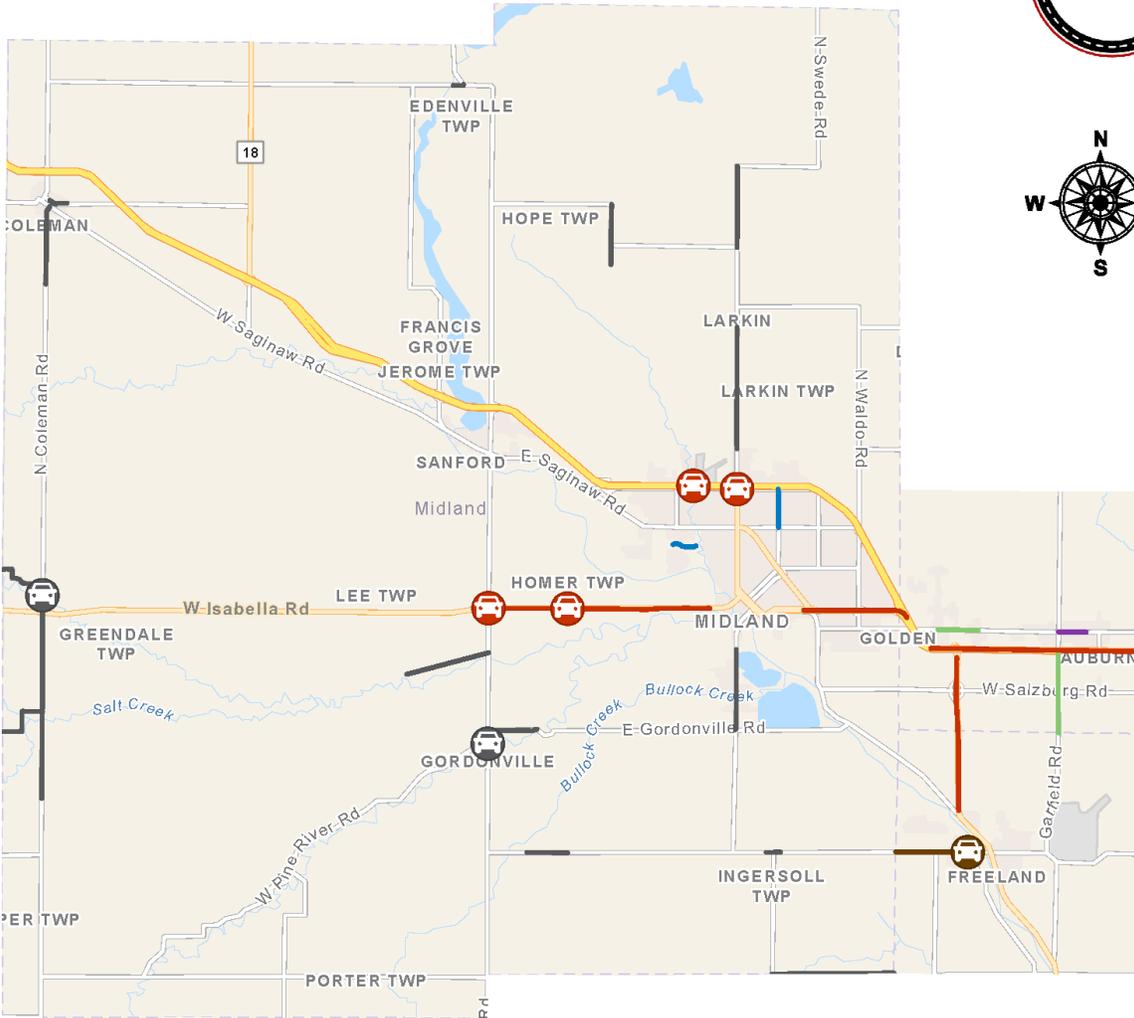
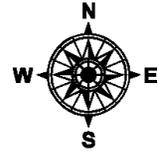
In summary, MATS' programmed 2020-2023 transportation projects are located throughout the MATS planning area; no population groups are disproportionately neglected or overexposed in light of these projects. The minorities' and low-income populations' needs are being taken into consideration with respect to future transportation improvements.

The following maps show the analysis that was described above geographically. The first map shows the location of all the 2020-2023 programmed road projects and the agency responsible for each project. The maps following show each minority group in relation to the TIP projects. For every Census block within MATS planning area, minority group population percentages were calculated and are represented in three colors (i.e. below average, between average and twice average, and more than twice the average - compared to the overall average for the entire MATS area). The final map shows below poverty level households in relation to TIP projects. It is clear that some of the block groups with higher poverty percentages will have transportation improvements within their areas.

In addition to the programmed road projects, there are also multiple projects for the County Connection of Midland and Dial-a-Ride agencies that involve replacing old buses and vans to allow for efficient and adequate public transportation in the area. The described projects are presented on the complete list of projects as previously shown. County Connection and Dial-A-Ride provide transit services within the MATS area for a minimal cost to the user.

MATS will continue to address environmental justice issues throughout the life of the Transportation Improvement Program, and will continue to work in coordination with MDOT and FHWA to help improve efforts in the future.

# Midland Area Transportation Study (MATS) MPO Area



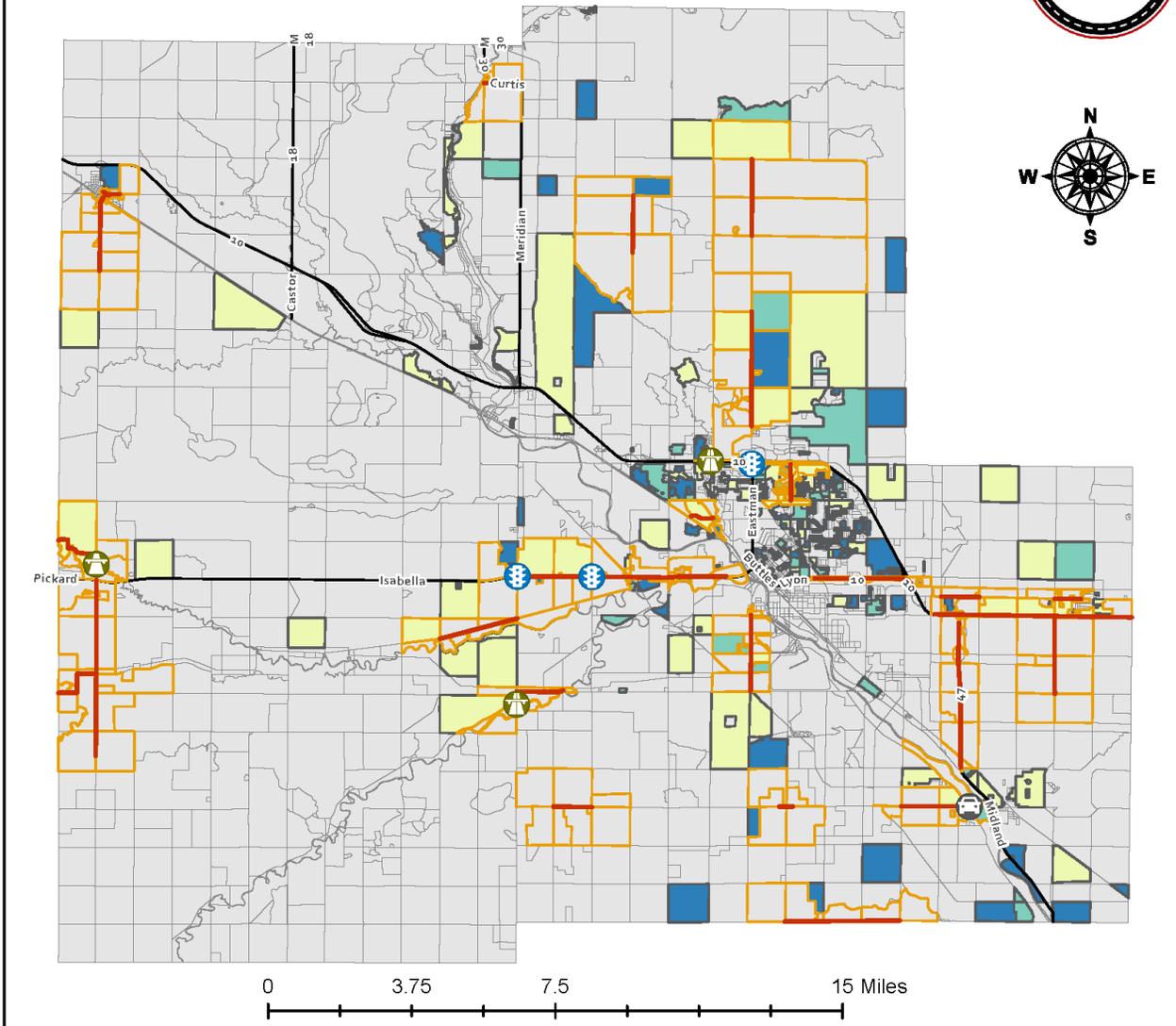
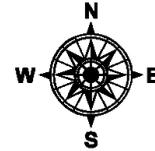
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<span style="color: grey;">—</span>	MCRC
<span style="color: red;">—</span>	MDOT
<span style="color: brown;">—</span>	SCRC
	MCRC
	MDOT
	SCRC



Created by Midland County GIS  
March 2019

## Census Blocks by Percent African American

# Midland Area Transportation Study (MATs) MPO Area



—	Major Roads
—	TIP - Road Projects
	TIP - Bridge
	TIP - Roundabout
	TIP - Traffic Signal
	Impacted Census Blocks
<b>Percent African American</b>	
	Below MATs Average (<1.92%)
	Between MATs Average & Twice MATs Average (1.92% - 3.84%)
	Above Twice MATs Average (>3.84%)
	Zero African American Population

