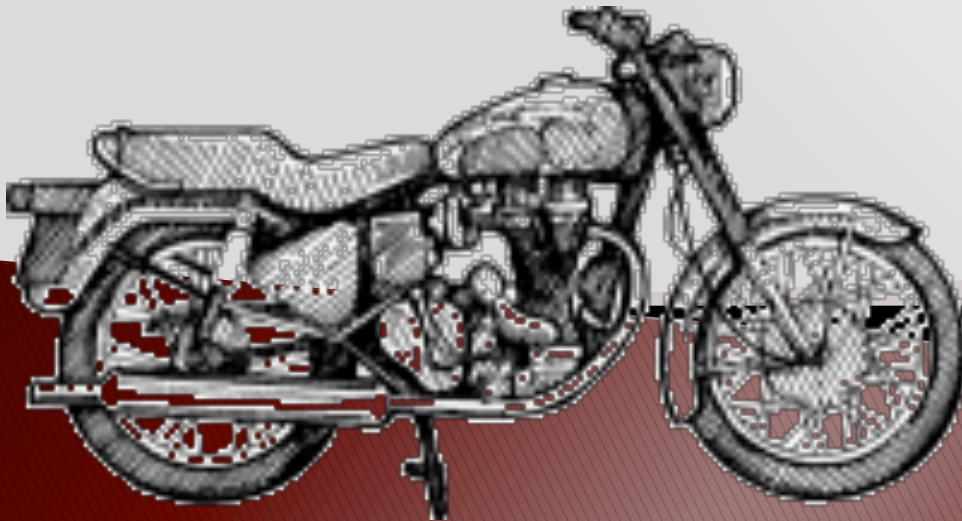


Texas Motorcyclist Survey

Laura Higgins, TTI

October 16, 2013



Texas Motorcyclist Survey

- ▶ Part of TxDOT research project
- ▶ Purpose:
 - to provide background information on Texas motorcycle rider demographics, riding habits, and attitudes
 - develop communications and outreach plan for encouraging safe riding behaviors
