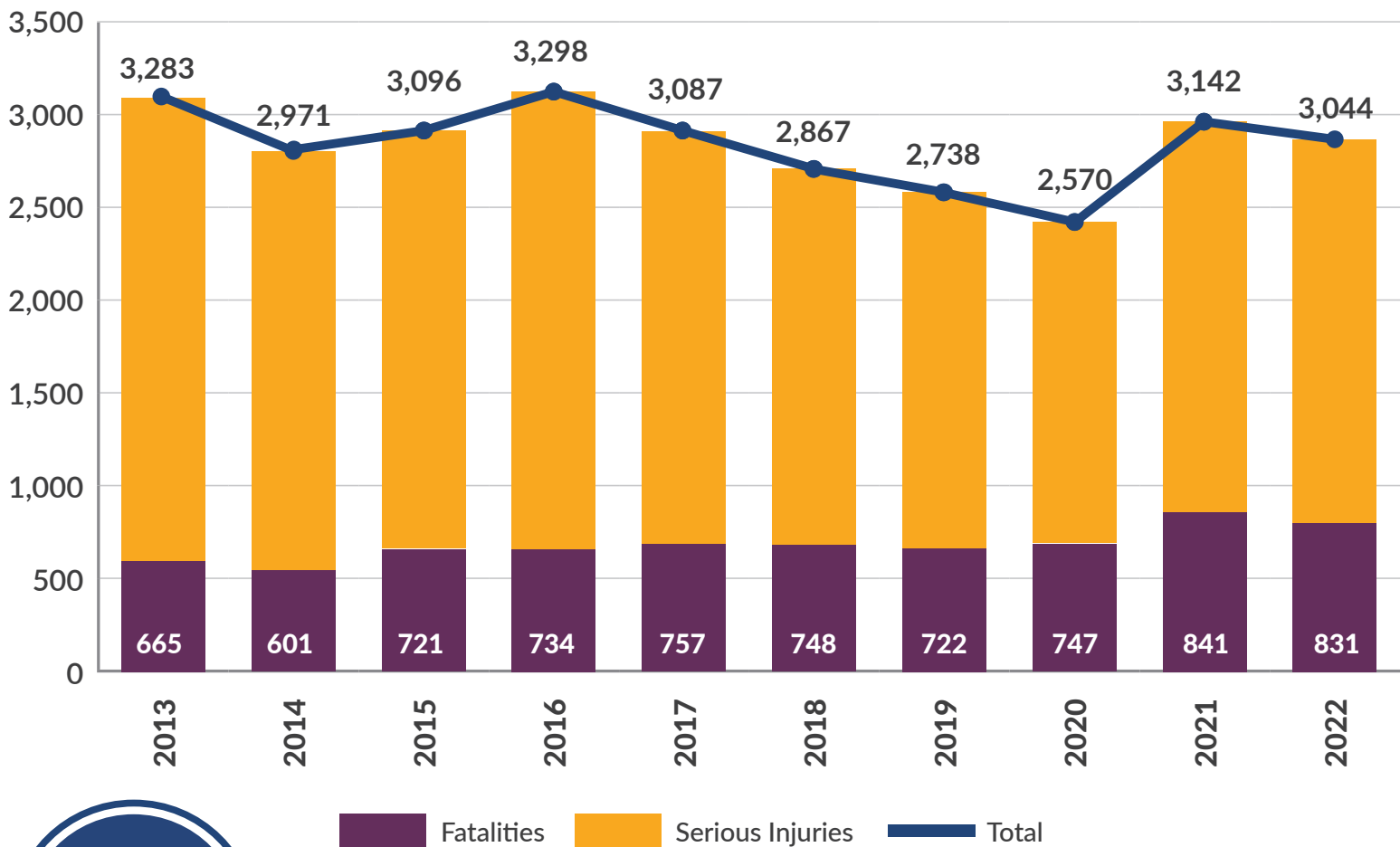


EMPHASIS AREA DEFINITION

Human behavior related crashes are those that occur due to behavioral decisions. This can include crashes due to user impairment (alcohol, drugs), speed too fast for conditions, lack of protective device (seatbelt, helmet), or a combination of the above.