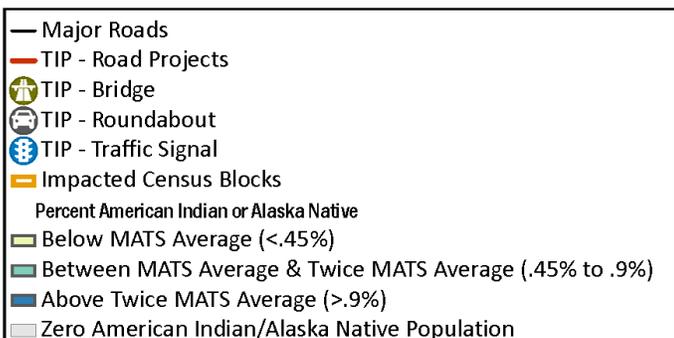
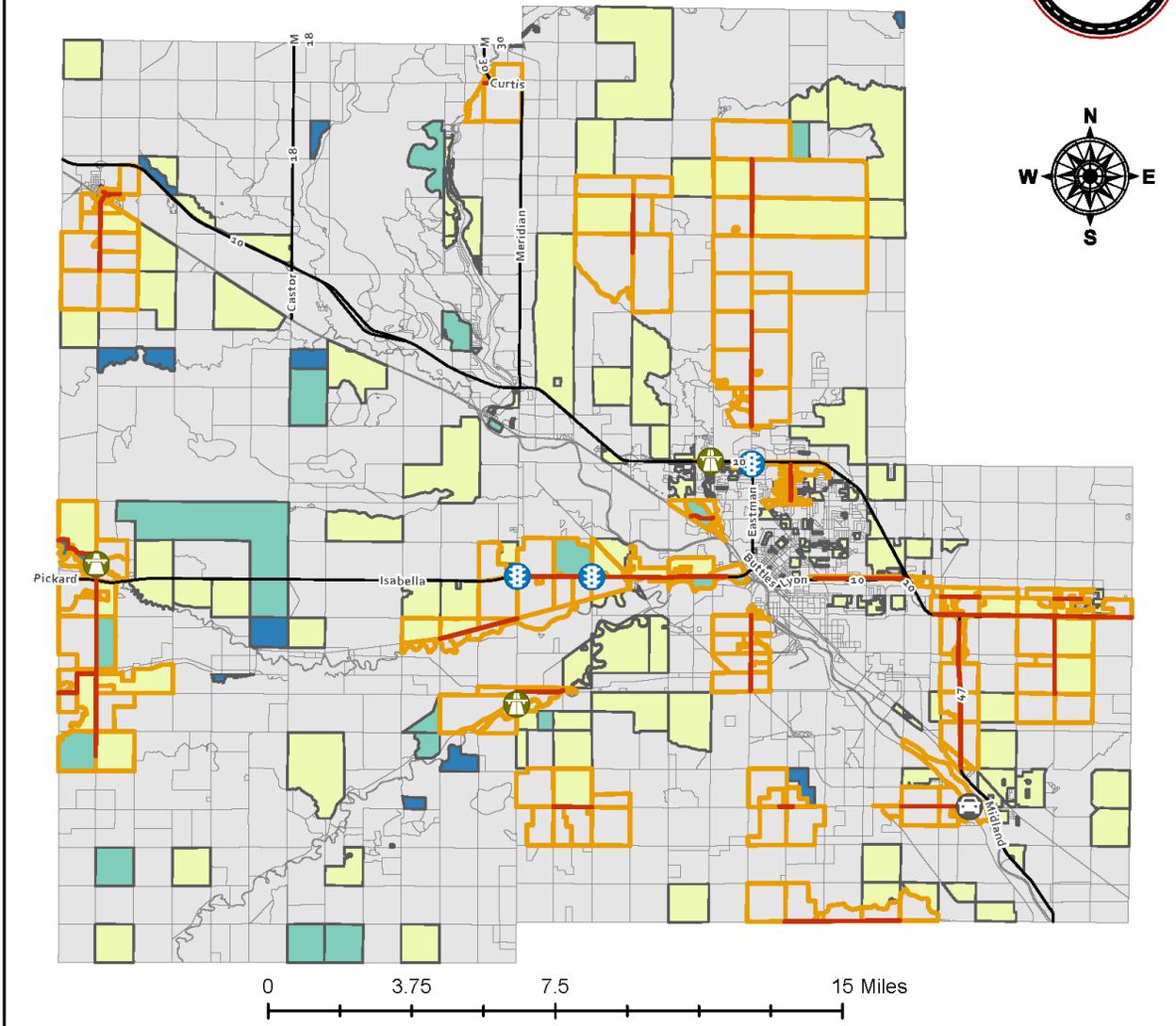
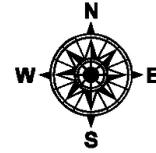
## Percent African American



Created by Midland County GIS  
March 2019

## Census Blocks by Percent American Indian

# Midland Area Transportation Study (MATs) MPO Area



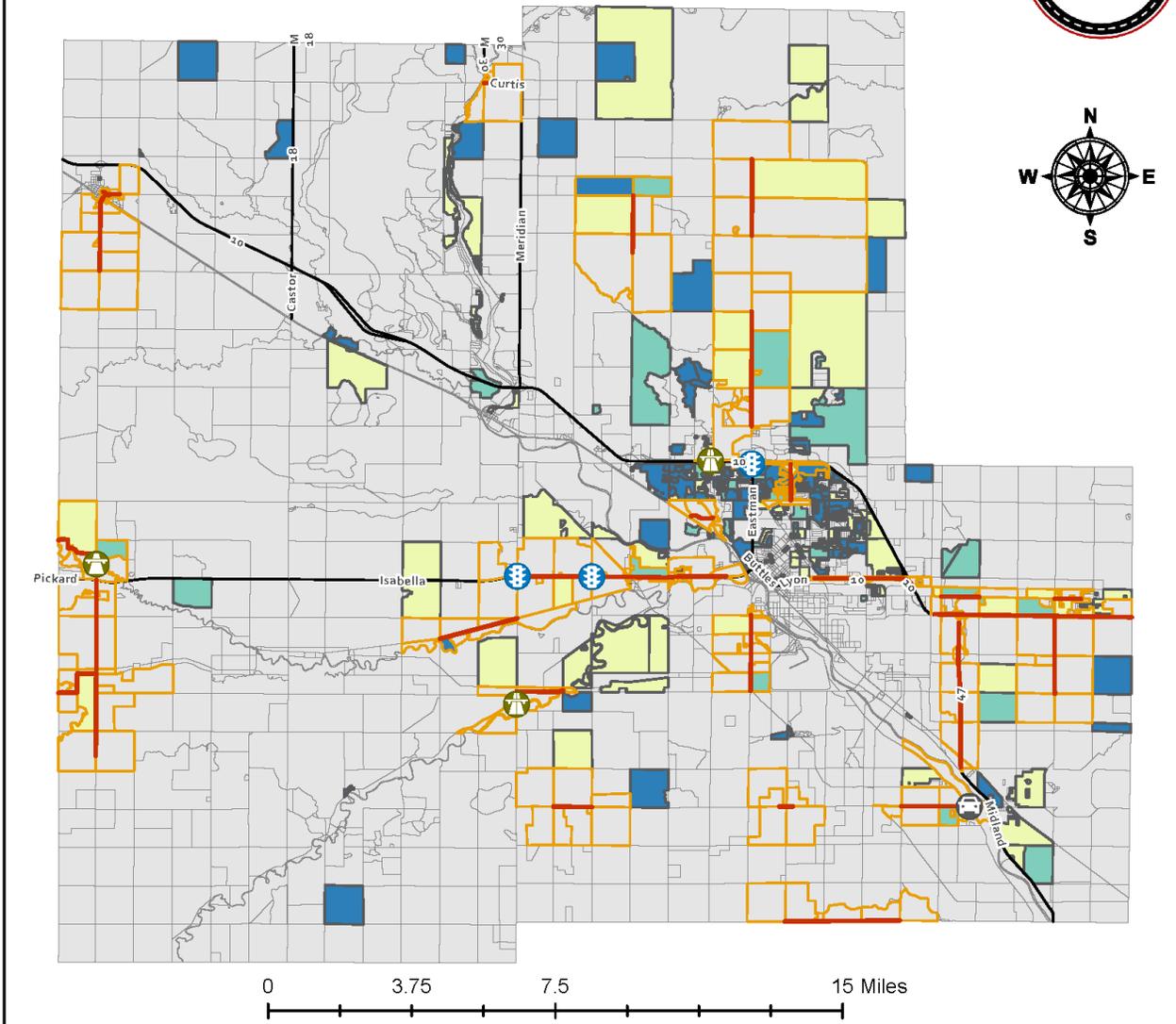
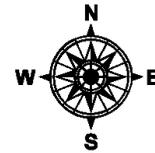
## Percent American Indian or Alaska Native



Created by Midland County GIS  
March 2019

## Census Blocks by Percent Asian

# Midland Area Transportation Study (MATS) MPO Area



	Major Roads
	TIP - Road Projects
	TIP - Bridge
	TIP - Roundabout
	TIP - Traffic Signal
	Impacted Census Blocks
<b>Percent Asian</b>	
	Below MATS Average (<1.63%)
	Between MATS Average and Twice MATS Average (1.63% to 3.26%)
	Above Twice MATS Average (>3.26%)
	Zero Asian Population

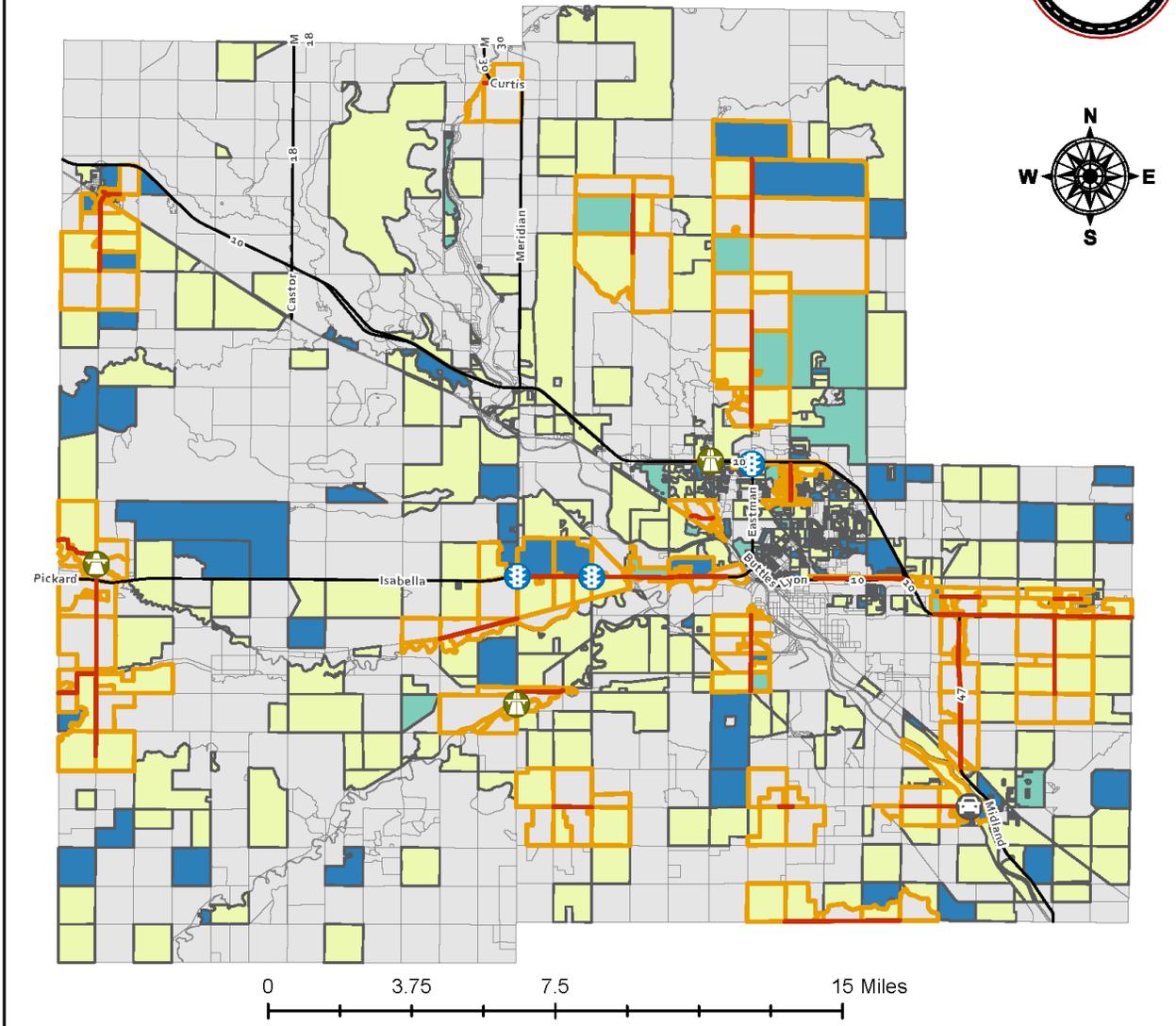
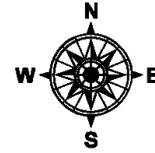
## Percent Asian



