### Oregon 42: Lookingglass Creek to Interstate 5

Oregon Department of Transportation

November 15, 2022



#### **Project overview**

The Oregon 42 Lookingglass Creek to Interstate 5 project will:

- Resurface a 4.5-mile section of Oregon 42 between Lookingglass Creek (Winston) and Interstate 5.
- Add safety features to help reduce highway crashes through the Green District.
- Install a new Oregon 42 traffic signal at Rolling Hills Road.
- Upgrade sidewalk curb ramps to better accommodate wheelchair users and other pedestrians.



### Paving and bridge repairs



#### Paving Oregon 42 from Winston to I-5



Oregon 42 was last paved through Winston and Green in 2006.

The road surface is cracked and has been patched in several locations.

This project will provide a 2-inch grind/inlay from Lookingglass Creek to Interstate 5.

#### Repairing and paving damaged turn lanes



Many of the turn lanes in this section of Oregon 42 are damaged and rutted.

This includes the turn lane from Oregon 42 onto Grant Smith Road.

ODOT will repair and repave all of the turn lanes.

#### Oregon 42 bridge repairs



Oregon 42 crosses five bridges between Winston and I-5, including the two bridges over the south Umpqua River (photo).

Each bridge will receive new expansion joints, deck seals and overlays.

# Safety improvements



#### Highway crashes through Green District



The three-mile area of Oregon 42 between the South Umpqua River and Interstate 5 has seen several serious crashes in recent years, some involving fatalities.

Many of these crashes involve turning movements or vehicles departing their lane of travel.

#### Median barrier can prevent many crashes



To help reduce the number of crashes involving turning movements and lane departures, ODOT will place raised concrete barrier (similar to that seen in the photo) along some areas of the Oregon 42 median.

In other areas, ODOT will install smaller traffic separators.

#### Barrier on Oregon 42 at I-5 interchange



There have been several crashes on Oregon 42 at the I-5 interchange in recent years.

ODOT will install 42" tall concrete barrier along the center median of Oregon 42 from the split in the I-5 northbound ramps to the turn lane at Grant Smith Road.

#### Oregon 42 at Grant Smith Road (Old Hwy 99 S)



At the Grant Smith Road intersection, **ODOT** will install raised traffic separators and concrete islands along the center median, adjust the roadway to better accommodate Uturns, and upgrade sidewalk curb ramps.

#### Oregon 42 at Emils Way/Grange Road



Left-turn lanes will be provided for each direction of highway onto Emils Way and Grange Road.

However, drivers on the side roads may only turn right onto the highway.

Grange Road drivers can use Brittney Avenue to reach the highway.

#### Oregon 42 at Landers Avenue



A left-turn lane will be provided on Oregon 42 for eastbound highway traffic to reach Landers Avenue.

However, drivers on Landers Avenue will only be able to turn right onto the highway.

#### Oregon 42 at Jackie Avenue



A section of 42" tall barrier will be placed along the center median in the area of Jackie Avenue.

No left turns will be allowed in or out of Jackie Avenue.

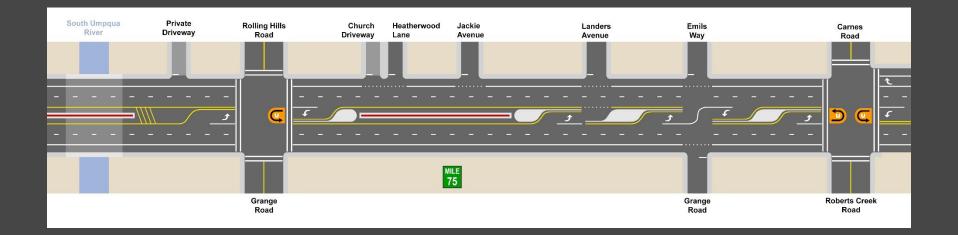
#### Oregon 42 at Heatherwood Lane



Barrier will also be placed along the center median of the highway at Heatherwood Lane and the neighboring church.

No left turns will be allowed in or out of Heatherwood Lane or the church driveway.

#### U-turns at Rolling Hills Road and Carnes Road



Due to these new restrictions on left turns, motorists may need to make U-turns at either Carnes Road or Rolling Hills Road to reach their destinations.

U-turn opportunities will also be provided for Oregon 42 motorists at Grant Smith Road.

#### Safe and legal U-turns at traffic signals



All three Oregon 42 traffic signals in the Green District will be adjusted to accommodate highway U-turns from their left-turn lanes.

During the protected green-arrow phase, highway motorists will be able to make left turns or U-turns.

Most passenger vehicles will be able to make U-turns at these intersections. Large commercial vehicles or trucks with trailers may need to use alternate routes.

