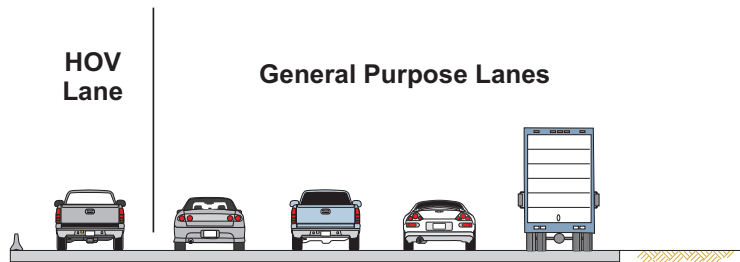
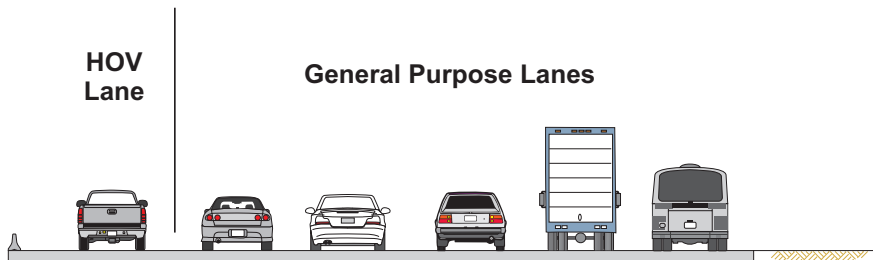