Created by Midland County GIS  
March 2019

Census Blocks by Percent Hispanic Origin

# Midland Area Transportation Study (MATs) MPO Area



	Major Roads
	TIP - Road Projects
	TIP - Bridge
	TIP - Roundabout
	TIP - Traffic Signal
	Impacted Census Blocks
<b>Percent Hispanic Origin</b>	
	Below MATs Average (<2.14%)
	Between MATs Average and Twice MATs Average (2.14% to 4.28%)
	Above Twice MATs Average (>4.28%)
	Zero Hispanic Population

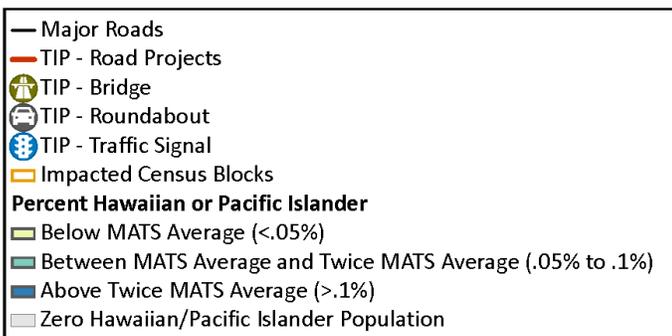
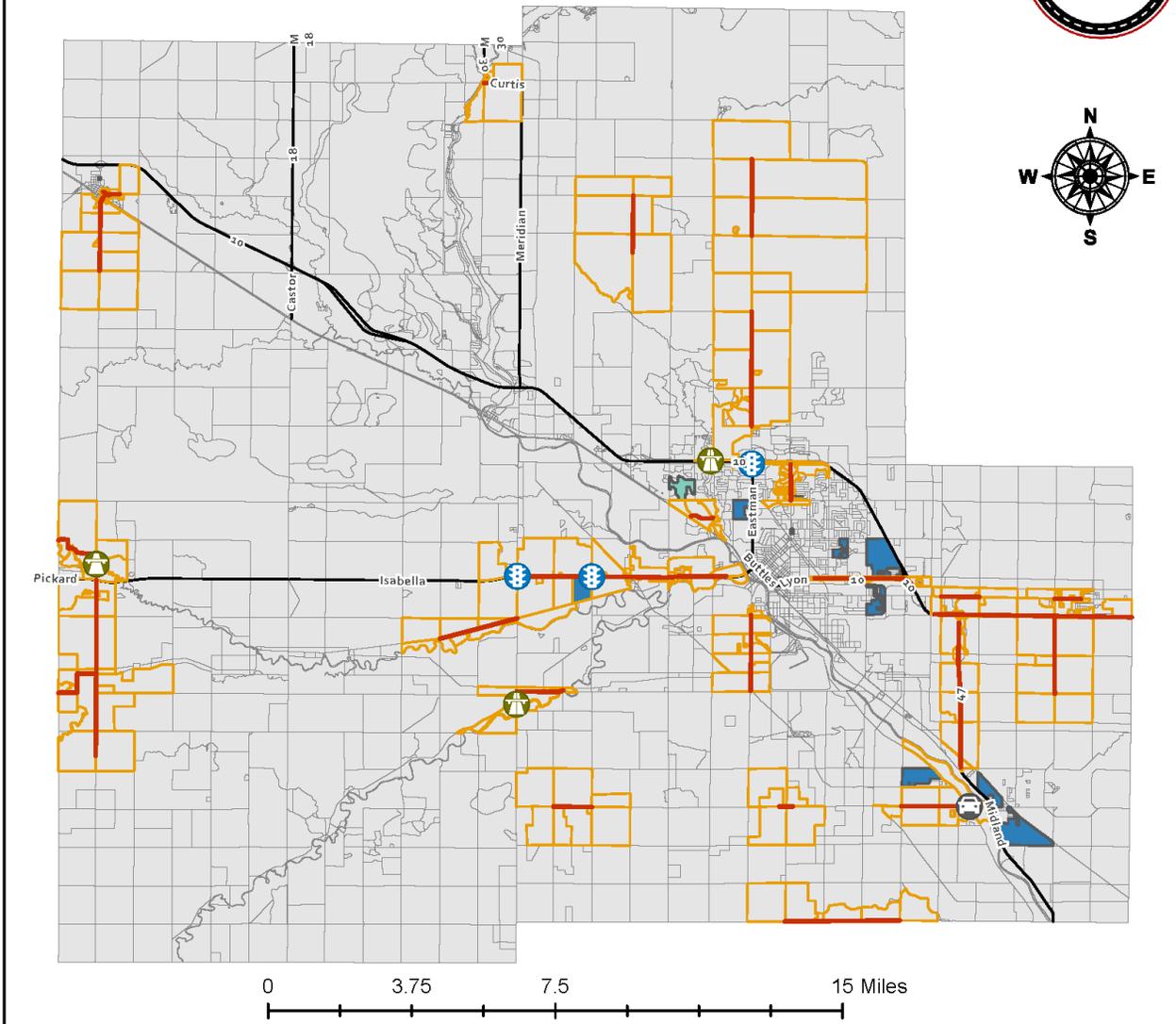
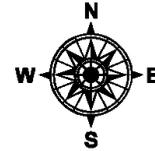
## Percent Hispanic Origin



Created by Midland County GIS  
March 2019

## Census Blocks by Percent Hawaiian Islander

# Midland Area Transportation Study (MATS) MPO Area



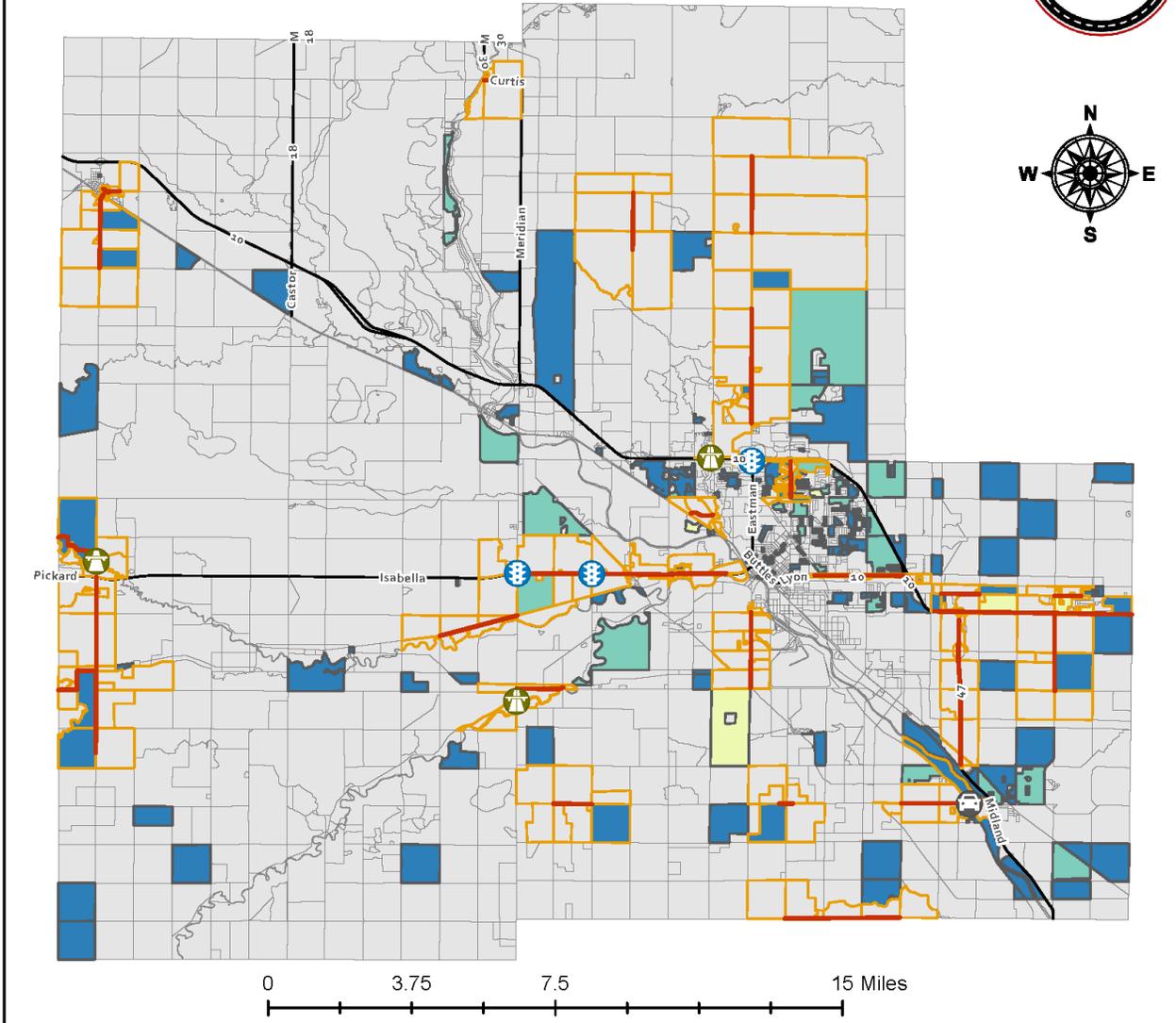
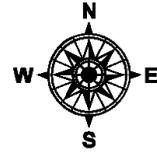
## Percent Hawaiian or Pacific Islander



Created by Midland County GIS  
March 2019

## Census Blocks by Percent Other Race

# Midland Area Transportation Study (MATs) MPO Area



—	Major Roads
—	TIP - Road Projects
	TIP - Bridge
	TIP - Roundabout
	TIP - Traffic Signal
	Impacted Census Blocks
<b>Percent Other Race Alone</b>	
	Below MATs Average (<.4%)
	Between MATs Average and Twice MATs Average (.4% to .8%)
	Above Twice MATs Average (>.8%)
	Zero Other Race Population

