

Washington State Hosts Roundabout Rodeo

Location

Bellingham, Washington
(Northeastern United States)

Implementation Stage

- ✓ Planning
- ✓ Design
- ✓ Construction

Roundabout Type/Setting

Multi-lane Roundabout in a rural location

Target Audience

- ✓ General public

Strategies Employed

- ✓ Mock Driveable Roundabout
- ✓ Expert on Hand

Background

Although Washington State has been constructing roundabouts in different localities across the state since the mid-1990s, there are still many communities without these types of intersections and citizens who are not familiar with what roundabouts are and how they are navigated. The City of Bellingham, in Whatcom County, WA, is an example of this type of community, and provided the setting for a memorable experience for the Washington State Department of Transportation (WSDOT).

The initial proposal for Bellingham's first roundabout was at a four-legged intersection where 18 collisions had occurred in a single year, and officials wanted to build a roundabout to improve conditions at that intersection and along the corridor. Similarly, in another part of Whatcom County, the community was struggling with the idea of roundabouts being constructed on a major highway near a border crossing. Residents voiced concerns about how viable the roundabouts would be for use by not only local farm equipment, but also the large freight trucks that moved on the corridor back and forth across the U.S.-Canadian border. Although meetings and face-to-face question and answer sessions were held, uncertainty persisted, and WSDOT faced stiff resistance from individuals who could not envision the concept or who still did not believe that the larger vehicles would be able to navigate the roundabouts safely. So, WSDOT decided to show them.

Approach

WSDOT decided to give a physical demonstration – not by building a roundabout per se – but by laying out one in a parking lot with cones, sandbags, and spray-on paint so that residents could come and experience driving a roundabout for themselves. This type of event is commonly called a mock driveable roundabout or a roundabout rodeo.

“Traffic engineer Phil Rust was one of the engineers that climbed aboard buses and semis all day. He felt that letting drivers get a hands-on feel for the size and shape made the mock roundabout a worthwhile project.”

— Brian Walsh
State Traffic Design Engineer
Washington Department of Transportation

WSDOT invited local farmers, fire departments, emergency services, school buses, city and county buses, and any other concerned residents that would be interested in learning about how to navigate a roundabout successfully. The goal was to dispel myths about roundabouts and promote their benefits. The agency encouraged the public to “bring the biggest, widest trailers you’ve got.” Staff also contacted the local media about the event, and the additional publicity brought even more people out to see the demonstration, drive through the mock roundabout and experience it for themselves.



Figure 1: A large truck yielding before entering the mock roundabout.



Figure 2: A snow plow approaching the mock roundabout.



Figure 3: A large truck and a school bus navigating the mock roundabout.

Many people drove the roundabout and reported a positive experience to the local media. In one instance, however, a truck driver didn't approach the roundabout in a way that it could be successfully navigated, so a WSDOT engineer got into the truck to show the driver how to set up his entry correctly so that the vehicle would traverse the roundabout without mishap. There were also a number of WSDOT staff present to brief truck drivers as well as the drivers of automobiles, tractors, and any other vehicles on the proper way to traverse the roundabout before trying to enter it. Traffic engineers were also available to enter each vehicle and talk drivers through it, offering tips and advice for driving through the mock roundabout in the form of hands-on education.

Results

WSDOT reports highly positive results from interacting directly with the public through the use of a roundabout rodeo. One of the more constructive results of having the "experts on hand" to talk with people is that a variety of myths about roundabouts were debunked, including concerns about pedestrian safety, size accommodations for large trucks, and how emergency response vehicles would safely traverse a roundabout. The presence of the WSDOT staff to explain to truck drivers about the wide truck apron used to accommodate larger vehicles and to show them the proper way to approach and navigate the mock roundabout went a long way toward dispelling that myth.

Lessons Learned

- A roundabout rodeo is best used when a jurisdiction is installing the first roundabout in a locality, as a larger percentage of the population is unfamiliar with the concept and will be more likely to attend the event.
- Make sure that you schedule the trucks that are interested in attending the roundabout rodeo as much as you possibly can. It works best if trucks come on a staggered but regular basis.
- If you can engage the media and have dedicated coverage for the event, it shows the public and elected officials that this type of outreach is worthwhile.
- Have knowledgeable people from the design staff that are pro-roundabout present at the rodeo ("expert-on-hand"). Many questions are asked during these activities, and the people with the answers need to be present.
- Be sure to talk with local trucking companies and other businesses with a large stake in the success of the community to obtain their participation before an outreach event like a roundabout rodeo.

Outreach Investment

According to WSDOT, the primary costs associated with a roundabout rodeo are the cost of labor for design staff, marketing staff, and the engineers who will be present at the event.

Related Products

General Information Website

"How to Drive a Roundabout,"

<http://www.wsdot.wa.gov/safety/roundabouts>

Video

Roundabout Rodeo Footage from Whatcom County, WA

<http://www.youtube.com/watch?v=HAQZ4muePOo>

Learn More

Brian Walsh

State Traffic Design Engineer
Washington State Department of Transportation

360.705.7986

walshb@wsdot.wa.gov

Jeffrey Shaw

Intersections Program Manager
FHWA Office of Safety

708.283.3524

jeffrey.shaw@dot.gov