



STAFF REPORT

DATE: 04/02/2025
TO: Honorable Mayor and City Council Members
FROM: Public Works Department

2025-136

REQUEST FOR CITY COUNCIL ACTION

SUBJECT:

REQUEST FROM COUNCIL MEMBER SPEAKE FOR PROPOSED IMPROVEMENTS TO THE MAGNOLIA AVENUE AND EL SOBRANTE ROAD INTERSECTION

EXECUTIVE SUMMARY:

This report asks the City Council to provide staff directions to explore treatments to reconfigure the intersection of Magnolia at El Sobrante, quantifying the impacts and benefits of the proposed reconfigurations.

RECOMMENDED ACTION:

That the City Council:

- a. Approve staff's recommendation to implement the short-term plan of crosswalk removal at El Sobrante Road in the interest of removing disruptions to the corridors signal coordination.
- b. Provide feedback and direction on the proposed long-term treatments, perform detailed traffic studies to quantify the impacts of these proposed treatments, and prepare a future presentation to discuss conceptual alternatives and study results for the proposed long-term reconfigurations of the intersection of Magnolia at El Sobrante.

BACKGROUND & HISTORY:

Council Member Speake submitted a Future Agenda Item Request Form, requesting available options to improve traffic operations along the Magnolia Avenue corridor, specifically at the intersection of Magnolia Avenue and El Sobrante Road. The Magnolia Avenue Corridor's operations are complicated by the sheer volume of traffic on Magnolia, Caltrans jurisdiction control of I-15 ramp signals, and the proximity of adjacent intersections to each other. This corridor has been a delicate balance of traffic flow between the I-15 freeway and Magnolia Avenue, a major arterial, since its inception.

The Traffic Engineering Division is responsible for operating and maintaining the traffic flows through the City of Corona. Staff is currently conducting a traffic signal synchronization project at this location, and several proposed improvement suggestions arose out of this engineering effort. As a result, staff proposes both short-term and long-term options, including near-term removal of the delay-inducing crosswalk across Magnolia at El Sobrante Road, reconfiguring the intersection to limit access (right in/right out) with the removal of the traffic signal, and a full reconfiguration of El Sobrante Road terminating short of Magnolia Avenue with the removal of the traffic signal.

ANALYSIS:

Currently, a project to retime or synchronize the traffic signals along the Magnolia Avenue Corridor from Rimpau Avenue to Sixth Street is underway. This effort has shown the constraints that are inhibiting optimal traffic flow on Magnolia Avenue. The corridor comprises of traffic signals owned and operated by the City of Corona, with two Interstate 15 ramp signals in the center of the corridor operated by the State of California Transportation Department (Caltrans). These entities have competing objectives for the use of signal timing on this corridor; Caltrans endeavors to serve the ramps so as not to queue back onto the freeway mainline, and the City of Corona strives to move traffic as efficiently as possible on Magnolia Avenue. These competing objectives are further hampered by the close proximity of El Sobrante Road with the Interstate 15 Southbound Offramp.

Short-Term Improvements

While analyzing the corridor for signal timing change, it was noted that the crosswalk crossing Magnolia Avenue at El Sobrante Road required a substantially high pedestrian timing interval far exceeding the timing required for vehicles to cross. This results in significant delays and causes this intersection to 'transition' out of synchronization with its adjacent traffic signals. Each pedestrian activation could cause several minutes out of synch, sending delays up and down the corridor. Removing this crosswalk would enable optimized signal timing and reduce the risk of transition delays. An available crosswalk is located at Rimpau Avenue, just three hundred sixty feet west of El Sobrante.

Potential Long-term Improvements – Option A

A long-term option to optimize the corridor would be to reconfigure the intersection of El Sobrante Road and Magnolia Avenue to a limited access configuration. This would convert the intersection into a permissive "right in/right out" access for both El Sobrante Road and the shopping center driveway and include removing the traffic signal at this

location. With the movements restricted to right in/right out, this enables the former intersection space to be utilized for additional vehicle storage for Rimpau and Freeway turn movements.

Long-term Improvements – Option B

The other option is to permanently remove access from El Sobrante Road to Magnolia Avenue. This would require the “knuckling” of El Sobrante Road, where it meets the driveway of the small shopping center North of Magnolia and West of El Sobrante. This option further benefits reduced conflict points by restricting access, while giving the same benefits of the traffic signal removal. Both restricted access options would require the rerouting or detouring of traffic to other adjacent roadways like the already congested Rimpau Avenue or further to the El Camino Avenue corridor.

Potential Benefits:

- Less traffic signal delay
- Additional vehicle throughput on Magnolia Avenue
- Increased turn movement storage
- Less roadway conflict points, resulting in a safer roadway
- Blank canvas for beautification

Potential Challenges:

- Pedestrian delays
- Emergency access
- Diverted traffic
- Reduced access to businesses and shopping center

Staff recommends proceeding with the short-term improvements and is seeking direction from the City Council on studying the long-term options. Studying the long-term options could cost approximately \$30,000 and may require additional funding approval from the City Council.

FINANCIAL IMPACT:

The financial impact of the short-term recommendation for crosswalk removal at El Sobrante Road has been determined to be less than \$9,500. This would include the use of staff time for the required traffic signal modifications, staff time to prepare public notices and conduct a public meeting to satisfy the requirements of the California Vehicle Code, and the City’s striping contractor to modify the intersection striping. This effort would be covered under the Traffic Engineering Division’s existing budget for signal and striping work.

The financial impact of a long-term potential plan with associated projects reconfigurations has yet to be determined. Researching and preparing studies and conceptual options for the council to consider will require approximately 30 hours of staff time and \$30,000 of consultant costs. The Traffic Engineering division can utilize existing on-call contracts with firms qualified to complete this scope of work, but this effort is not budgeted.

ENVIRONMENTAL ANALYSIS:

This action is exempt pursuant to Section 15061(b)(3) of the Guidelines for the California Environmental Quality Act (CEQA), which states that a project is exempt from CEQA if the activity is covered by the general rule that CEQA applies only to projects that have the potential for causing a significant effect on the environment. Where it can be seen with certainty that there is no possibility that the activity in question may have a significant effect on the environment, the activity is not subject to CEQA. This action provides direction to the Public Works Traffic Engineering staff to explore treatments to reconfigure the intersection of Magnolia at El Sobrante, quantifying the impacts and benefits of the proposed reconfigurations. Since there is no possibility that this action will have a significant effect on the environment, no environmental analysis is required. Individual projects will be reviewed for environmental compliance accordingly in the future.

PREPARED BY: AARON COX, SENIOR ENGINEER – TRAFFIC

REVIEWED BY: SAVAT KHAMPHOU, PUBLIC WORKS DIRECTOR

ATTACHMENTS:

1. Exhibit 1 – Presentation
2. Exhibit 2 – Future Agenda Request Form (Speake)