

Minnesota Toward Zero Deaths

Vision

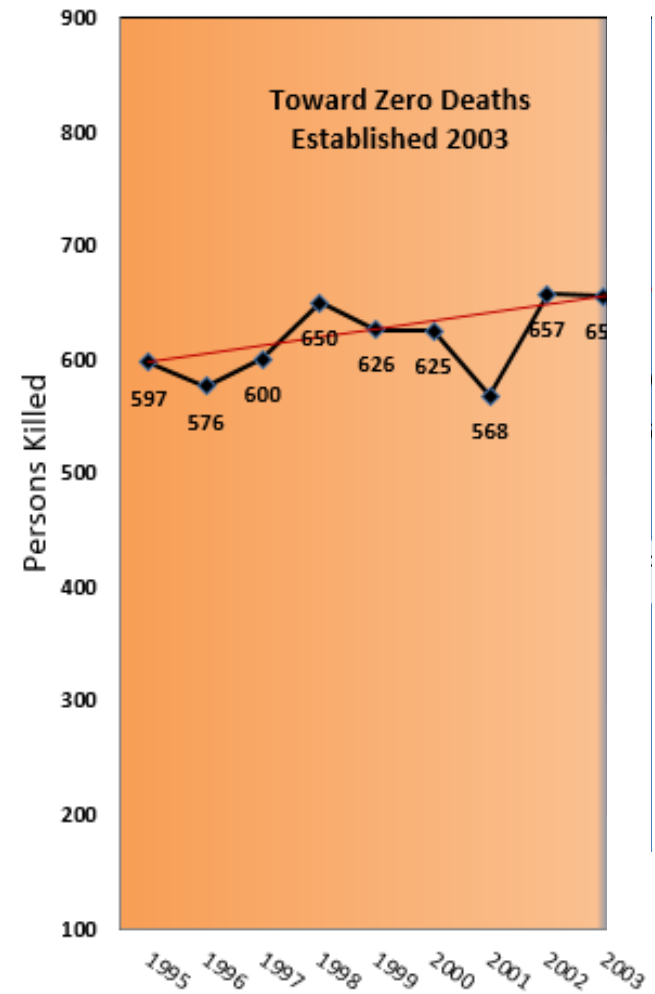
To prevent fatalities and serious injuries
on Minnesota's roads to get to zero