 - provide data for the development of a statewide motorcycle safety plan

Survey Questions – Summary

▶ Characteristics

- Demographics
- Riding habits
- Training
- Licensing status
- Crash experiences

▶ Knowledge/Attitudes

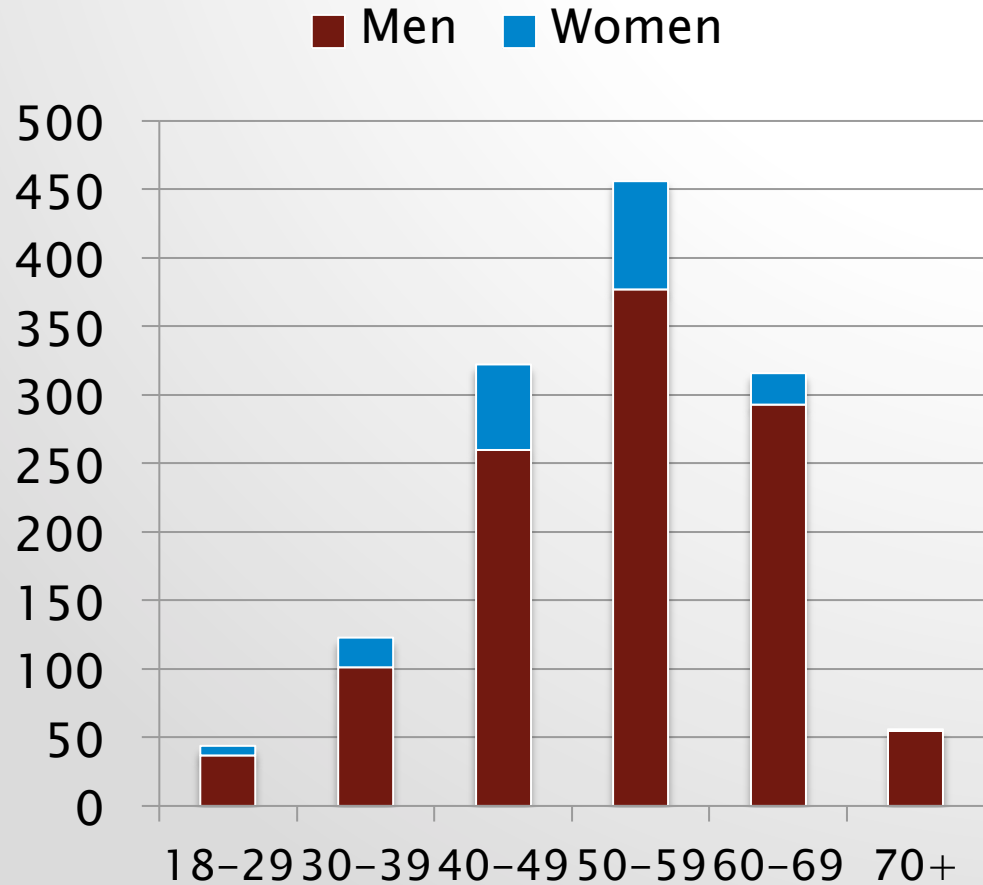
- Use of protective gear
- Opinions on safety countermeasures
- Opinions on advanced technologies