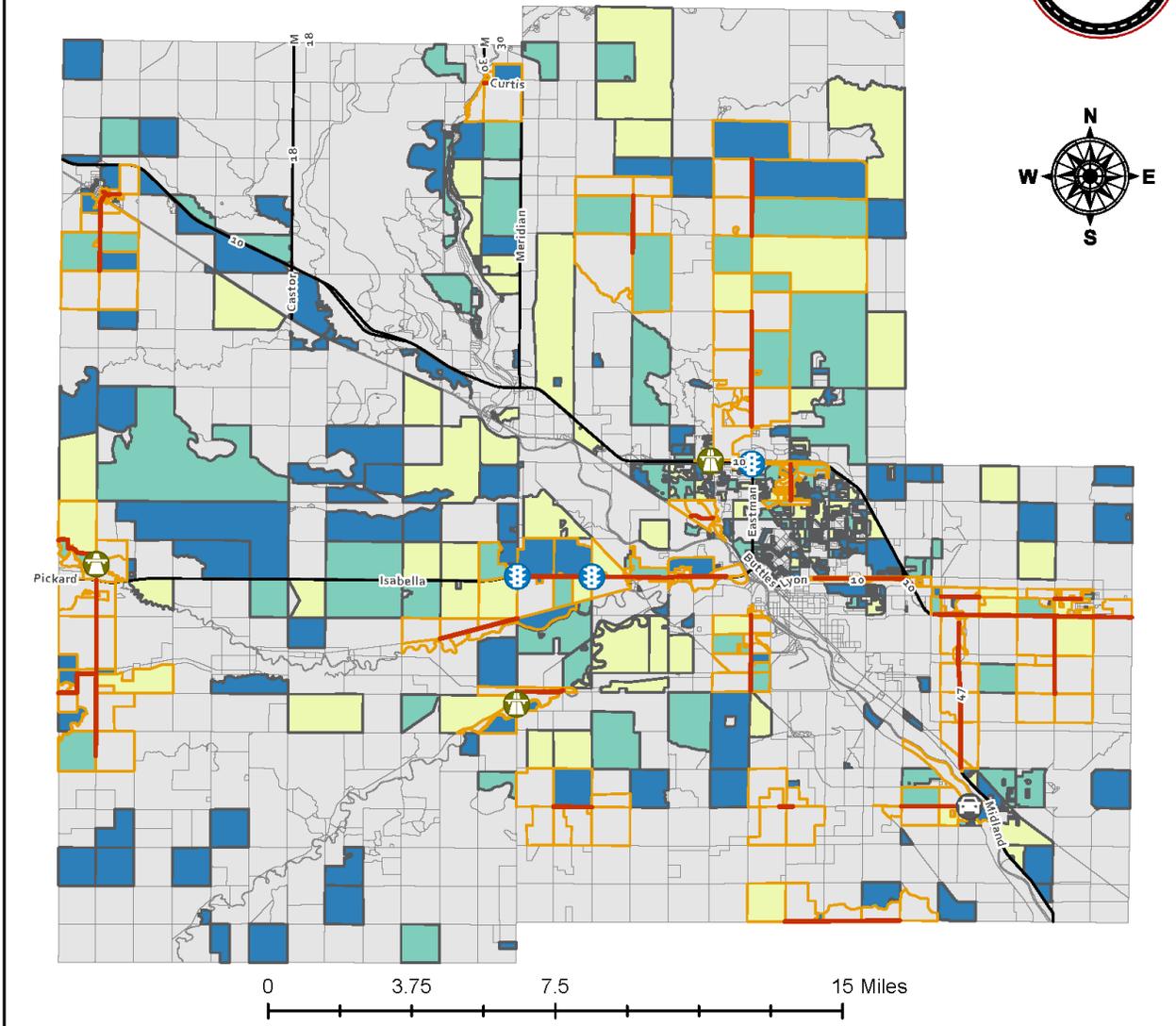
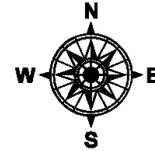
## Percent Other Race Alone



Created by Midland County GIS  
March 2019

Census Blocks by Percent Two or More Races

# Midland Area Transportation Study (MATs) MPO Area



- Major Roads
- TIP - Road Projects
- TIP - Bridge
- TIP - Roundabout
- TIP - Traffic Signal
- Impacted Census Blocks
- Percent Two or More Races**
- Below MATs Average (<1.42%)
- Between MATs Average and Twice MATs Average (1.42% to 2.84%)
- Above MATs Average (>2.84%)
- Zero Two or More Race Population

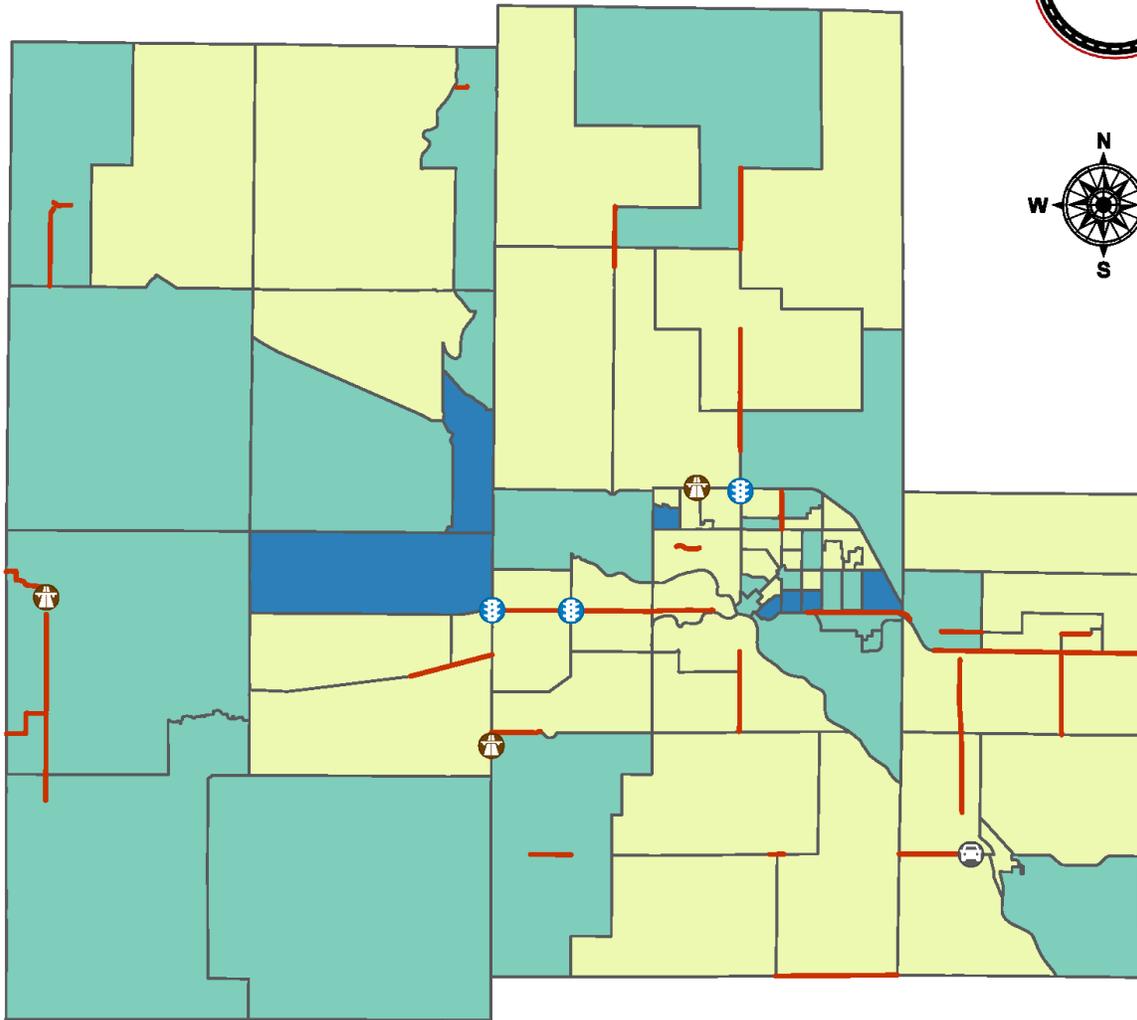
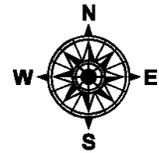
## Percent Two or More Races



Created by Midland County GIS  
March 2019

## Census Block Groups by Households Below Poverty

# Midland Area Transportation Study (MATS) MPO Area



0      3.75      7.5      15 Miles

Based on 2011 ACS block groups.  
ACS data has a margin of error.  
Data is not 100% accurate.

Households Below Poverty Level	
Bridge	
Roundabout	
Traffic Signal	
Road Projects	
Households	
Below MATS Average (<9.9%)	
Between MATS Average & Twice MATS Average (9.9% - 19.8%)	
Above Twice MATS Average (>19.8%)	



Created by Midland County GIS  
March 2019

# Performance Measures

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## Part One: Federal Aspects of the Process

### Legislation, Background, and Goals

A key feature of the Fixing America's Surface Transportation (FAST) Act is the continuation of a performance and outcome-based program originally introduced through the Moving Ahead for Progress in the 21<sup>st</sup> Century (MAP-21) Act. The objective of this performance-based program is for states and MPOs to invest resources in projects that collectively will make progress toward the achievement of national transportation goals.

### **National Goal Areas for Performance Management for Roads and Highways**

23 CFR 490 outlined the national goals for the federal aid highway program around which the federally required performance measures were created. Below is a listing of those seven areas followed by a brief description of each goal. They are:

- 
1. **Safety:** To achieve a reduction in fatalities and serious injuries on all public roads.
  2. **Infrastructure Condition:** To maintain highway infrastructure assets in a state of good repair.
  3. **Congestion Reduction:** To achieve a reduction in congestion on the National Highway System.
  4. **System Reliability:** To improve the efficiency of the surface transportation system.
  5. **Freight Movement and Economic Vitality:** To improve freight networks, strengthen the ability of rural communities to access national and international trade markets, and support regional economic development.
  6. **Environmental Sustainability:** To enhance the performance of the transportation system while protecting and enhancing the environment.
  7. **Reduced Project Delivery Delays:** To reduce project costs, promote jobs and the economy, and expedite the movement of people and goods by accelerating project completion through eliminating delays in the project development and delivery process, including reducing regulatory burdens and improving agencies' work practices.

MAP-21 focused on national goals, increasing accountability, and improving transparency. These changes improved decision-making through better-informed planning and programming. In general, performance measures must be directly relatable to goals, utilize available data that is trackable over time, and measure progress. According to the Federal Highway Administration (FHWA), “Performance measures are a qualitative or quantitative measure of outcomes, outputs, efficiency, or cost-effectiveness.” Under MAP-21, U.S. DOT was to establish performance measures and state DOTs then develop performance targets in consultation with metropolitan planning organizations (MPOs) and others. State investments must make progress toward these performance targets, and MPOs must incorporate these performance measures and targets into their Transportation Improvement Programs (TIPs) and Long Range Transportation Plans.

A specific sequence of events is necessary to convert Federal transportation authorization legislation into action. First, the Federal Highway Administration and/or the Federal Transit Agency takes the legislative goals enumerated by Congress and proceeds to rulemaking, issued via the Federal Register. The result of the rulemaking is specific Performance Measures for each area covered by the rules as they are issued. For each Performance Measure, as applicable, State DOT’s and MPOs create targets, set up a methodology to evaluate progress towards those targets through assessment of data, and review and/or update the targets according to a cycle indicated in each rule.

Within one year of the U.S. Department of Transportation final rules on performance measures, States are required to set performance targets in support of these measures. Within 180 days of the state setting targets, MPOs are then required to choose to support the statewide targets or optionally set their own targets. To ensure consistency, each MPO must, to the maximum extent practicable, coordinate with the relevant State and public transportation providers when setting performance targets.

The following Table (Table 1) lays this out broadly, showing the Performance Rule (called a Final Rule), specifically what measures were included in the rule, when the Michigan Department of Transportation was required to promulgate initial targets, and when MATS will need to adopt targets.

Table 8.

TMP Rules Overview and Deadlines			
Performance Rule	Measures	Targets	
		MDOT	MATS
Safety Performance	Fatalities, Serious Injuries, Non-Motorized Fatalities and Serious Injuries	Initial Targets due 8/31/2017	Initial Targets Due 2/27/2018 MATS Adoption 12/06/2017 Annual Cycle
Pavement and Bridge Condition	Bridges in Good & Poor cond., Interstate Pavement in Good & Poor cond., non-Interstate NHS pavement in Good & Poor cond.	Initial Targets due 5/20/2018	Initial Targets Due 11/16/2018 2 to 4 year cycle
Statewide and Non-Metro Planning; Metro Planning	TIP & LRTP must be compliant with the rule after May 27, 2018. TIP Report to be revised to include Performance Measures chapter.	Compliant by 5/27/2018	No Targets. MPO process to be compliant by 5/27/2018 TIP Report - 3 year cycle LRTP - 4 to 5 year cycle
Performance of the NHS, Freight, and CMAQ;	Interstate Travel Time reliability Measure, Non-Interstate Travel Time reliability Measure, Truck Travel Time Reliability Index,	Initial Targets due 5/20/2018	Initial Targets Due 11/16/2018 2 to 4 year cycle
Greenhouse Gas	% Change in tailpipe CO2 Emissions (NHS Only)	Initial Targets due 9/27/2018	Initial Targets Due 3/27/2019 2 to 4 year cycle
Highway Asset Management Plans for NHS	Development of MDOT NHS Asset Management Plan	Compliant by 4/30/2018	Not Applicable
Transit Asset Management (State of Good Repair)	Rolling Stock ULB, Infrastructure, Equipment, Facilities	Initial Targets due 1/1/2017	Initial Targets Due 6/2017 MATS Adoption 7/11/2017 Annual Cycle

### Rulemaking Areas and Performance Measures

Rulemaking is the process that Federal agencies use to create or promulgate regulations. In general, legislatures first set broad policy mandates by passing statutes, then agencies create more detailed regulations through rulemaking. These specific rulemaking areas then, serve to fulfill the goals established in MAP-21 and the FAST Act.

