

The Willow Final Draft Alternative – Proposed Traffic Calming Devices Toolbox



The proposed alternative for traffic calming in the Willows neighborhood was based on the study of historical data, on-the-street data, and feedback provided by the community. The project team reviewed past and current data gathered, evaluated all feedback received and found that suggestions varied greatly, even between neighbors. The current proposal responds to the data gathered and the community's cumulative feedback. A detailed walk through of the plan will be discussed at Thursday's meeting.

Raised Intersections

Description: A raised intersection is a raised section of roadway at an intersection where the pavement is elevated to be flush with the top of curbing and the approaches are ramped like speed humps.

Advantages:

- Effective in reducing vehicle speeds
- Opportunity for attractive pavement treatments
- Improved pedestrian safety at intersections

Disadvantages:

- May reduce emergency vehicle response times
- May require bollards (short vertical post s) to define corners of the intersection
- Relatively expensive



Speed Feedback Signs

Description: A radar unit (permanently or semi-permanently) that detects speeds of passing vehicles and displays it on a reader board.

Advantages:

- Educational tool
- Good public relations
- Effective for temporary speed reduction measures
- No effect on emergency vehicles

Disadvantages:

- Not self-enforcing
- Duration of effectiveness may be limited
- Not effective on multi-lane roadways having significant traffic volumes (too many approaching vehicles)
- May detract from neighborhood character
- Prone to vandalism



Speed Lumps

Description: A variation on a speed hump that can be straddled by large vehicles such as emergency vehicles and busses, but passenger vehicles are impacted in the same manner as a speed hump.

Advantages:

- Effective in reducing vehicle speeds
- Requires minimum maintenance
- Does not require parking removal
- Better when used in a series

Disadvantages:

- May increase traffic noise in vicinity of hump
- Less attractive than other measures
- Less aesthetically pleasing than other features
- May affect people with spinal problems



Gateway Signs

Description: Special architectural or roadway feature that identifies the entrance to a neighborhood. It may incorporate monuments, islands, textured pavements, signs or other features to provide a dramatic identity to the neighborhood's entrance.

Advantages:

- Increased motorist awareness of the neighborhood character
- Provides goal for traffic calming efforts
- Inexpensive to install
- Creates identity for neighborhood
- May create opportunity for landscaping

Disadvantages:

- Voluntary compliance
- Requires ongoing police enforcement to be truly effective
- Expensive to enforce
- May create a physical obstruction
- Little affect on traffic speeds or volumes
- May require localized removal of parking



Left Turn Restrictions

Description: Signs prohibiting turns into a roadway during AM and PM Peak Hours (7-9am and 4-6pm, respectively)

Advantages:

- Reduces cut-through traffic
- Redirects traffic to main streets
- When used on main streets, left turn prohibition can improve traffic flow and reduce collisions
- May increase trip length for drivers
- Inexpensive to install
- No effect on emergency vehicles

Disadvantages:

- Voluntary compliance
- Requires ongoing police enforcement
- May increase trip length for drivers
- May divert traffic to parallel streets without turn restrictions
- Can contribute to visual street clutter
- Effect of the sign wears off over time.



Signal Coordination

Description: It enables traffic signals to communicate with each other therefore allowing them to work together. When traffic signals work together (or are coordinated), they provide a greater opportunity for motorists to travel through adjacent traffic signals without making unnecessary stops.

Advantages:

- Improves mobility and access through the area
- Reduces vehicle accidents in the area
- Reduces energy and fuel consumption
- Reduces stops
- May control travel speeds
- Provides environmental benefits from reduced vehicle emissions

Disadvantages:

- Increase in travel speeds may have a negative impact in the community
- May attract additional traffic through the corridor
- Maintenance and equipment costs may be high based on the type of hardware and software used
- Requires qualified staff for maintenance and monitoring of daily operations.



Reduced Lane Width/Edge line

Description: Streets can be restriped in various ways to alter driver behavior. The striping can include yellow centerlines, edge/shoulder striping or bike lane striping, restriping lanes to have narrower widths.

Advantages:

- May have slight impact on reducing vehicle speeds
- Minimal impact on emergency vehicles
- May provide facilities for bicyclists
- Often less objectionable than other measures

Disadvantages:

- May require enforcement
- May require additional maintenance of striping
- May have little effect on speed or volume



Partial One-Way Conversion (Half Closure)

Description: Half closures are barriers that block travel in one direction for a short distance on otherwise two-way streets. They are good for locations with extreme traffic volume problems and non-restrictive measures have been unsuccessful. The sidewalk or bicycle accesses remain open.

Advantages:

- Reduces cut-through traffic
- Provides area for landscaping
- Reduces intersection conflicts
- Increases pedestrian safety
- Can include bicycle pathway connection

Disadvantages:

- They causes circuitous routes for local residents and emergency services
- They may limit access to businesses
- Depending on the design, drivers may be able to circumvent the barrier
- May shift traffic to other nearby streets



Right Turn Restrictions

Description: Signs prohibiting right turns into a roadway

Advantages:

- Reduces cut-through traffic
- Redirects traffic to main streets
- May increase trip length for drivers
- Inexpensive to install

Disadvantages:

- Voluntary compliance
- Requires ongoing police enforcement
- May increase trip length for drivers
- May divert traffic to parallel streets without turn restrictions
- Effect of the sign wears off over time.
- Can contribute to visual street clutter

