



COMMONWEALTH *of* VIRGINIA
Office of the
SECRETARY *of* TRANSPORTATION

Transportation Safety Performance 2024 Safety Measure Targets

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AND PUBLIC TRANSPORTATION

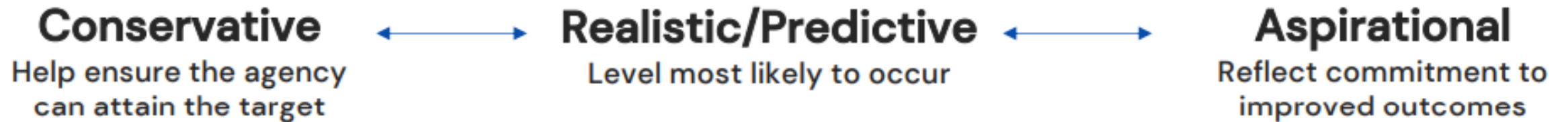


Federal Safety Target Setting

- Provide background on target setting requirements and Virginia's methods
- New 2024 federal target reporting requirements
- Proposed target setting approach
- Performance and proposed 2024 targets
- Aspirational safety performance goals
- Performance and proposed 2024 aspirational goals
- Next Steps

Background

Federal Target Setting Philosophy



National Academies of Sciences, Engineering, and Medicine 2022. *Guide to Effective Methods for Setting Transportation Performance Targets*. Washington, DC: The National Academies Press. <https://doi.org/10.17226/26764>.

Background

Safety Performance Management Requirements

- Code of Virginia 2.2-229 – CTB to establish performance targets for surface transportation
- Federal law establishes performance targets for Safety (5 measures)
- Safety targets must be set annually for the next calendar year
- VDOT and Department of Motor Vehicles' Highway Safety Office coordinate on 3 of the 5 performance measures
- DMV must report targets to NHTSA by June 30
- VDOT must report targets to FHWA by August 31

Background

Safety Performance Management Federal Measures

- **Number of fatalities*** - person involved died at scene or within 30 days
- **Number of serious injuries*** - suspected serious injury, typically taken to hospital
- **Rate of fatalities*** - per 100M vehicle miles traveled
- **Rate of serious injuries** - per 100M vehicles miles traveled
- **Number of non-motorized fatalities and serious injuries** - bicyclists and pedestrians

* Three Federal measures requiring coordination and consistency with the DMV Highway Safety Office (HSO)

Background

Virginia's Target Setting Method

- Since 2020 target setting, an analytical model with several factors has been adjusted annually to predict target year fatalities and serious injuries
- Factors include vehicle miles traveled; demographics and employment; weather; liquor sales; VDOT maintenance and operations programs spending and DMV behavioral programs spending
- Additionally, the expected annual reductions of SMART SCALE and VHSIP projects that were recently or soon to be completed are subtracted from the model predictions

New 2024 Federal Target Setting Requirements

- The 2021 BIL (IIJA) requires that States set 2024 safety targets that **demonstrate level or improved performance** and provide justification for each target that explains why the target is appropriate and evidence-based
- VDOT and DMV must submit federal targets that are the same for:
 - Fatalities
 - Fatality Rate (per 100M VMT)
 - Serious Injuries

Proposed Target Setting Approach

2022 Performance Comparison with 2024 Target Setting Method

- Estimated low- and high-range 2024 models to predict range of targets

Measure	2022 Actual Value	2024 Low-Range Prediction*	2024 High-Range Prediction*
Fatalities	1,005	1,015	1,068
Serious Injuries	7,137	7,177	7,250
Non-Motorized Fatalities + Serious Injuries	765	766	772
Fatality Rate**	1.217	1.199	1.261
Serious Injury Rate**	8.643	8.477	8.563

- Model predictions are slightly higher than 2022 values for fatalities (F), serious injuries (SI), and non-motorized F+SI
 - This increase conflicts with federal guidance to demonstrate level or improved performance

*Prediction incorporates expected reductions from project investments.