Minnesota Toward Zero Deaths

TZD History

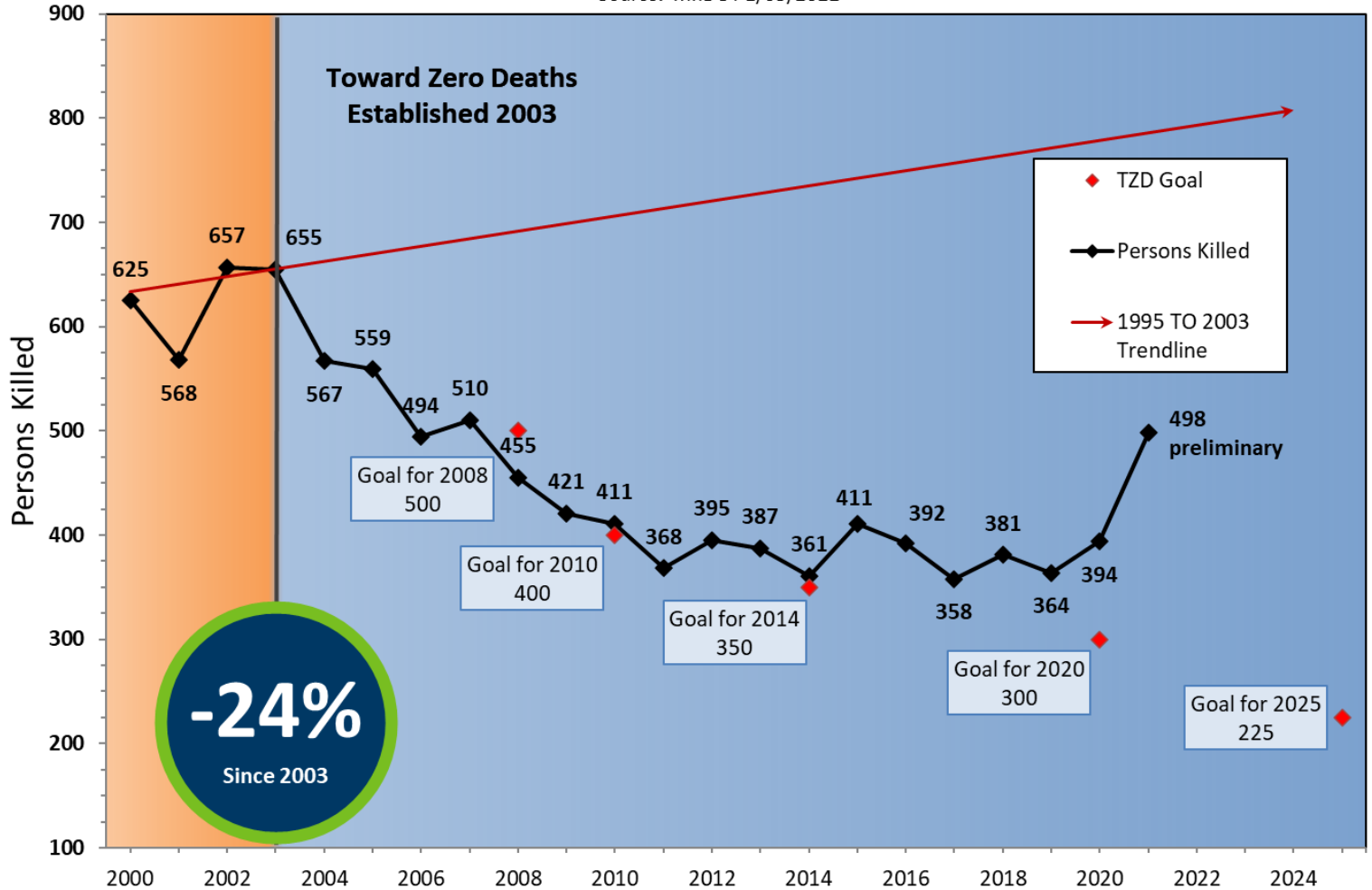
- Program created in 2003 during a time of increasing traffic fatalities.
- Unique program that coordinated the traffic safety efforts of the Departments of Public Safety, Health and Transportation.
- Modeled after Sweden's Vision Zero Program, which began in 1997.



Minnesota Toward Zero Deaths

Minnesota Roadway Fatalities

Source: MnDOT 1/05/2022



Minnesota Toward Zero Deaths



Education

Giving drivers the knowledge they need to avoid hazardous driving practices and choose responsible behavior.



Enforcement

Ensuring compliance with traffic laws to change driver behavior and reduce unsafe driving practices.



Engineering

Changing the roadway—including cable median barriers, signage, and the roadside—to make travel safer.



Emergency Medical & Trauma Services

Providing fast, efficient emergency medical and trauma services to reduce fatalities and serious injuries whenever a crash does occur.



Everyone

Advocating for zero deaths while adopting behaviors and changing culture to get there.