#### **Safety Performance**

Safety Performance Management (Safety PM) is part of the overall Transportation Performance Management (TPM) program, which FHWA defines as a strategic approach that uses system information to make investment and policy decision to achieve national performance goals. The Safety PM Final Rule supports the Highway Safety Improvement Program (HSIP), as it establishes safety performance measure requirements for the purpose of carrying out the HSIP and to assess fatalities and serious injuries on all public roads.

The Safety PM Final Rule, effective April 14, 2016, establishes five performance measures, presentable as five-year rolling averages. They include:

- 
1. Number of Fatalities
  2. Rate of Fatalities per 100 million Vehicle Miles Traveled (VMT)
  3. Number of Serious Injuries
  4. Rate of Serious Injuries per 100 million VMT
  5. Number of Non-motorized Fatalities and Non-motorized Serious Injuries

The Safety PM Final Rule also establishes the process for State Departments of Transportation (DOTs) and Metropolitan Planning Organizations (MPOs) to establish and report their safety targets, and the process that FHWA will use to assess whether State DOTs have met or made significant progress toward meeting their safety targets. The Safety PM Final Rule also establishes a common national definition for serious injuries.

### **Pavement and Bridge Condition Performance**

On May 20, 2017, the FHWA's Final Rule on pavement and bridge condition performance measures took effect. This Pavement and Bridge Condition Performance Measures final rule establishes measures for State DOTs to carry out the NHPP and to assess the condition of pavements on the non-Interstate NHS; pavements on the Interstate System; and bridges carrying the NHS, including on- and off-ramps connected to the NHS.

This final rule includes six measures which are:

- 
1. Percentage of pavements on the Interstate System in Good condition
  2. Percentage of pavements on the Interstate System in Poor condition
  3. Percentage of pavements on the NHS (excluding the Interstate System) in Good condition
  4. Percentage of pavements on the NHS (excluding the Interstate System) in Poor condition
  5. Percentage of NHS bridges in Good condition
  6. Percentage of NHS bridges in Poor condition

## **Statewide and Nonmetropolitan Transportation Planning; Metropolitan Transportation Planning**

This Final Rule, effective June 27, 2016, updates and modifies a rule originally issued as part of MAP-21. Jointly issued by FHWA and FTA, it updates regulations concerning the Long Range Transportation Plan (LRTP), a new mandate for States and MPOs like MATS to take a performance-based approach to planning and programming; a new emphasis on the nonmetropolitan transportation planning process, by requiring States to have a higher level of involvement with nonmetropolitan local officials and providing a process for the creation of regional transportation planning organizations (RTPO); a structural change to the membership of the larger MPOs; a new framework for voluntary scenario planning; new authority for the integration of the planning and environmental review processes; and a process for programmatic mitigation plans.

Any Transportation Improvement Program (TIP) and Long Range Plan (LRTP) document must comply with performance reporting requirements beginning on May 27, 2018. It is this rule that prompted the creation of this amendment to the MATS FY 2017 - 2020 TIP.

### **Performance of the NHS, Freight, and CMAQ**

On May 20, 2017, a Federal Highway Administration (FHWA) final rule took effect regarding Performance of the NHS, Freight, and CMAQ. The rule establishes performance measures that State Departments of Transportation (DOTs) and metropolitan planning organizations (MPOs) will use to report on the performance of the Interstate and non-Interstate National Highway System (NHS) to carry out the National Highway Performance Program (NHPP); freight movement on the Interstate system to carry out the National Highway Freight Program (NHFP); and traffic congestion and on-road mobile source emissions for the purpose of carrying out the Congestion Mitigation and Air Quality Improvement (CMAQ) Program. The rule addresses requirements established by the Moving Ahead for Progress in the 21st Century Act (MAP-21) and reflects passage of the Fixing America's Surface Transportation (FAST) Act. Specific measures associated with this rule are:

- 
1. Percent of the Interstate System Providing for Reliable Travel;
  2. Percent of the Interstate System Where Peak Hour Travel Times Meet Expectations;
  3. Percent of the Non-Interstate NHS Providing for Reliable Travel; and
  4. Percent of the Non-Interstate NHS Where Peak Hour Travel Times Meet Expectations.

## Highway Asset Management Plans for the NHS

The FHWA issued this Final Rule, effective October 2, 2017, to address three new requirements established by the Moving Ahead for Progress in the 21st Century Act (MAP-21). First, as part of the National Highway Performance Program (NHPP), MAP-21 adopted a requirement for States to develop and implement risk-based asset management plans for the National Highway System (NHS) to improve or preserve the condition of the assets and the performance of the system. Second, for the purpose of carrying out the NHPP, MAP-21 requires FHWA to establish minimum standards for States to use in developing and operating bridge and pavement management systems. Third, to conserve Federal resources and protect public safety, MAP-21 mandates periodic evaluations to determine if reasonable alternatives exist to roads, highways, or bridges that repeatedly require repair and reconstruction activities. This rule establishes requirements applicable to States in each of these areas. The rule also reflects the passage of the Fixing America's Surface Transportation (FAST) Act, which added provisions on critical infrastructure to the asset management portion of the NHPP statute.

## Transit Asset Management Performance

MAP-21 mandated the Federal Transit Administration (FTA) to develop a rule establishing a strategic and systematic process of operating, maintaining, and improving public capital assets effectively through their entire life cycle. The Transit Asset Management (TAM) Final Rule 49 CFR part 625 became effective Oct. 1, 2016, and established four performance measures, also known as State of Good Repair. The performance management requirements outlined in 49 CFR 625 Subpart D are a minimum standard for transit operators. Providers with more sophisticated analysis expertise are allowed to add additional transit performance measures and utilize those advanced techniques in addition to the required national performance measures.

- 
1. Rolling Stock - means a revenue vehicle used in providing public transportation, including vehicles used for carrying passengers on fare-free services
  2. Equipment - means an article of non-expendable, tangible property has a useful life of at least one year
  3. Facilities - means a building or structure that is used in providing public transportation
  4. Infrastructure - means the underlying framework or structures that support a public transportation system

## Part Two: MDOT Aspects of the Process

### Data, Baselines, and Targets

In order to implement the various rules promulgated by the FHWA and the FTA, the Michigan Department of Transportation will ultimately need to disseminate targets for measures found under many of the individual rules issued. The rules clearly delineate a process for States and MPOs to establish and report targets, as well as a process for FHWA to assess whether a State has met or made significant progress toward achieving those targets.

#### **Data and Factors**

The process of establishing targets must be a data-driven one. Data-driven means informed by a systematic review and analysis of quality data sources when making decisions related to planning, target establishment, resource allocation and implementation.

In addition, other data is gathered, relating to external factors that may affect the accuracy of any forecast. This data includes such things as the relationship between vehicle miles of travel and fatalities, modal split tracking over time, and household income distribution. The data gathered may apply to one or more individual performance measure target setting processes across the various performance rule areas.

This level of complexity is utilized because while basic trends provide a way of looking at the direction current data, these trends do not account for external factors and variations between data sources. In this way, larger and more comprehensive data sets create a clearer picture of events.

#### **Baseline Generation and Target Promulgation**

For setting CY 2018 targets, States used data from 2016 and prior years where available. This iterative and ongoing process was used to create a data trend line. The trend line was then extrapolated and used to forecast 5-year averages for each, to set the CY 2018 target. In future years the same process will be followed.

In addition to this, model data such as that from the University of Michigan Transportation Research Institute (UMTRI) can be used to better refine various factors and the resulting baseline. Once the baseline has been established and projections made, MDOT issues the targets and the MPOs begin to finalize their deliberations regarding support of MDOT targets or development of MPO-specific targets.

## Part Three: MPO Aspects of the Process

### Performance-Based Planning

Projects that MATS programs via the TIP can be categorized as either a MATS-selected project (utilizing STUL funding), or one selected by another agency through their respective process. Currently, MATS policy is that each project proposed through the STUL funding process will be reviewed and prioritized based on the following factors:

- 
1. Safety,
  2. Condition (PASER),
  3. Economic Vitality/Congestion Relief,
  4. Traffic Volume/Functional Classification,
  5. Non-Motorized Capabilities,
  6. Local Priority/Funding Support.

The 2020-2023 TIP is the first to be developed subsequent to official federal guidance regarding performance based planning, and the initial sets of targets being released. Following these developments, MATS has supported the targets promulgated by MDOT, and utilized performance measures in the planning process. To that end, MATS has analyzed the projects programmed for this TIP to review their linkage with recent compliance requirements.

Following is a listing of all projects programmed for the FY 2020–2023 TIP, presented in a simplified manner by project category. It should be noted that the funding in these categories can rise and fall in any given year due to varying levels of grants and discretionary funds awarded. For example, local agencies apply for funds for bridge, transit, safety, system performance, and non-motorized programs which are competitive on a statewide level. These annual grants would then be added to the amounts in the categories shown in the table.

Project Category	Projects Programmed	Impact on Condition
<b>Safety / Non-Motorized</b>  \$4,248,424	US-10 - WB: MATS MPO Study Area W Freeland Rd: Freeland Rd At River Rd intersection US-127BR: none, None M-47 S: M-47 from Midland Rd to US-10 M-84 N: Signing Upgrade M-84 N: Signing Upgrade US-10BR: Bay Region Midland MPO US-10 E: US-10 Between Bay City Rd Interchange and Flajole Rd, Bay County Bay Regionwide Retroreflectivity Readings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: Midland Area Bay Regionwide Longitudinal Pavement Markings: Midland Area Bay Regionwide Special Pavement Markings: Midland Area Bay Regionwide Special Pavement Markings: Midland Area Bay Regionwide Special Pavement Markings: Midland Area Bay Regionwide Pvmr Mrkg Retro Readings: All of MATS MPO M-20: Non-Freeway Multiple Routes, Midland County: Multiple Routes, Various Locations, Midland County Freeland Road: Freeland Road at Sasse Road, Midland County Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO Bay Regionwide Retroreflectivity Readings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Longitudinal Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO Bay Regionwide Special Pavement Markings: All of MATS MPO	Reduce potential for motor vehicle crashes and non-motorized crashes, injuries and fatalities
<b>Pavement Preservation</b>  \$16,190,285	Freeland Road: Five Mile Road to Homer Road Freeland Road: Five Mile Road to Homer Road Poseyville Rd: Gordonville Road to Midland City Limits 3rd Street: Railway Street to Coleman city limits County Wide: Various locations, Midland County Road Commission County Wide: Various locations, Midland County Road Commission Dickenson: Coleman Road to Isabella County Line Dickenson: Coleman Road to Isabella County Line M-20: West of Saginaw Road to US-10 M-20: M-30 to east of Currie Parkway M-20: M-30 to east of Currie Parkway N Meridian Rd: Meridian Road over Pine River, Str# 6950, Midland County W Freeland Rd: Orr Rd to N. Gleaner Rd W Freeland Rd: Orr Rd to N. Gleaner Rd S Garfield Rd: Hotchkis Rd to US-10 Countywide: Various Locations, Midland County Countywide: Various Locations, Midland County Countywide: Various locations, Midland County Countywide: Various locations, Midland County County Wide: Various Locations, Midland County County Wide: Various Locations, Midland County W Midland Rd: Garfield Road to Francis Street N Jefferson Ave: Wheeler Road to Wackerly Road W Freeland Rd: N. Gleaner Road to River Road W Midland Rd: Carter Road to Flajole Road	Improve surface condition and IRI, eliminate issues with cracking, rutting and faulting
<b>Transit</b>  \$21,357,212	Operating Assistance: CCM Operating Assistance: DART Additional Transit Vehicles Bus Replacements	Reduce percentage of vehicles, equipment and facilities that are past useful life benchmark
<b>Bridges</b>  \$3,486,985	N Coleman Rd: Coleman Road over Chippewa River, Str# 6943 US-127: B05-3 & 4 of 56044 (US-10 EB/WB over Sturgeon Creek), B05-3 & 4 of 56044 (US-10 EB/WB over Sturgeon Creek)	Reduce number of structurally deficient and functionally obsolete bridges
<b>System Performance / Congestion</b>  \$2,712,362	I-75 S: US-10 at M-47 Eastman Ave: Commerce Drive to Monroe Road Eastman Ave: Commerce Drive to Monroe Road W Sugnet Rd: Main Street to Northwood Drive	Network improvements and system connectivity enhancements