**Rate calculations assume a 1.3% growth in VMT per year.

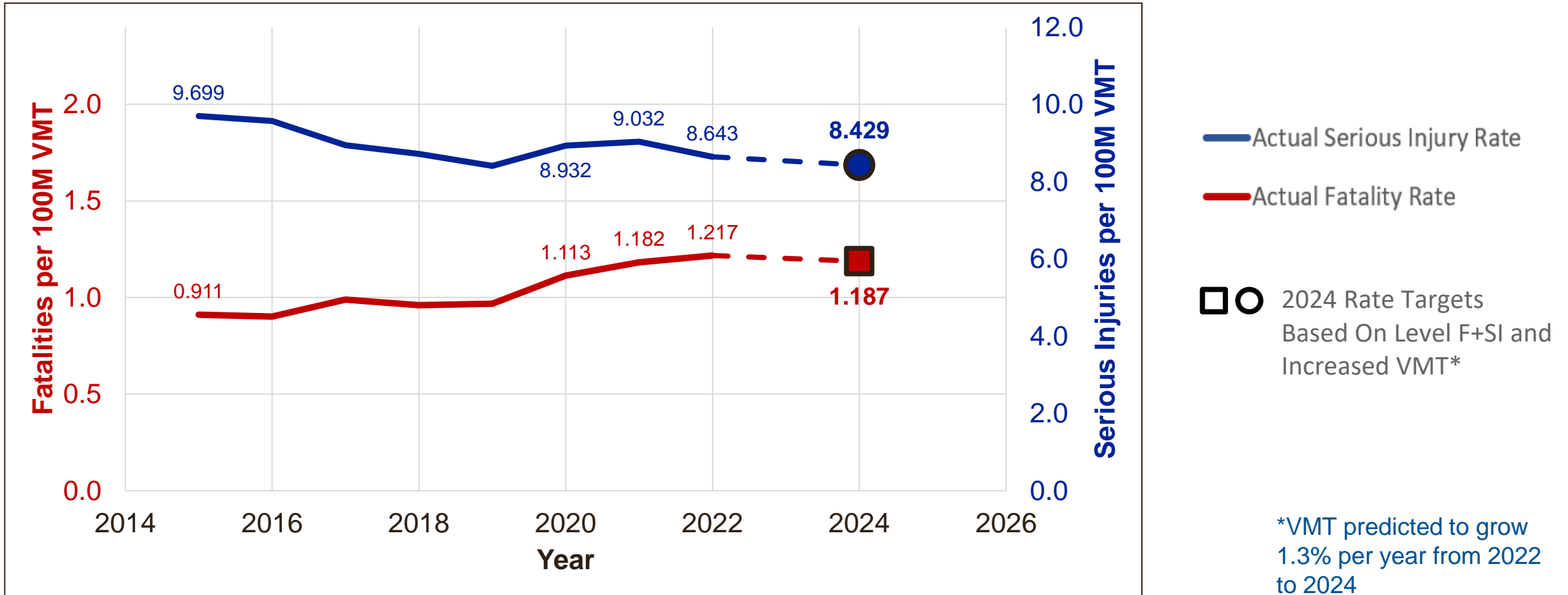
Proposed Target Setting Approach

- Set 2024 targets for fatalities (F), serious injuries (SI), and non-motorized F+SI equal to 2022 values
 - **Level** targets for the three “count” measures
- Calculate 2024 fatality and serious injury rates using the level “count” measures targets and predicted VMT growth
 - “Rate” measures decrease due to level “count” measures and increased VMT

Performance and Proposed 2024 Targets Level Count Measures



Performance and Proposed 2024 Targets Calculated Rate Measures



Aspirational Safety Performance Goals

- 2022-2026 Strategic Highway Safety Plan (SHSP) set a goal to reduce the number of fatalities and serious injuries by half by 2045
 - A two percent reduction each year
- Aspirational goals for 2023, adopted by CTB last June, were to reduce the 2021 number of fatalities and serious injuries by half by 2045
- Updated Virginia Highway Safety Investment Strategy was adopted by CTB last September to improve performance