Where did participants come from?

- ▶ Existing e-mail database of riders
- ▶ Texas Motorcycle Safety Coalition (TMSC)
- ▶ Riders groups (TMRA, TMRA2, COC&I)
- ▶ Motorcycle safety instructors → new riders
- ▶ Contacts collected at motorcycle rider events
- ▶ Social media
- ▶ 1,386 total respondents

Demographics

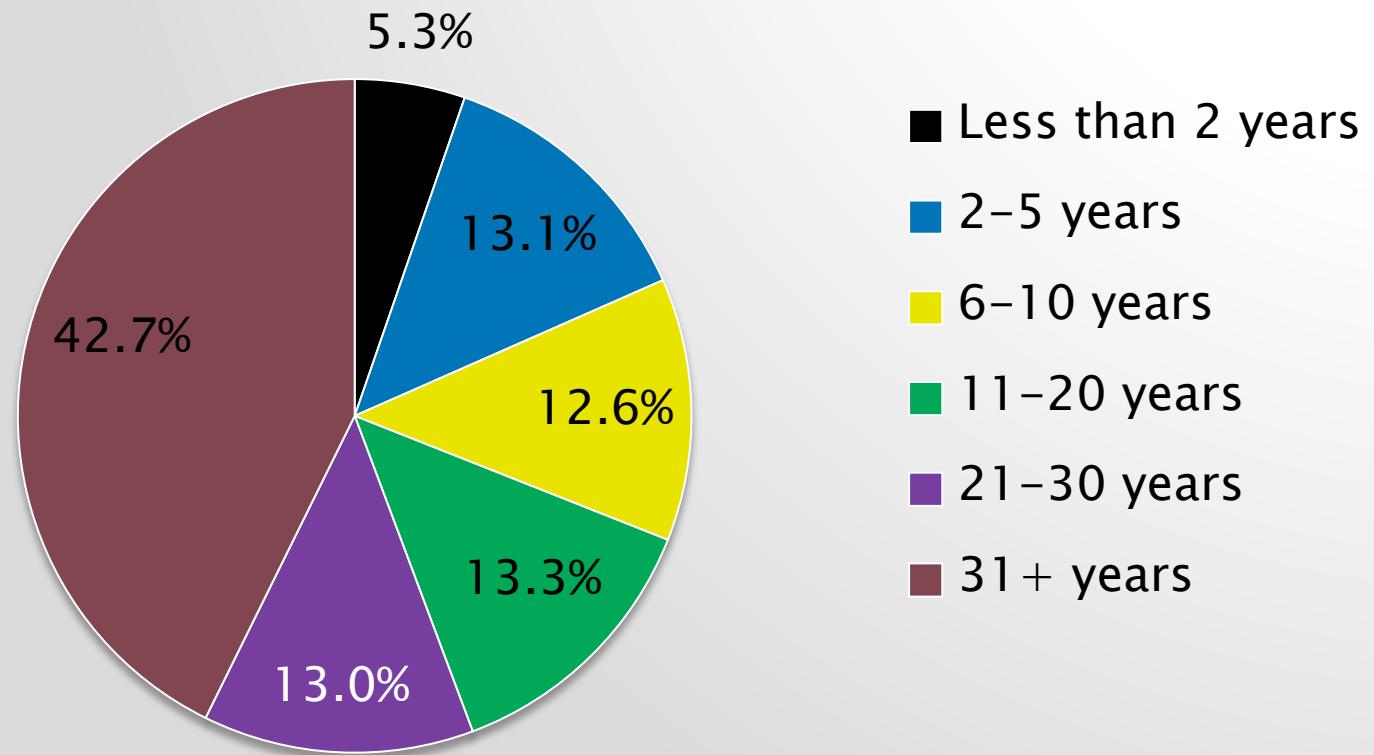
- 85% male
- 15% female
- Ages range:
21 to 81 years
- Average age:
52.5