Going forward, each new TIP will demonstrate the amount of investment being made towards each performance goal on either a per-project basis or more broadly across multiple rule areas. As can be seen in the table above, MATS has begun to analyze progress toward the performance goals and has implemented this analysis utilizing the project selection process. Each programmed project has thus been evaluated to determine to which performance area it may contribute. Furthermore, ongoing utilization of this 2020-2023 TIP will place continued emphasis on meeting the targets and using this performance-driven project selection process. MATS staff will also continue to work with other MPOs on best practices for performance-based programming of projects and analysis of performance measure data.

In addition, through the LRTP and TIP, MATS will endeavor to broadly correlate future funding projections with the various projects proposed and the applicable performance rule areas. Goals were initially established in the recent LRTP (Towards 2045), and evaluation of progress towards them will begin with this TIP amendment. Finally, MATS will also continue to gather selected primary data for the development of performance measures such as pavement and bridge condition, and secondary data from a variety of sources (such as MDOT) for traffic volumes, traffic flow, level of congestion, and safety.

### Targets & Evaluation

The key decision to be made by the MPO once State targets have been released is whether to adopt those targets, either on a per-measure basis or for an entire performance area, or to develop targets that are specific to the MPO planning area. This initial process is based on three variables.

- 
1. Availability of data, i.e. can data be gathered and meaningfully used at the appropriate geographic scale that represents the planning area, even if assembled from smaller geographic areas.
  2. Availability of manpower, i.e. does the MPO have the staff available and capable in the appropriate time frame to create the targets.
  3. Local distinctiveness i.e. is there sufficient differentiation between data quintiles, trend lines, and projected results for the planning area versus the State as a whole.

In addition, an MPO should coordinate on target development with MDOT to ensure consistency. MPOs, therefore, have the flexibility to establish targets using the methodology and data sets they determine are most appropriate.

Based on this assessment, MATS Policy Committee came to specific conclusions for each of the performance areas required thus far and will continue to use this approach as additional performance rules come into effect.

## Transit Asset Management State of Good Repair Targets

In the June 2017 initial cycle of target setting, targets were developed with the cooperation of both DART and CCM. DART targets were self-derived (as required for each urban transit provider), whereas MDOT derived group and individual targets for rural transit providers and thus CCM. MATS group targets were essentially an average between the DART targets and the CCM targets in the applicable target areas. These initial targets were set and approved by MATS' Policy Committee on July 11, 2017. State of Good Repair targets are updated annually.

Table 10

<b>MATS State of Good Repair Targets 2017</b>	<b>Asset Class</b>	<b>2017 Target</b>
<b>Rolling Stock:</b>	Revenue Vehicles: small bus and van class	Not more than 10% will meet or exceed the FTA ULB (For each transit agency: not more than 25% will meet or exceed)
	Revenue Vehicles: large bus class	Not Applicable, not owned by CCM or DART
<b>Infrastructure</b>	Only rail fixed-guideway, track, signals and systems	Not Applicable, not owned by CCM or DART
<b>Equipment</b>	Over \$50,000; non-revenue support service and maintenance vehicles	100% may meet or exceed the FTA ULB
<b>Facilities</b>	All, including administrative offices	100% may be below a 3.0 rating on the FTA TERM scale

<b>MATS State of Good Repair Targets 2018</b>	<b>Asset Class</b>	<b>2018 Target</b>
<b>Rolling Stock:</b>	Revenue Vehicles: small bus and van class	Not more than 10% will meet or exceed the FTA ULB (For each transit agency: not more than 25% will meet or exceed)
	Revenue Vehicles: large bus class	Not Applicable, not owned by CCM or DART
<b>Infrastructure</b>	Only rail fixed-guideway, track, signals and systems	Not Applicable, not owned by CCM or DART
<b>Equipment</b>	Over \$50,000; non-revenue support service and maintenance vehicles	100% may meet or exceed the FTA ULB
<b>Facilities</b>	All, including administrative offices	100% may be below a 3.0 rating on the FTA TERM scale

<b>MATS State of Good Repair Targets 2019</b>	<b>Asset Class</b>	<b>2019 Target</b>
<b>Rolling Stock:</b>	Revenue Vehicles: small bus and van class	Not more than 10% will meet or exceed the FTA ULB (For each transit agency: not more than 25% will meet or exceed)
	Revenue Vehicles: large bus class	Not Applicable, not owned by CCM or DART
<b>Infrastructure</b>	Only rail fixed-guideway, track, signals and systems	Not Applicable, not owned by CCM or DART
<b>Equipment</b>	Over \$50,000; non-revenue support service and maintenance vehicles	100% may meet or exceed the FTA ULB
<b>Facilities</b>	All, including administrative offices	5% may be below a 3.0 rating on the FTA TERM scale

Note: Current and historical targets are maintained on file at MATS, and on our website at [www.midlandmpo.org](http://www.midlandmpo.org).

**Transit Performance Measures Role in the TIP Process**

As can be seen from the table above, the group targets set by MATS for the current year are essentially the same as previous year targets, other than the lower facilities target. There has been no significant change in the active rolling stock for either DART or CCM, and the condition of both equipment and facilities is unchanged. Both DART and CCM currently meet the targets for all 4 measures. This shows that MDOT targets are being supported by these systems in the MATS area.

During deliberations regarding future transit efforts, MATS will refer to, and measure progress towards each of these performance measure targets. This will be done via the process utilized to determine the group targets, and ongoing coordination and consultation. These performance measures and their associated targets will be taken into account both by the individual transit systems, and by MATS as future efforts are evaluated.

**Transit Asset Management Plan**

Federal regulations require urban transit systems to prepare Transit Asset Management Plans, and to present these documents to the local MPO. In our case, DART has transmitted its draft Transit Asset Management Plan to MATS, where it will be kept on file, and utilized when making project selections for future TIP documents. It can be found on the MATS website at [www.midlandmpo.org](http://www.midlandmpo.org).

## Safety Performance Targets

For calendar year 2018 and 2019 target-setting, MATS Policy Committee elected to support the MDOT Safety Performance Measure targets. To support these targets, MATS will continue ongoing coordination with the State and other safety stakeholders to address areas of concern, and agreeing to plan and program projects that contribute toward meeting the State safety targets.

Table 11

<b>Safety Performance Measure</b>	<b>Calendar Year 2018 State Safety Target</b>	<b>Baseline Through Calendar Year 2016</b>
Fatalities	1,003.20	963
Fatality Rate	1.02	1
Serious Injuries	5,136.40	5,273.40
Serious Injury Rate	5.23	5.47
Nonmotorized Fatalities and Serious Injuries	743.6	721.8

<b>Safety Performance Measure</b>	<b>Calendar Year 2019 State Safety Target</b>	<b>Baseline Through Calendar Year 2017</b>
Fatalities	1,023.20	981.4
Fatality Rate	1.02	1
Serious Injuries	5,406.80	5,355
Serious Injury Rate	5.41	5.47
Nonmotorized Fatalities and Serious Injuries	759.8	743.6

Note: Current and historical targets are maintained on file at MATS, and on our website at [www.midlandmpo.org](http://www.midlandmpo.org).

## **Safety Performance Measures Role in the TIP Process**

As the previous section pointed out, MATS takes safety into account when preparing the TIP project list via the policy utilized to assist in the selection of projects. While all projects inevitably have some safety component or benefit, numerous projects such as Eastman Road at Schaffer Road, Gordonville Road, Poseyville Road, US-10, M-47, and numerous region-wide MDOT projects have all explicitly focused on safety or been funded with safety targeted resources. Another instance is for Non-Motorized projects currently listed in the Non-Motorized Plan, as safety and compliance with the American Disabilities Act were also considered during the project evaluation process. This includes factoring in the project's potential to eliminate conflict points between vehicles and the various forms of non-motorized travel. Such projects should minimize the potential for crashes, injuries, and fatalities as well.

In addition to this, the East Michigan Council of Governments Regional Safety Data Plan presents key emphasis areas and systematic approaches that can be utilized by local agencies as they apply for safety-specific funding for identified projects. This enables MATS to continue to focus on the priority emphasis areas identified in the safety plan, such as intersection, lane departure, and pedestrian and bicycle safety. Therefore, MATS is continuing to support MDOT targets through a variety of methods.

Furthermore, the MPO will continue to use its Project Prioritization Policy document as well as the collaborative process for ranking and selecting non-motorized projects to incorporate safety targets as well as the remaining performance measures in the project selection process as part of the development of this FY2020-2023 TIP.

## **Pavement Performance/Bridge Condition/Travel Time Reliability Targets**

For calendar year 2019 target-setting (i.e. 2-Year and 4-Year reporting cycle), MATS Policy Committee elected to support the MDOT targets for the areas of Pavement Performance, Bridge Condition, and Travel Time Reliability. These targets are shown below in Table 5. To support these targets, MATS will continue ongoing coordination with the State and other safety stakeholders to address areas of concern, and agreeing to plan and program projects that contribute toward meeting these State targets.

Table 12

Performance Area	Measures	Baseline (Calendar Year 2017)	2-Year	4-Year
Bridge	% NHS Deck Area in Good Condition;	32.7%	27.2%	26.2%
	% NHS Deck Area in Poor Condition	9.8%	7.2%	7.0%
Pavement	% of Interstate Pavement in Good Condition	56.8%	N/A	47.8%
	% of Interstate Pavement in Poor Condition	5.2%	N/A	10.0%
	% of Non-Interstate NHS in Good Condition	49.7%	46.7%	43.7%
	% of Non-Interstate NHS in Poor Condition	18.6%	21.6%	24.6%
Reliability	Interstate Travel Time Reliability Level	85.1%	75.0%	75.0%
	Non-Interstate Travel Time Reliability Level,	85.8%	N/A	70.0%
	Freight Reliability Measure on the Interstate	1.38	1.75	1.75

Note: Current and historical targets are maintained on file at MATS, and on our website at [www.midlandmpo.org](http://www.midlandmpo.org).

### **Pavement Performance/Bridge Condition/Travel Time Reliability Performance Measures Role in the TIP Process**

As the previous section pointed out, MATS takes these targets into account when preparing the TIP project list via the policy utilized to assist in the selection of projects. Through annual PASER surveys, MATS maintains a close partnership with local implementing agencies with regard to monitoring pavement performance. In addition, bridge preservation is an important consideration for the MATS area. There have been numerous bridge projects in our area, such as the M-20 bridge replacement project, which have resulted in an overall improvement in bridge condition in the MATS region.

