

# Queuing

## Safety & Operations

*Queuing is one of six safety and operations factors ODOT may consider when evaluating a highway approach application.*

### Points of Interest

What is queuing?

Why is ODOT concerned about queuing?

When does a queuing problem exist?

**What is Queuing?** Queuing refers to the line of vehicles that backs up behind a signal or stop sign, or behind motorists who are forced to yield to other traffic or pedestrian movements.

### Why is ODOT Concerned About Queuing?

A queue that blocks a highway approach prevents drivers from entering or exiting the driveway. If the blockage lasts for very long, frustrated drivers begin to take risks to get where they want to go, imperiling their own safety and others.

For example, a driver who has waited longer than they wish may decide to turn into oncoming traffic not knowing whether the gap between cars will allow a safe move, but relying on motorists in the queue to slow or stop to avoid a collision.



### Factors Considered in Queuing

- ✓ The distance from the end of the queue to the approach
- ✓ Whether there are breaks in the queue that allow safe turning

### When does a queuing problem exist?

- The measurement ODOT considers is the “95th percentile queue”, which means there is a 95% certainty that the queue will not extend beyond a certain point.
- If the end of the 95<sup>th</sup> percentile queue is at least 100 feet from the center of the highway approach, queuing is not a safety and operational concern.
- If the end of the 95<sup>th</sup> percentile queue is closer than 100 feet from the center of the highway approach or blocks the approach, there may be a safety or operational concern. The concern is flagged for further study by an ODOT traffic engineer.