Distribution of Ages for Men and Women

Riding History and Experience

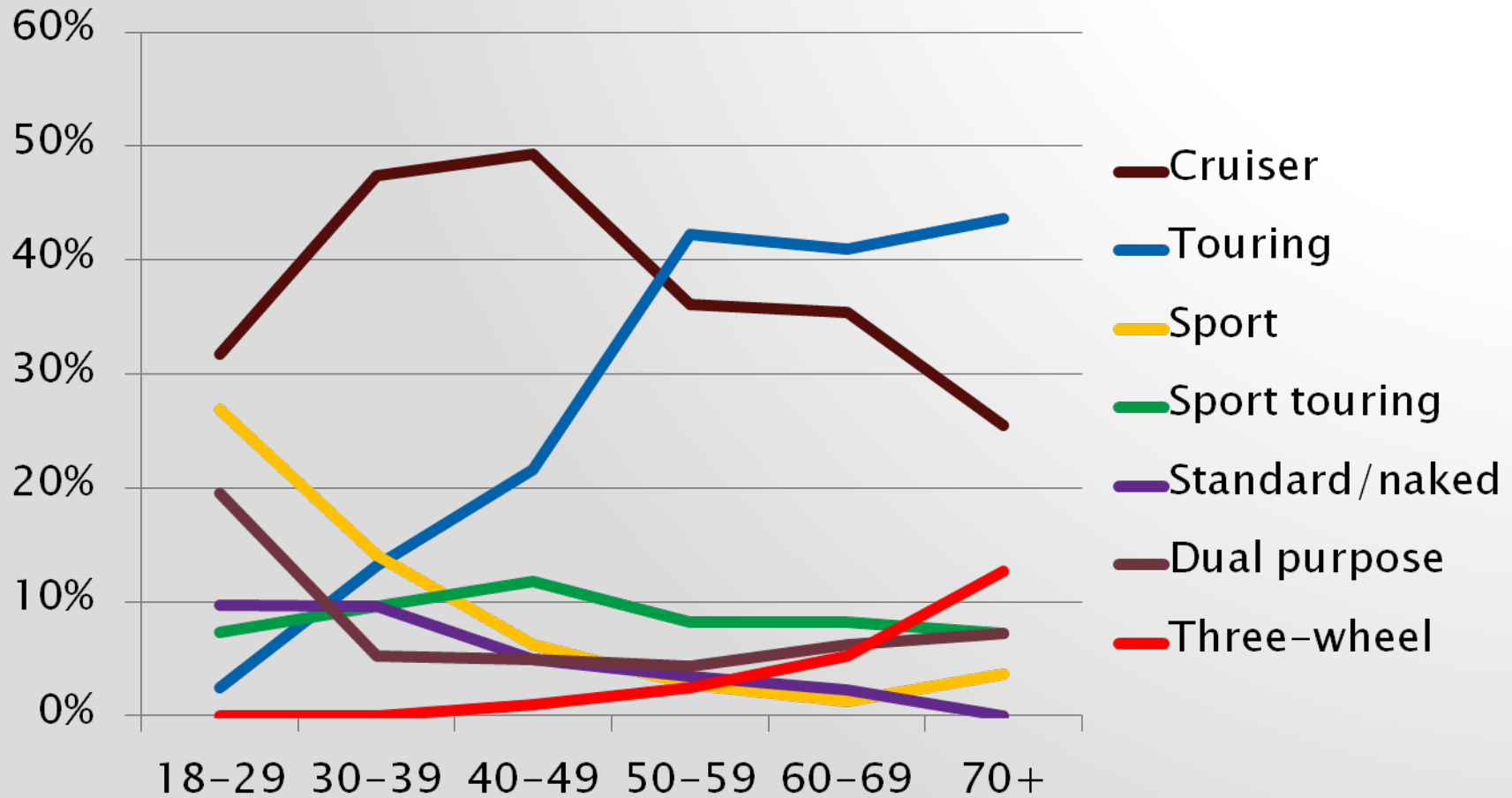
“How long have you been riding a motorcycle?”