HIGHLIGHTS

71%

of total fatalities are a result of Human Behavior.*

People aged **25-35**

had the most fatalities and serious injuries compared to other age groups.*

*Data taken from 2013-2022, crashes may overlap with other Emphasis Areas

STRATEGIES

ID	STRATEGY	TIMEFRAME	COST/ EFFORT
 SAFE ROADS			
HB.1A	Incorporate more forgiving design elements.	Medium term	Medium
HB.1B	Simplify roadway environment.	Medium term	Medium
 SAFE ROAD USERS			
HB.2A*	Promote seat belt education program.	Short term	Low
HB.2B	Promote impairment and aggressive driving enforcement and education programs.	Short term	Medium
HB.2C	Support increased safety education and testing for all road users.	Medium term	Low
HB.2D	Support, through the provision of information, laws and agency policies that promote safety.	Medium term	Low
HB.2E	Collaborate with stakeholders to develop positive social-norming public information media campaigns.	Medium term	Medium
 SAFE SPEEDS			
HB.3A	Improve driver awareness of appropriate speeds.	Short term	Medium
HB.3B	Increased automated/mobile enforcement of speeds.	Short term	Medium
 SAFE VEHICLES			
HB.4A	Support vehicle systems that discourage impaired driving.	Short term	Low
HB.4B	Support vehicle systems that discourage distracted/drowsy driving.	Short term	Low
HB.4C	Collaborate with private stakeholders on traffic safety initiatives.	Medium term	Low
HB.4D	Support increased vehicle inspection.	Medium term	Low
 POST-CRASH CARE			
HB.5A*	Promote safety at crash scenes.	Short term	Medium
HB.5B	Support improvements in communication options in rural areas.	Long term	Medium
HB.5C	Improve DUI training for law enforcement.	Short term	Medium
HB.5D	Support, through the provision of information, laws related to DUI abatement.	Medium term	Low
HB.5E	Support, through the provision of information, laws related to hit-and-run abatement	Medium term	Low

***High Priority Strategy**

STRATEGY EXAMPLES

INCORPORATE MORE FORGIVING DESIGN ELEMENTS

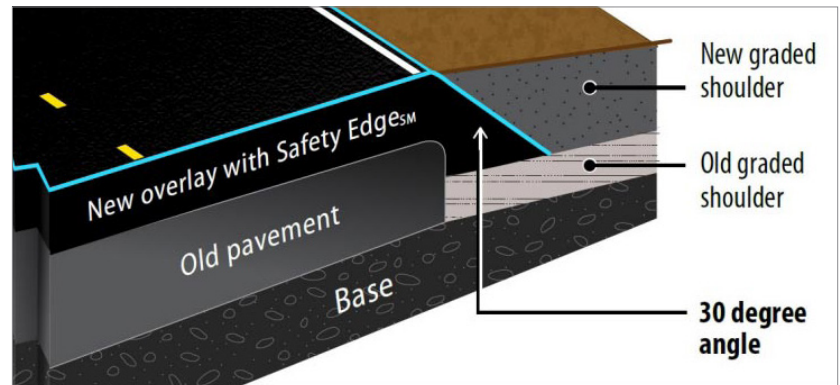
Incorporate elements into infrastructure projects that increase the potential for recovery and/or survivability in case of mistakes by travelers. This may include performance-based practical design (PBPD), Complete Streets, or other approaches.

Examples:

- » Pavement safety edges
- » Modified lane widths
- » Additional buffer zones
- » Physical separation
- » Traffic control to increase separation

Countermeasures should focus on improved safety and may overlap with other strategies.

Safety Edge



Source: FHWA

SIMPLIFY ROADWAY ENVIRONMENT

Minimize visual distractions within the roadway prism particularly at decision points and/or reduce the number of decisions required by the driver.

- » Reduce distractions such as sign clutter or excess pavement markings
- » Provide physical emphasis for decision points to positively reinforce a user's intent

Examples:

- Channelization
- Turn lanes
- Separated bicycle lanes

Channelized Intersection



PROMOTE SEAT BELT EDUCATION PROGRAM

Provide data and input that supports the need for seatbelt use. Readily available statistics at the national and state levels regarding the relationship between crash severity and occupant protection can be presented to elected officials to increase awareness.

Distribution can be done:

- » Online
- » Promoted on social media
- » Presented to community groups

Local education campaigns can be developed utilizing the same data.

Click It or Ticket Sign



Source: NHTSA

PROMOTE IMPAIRMENT AND AGGRESSIVE DRIVING ENFORCEMENT AND EDUCATION PROGRAMS

Utilize existing data and statistics regarding impairment and aggressive driving to refine enforcement locations and tactics. Increase enforcement visibility and promote awareness using media platforms.

