



Moving Ahead for Progress in the 21st Century Act means more robust transit asset management

The Moving Ahead for Progress in the 21st Century Act (MAP-21) required the Secretary of the United States Department of Transportation to develop rules to establish a system to monitor and manage public transportation assets to improve safety and increase reliability and performance, and to establish performance measures, and the Fixing America's Surface Transportation (FAST) Act reaffirmed this requirement. On July 26, 2016, Federal Transit Administration (FTA) published the Transit Asset Management (TAM) Final Rule. You may view the Final Rule at: <https://federalregister.gov/a/2016-16883>

Defining Transit Asset Management and State of Good Repair

The FTA defines *Transit Asset Management* as a business model that uses the condition of assets to guide the optimal prioritization of funding of transit priorities in order to keep our transit networks in a State of Good Repair (SGR). The purpose of the TAM is to help achieve and maintain a State of Good Repair for the nation's public transportation assets. *SGR* is defined as the condition in which a capital asset is able to operate at a full level of performance. A capital asset is in a state of good repair when the asset:

- Is able to perform the designed function
- Does not pose a known unacceptable safety risk
- Has recovered life cycle investments

Who is required to complete a Transit Asset Management Plan?

The TAM rule applies to all transit providers that are recipients or sub-recipients of federal assistance under 49 U.S.C. Chapter 53 that own, operate or manage transit capital assets used in the provision of public transportation.

A Tier I provider (see chart to the right) must develop its own TAM Plan. A Tier II provider may participate in a Group Plan or opt out and develop its own TAM Plan.

Performance Management Requirement

Asset performance is measured by asset class, which means a subgroup of capital assets within an asset category. The following table shows the distinction between what assets must be included in asset inventories and the assets for which transit providers must measure performance.

Assets: <i>Only those for which agency has direct capital responsibility</i>	Performance measures
Equipment Non-revenue support-service and maintenance vehicles	Percentage of vehicles met or exceeded Useful Life Benchmark
Rolling Stock Revenue vehicles by mode	Percentage of vehicles met or exceeded Useful Life Benchmark
Infrastructure Only rail fixed-guideway, track, signals and systems	Percentage of track segments with performance restrictions by class
Facilities Maintenance and administrative facilities; and passenger stations (buildings) and parking facilities	Percentage of assets with condition rating below 3.0 on FTA Transit Economic Requirement Model (TERM) Scale

Useful Life Benchmark (Washington state definition): The expected life cycle of a capital asset or acceptable period of use in service for a particular transit provider's operating environment.

Tier I	Tier II
Operates rail	Subrecipient of 5311 funds
OR	OR
≥ 101 vehicles across all fixed route modes	American Indian Tribe
OR	OR
≥ 101 vehicles in one non-fixed route mode	≤ 100 vehicles across all fixed route modes
	OR
	≤ 100 vehicles in one non-fixed route mode



Transit Asset Management Plan reporting requirements

Tier I providers must develop and carry out their own TAM plans. Tier II providers may develop their own plans or participate in a Group Plan, which is compiled by a Group Plan Sponsor (generally the State DOT or designated §5310 recipient).

Tier II §5307 sub-recipients are not required to be offered a Group Plan, but may participate in one if a Sponsor invites them. Each transit provider must designate an Accountable Executive to ensure that the necessary resources are available to carry out the TAM plan and the Transit Agency Safety Plan, regardless of whether it develops its own TAM Plan or participates in a Group Plan.

Transit Asset Management target setting

Targets should be set by each transit provider or TAM plan sponsor for each applicable asset class for the coming year. Initial targets must be set by January 1, 2017, and then every fiscal year thereafter. It is recognized that transit providers may not have complete data while setting initial targets. To the extent feasible, targets should be supported by data such as the most recent condition data and reasonable financial projections for the future, but the overall end goal is to be in a system-wide SGR.

Timeframes/Reporting

TAM Plans

A TAM plan must be updated in its entirety at least every 4 years, and it must cover a horizon period of at least 4 years. An initial TAM plan must be completed no later than 2 years after the Final Rule effective date, October 1, 2016.



National Transit Database

Each entity developing a TAM Plan will have to report annually to FTA's National Transit Database (NTD). This submission should include:

- 1) Projected targets for the next fiscal year,
- 2) Condition assessments and performance results; and,
- 3) A narrative report on changes in transit system conditions and the progress toward achieving previous performance targets.

What information should be included in a Transit Asset Management Plan?

It is expected that all assets used in the provision of public transit will be included in the TAM Plan asset inventory. This includes (with the exception of equipment) assets that are owned by a third party



or shared resources. The inventory must include all service vehicles, and any other owned equipment assets over \$50,000 in acquisition value. Agencies only need to include condition assessment for assets for which they have direct capital responsibility.