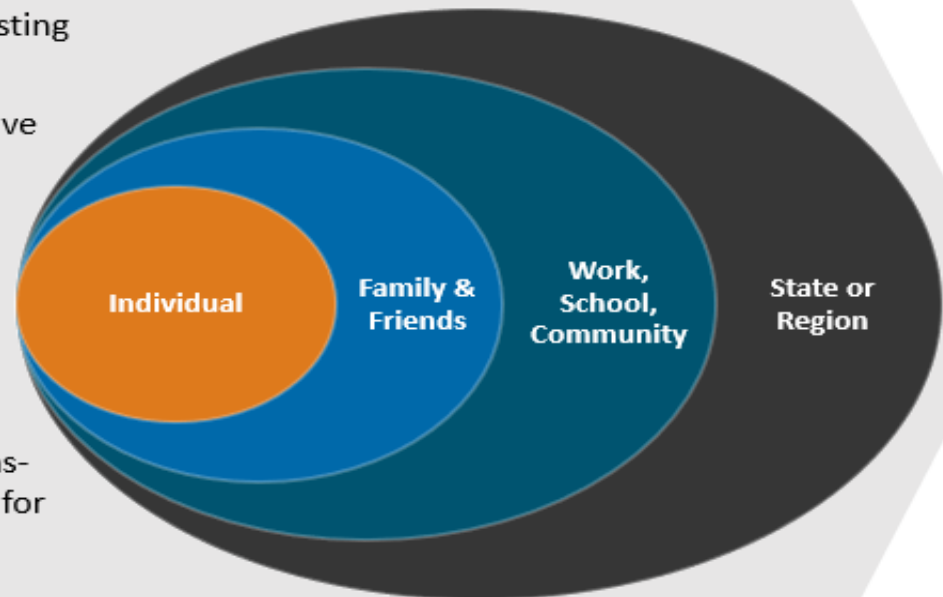
TZD 2.0: Building A Culture of Traffic Safety

True, Lasting Transformation of Traffic Safety Culture

A Social Ecological Approach

Using the environment to create lasting changes to beliefs and behavior

- Uses proven principles of Positive Community Norming
- Founded on the principle that the solutions exist
- Engages community and organizations to help drive individual behavior and beliefs
- Driven by hope from a strengths-based orientation and concern for critical issue
- Part of MN Strategic Highway Safety Plan



TZD 2.0: Designing and Operating a Safe Transportation System

“Safety net” to protect people when mistakes happen/poor choices are made

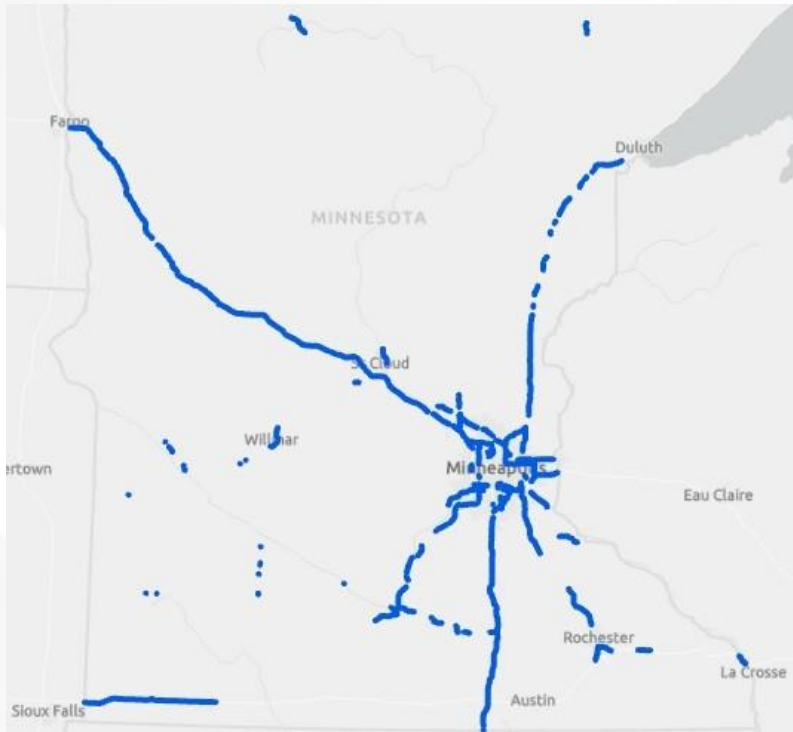
Safe System Approach

Designs and operates traffic systems and structures to protect against human mistakes and injury tolerances and avoid death and serious injuries



High Tension Cable Median Barrier

95% Reduction in
Fatal Head-on
Crashes



2003: None
2014: More than
450 miles
2018: 705 miles



Roundabouts



- Removed Right Angle Crash potential (T-bone crashes)
- Reduced severe crashes by 80-90%
- Reduced pedestrian crashes by 60% when compared to other intersections