Type of Motorcycle Participants Ride Most Often

| Type | Response Percent |
|--------------------------------|------------------|
| Cruiser | 39.8% |
| Touring | 33.2% |
| Sport | 5.0% |
| Sport touring | 9.1% |
| Standard/naked | 4.1% |
| Dual purpose (on and off-road) | 5.7% |
| Three-wheeler | 2.8% |

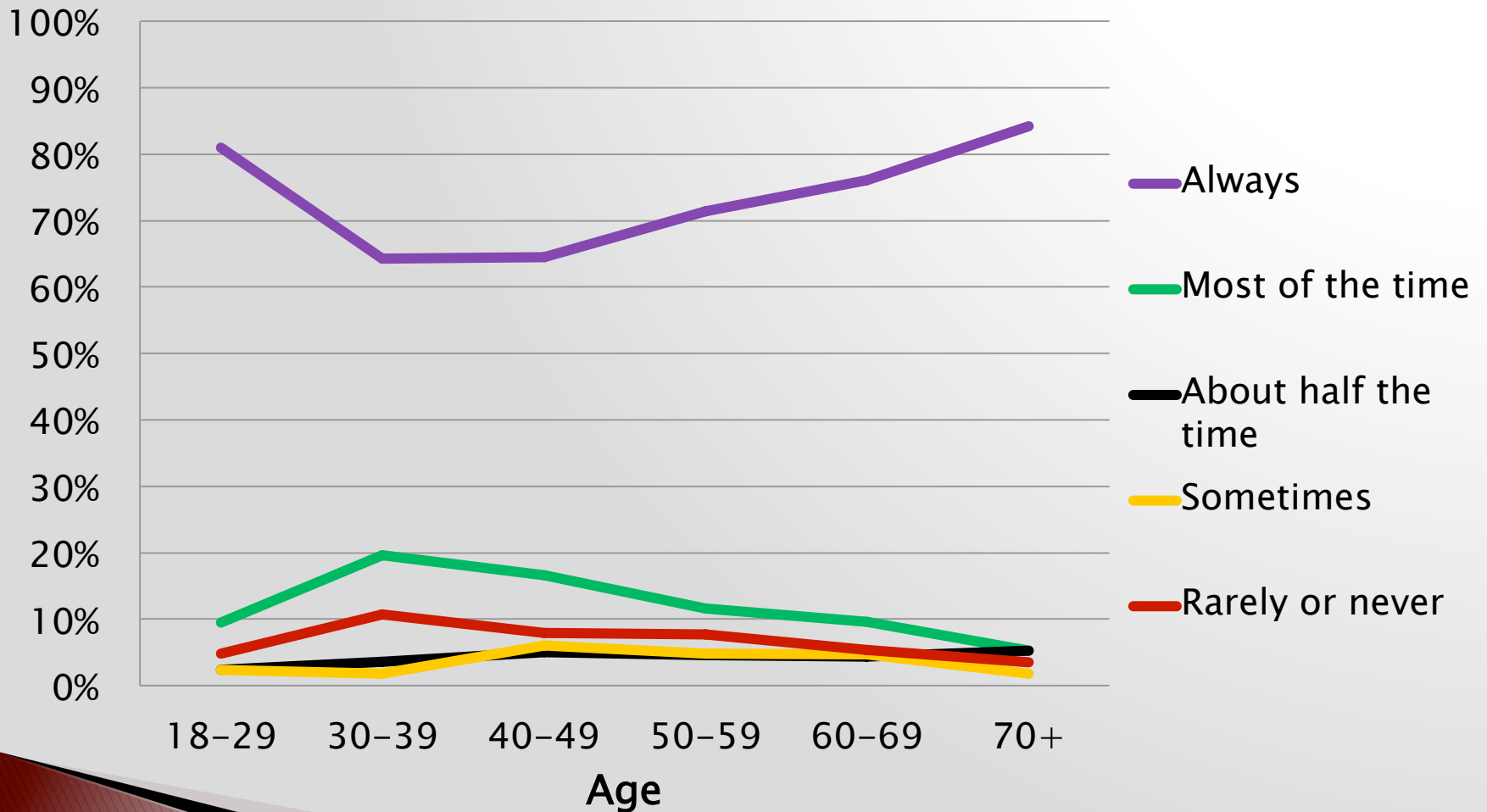
Bike Type by Age Group



Motorcycle Safety Training

- ▶ 72% of participants have taken at least one training course
- ▶ 82% of these say that training significantly improved their skills
- ▶ Training needs identified:
 - Improve/update curriculum
 - Better/more motorcycles available for training
 - Courses for 3-wheel motorcycles
 - Courses for high-performance riding

“How often do you choose to wear a DOT-approved helmet when you ride?”



Reasons for Wearing or Not Wearing a DOT-Approved Helmet

Reasons for wearing a helmet

| | |
|--|-------|
| Protective benefits | 81.2% |
| Weather (cold/rain/wind) | 49.6% |
| Keeps bugs/debris out of my face | 40.2% |
| Habit | 38.3% |
| Know someone who was injured riding without a helmet | 25.9% |