### New traffic signal



#### New traffic signals must meet criteria

Before the state traffic-roadway engineer can approve a new traffic signal, ODOT is required to complete an engineering study. The location must meet at least one of nine warrants (criteria):

- 1. Eight-hour vehicular volume
- 2. Four-hour vehicular volume
- 3. Peak hour
- 4. Pedestrian volume
- 5. School crossing
- 6. Coordinated signal system
- 7. Crash experience
- 8. Roadway network
- 9. Intersection near a grade crossing

Since the Rolling Hills Road intersection will be used for U-turns, the intersection will meet warrants for vehicular traffic volume.

#### New traffic signal at Rolling Hills Road



The new traffic signal at Rolling Hills Road will provide turn lanes, U-turn accommodations, streetlights, and traffic detection sensors. For pedestrians, the intersection will provide crosswalks, ADA sidewalk curb ramps and push-button beacons.

## Solving a dilemma



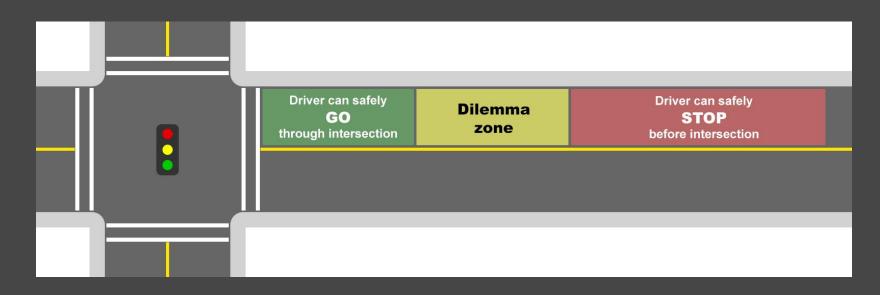
#### Kelly's Corner: Oregon 42 at Carnes Road



In recent years, many crashes have occurred along Oregon 42 at Kelly's Corner (Carnes Road) and Grant Smith Road.

We believe many of these crashes are related to the "dilemma zone."

#### Driving through the "dilemma zone"



When a traffic signal turns from green to yellow, some drivers near the intersection can safely go through it. Those further away have enough distance to safely stop.

Others may be caught in the "dilemma zone," where they must quickly decide whether it is safer to go through the intersection or stop before it. A wrong decision could lead to a crash.

#### Crashes related to the dilemma zone



If a vehicle enters an intersection during the yellow phase but is unable to reach the other side before the light turns red, they risk crashing into cross traffic. But if a driver stops too abruptly before the intersection, they could be rear-ended.

We believe we can improve safety by reducing the number of drivers who face this dilemma.

#### Working to solve the dilemma



ODOT will install new hardware on the Oregon 42 traffic signals at Grant Smith Road, Carnes Road (Kelly's Corner) and Rolling Hills Road.

The new system will maintain a green light until there's a natural gap in traffic. Then the signal will transition to the yellow phase.

This means fewer vehicles will be caught in the dilemma zone when a light turns yellow. We believe this change will result in fewer crashes.

### A better way to merge



#### Oregon 42 merging at I-5 overpass



Oregon 42 drivers heading east often get into the left lane early and won't allow drivers in the right lane to merge.

This can lead to aggressive behavior and crashes.

But there is a safer way to merge.

#### New markings encourage zipper merge



A more efficient solution is for drivers to use both lanes all the way to the lane reduction point, then take turns merging -left, right, left and so on. This is called a zipper merge.

New pavement markings in both lanes will encourage a zipper merge.

#### New merge signs on both sides



ODOT will also install "merge" signs to encourage drivers in both lanes to take turns merging.

The introduction of signs and markings on Oregon 99W in Dundee (photo) has helped encourage cooperative merging.

### ADA improvements



#### Recent ADA curb ramp project



In 2020 and 2021, ODOT replaced many of the sidewalk curb ramps on Oregon 42 between Abraham Ave. and Rose Ave. in Winston.

All new curb ramps comply with the Americans with Disabilities Act.

#### New ADA curb ramp construction

The new project will replace curb ramps along Oregon 42 at 14 intersections between the Cheetah statue and I-5.

- Douglas & Main St
- Baker St
- Jorgen St
- Sherry St
- Brosi Orchard Rd
- Lookingglass Rd
- Helwig Rd

- Rolling Hills Rd/Grange Rd
- Heatherwood Ln
- Jackie Ave
- Landers Rd
- Emils Way/Grange Rd
- Carnes Rd/Roberts Creek Rd
- Grant Smith Rd/Old Hwy 99S

These new curb ramps will also comply with the Americans with Disabilities Act.

#### Curb ramps at Cheetah intersection



Many sidewalk curb ramps in Winston and Green are difficult for pedestrians and wheelchair users to navigate.

The new curb ramps will benefit all sidewalk users.

#### Crosswalks and side street approaches



In addition to replacing ADA curb ramps, ODOT will also pave crosswalks and side street approaches, like this one at Baker Street, that are damaged or heavily cracked.

### For more information:

### www.Winston42.com