1. **Inventory of Capital Assets:** All capital assets that a transit provider owns, operates or manages, including those acquired without FTA funds
2. **Condition Assessment:** Rating of inventoried assets, collected at individual or asset class level
3. **Decision Support Tools:** Analytical processes used to make investment prioritization
4. **Investment Prioritization:** Ranked list of proposed projects and programs ordered by year of planned implementation
5. **Transit Asset Management and State of Good Repair Policy:** Transit providers' vision, defining objectives, roles and responsibilities
6. **Implementation Strategy:** Operational level process for implementing TAM Plan
7. **List of Key Annual Activities:** Actions needed to implement TAM Plan for each year of the Plan's four-year horizon
8. **Identification of Resources:** Staff time, funding, technology requirements, etc.
9. **Evaluation Plan:** How TAM activities will be monitored, evaluated, and updated to ensure continuous improvement

Tier I & II

Tier I only

Transit asset management in Washington state

Public transit is a vital part of Washington state's multimodal transportation system. It is a transportation option that relieves congestion, helps maximize capacity on roadways, improves air quality, reduces fuel consumption and connects people of all ages and abilities with their surrounding communities. Maintaining a transit fleet in a State of Good Repair is critical to providing a safe, reliable and comfortable environment for operators and the traveling public.

There are 31 transit agencies in the state that operate a statewide fleet of nearly 8,900 vehicles. Under the tier definition on page 1, 10 of the 31 transit providers in Washington state are Tier I providers, and the remaining 21 are Tier II providers. These agencies provided more than 229 million passenger trips annually, with more than 6.3 million of these providing trips for passengers with special transportation needs.

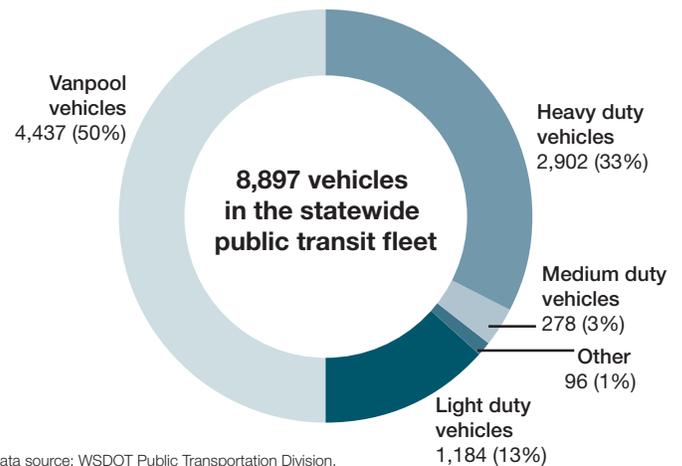
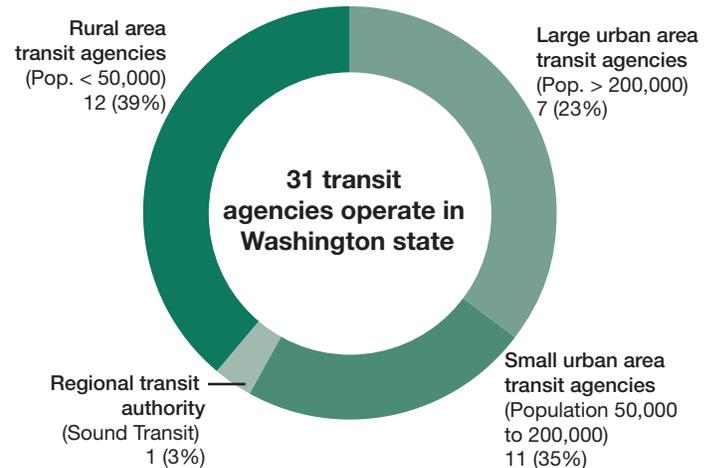
Current Transit Asset Management Plan reporting requirements in Washington

As a condition of receiving state funds, publicly owned transit agencies were required to submit an initial asset management plan to the Washington State Transportation Commission for certification in 2005. Agencies must recertify their plan every two years in the form of a letter, verifying that the agency is still following its plan as approved by the Transportation Commission. If there are changes, the agency must identify the changes in the recertification letter and submit the updated plan to WSDOT. The plan must inventory all transportation system assets and provide a preservation plan based on lowest life-cycle cost methodologies. These specific elements make up the framework for the transit asset management plan:

- A mission statement that includes the guiding principles for asset management.
- An inventory of the transit agency's assets that includes facilities, vehicles and equipment.
- A preventative maintenance program, that includes maintenance service based on manufacturer's recommendations and adapted to local conditions, as well as a system to identify, track, and report maintenance, repair and preservation activities and costs.
- A cost model that reflects the agency's policies and standards that result in the lowest maintenance costs over the life of an asset. The cost model is to ensure that an asset is maintained at an acceptable condition, maximizing safety and useful life of an asset.
- A Warranty Recovery System (claim) – the process to recover the cost of parts and labor covered under the warranty.