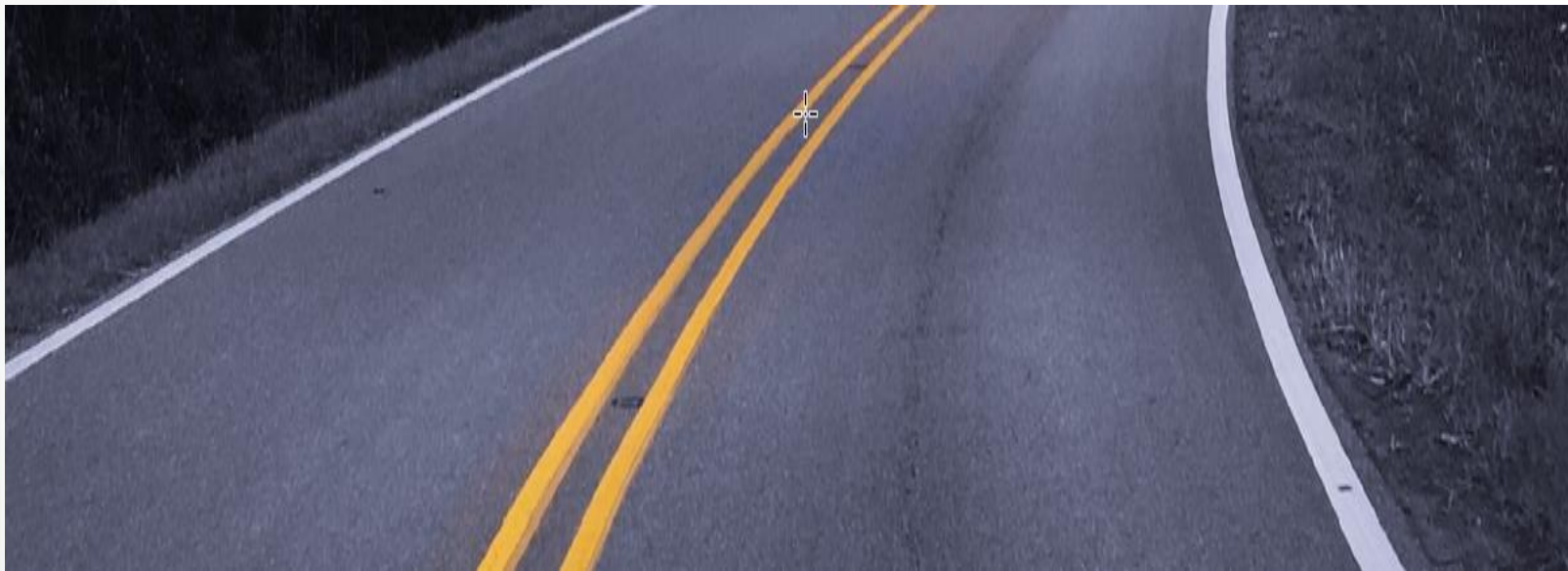
Reduced Crossing Intersection (RCI)



- Have shown an 69% reduction in death & serious injury crashes.
- Over 50 now installed in Minnesota

6" Edgelines

- Studies have shown 20-40% reduction in run off the road fatal/serious injury crashes
- All new edgelines placed on State roadways will be at least 6" beginning in 2022



Rumblestrips

- Studies have shown 13-51% reduction in fatal/serious injury crashes
- 2011: required on all rural projects
- 2017: Noise-reduced option developed





Intersection Constrictor

- Reduce rural high speed mainline intersection approach widths to 10' with centerline and edgeline sinusoidal rumblestrips
- Trial included 30 intersections installed in 2018



Red Strips on Stop Signs - 2018

- Installed at more than 1,000 intersections statewide
- Focused on higher risk intersections connecting to highways

Yellow Tape on Back Plates of Signalized Intersections

- Installed at 100 locations statewide in 2019
- Research has shown about a 15% reduction in crashes



Delineator Posts 2018 & 2019



- Installed more than 1,300 miles of 1/10 mile delineator posts on multi-lane highways
- Used when no lighting is present