# Potential Solutions

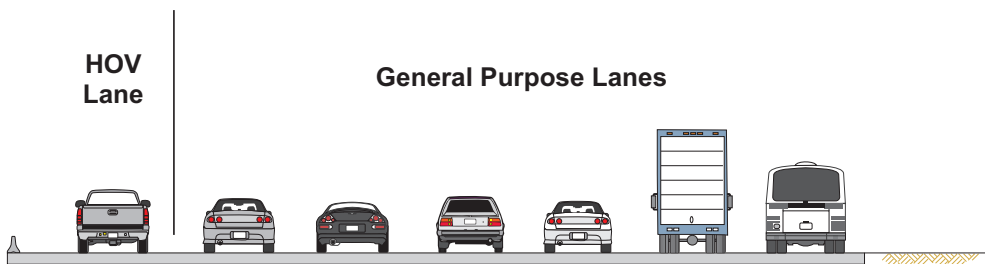


## Existing



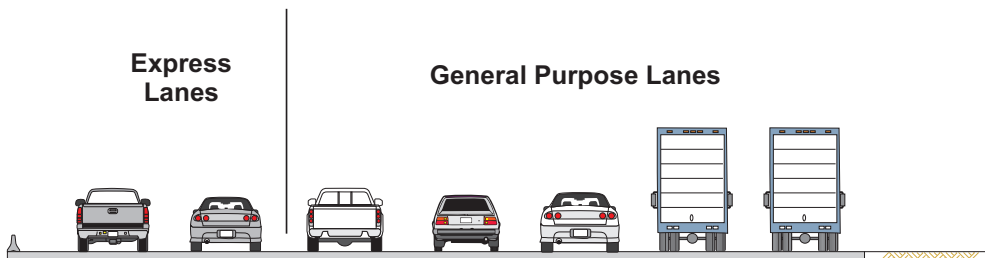
## Alternative 1

Adds One general Purpose Lane in Each Direction