WSDOT requires all transit agencies to provide an annual asset inventory report, so WSDOT can report to the following entities:

- Office of Financial Management: Ensure that state/federally funded assets are being managed and operated appropriately as originally intended in the grant for the asset's minimum useful life period.
- Continued on page 4



Data source: WSDOT Public Transportation Division.

Reporting gaps – Current TAM requirements in Washington vs. FTA TAM requirements

TAMP reporting requirement	Currently required for TAM reporting in Washington
Inventory Report System	Yes
Lowest Life-Cycle Cost Methodologies	Yes
Graduated Preventative Maintenance Program	Yes
Maintenance Recordkeeping System	Yes
State of Good Repair	Under development
Performance Based Planning Process	Under development
Safety and Security	Under development



Transit asset management in Washington state (cont'd)

- State Auditor's Office: Satisfy that office's requirement that WSDOT ensures the physical condition of state/federally funded assets
- Federal Transit Administration: Satisfy federal minimum usage requirement (100 passenger service miles per week)

Asset Management Plan Recertification is due every other year in February. New transit systems are required to submit and have their plan certified by WSDOT prior to receiving state funding. In addition, an Asset Inventory Report is due annually to WSDOT by February. Asset Inventory Reports are also reported and included with the annual Transit Development Plan that is submitted to WSDOT under RCW 35.58.2795. Collectively, this information is provided to communicate transit systems six-year service plans as well as the status and state of their individual capital assets.

The information is used to assess the condition of the public transportation fleet in Washington state, and to seek and obtain additional grant funds to maintain the fleet in a state of good repair. The transit asset management information provided to WSDOT is used in reports to the Governor's Office, the Washington State Legislature and federal agencies.

In order to reduce duplication of effort, WSDOT adopted definitions that are already established and reported by the transit systems. The Federal Transit Administration requires that each state develop a Public Transportation Management System that includes an inventory of all transit systems assets in the state. All transit systems currently submit an asset inventory to WSDOT on an annual basis. For the purposes of this reporting, transit assets are defined as:

- All rolling stock vehicles
- Facilities with a replacement value of \$25,000 or more
- Other equipment with a replacement value of \$100,000 or greater

Available Data

Transit fleet (rolling stock) condition:

- Number and percent of transit vehicles beyond useful life by transit agency and statewide

Transit fleet (rolling stock) inventory:

- Number of vehicles (by size) in the fleet by transit agency and statewide

Facilities inventory:

- Inventory of transit facilities by type with a value of more than \$25,000

Transit providers must develop an inventory system to keep track of all capital investment, which includes all vehicles, equipment and facilities of their system.

Partnerships and information resources

WSDOT continues to coordinate with and support the Washington State Transit Association – Maintenance Committee to establish standards of maintenance and safety. This committee enables transit system maintenance managers and staff to exchange information, procedures and ideas to improve the safety, reliability, efficiency and effectiveness of operations, reduce costs of maintenance, improve customer and employee comfort, protect and maximize public investment and comply with state and federal asset management requirements.

Visit these websites to learn more about transit asset management and public transportation in Washington state:

- WSDOT Public Transportation Division:
www.wsdot.wa.gov/transit/
- Washington State Transit Association (WSTA):
www.watransit.com/Pages/default.aspx
- WSTA – Maintenance Committee:
www.watransit.com/Pages/Maintenance.aspx
- Washington State Transit Insurance Pool:
www.wstip.org/default.aspx

Purpose of reporting requirements

In July 2012, the Moving Ahead for Progress in the 21st Century Act (MAP-21) became law. Included in the law was a Declaration of Policy: "Performance management will transform the Federal-aid highway program and provide a means to the most efficient investment of Federal transportation funds..." The primary objectives of MAP-21 are to increase the transparency and accountability of states for their investment of federal taxpayer dollars into transportation infrastructure and services nationwide, and to ensure that states invest money in transportation projects that collectively make progress toward the achievement of national goals.

Americans with Disabilities Act (ADA) Information: This material can be made available in an alternate format by emailing the WSDOT Diversity/ADA Affairs team at wsdotada@wsdot.wa.gov or by calling toll free, 855-362-4ADA(4232). Persons who are deaf or hard of hearing may make a request by calling the Washington State Relay at 711.

Title VI Statement to Public: It is the Washington State Department of Transportation's (WSDOT) policy to assure that no person shall, on the grounds of race, color, national origin or sex, as provided by Title VI of the Civil Rights Act of 1964, be excluded from participation in, be denied the benefits of, or be otherwise discriminated against under any of its federally funded programs and activities. Any person who believes his/her Title VI protection has been violated, may file a complaint with WSDOT's Office of Equal Opportunity (OEO). For additional information regarding Title VI complaint procedures and/or information regarding our non-discrimination obligations, please contact OEO's Title VI Coordinator at (360) 705-7082.

For more information

For more information, contact Hiep Tran,
Transit Asset Management, WSDOT Public Transportation Division
TranH@wsdot.wa.gov or 360-705-7806