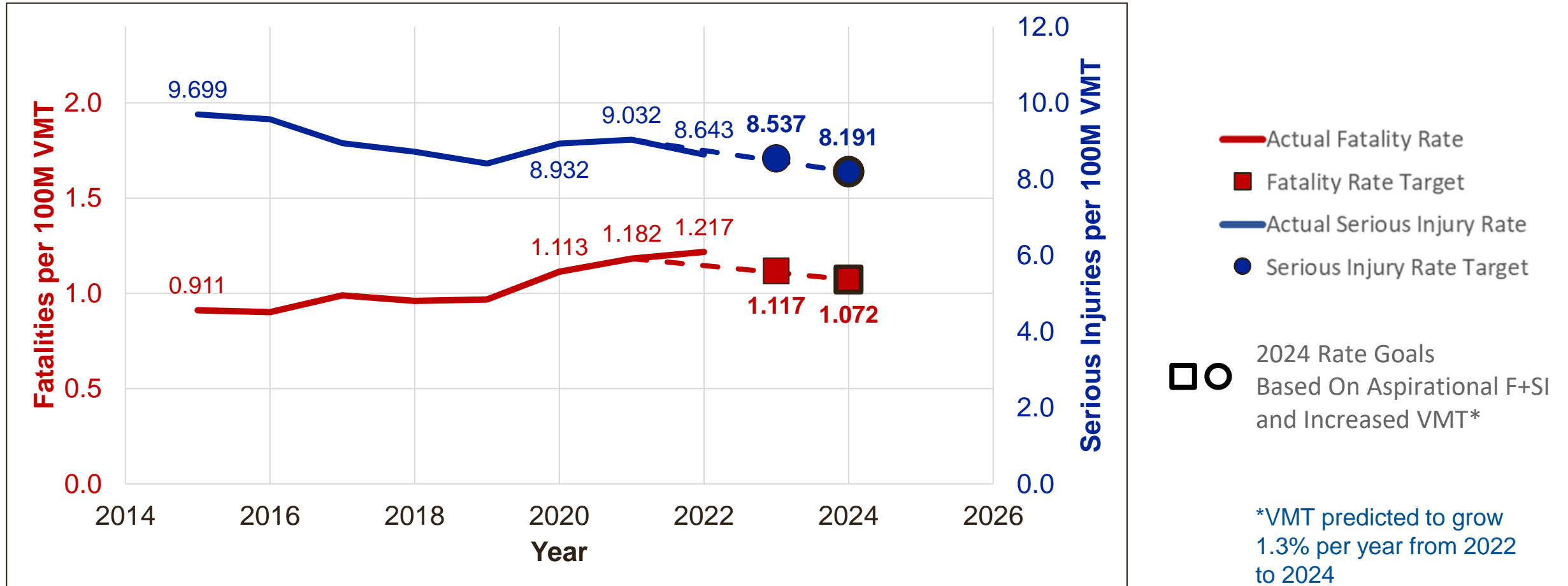


Performance and Proposed 2024 Aspirational Goals

Count Measure



Performance and Proposed 2024 Aspirational Goals Rate Measures



Next Steps

Proposed 2024 Safety Targets and Aspirational Goals

- CTB adoption of proposed targets and goals at June meeting.

Measure	2022 Actual Values	Proposed 2024 Targets	Proposed 2024 Aspirational Goals
Fatalities	1,005	1,005	908
Serious Injuries	7,137	7,137	6,935
Non-Motorized Fatalities + Serious Injuries	765	765	642
Fatality Rate*	1.217	1.187	1.072
Serious Injury Rate*	8.643	8.429	8.191

*VMT predicted to grow 1.3% per year from 2022 to 2024



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Thank you.



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