

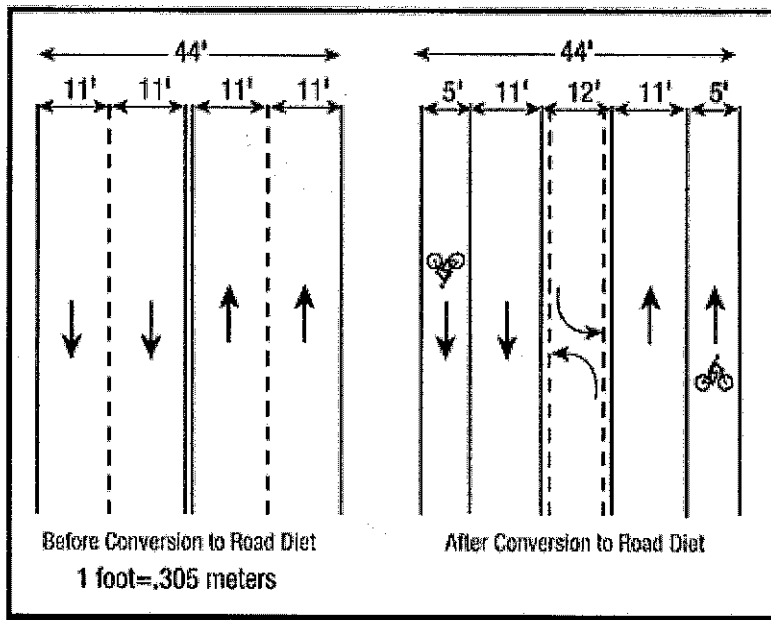
SUBJECT: TREKELL ROAD LANE MODIFICATIONS

This is a proposal for changes to the lane layout of Trekell Road. These changes are expected to reduce crashes, increase safety for bicyclists, and protect pedestrians.

To the north of the Trekell-Florence intersection, we propose to add a dedicated right turn lane and convert the left hand through lane to an additional left turn lane to provide two left turn lanes. The additional left turn lane will enable the intersection to handle more traffic than the current configuration with only one left turn lane in operation.

To the south of the Trekell-Florence intersection, we propose to reduce the current lane layout of four undivided through lanes (two lanes in each direction) to one through lane in each direction, a center two way left turn lane, and new bike lanes at the outside edges of the through lanes. These lane modifications maintain adequate capacity for the expected volume of traffic while improving operations and safety for vehicles, bicyclists, and pedestrians.

Example:



TREKELL ROAD SOUTH OF FLORENCE:

South of the Florence Boulevard intersection, Trekell Road is currently 44 ft wide with four 11 ft wide travel lanes. With this proposed alteration, Trekell Road will be restriped with two 11 ft wide travel lanes, two 5 ft wide bike lanes, and a 12 ft wide center left turn lane. This type of alteration is called a 'road diet' and is primarily implemented on low volume roadways to reduce traffic speed and crashes. The most common crashes on roads like Trekell Road approaching Florence Boulevard are a result of cars slowing or stopping in through lanes with the intent to turn left. A driver blocking traffic in a through lane creates a number of opportunities for easily

preventable crashes, such as read-ends and side-swipes. The single through lane with the dedicated left turn lane will serve to significantly reduce the common types of crashes that are seen at this location.

Trekell Road sees significant use not just by motor vehicles, but also by bicyclists and pedestrians. The proposed changes will create bike lanes on each side of the road south of the Trekell-Florence intersection. Bike lanes create a safe route for cyclists without disrupting other travelers while also offering additional buffer space between pedestrians and passing vehicles. Pedestrians will also benefit from reduced distance to cross vehicular traffic lanes at crosswalks, where they will be more visible to drivers.

Although the number of through lanes will be reduced, Trekell Road should not see an increase in traffic congestion. A traffic study conducted in March 2011 showed that 4,481 vehicles traveled in both directions on Trekell over a 24-hour period. This volume of traffic makes Trekell Road south of the Trekell-Florence intersection a minor arterial in an urban setting. Four lanes are unnecessary for that level of traffic volume on Trekell Road.

TREKELL ROAD NORTH OF FLORENCE:

Trekell Road currently has three southbound lanes leading into the Trekell-Florence intersection:

- A through and permitted right turn lane
- A through-only lane
- A dedicated left turn lane

The proposed improvements will create:

- A second southbound left turn lane
- A dedicated right turn lane.

These lanes will be adjusted to accommodate and line up with the proposed changes to the south side of the intersection.

The proposed lane modifications are expected to reduce congestion at the intersection during peak traffic times. Increasing the southbound left turn lanes will allow more vehicles wanting to head east towards I-10 to pass through the intersection each signal cycle than the current single southbound left turn lane configuration. Similarly, providing a dedicated right turn lane will also allow more vehicles wanting to head westbound traffic towards the Maricopa-Casa Grande Highway to pass through the intersection than under the current configuration as they will no longer be held up by stopped traffic wanting to cross Florence Boulevard. The city owns the right of way on the northwest corner of the Trekell-Florence intersection, eliminating any delays in construction typically seen for projects awaiting right of way acquisition.

Casa Grande is ever-evolving and population growth projections promise even more changes into the future. The proposed traffic modifications will not be the last alterations needed, but they will provide a solid foundation for making our roadway network more efficient and safer for drivers, bicyclists, and pedestrians alike.