## Alternative 2

Adds Two General Purpose Lanes in Each Direction

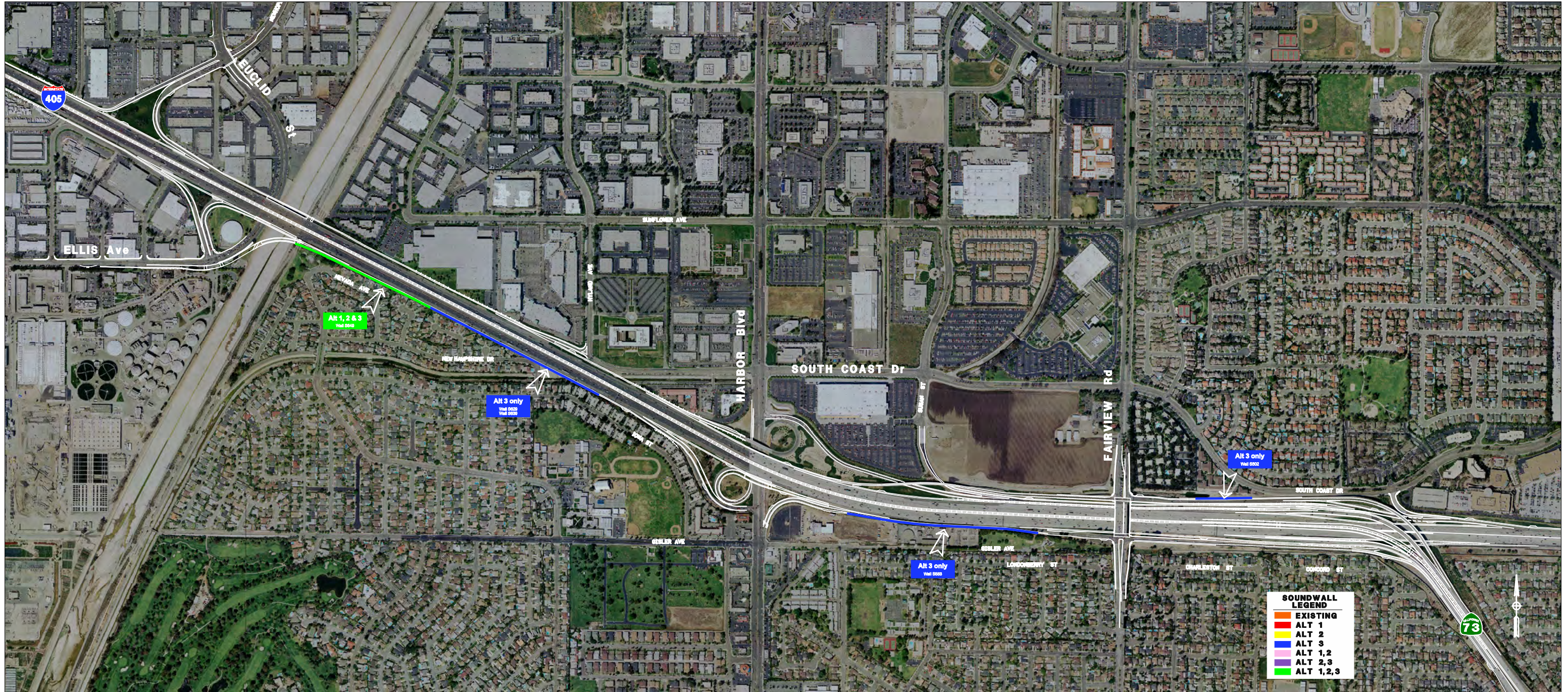


## Alternative 3

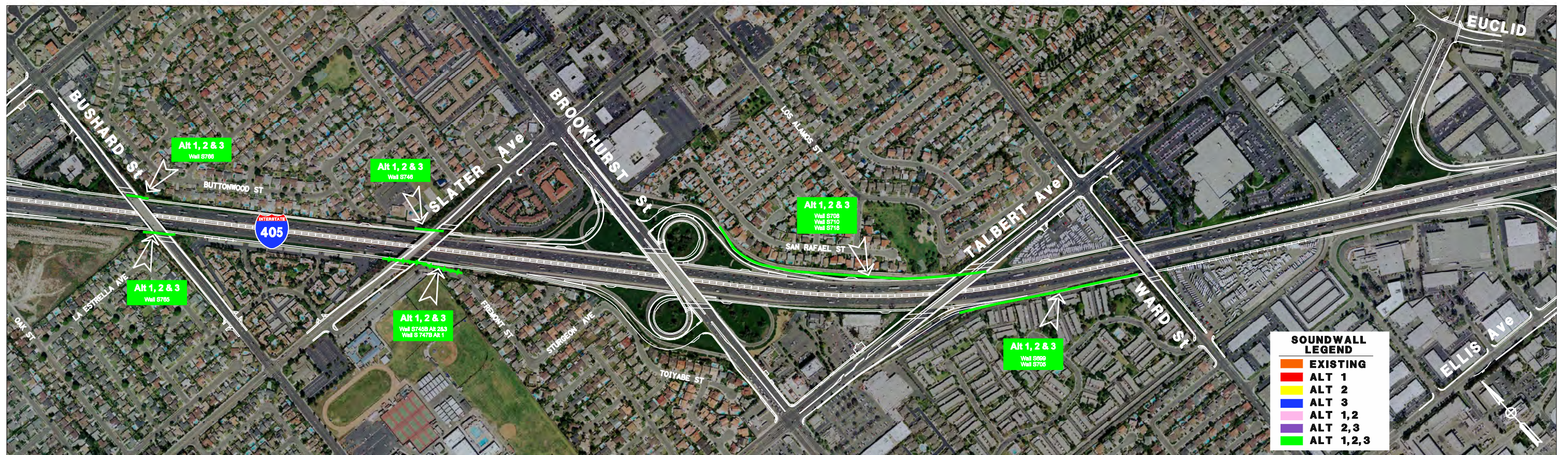
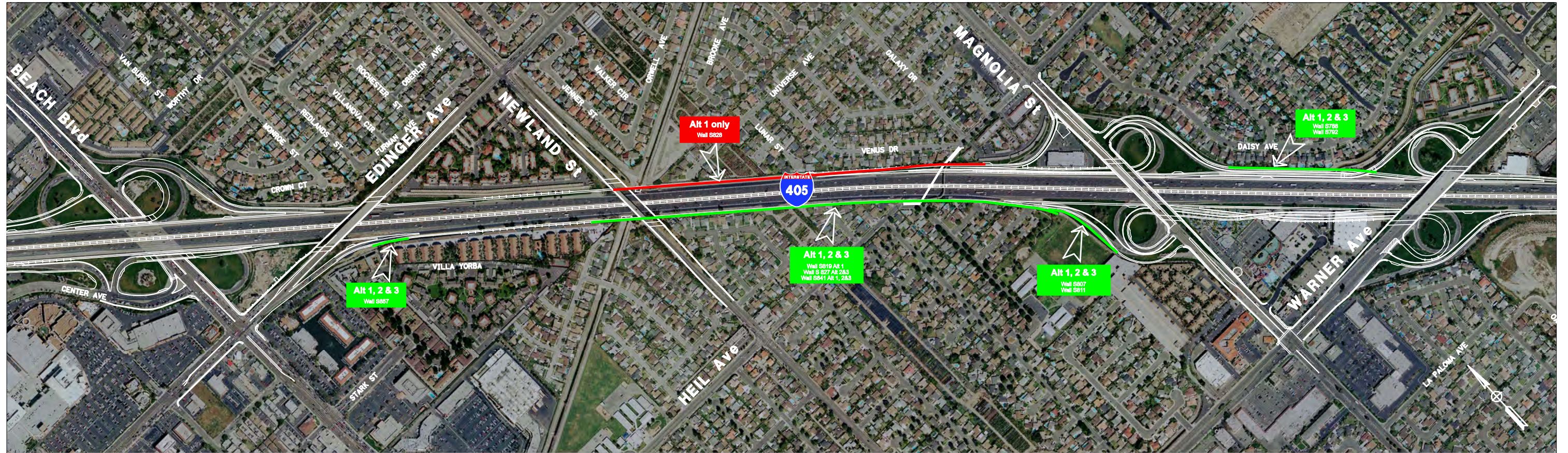
Express Facility Alternative: Adds one lane adjacent to the carpool lane in each direction. Both lanes will be managed together as the Express Facility.

Adds one new general purpose lane.