Reasons for **NOT** wearing a helmet

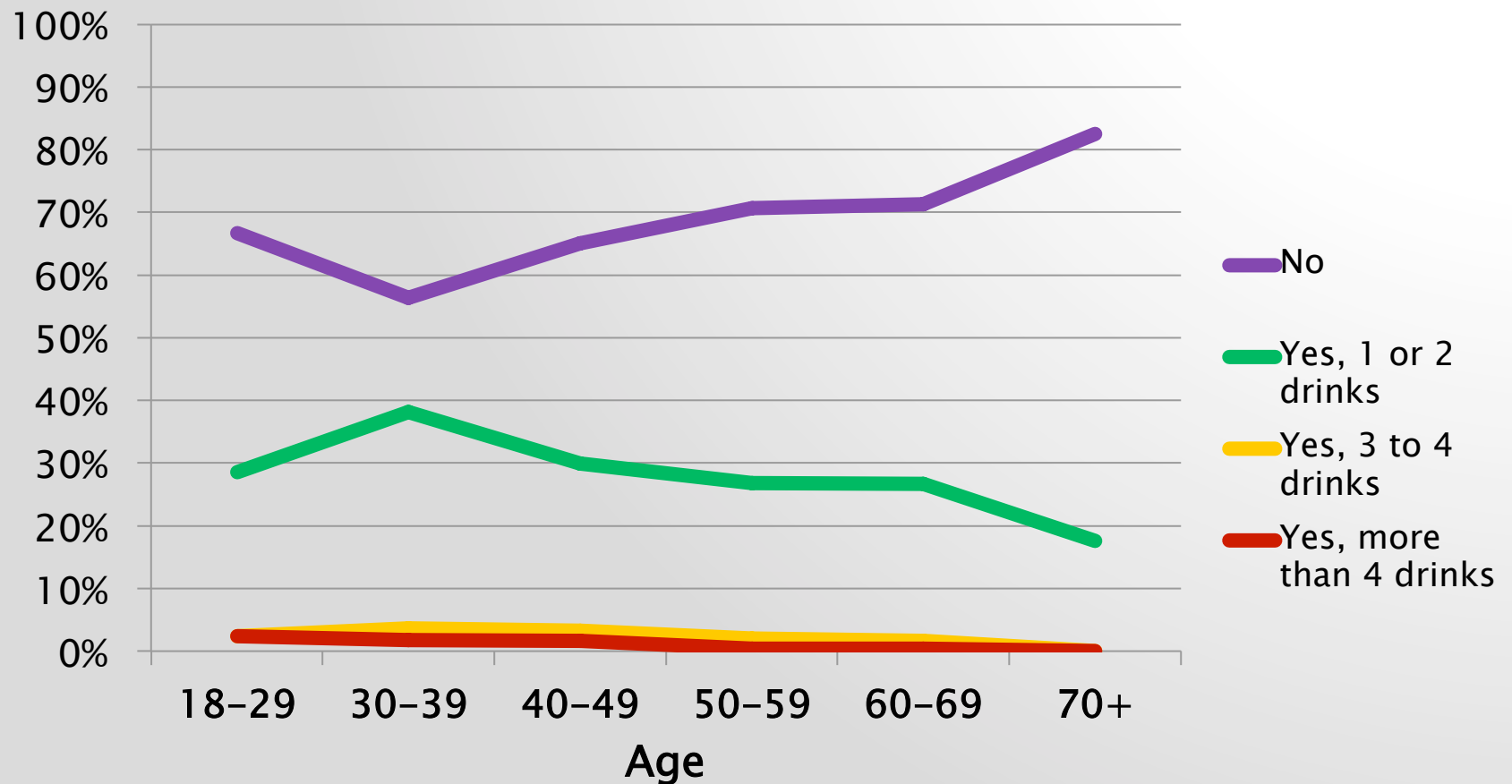
| | |
|---------------------------------|-------|
| Personal freedom/choice | 58.3% |
| Weather (hot/humid) | 36.5% |
| Uncomfortable | 25.8% |
| More fun to ride without helmet | 25.2% |
| See better | 18.2% |
| Hear better | 16.0% |
| Give passenger the only helmet | 8.0% |

