Module 4.4

Rural and Highway Driving
Rural and Highway Driving Objectives

- Understand the HTS and how it is managed.
- Understand the unique characteristics of rural roads and highways.
- Understand signs, signals, and roadway markings.
- Understand the hazards of driving in rural environments.
Rural and Highway Driving Objectives

• Describe, evaluate and respond to roadway conditions.
• Understand when it is safe and legal to pass and how to pass safely.
• Dealing with slow moving vehicles.
• Open range laws and being aware of wildlife hazards.
Highway Transportation System (HTS)

ROADS
Gravel roads to Interstate freeways

VEHICLES
Bicycles, motorcycles, cars, pickups, RVs, semi-trucks, tractor-trailers, farm equipment

USERS
Novice drivers, experienced drivers, old and young drivers, pedestrians, cyclists, users of every skill level.
Road Departure Fatal Crashes in Rural Montana (2003-2012)
Signs, Signals and Roadway Markings

What do the signs, roadway markings, and signal tell you?

How long does it take to notice and understand them?
Rural Driving Hazards

- Width of road and lanes
- Roadway departure crashes
  - Speed
  - Inattention
  - Distracted driving
  - Weather
  - Surface conditions
- Isolation
  - Distance between towns
  - EMS response time
- Single-vehicle crashes
- Head-on crashes
- Mental and physical effects
  - Highway Hypnosis
  - Velocitation
  - Fatigue
Rumble Strips

- What causes drivers to leave the roadway or move out of their lane?
- How do rumble strips prevent crashes?
Open Range
Beware of Invisible Cows

Montana Teen Driver Education and Training
Wind and Large Vehicles
Describe, Evaluate and Respond to Road Conditions

*Putting it All Together*

The following slides show different conditions faced by drivers on rural roads:

- What info can you gather from signs?
- What info can you get from “paint?”
- What info can you get from surface conditions?
- How should you drive on this road?
What info can you gather from signs?
What info can you get from “paint”?
What info can you get from surface conditions and the roadway design?
Each road type requires us to make informed decisions. Answer these questions for each road type.

1. Surface?
2. Traction?
3. Markings?
4. Signage?
5. Curves?
6. Shoulders?

What kind of road surface markings are present? How do they affect my traction? What kind of roadway markings are present?
PASSING AND BEING PASSED
Slow-Moving Vehicles

What problems will you encounter as you approach this RV?
Slow-Moving Vehicles

What problems will you encounter as you approach this tanker truck?
Remember the “No-Zone”

Montana I-15 near Canadian border
Slow-Moving Vehicles

What problems will you encounter as you approach these trucks?
Passing and Being Passed
Student Activity 1: Unsafe Passing

Passing is unsafe and unlawful in areas where LOS-POT zone changes are present.

Working in groups of two or three, list the nine locations or situations where it is illegal to pass and explain why.
Student Activity 2: Illegal Passing Locations

1. Curves
2. Hills
3. Tunnels
4. Intersections
5. RR crossings
6. Bridges
7. Across a solid yellow line
8. No passing zones
9. When oncoming traffic is present
TowPlows
Lawful or Unlawful in Montana?

Is it legal to exceed the speed limit when passing on a two-lane road if the vehicle you are passing is traveling under the speed limit?
Passing Lanes

PASSING LANE
2 MILES

Montana Teen Driver Education and Training
Slow-Moving Vehicles
Wildlife

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Montana Teen Driver Education and Training
Time and Space Management

• Use an orderly visual search pattern.
• Search to your target area (Vision Control).
• Reduce speed when there are line-of-sight or path-of-travel restrictions (Motion Control).
• Reduce speed when there is a change in traction.
• Reduce speed in wildlife areas and crossings.
Time and Space Management

Use longer following distances when:

• Visibility is reduced
• Following farm equipment
• Following a snowplow
• Pulling a trailer
• Driving on surfaces with less traction
LIMITED ACCESS HIGHWAYS
Limited Access
HIGHWAY INTERCHANGES

CLOVERLEAF - Allows for interchange of two expressways or major roadways.

DIAMOND - Allows for interchange of a major roadway with a secondary dual or multiple lane roadway.
HIGHWAY INTERCHANGES

TRUMPET - Allows for interchange of secondary two-way streets to a multiple lane roadway with minimal traffic mix.

FRONTAGE ROAD INTERCHANGE - Allows for interchange of vehicles using parallel secondary two-way or one-way roadways and a major multiple-lane roadway.
Expressways
Exiting the Freeway
Montana Driver Education and Training Standards and Benchmarks

1. **Laws and Highway System**
   1.1. know the laws outlined in the Montana Driver's manual;
   1.2. understand the laws outlined in the Montana Driver's Manual; and
   1.3. consistently demonstrate knowledge and understanding by responsible adherence to highway transportation system traffic laws and control devices.

2. **Responsibility**
   2.1. recognize the importance of making safe and responsible decisions for owning and operating a motor vehicle;
   2.2. demonstrate the ability to make appropriate decisions while operating a motor vehicle;
   2.3. consistently display respect for other users of the highway transportation system; and
   2.4. develop positive habits and attitudes for responsible driving.

3. **Visual Skills**
   3.1. know proper visual skills for operating a motor vehicle;
   3.2. communicate and explain proper visual skills for operating a motor vehicle;
   3.3. demonstrate the use of proper visual skills for operating a motor vehicle; and
   3.4. develop habits and attitudes with regard to proper visual skills.

4. **Vehicle Control**
   4.1. demonstrate smooth, safe and efficient operation of a motor vehicle; and
   4.2. develop positive habits and attitudes relative to safe, efficient and smooth vehicle operation.

(continued on next slide)
Montana Driver Education and Training Standards and Benchmarks

5. Communication
   5.1. consistently communicate driving intentions (i.e., use of lights, vehicle position, and personal signals);
   5.2. adjust driver behavior based on observation of the highway transportation system and other roadway users;
   5.3. adjust communication (i.e., use of lights, vehicle position, and personal signals) based on observation of the highway transportation system and other users; and
   5.4. develop positive habits and attitudes for effective communication.

6. Risk Management
   6.1. understand driver risk-management principles;
   6.2. demonstrate driver risk-management strategies; and
   6.3. develop positive habits and attitudes for effective driver risk-management.

7. Lifelong Learning
   7.1. identify and use a range of learning strategies required to acquire or retain knowledge, positive driving habits, and driving skills for lifelong learning;
   7.2. establish learning goals that are based on an understanding of one’s own current and future learning needs; and
   7.3. demonstrate knowledge and ability to make informed decisions required for positive driving habits, effective performance, and adaptation to change.

8. Driving Experience
   8.1. acquire at least the minimum number of BTW hours over at least the minimum number of days, as required by law, with a Montana-approved driver education teacher; and
   8.2. acquire additional behind-the-wheel driving experience with a parent or guardian’s assistance in a variety of driving situations (i.e., night, adverse weather, gravel road, etc.).