Distribution can be done:

- » Online
- » Promoted on social media
- » Presented to community groups

Local education campaigns can be developed utilizing the same data.

Police Car



Source: AdobeStock

SUPPORT INCREASED SAFETY EDUCATION AND TESTING FOR ALL ROAD USERS

Provide data and input that supports the need for increased safety education and testing within the younger and older age brackets.

Readily available statistics at the national and state levels regarding the relationship between crash severity and road user age can be presented to elected officials to increase awareness and offer support to new initiatives such as:

- » Graduated drivers' licenses
- » Renewal requirements
- » Traveler safety education in schools

Teen Driver Safety

Your teen is in the driver's seat but
YOU'RE IN CONTROL.

Talk with your teen about
the rules for the road.

Wear seat belts | No speeding
| No texting | No alcohol or drugs
| Limit extra passengers

NHTSA



Source: NHTSA

SUPPORT, THROUGH THE PROVISION OF INFORMATION, LAWS AND AGENCY POLICIES THAT PROMOTE SAFETY

Provide data that supports the need for new and/or revised laws and policies that promote safety.

Readily available statistics at the national and state levels regarding the relationship between crash severity and human behavior can be presented to elected officials and agency leadership to increase awareness and offer support to new initiatives:

- » Distracted Driving Laws (cell phone use)
- » Enforcement cameras (red-light running)
- » Lane restrictions (parking, transit, bicycle)

COLLABORATE WITH STAKEHOLDERS TO DEVELOP POSITIVE SOCIAL-NORMING PUBLIC INFORMATION MEDIA CAMPAIGNS

Develop media campaigns that focus on positive social-norming around traffic safety. Positive social-norming uses existing data to highlight positive norms already existent in populations to reduce commonly held misconceptions that contribute to risky behavior.

Media campaigns can be created to support a wide variety of measures including;

- » Behaviors
- » Attitudes
- » Support for policy

Statewide and regional efforts can be combined to reach larger audiences and increase efficiency of resources.



Source: AdobeStock

IMPROVE DRIVER AWARENESS OF APPROPRIATE SPEEDS

Increase awareness of appropriate speeds through the use of high-visibility feedback systems. These systems provide drivers additional information beyond static posted speed limits by utilizing real-time, variable feedback. Examples include:

- » Variable speed limits that can change based on environmental conditions
- » Speed feedback systems that provide awareness/warning of actual user speeds compared to limit

These devices should be accompanied by increased enforcement to encourage driver compliance.

Variable Speed Sign



Source: WSDOT

Speed Feedback Sign



Source: Iowa DOT

INCREASE AUTOMATED/MOBILE ENFORCEMENT OF SPEEDS

Utilizing existing data and statistics regarding speeding to refine enforcement locations and tactics.

- » Utilize automated systems where feasible to reduce the need for resources and increase the efficiency of the effort.
- » Utilize mobile systems where feasible to target more areas and increase the efficacy of the effort.

Priority should be given to locations with a high number of speed violations or fatalities and serious injuries.

Red Light Camera



Source: Adobe Stock

SUPPORT VEHICLE SYSTEMS THAT DISCOURAGE IMPAIRED DRIVING

Provide the automotive industry and state legislature existing data regarding the relationship between crash frequency and severity and driver impairment.

Offer support to potential new equipment and design initiatives such as mandatory impaired driving prevention technology on all new passenger motor vehicles

SUPPORT VEHICLE SYSTEMS THAT DISCOURAGE DISTRACTED/DROWSY DRIVING

Provide the automotive industry and state legislature existing data regarding the relationship between crash frequency and severity and distracted driving/fatigue. Offer support to potential new equipment and design initiatives such as drowsy driving detection systems that use a combination of sensors and algorithms to identify signs of drowsiness.

COLLABORATE WITH PRIVATE STAKEHOLDERS ON TRAFFIC SAFETY INITIATIVES

Collaborate with private stakeholders on traffic safety initiatives related to vehicle improvements and operations. Potential partnerships can include fleet/owner operators who oversee large numbers of businesses vehicles and insurance agencies who manage risk-based policies.

SUPPORT INCREASED VEHICLE INSPECTIONS

Provide data and input that supports the need for new and/or revised laws and policies that promote vehicle safety inspection. Arizona currently requires safety inspections on commercial vehicles but not passenger vehicles. Determine appropriate level of inspection based on other state practices that require passenger vehicles to undergo inspection on an annual or biennial cycle or when sold/transfer ownership.