Participant Strategies for Improving Conspicuity

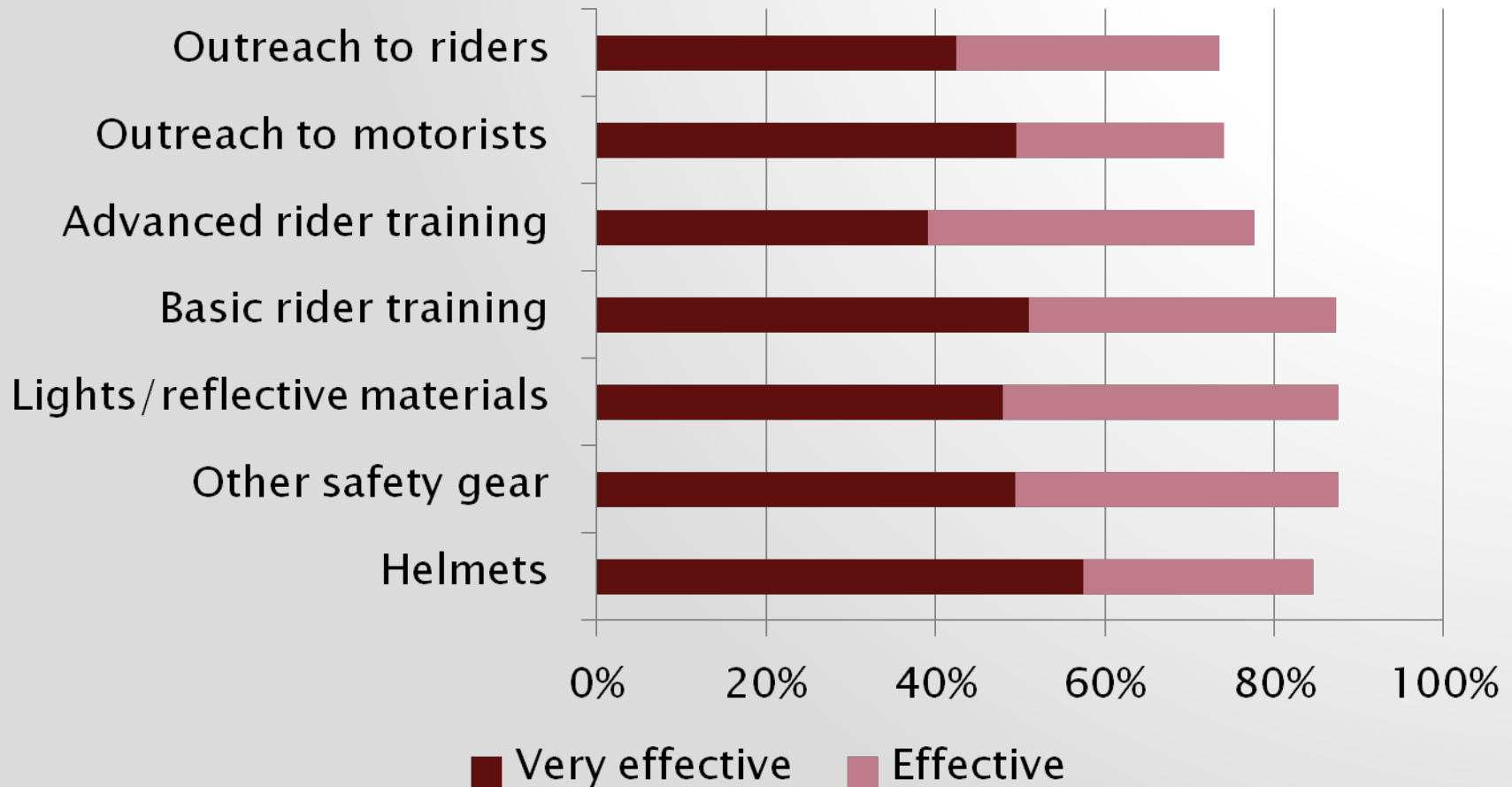
- ▶ Strategic lane positioning (74%)
- ▶ Auxiliary lights (51%)
- ▶ Reflective materials (32%)
- ▶ Brightly colored helmet (24%)
- ▶ Brightly colored clothing (22%)

Alcohol Use

“Within the last year, have you consumed alcohol within an hour prior to riding a motorcycle?”