Furthermore, the MPO will continue to use its Project Prioritization Policy document as well as the collaborative process for ranking and selecting non-motorized projects to incorporate safety targets as well as the remaining performance measures in the project selection process as part of the development of this FY2020-2023 TIP.

## FY 2020-2023 Transportation Improvement Program

# *APPENDIX*

### Midland Area Transportation Study

220 W Ellsworth Street, Suite 326

Midland, Michigan 48640

Phone: (989) 832-6333

info@midlandmpo.com

[www.midlandmpo.org](http://www.midlandmpo.org)

## Fiscal Constraint Table - MATS FY 2020-2023 TIP

	2020						2021						2022						2023						
	Estimated Federal Revenue	Estimated Total Revenue	Federal Commitment	State Commitment	Local Commitment	Total Proposed Commitments	Estimated Federal Revenue	Estimated Total Revenue	Federal Commitment	State Commitment	Local Commitment	Total Proposed Commitments	Estimated Federal Revenue	Estimated Total Revenue	Federal Commitment	State Commitment	Local Commitment	Total Proposed Commitments	Estimated Federal Revenue	Estimated Total Revenue	Federal Commitment	State Commitment	Local Commitment	Total Proposed Commitments	
<b>Highway Program</b>																									
MDOT - Road - Capital Preventive Maintenance	\$1,232,094	\$1,505,308	\$1,232,094	\$273,214	\$0	\$1,505,308	\$1,255,000	\$1,535,000	\$0	\$0	\$0	\$0	\$1,280,000	\$1,565,000	\$0	\$0	\$0	\$0	\$1,305,000	\$1,597,000	\$0	\$0	\$0	\$0	
MDOT - Road - Rehabilitation and Reconstruction	\$1,109,318	\$1,355,306	\$1,109,318	\$233,258	\$12,730	\$1,355,306	\$1,131,000	\$1,382,000	\$0	\$0	\$0	\$0	\$1,153,000	\$1,409,000	\$245,550	\$51,632	\$2,818	\$300,000	\$1,176,000	\$1,437,000	\$0	\$0	\$0	\$0	
MDOT - Traffic and Safety	\$1,871,650	\$2,051,028	\$1,871,650	\$179,378	\$0	\$2,051,028	\$1,000,000	\$1,200,000	\$442,373	\$23,131	\$0	\$465,504	\$1,000,000	\$1,200,000	\$258,181	\$23,131	\$0	\$281,312	\$1,000,000	\$1,200,000	\$233,651	\$25,961	\$0	\$259,612	
MDOT - Bridge	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
MDOT - ITS Applications	\$138,170	\$168,500	\$138,170	\$30,330	\$0	\$168,500	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
<b>Sub-Total MDOT</b>	<b>\$4,351,232</b>	<b>\$5,080,142</b>	<b>\$4,351,232</b>	<b>\$716,180</b>	<b>\$12,730</b>	<b>\$5,080,142</b>	<b>\$3,386,000</b>	<b>\$4,117,000</b>	<b>\$442,373</b>	<b>\$23,131</b>	<b>\$0</b>	<b>\$465,504</b>	<b>\$3,433,000</b>	<b>\$4,174,000</b>	<b>\$503,731</b>	<b>\$74,763</b>	<b>\$2,818</b>	<b>\$581,312</b>	<b>\$3,481,000</b>	<b>\$4,234,000</b>	<b>\$233,651</b>	<b>\$25,961</b>	<b>\$0</b>	<b>\$259,612</b>	
Local STP (Urban - STUL, HIP)	\$1,233,440	\$1,732,612	\$1,233,440	\$0	\$499,172	\$1,732,612	\$944,000	\$1,280,000	\$944,000	\$0	\$336,000	\$1,280,000	\$963,000	\$1,839,000	\$963,000	\$0	\$876,000	\$1,839,000	\$982,000	\$3,150,000	\$982,000	\$0	\$2,168,000	\$3,150,000	
Local STP (Rural - STL)	\$1,137,000	\$2,156,612	\$1,137,000	\$0	\$1,019,612	\$2,156,612	\$581,000	\$731,612	\$581,000	\$0	\$150,612	\$731,612	\$592,000	\$816,212	\$592,000	\$0	\$224,212	\$816,212	\$1,257,800	\$1,676,612	\$1,257,800	\$0	\$418,812	\$1,676,612	
TEDF Category D	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$73,388	\$0	\$93,388	\$0	\$93,388	\$0	\$93,388	
Local STP flexed to Transit (5311)	\$56,208	\$70,260	\$56,208	\$14,052	\$0	\$70,260	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
Local Bridge	\$2,622,400	\$3,278,000	\$2,622,400	\$0	\$655,600	\$3,278,000	\$1,396,800	\$1,746,000	\$1,396,800	\$261,900	\$87,300	\$1,746,000	\$1,500,000	\$1,900,000	\$0	\$0	\$0	\$0	\$1,500,000	\$1,900,000	\$0	\$0	\$0	\$0	
Local CMAQ	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
Local Safety	\$631,996	\$702,218	\$631,996	\$0	\$70,222	\$702,218	\$500,000	\$620,000	\$0	\$0	\$0	\$0	\$500,000	\$620,000	\$0	\$0	\$0	\$0	\$550,000	\$670,000	\$0	\$0	\$0	\$0	
<b>Sub-Total Local</b>	<b>\$5,681,044</b>	<b>\$8,013,090</b>	<b>\$5,681,044</b>	<b>\$87,440</b>	<b>\$2,244,606</b>	<b>\$8,013,090</b>	<b>\$3,421,800</b>	<b>\$4,451,000</b>	<b>\$2,921,800</b>	<b>\$335,288</b>	<b>\$573,912</b>	<b>\$3,831,000</b>	<b>\$3,555,000</b>	<b>\$5,248,600</b>	<b>\$1,555,000</b>	<b>\$73,388</b>	<b>\$1,100,212</b>	<b>\$2,728,600</b>	<b>\$4,289,800</b>	<b>\$7,490,000</b>	<b>\$2,239,800</b>	<b>\$93,388</b>	<b>\$2,586,812</b>	<b>\$4,920,000</b>	
<b>Total Highway</b>	<b>\$10,032,276</b>	<b>\$13,093,232</b>	<b>\$10,032,276</b>	<b>\$803,620</b>	<b>\$2,257,336</b>	<b>\$13,093,232</b>	<b>\$6,807,800</b>	<b>\$8,568,000</b>	<b>\$3,364,173</b>	<b>\$358,419</b>	<b>\$573,912</b>	<b>\$4,296,504</b>	<b>\$6,988,000</b>	<b>\$9,422,600</b>	<b>\$2,058,731</b>	<b>\$148,151</b>	<b>\$1,103,030</b>	<b>\$3,309,912</b>	<b>\$7,770,800</b>	<b>\$11,724,000</b>	<b>\$2,473,451</b>	<b>\$119,349</b>	<b>\$2,586,812</b>	<b>\$5,179,612</b>	
<b>Transit Program</b>																									
CTF - Comprehensive Transit Fund	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	\$0	\$1,062,000	
Section 5307 - Urban Transit (UZA Formula)	\$800,000	\$2,515,000	\$758,099	\$913,397	\$658,099	\$2,329,595	\$816,000	\$2,552,000	\$758,099	\$913,397	\$658,099	\$2,329,595	\$832,000	\$2,589,000	\$758,099	\$993,077	\$339,379	\$2,090,555	\$849,000	\$2,628,000	\$758,099	\$953,297	\$498,499	\$2,209,895	
Section 5310 - Elderly & Disabled	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	
Section 5311 - Rural Transit (Non-UZA)	\$508,096	\$2,782,626	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	\$518,258	\$2,838,279	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	\$528,623	\$2,895,045	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	\$539,195	\$2,952,946	\$508,096	\$1,074,530	\$1,200,000	\$2,782,626	
Section 5339 - Bus and Bus Facilities	\$239,362	\$299,202	\$239,362	\$59,840	\$0	\$299,202	\$244,000	\$304,000	\$239,362	\$59,840	\$0	\$299,202	\$249,000	\$311,000	\$239,362	\$59,840	\$0	\$299,202	\$254,000	\$318,000	\$239,362	\$59,840	\$0	\$299,202	
<b>Total Transit</b>	<b>\$1,547,458</b>	<b>\$6,658,828</b>	<b>\$1,505,557</b>	<b>\$3,109,767</b>	<b>\$1,858,099</b>	<b>\$6,473,423</b>	<b>\$1,578,258</b>	<b>\$6,756,279</b>	<b>\$1,505,557</b>	<b>\$3,109,767</b>	<b>\$1,858,099</b>	<b>\$6,473,423</b>	<b>\$1,609,623</b>	<b>\$6,857,045</b>	<b>\$1,505,557</b>	<b>\$3,189,447</b>	<b>\$1,539,379</b>	<b>\$6,234,383</b>	<b>\$1,642,195</b>	<b>\$6,960,946</b>	<b>\$1,505,557</b>	<b>\$3,149,667</b>	<b>\$1,698,499</b>	<b>\$6,353,723</b>	
<b>Grand Total</b>	<b>\$11,579,734</b>	<b>\$19,752,060</b>	<b>\$11,537,833</b>	<b>\$3,913,387</b>	<b>\$4,115,435</b>	<b>\$19,566,655</b>	<b>\$8,386,058</b>	<b>\$15,324,279</b>	<b>\$4,869,730</b>	<b>\$3,468,186</b>	<b>\$2,432,011</b>	<b>\$10,769,927</b>	<b>\$8,597,623</b>	<b>\$16,279,645</b>	<b>\$3,564,288</b>	<b>\$3,337,598</b>	<b>\$2,642,409</b>	<b>\$9,544,295</b>	<b>\$9,412,995</b>	<b>\$18,684,946</b>	<b>\$3,979,008</b>	<b>\$3,269,016</b>	<b>\$4,285,311</b>	<b>\$11,533,335</b>	