PROMOTE SAFETY AT CRASH SCENES

Promote traffic safety at crash scenes through internal training on traffic incident management (TIM), incident command system (ICS), and other topics to law enforcement, first responders, and other public agencies. Provide public education on the need for safety around active crash scenes and the importance of responder safety. Educate on supporting initiatives such as “Move Over” law and clearing roadway with minor crashes.

Promote stop-the-bleed and CPR training for all motorists and bystanders so they can render emergency care at crash scenes as needed until emergency responders arrive. Support training of emergency medical care technicians and job placement in rural and medically underserved areas.

Move Over AZ



Source: NHTSA

SUPPORT IMPROVEMENTS IN COMMUNICATION OPTIONS IN RURAL AREAS

Support private industry efforts to increase broadband and cellular communication in rural areas particularly those that improve reliability along major transportation corridors. Agencies can implement policies, permit processes, and projects to support the expansion of services to underserved areas. Partnerships may include leveraging Arizona's broadband activities under the Arizona Commerce Authority. In rural and/or mountainous locations where there is little to no cell reception, roadside call boxes may support emergency response.

Broadband Tower



Source: AdobeStock

IMPROVE DUI TRAINING FOR LAW ENFORCEMENT

Provide internal trainings on:

- » Laws surrounding impairment
- » Detection methods
- » Response techniques

Increase the number of officers qualified for DUI enforcement, including the use of technical equipment.

SUPPORT, THROUGH PROVISION OF INFORMATION, LAWS RELATED TO DUI ABATEMENT

Provide lawmakers existing data regarding the relationship between crash frequency and severity and driver impairment, as requested. Offer subject matter expertise and information related to potential new laws and initiatives surrounding DUI laws and penalties.

SUPPORT, THROUGH PROVISION OF INFORMATION, LAWS RELATED TO HIT-AND-RUN ABATEMENT

Provide lawmakers existing data regarding the occurrence of hit-and-run crashes where a driver leaves the scene, as requested. Offer subject matter expertise and information related to potential new laws and initiatives surrounding hit-and-run laws and penalties.

STRATEGY RESOURCES

FHWA – Safety Resources	https://highways.dot.gov/safety
Proven Safety Countermeasures	https://highways.dot.gov/safety/proven-safety-countermeasures
Zero Death Resources	https://highways.dot.gov/safety/zero-deaths/resources
Intersection Safety Resources	https://highways.dot.gov/safety/intersection-safety/resources
Safe System Intersections	https://highways.dot.gov/safety/intersection-safety/safe-system-intersections
Transportation Safety Planning	https://highways.dot.gov/safety/other/transportation-safety-planning-tsp
Intersection Control Evaluation	https://highways.dot.gov/safety/intersection-safety/ice
Bicycle and Pedestrian Safety	https://highways.dot.gov/safety/pedestrian-bicyclist
Local & Rural Safety	https://highways.dot.gov/safety/local-rural/training-tools-guidance-and-countermeasures-locals-practitioners
Speed Management Safety	https://highways.dot.gov/safety/speed-management/reference-materials
Roadway Departure Safety	https://highways.dot.gov/safety/RwD
NHTSA – Safety Resources	https://www.nhtsa.gov/
Risky Driving	https://www.nhtsa.gov/risky-driving
Vehicle Safety	https://www.nhtsa.gov/vehicle-safety
Road Safety	https://www.nhtsa.gov/road-safety
Other Resources	
Arizona–Move Over AZ	https://moveoveraz.org/
BIKESAFE–Bicycle Safety	http://www.pedbikesafe.org/BIKESAFE/countermeasures.cfm
FHWA - Bicycle and Pedestrian Program	https://www.fhwa.dot.gov/environment/bicycle_pedestrian/resources/
GHSA – Speed and Red Light Cameras	https://www.ghsa.org/issues/speed-and-red-light-cameras
IIHS – Highway Loss Data Institute	https://www.iihs.org/
MAG – See Me AZ	https://azmag.gov/Programs/Transportation/Safety-Programs/See-Me-AZ
PEDSAFE–Pedestrian Safety	http://www.pedbikesafe.org/PEDSAFE/countermeasures.cfm
TZD–Marketing & Communications Toward Zero deaths	https://www.towardzerodeaths.org/marketing-communications/#plans
USDOT – Preparing for the future of transportation	https://www.transportation.gov/AV
USDOT – Traffic Safety Marketing	https://www.trafficsafetymarketing.gov/