Effectiveness of countermeasures



ITS and Advanced Technologies

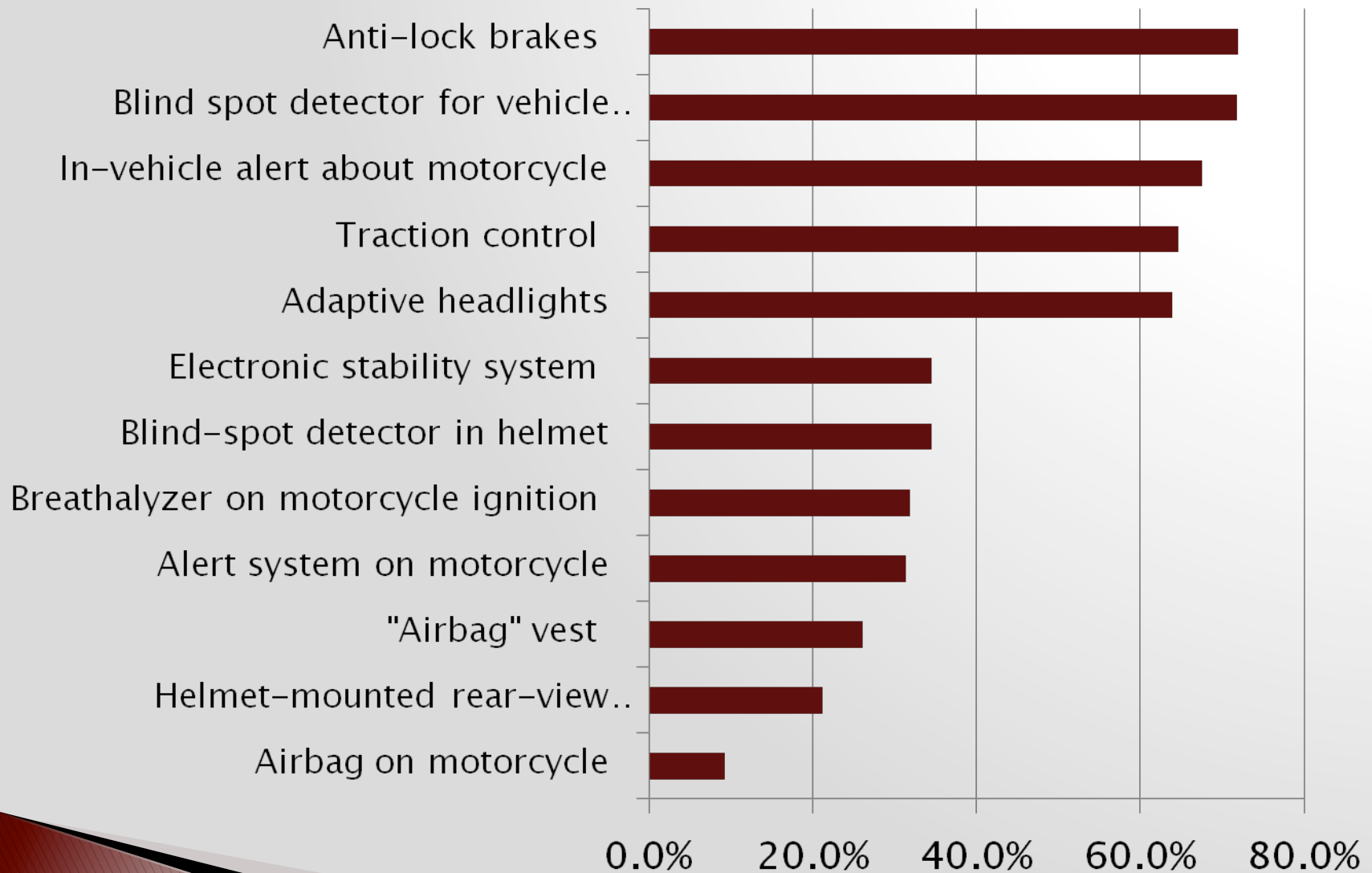
Technologies for Motorcycles / Riders

| |
|--|
| Adaptive headlights |
| Airbag on motorcycle |
| Airbag vest |
| Alcohol breathalyzer on motorcycle ignition |
| Anti-lock brakes |
| Blind-spot detector in motorcycle helmet |
| Electronic stability system (for trikes) |
| Helmet-mounted rear-view display/camera |
| System to alert riders if they're getting too close to other vehicles, pedestrians, or objects |
| Traction control |

Technologies for Vehicles / Drivers

| |
|--|
| Blind spot detector (vehicles) |
| System to warn drivers if they're getting close to motorcycles |

Percent Rated as Effective/Very Effective



Texas Strategic Action Plan for Motorcycles

- ▶ Living document intended to guide motorcycle safety initiatives for Texas, 2013–2018
- ▶ Survey results contributed to plan measures
 - Improve motorcycle training
 - Increase helmet/safety gear use
 - Increase motorcycle/rider conspicuity
 - Increase driver awareness of motorcycles
 - Reduce impaired riding
 - Promote adoption of advanced technologies