# Glossary of Funding Source Abbreviations

## Fund Sources

BHI	Bridge Rehabilitation - Prior 1991 - Interstate	Federal
BHN	Bridge Rehabilitation - National Highway System (NHS)	Federal
BHO	Bridge Rehabilitation - Not Classified, Off System	Federal
BHT	Bridge Rehabilitation - Surface Transportation Program (STP)	Federal
BIO8	Build Michigan FY08	Federal
BO	Bridge Not Classified Off System	Federal
BOWD	Business Opportunity & Workforce Development Center	Federal
BRI	Bridge Replacement - Pre 1991 Interstate	Federal
BRN	Bridge Replacement - National Highway System (NHS)	Federal
BRO	Bridge Replacement - Not Classified, Off System	Federal
BRT	Bridge Replacement - Surface Transportation Program (STP)	Federal
CBCD	Corridor & Border Crossing Discretionary	Federal
CBIP	Coordinated Border Infrastructure Program - SAFETEA-LU	Federal
CM	Congestion Mitigation & Air Quality	Federal
CMG	Congestion Mitigation & Air Quality - 100% Federal	Federal
DIG	ISTEA Demonstration 100% Federal on Interstate	Federal
DOG	ISTEA Demonstration 100% Federal Not Classified	Federal
DPN	ISTEA Demonstration 80% Federal on NHS	Federal
DPO	ISTEA Demonstration 80% Federal Not Classified	Federal
DPS	ISTEA Demonstration 80% Federal on STP	Federal
DPSA	Demonstration Project Section 112 Division A	Federal
DST	Donor Bonus Surface Transportation	Federal
DSTU	Donor Bonus Surface Transportation - (Urban > 200,000)	Federal
DSTT	Donor Bonus Surface Transportation - Rural - Trunkline	Federal
EBSL	Equity Bonus - SAFETEA-LU	Federal
EDAF	Economic Development - Category A with Federal Aid	Federal
EDCF	Economic Development - Category C with Federal Aid	Federal
EDDF	Economic Development - Category D with Federal Aid	Federal
EDFF	Economic Development - Category F with Federal Aid	Federal
ER	Emergency Relief	Federal
FBD	Ferry Boat & Terminal Discretionary	Federal
FFH	Federal Forest Highway	Federal
FLH	Federal Land Highways - Public Lands	Federal
HBOA	Highway Bridge Obligation Authority	Federal
HPP	High Priority Projects (Demo)	Federal
HPSL	High Priority Projects - SAFETEA-LU	Federal
HRRR	High Risk Rural Roads - SAFETEA-LU	Federal
HSG	High Speed Rail Crossings - 100% Federal	Federal
HSIP	Highway Safety Improvement Program - SAFETEA-LU	Federal
IM	Interstate Maintenance - No Added Lanes	Federal
IMD	Interstate Maintenance Discretionary	Federal
IMG	Interstate Maintenance - Safety - 100% Federal	Federal
ITS	Intelligent Transportation Systems	Federal
JST	85% Minimum Floor Surface Transportation	Federal
JSTU	85% Minimum Floor Surface Transportation (Urban Area > 200,000)	Federal
LTA	Local Technical Assistance Program	Federal
MG	Minimum Guarantee	Federal
NCII	National Corridor Infrastructure Improvement - SAFETEA-LU	Federal
NH	National Highway System	Federal

NHG	National Highway System - Safety - 100% Federal	Federal
NHI	National Highway Funds on I (Does not Qualify for I)	Federal
NHIM	National Highway Funds on I (Qualifies for IM)	Federal
NHS	National Highway System - MDOT Safety Program	Federal
NRT	National Recreational Trails	Federal
OFHWA	Other FHWA Funds (Specify source in Comments)	Federal
PNRS	Projects of National and Regional Significance	Federal
RP	Research Project	Federal
RPH	American Recovery and Reinvestment Act	Federal
SBD	Scenic Byways - Discretionary	Federal
SIB	State Infrastructure Bank	Federal
SLG	Surface Transportation Safety	Federal
SRHG	Surface Transportation Safety Highway Crossing Hazard Elimination 100%	Federal
SRPG	Surface Transportation Safety Highway Crossing Protection Devices 100%	Federal
SRSE	Safe Routes to School - Either - SAFETEA-LU	Federal
SRSI	Safe Routes to School - Infrastructure - SAFETEA-LU	Federal
SRSN	Safe Routes to School - Non-infrastructure - SAFETEA-LU	Federal
SST	Supportive Services Training	Federal
ST	Surface Transportation Program (STP) - Any Area	Federal
STE	STP - Enhancement	Federal
STG	STP - Safety - 100% Federal for ST	Federal
STH	STP - Safety - Hazard Elimination	Federal
STI	STP - Interstate (90%)	Federal
STL	STP - Local	Federal
STLG	Surface Transportation Safety 100% Fed for STL-Items	Federal
STR	STP - Safety - Rail-Highway Crossing Protection	Federal
STRG	STP - Safety Rail-Highway & Incentive Payment - 100% Federal	Federal
STRH	Surface Transportation Safety Highway Crossing Hazard Elimination	Federal
STRP	Surface Transportation Safety Highway Crossing Protection Devices	Federal
STS	STP - Any Area- MDOT Safety Program	Federal
STT	STP - Trunkline	Federal
STU	STP - Urban Areas > 200,000 Population	Federal
STUG	STP - Urban Areas < 200,000 Population 100%	Federal
STUL	STP - Urban Areas < 200,000 Population	Federal
STUT	STP - Urban Areas < 200,000 Population - Trunkline	Federal
SUG	STP - Safety - 100% Federal for STU	Federal
SUL	Surface Transportation Urban Areas < 200k Population	Federal
SULG	Surface Transportation Urban Areas < 200k Population 100%	Federal
TA	Transportation Alternatives Program Flex	Federal
TAL	Transportation Alternatives Rural	Federal
TAU	Transportation Alternatives Urban Areas > 200K Population	Federal
TAUL	Transportation Alternatives Urban Areas < 200K Population	Federal
TBR	Timber Bridge Fund	Federal
TCP	Tax Compliance Program	Federal
TCSP	Transportation, Community and System Preservation	Federal
TG	Transportation Grant (100% Fed)	Federal
TGR2	TIGER II Discretionary Grant	Federal
TGR3	TIGER III Discretionary Grant	Federal
TIP	Transportation Improvements Projects SAFETEA-LU	Federal
TPFD	Truck Parking Facilities Discretionary	Federal

3038	Section 3038 - Over the Road Bus Program	Transit
3045	Section 3045 - National Fuel Cell Technology Development Program	Transit
5303	Section 5303 - Metropolitan Transportation Planning	Transit
5304	Section 5304 - Statewide Transportation Planning	Transit
5305	Section 5305 - Metropolitan and Statewide Planning	Transit
5307	Section 5307 - UZA Formula	Transit
5308	Section 5308 - Clean Fuels Program	Transit
5309	Section 5309 - Fixed Guide way Capital Investment Grant	Transit
5310	Section 5310 - Enhanced Mobility of Seniors and Individuals with Disabilities	Transit
5311	Section 5311 - Non-UZA	Transit
5312	Section 5312 - Research, Development, Demonstration, and Deployment	Transit
5313	Section 5313 - Transit Cooperative Research Program	Transit
5314	Section 5314 - Technical Assistance and Standards	Transit
5316	Section 5316 - Transit - Section 5316 - Job Access/Reverse Commute	Transit
5317	Section 5317 - Transit - Section 5317 - New Freedom Initiative	Transit
5320	Section 5320 - Alternative Transportation in Parks and Public Lands	Transit
5322	Section 5322 - Human Resources and Training	Transit
5324	Section 5324 - Emergency Relief	Transit
5326	Section 5326 - Asset Management Provisions	Transit
5329	Section 5329 - Safety	Transit
5337	Section 5337 - State of Good Repair Grants	Transit
5339	Section 5339 - Bus and Bus Facilities	Transit
5505	Section 5505 - University Transportation Centers Program	Transit
BI04	Build Michigan Bond Issue 2004	State
BI06	Build Michigan Bond Issue 2006	State
BI08	Build Michigan Bond Issue 2008	State
BT01	Bond Trunkline Roads for First Issue	State
CTF	Comprehensive Transportation Fund	State
EDA	Economic Development - Category A	State
EDC	Economic Development - Category C	State
EDD	Economic Development - Category D	State
EDF	Economic Development - Category F	State
JT07	Jobs Today Bond Issue 2007 GARVEE (State AC for Federal GARVEE Bonds)	State
LFMP	Local Fund Match Program - 100% Local	State
M	State Funds - Michigan Betterment	State
MBS	Michigan Budget Stabilization	State
MBWB	Michigan Blue Water Bridge	State
MCS	State Funds - Critical Structures	State
MDA	Drainage Assessment	State
MER	Emergency Program	State
MIR	State Funds - Institutional Roads	State
MRR	Michigan Railroad	State
MRRF	Michigan Revolving Real Estate Fund	State
MS	Safety Program	State
MTB	Turn back Program	State
SIBG	100% State Infrastructure Bank	State
CITY	Local - City (Specify city in Comments)	Local
CNTY	Local - County (Specify county in Comments)	Local
OLF	Other Local Funds (Specify local fund source in Comments)	Local
PRVT	Private (Non-governmental)	Local
TRAL	Local - Transit Authority Funds (Specify transit authority in Comments)	Local
TWP	Local - Township (Specify township in Comments)	Local
VLG	Local - Village (Specify village in Comments)	Local

## MIDLAND AREA TRANSPORTATION STUDY

### MATS Resolution regarding FY 2020-2023 Transportation Improvement Program

**WHEREAS**, the Midland Area Transportation Study (MATS), as the state designated Metropolitan Planning Organization (MPO) for the Midland urbanized area, conducts the continuing, cooperative, and comprehensive planning process and also is a forum for transportation decision-making developed under federal guidelines for the purposes of urban transportation planning and conduct, and

**WHEREAS**, the Midland Area Transportation Study is responsible for the development of a Transportation Improvement Program (TIP) which is required by both the Federal Transit Administration and Federal Highway Administration, and

**WHEREAS**, the Midland Area Transportation Study *"FY 2020-2023 Transportation Improvement Program"* has been developed pursuant to Section 134 of title 23, United States Code, and

**WHEREAS**, the Midland Area Transportation Study *"FY 2020-2023 Transportation Improvement Program"* includes a "Financial Constraint Demonstration" that lists categories of anticipated revenue and estimated funding amounts for the identified projects each fiscal year, with the total of proposed commitments not exceeding the total estimated revenue in any category in any fiscal year, and thus is financially constrained, and

**WHEREAS**, the Midland Area Transportation Study *"FY 2020-2023 Transportation Improvement Program"* was developed with the opportunity for public input and comment;

**NOW THEREFORE BE IT RESOLVED**, it is the finding of the Midland Area Transportation Study that its *"FY 2020-2023 Transportation Improvement Program"* is consistent with local, state and federal planning policies and principles, and

**BE IT FURTHER RESOLVED**, that the Midland Area Transportation Study approves its *"FY 2020-2023 Transportation Improvement Program"*.

\_\_\_\_\_  
Brad Kaye, Chair  
Midland Area Transportation Study Policy Committee

DATE: \_\_\_\_\_

# METROPOLITAN TRANSPORTATION PLANNING PROCESS CERTIFICATION

(For Attainment Areas)

In accordance with 23 CFR 450.334, the Michigan Department of Transportation and the **Midland Area Transportation Study (MATS)**, the Metropolitan Planning Organization for *Midland*, Michigan urbanized area, hereby certify, as part of the STIP submittal, that the transportation planning process is addressing the major issues in the metropolitan planning area and is being conducted in accordance with all applicable requirements of:

- I. 49 U.S.C. 134, 49 U.S.C. 5303, and this subpart;
- II. Title VI of the Civil Rights Act of 1964, as amended (42 U.S.C. 2000d-1) and 49 CFR part 21;
- III. 49 U.S.C. 5332, prohibiting discrimination on the basis of race, color, creed, national origin, sex, or age in employment or business opportunity;
- IV. Section 1101(b) of the MAP-21 (Pub. L. 112-141) and 49 CFR part 26 regarding the involvement of disadvantaged business enterprises in USDOT funded projects;
- V. 23 CFR part 230, regarding the implementation of an equal employment opportunity program on Federal and Federal-aid highway construction contracts;
- VI. The provisions of the Americans with Disabilities Act of 1990 (42 U.S. C. 12101 *et seq.*) and 49 CFR parts 27, 37, and 38;
- VII. The Older Americans Act, as amended (42 U.S.C. 6101), prohibiting discrimination on the basis of age in programs or activities receiving Federal financial assistance;
- VIII. Section 324 of title 23 U.S.C. regarding the prohibition of discrimination based on gender; and
- IX. Section 504 of the Rehabilitation Act of 1973 (29 U.S.C. 794) and 49 CFR part 27 regarding discrimination against individuals with disabilities.

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*MPO Director*  
*Midland Area Transportation Study*

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Todd White, Director  
Bureau of Transportation Planning

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Date

