UNDERSTANDING ROUNDABOUTS

CITY OF SHORELINE

Roundabouts generate a skeptical response...

When almost anyone not familiar with roundabouts first hears about the potential construction of one they ask, "Why?" Roundabouts are often initially thought to be congestion bottlenecks, accident attractors and unsafe for pedestrians and cyclists.

... but the data tells a different story.

According to the Washington State Department of Transportation, roundabouts are:

Safer—for both cars and pedestrians. Data from both national and Washington State studies show that roundabouts are typically safer for all modes of travel than a signalized intersection.

Faster. Because traffic stops only when necessary, traffic flows and total travel times are less. In challenging conditions, roundabouts break down more slowly and recover more quickly.

Cheaper to own and maintain. Average Operations and Maintenance savings of $5,000 to $10,000 a year, compared to signalized intersections.

Greener. Fewer overall land impacts, and cars burn less fuel idling and stopping/starting.

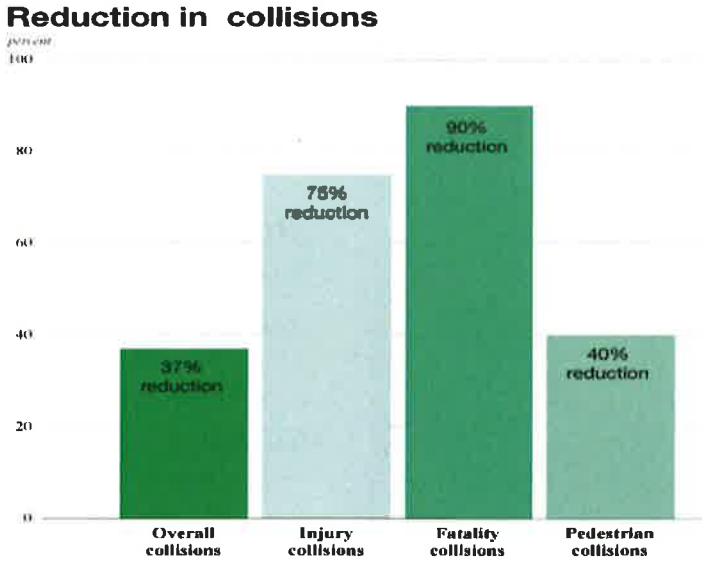
Roundabouts are safer for both cars and pedestrians

Lower speeds. Roundabout speeds are typically 15-20 mph. Collisions are less frequent and typically minor.

No racing through yellow lights. Reduces opportunity and incentive for unsafe behavior.

One way travel. Curved roads and one-way travel eliminate t-bone and head-on collisions.

Pedestrian/bicycle safety. Crosswalks are set further back from vehicle traffic, which allowsdrivers more time to react before merging in or out of the roundabout.



Washington's Target Zero safety initiative identifies roundabouts as a proven safety countermeasure. The chart above shows why.

To learn more about roundabouts

Visit WSDOT's roundabout webpage:
https://www.wsdot.wa.gov/Safety/roundabouts/benefits.htm

Or view this informative video:
https://youtu.be/LnT1HXo7p_4

ROUNDABOUTS VS. SIGNALIZED INTERSECTIONS

Roundabouts provide faster travel at lower speeds

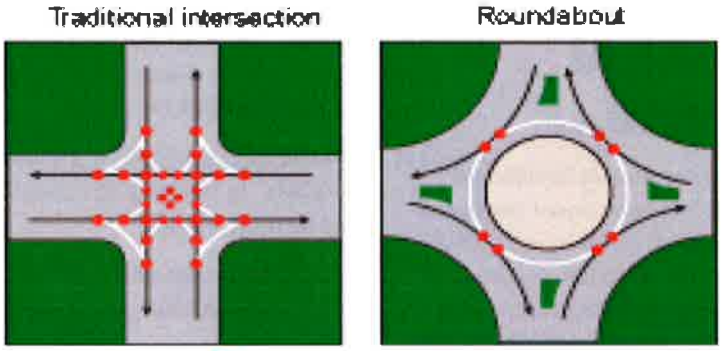
Traffic is required to yield, but may not need to stop. Plus, there is no waiting for traffic lights to change.

As a result, the intersection can handle more traffic in the same amount of time.

National studies show:

- **89 % REDUCTION** in travel delays
- **56 % REDUCTION** in vehicle stops

With roundabouts, head-on and high-speed right angle collisions are virtually eliminated



Roundabouts are cheaper in the long run

Building a roundabout costs about the same as a signalized intersection. But a roundabout eliminates the hardware, maintenance and power costs of traffic signals, saving $5,000 and $10,000 per year.

Roundabouts are greener, supporting sustainability

Less land needed. Because roundabouts handle traffic more efficiently, they require fewer approach lanes. While the intersection may require more property, the larger system does not.

Less fuel wasted. No prolonged stops and less congestion translates into lower gas consumption, less idling and reduced air pollution.

Roundabouts change minds

People may oppose roundabouts before they are installed, but after installation opinion rapidly shifts to positive. The chart on the right is a compilation of before & after sentiment surveys by the Federal Highway Administration.