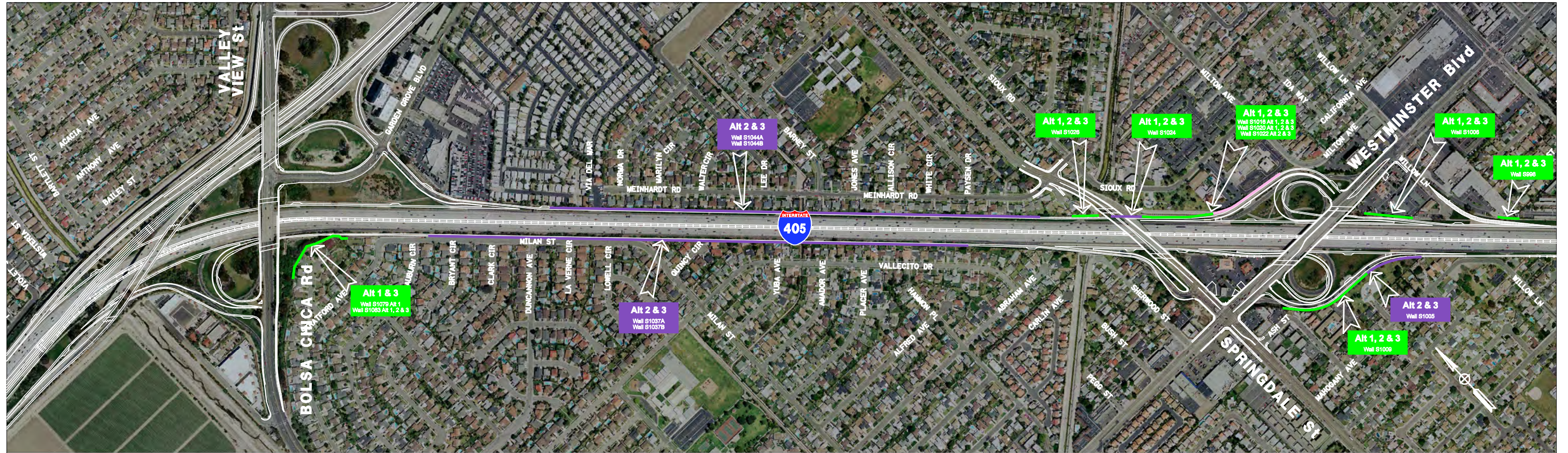
# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED SOUNDWALLS



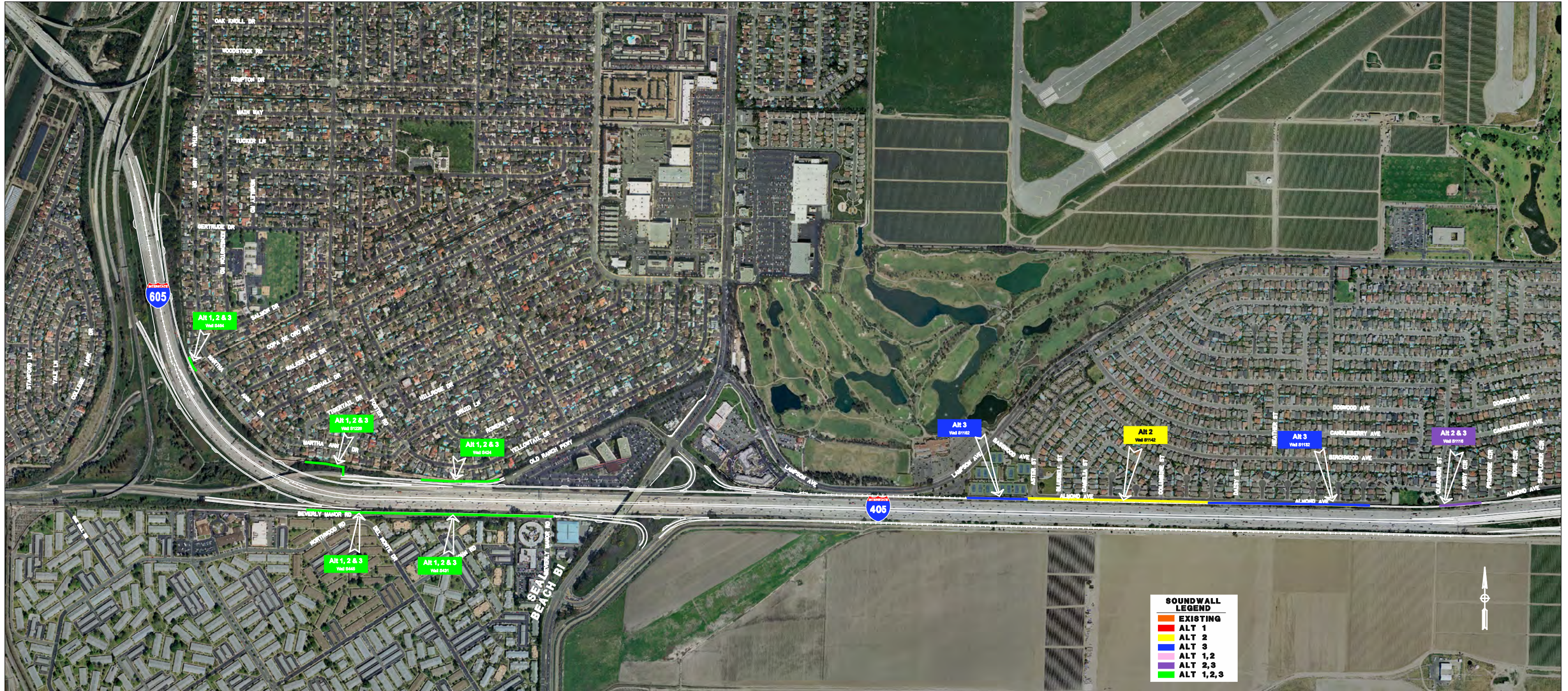
# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED SOUNDWALLS



# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED SOUNDWALLS

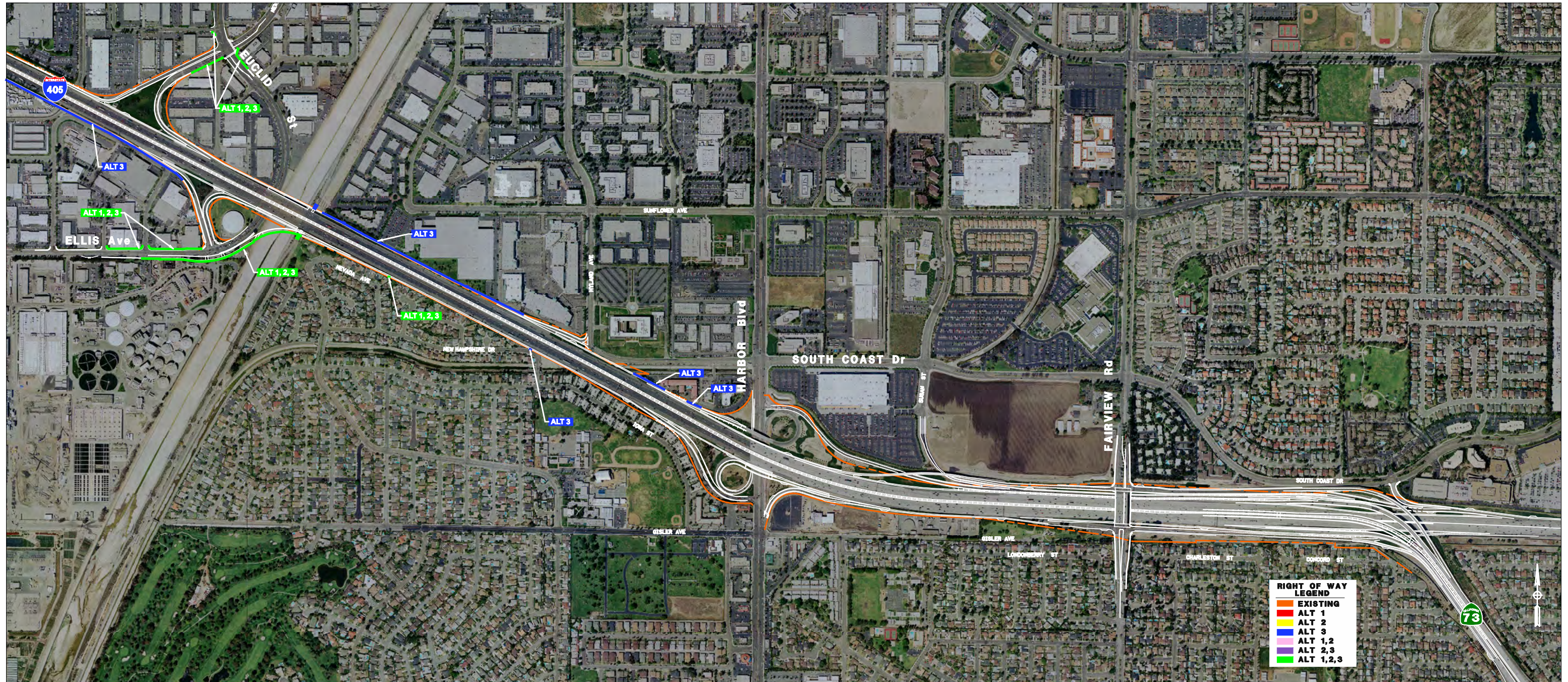


# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED SOUNDWALLS

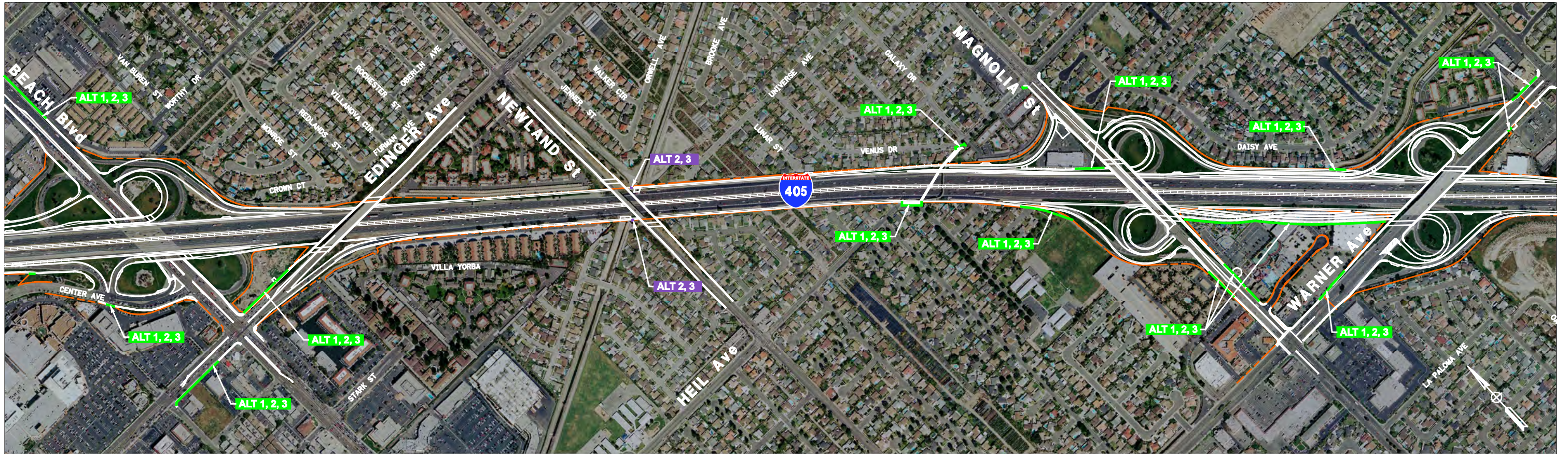


SOUNDWALL LEGEND	
<span style="color: red;">█</span>	EXISTING
<span style="color: yellow;">█</span>	ALT 1
<span style="color: blue;">█</span>	ALT 2
<span style="color: pink;">█</span>	ALT 3
<span style="color: purple;">█</span>	ALT 1, 2
<span style="color: green;">█</span>	ALT 2, 3
<span style="color: green;">█</span>	ALT 1, 2, 3

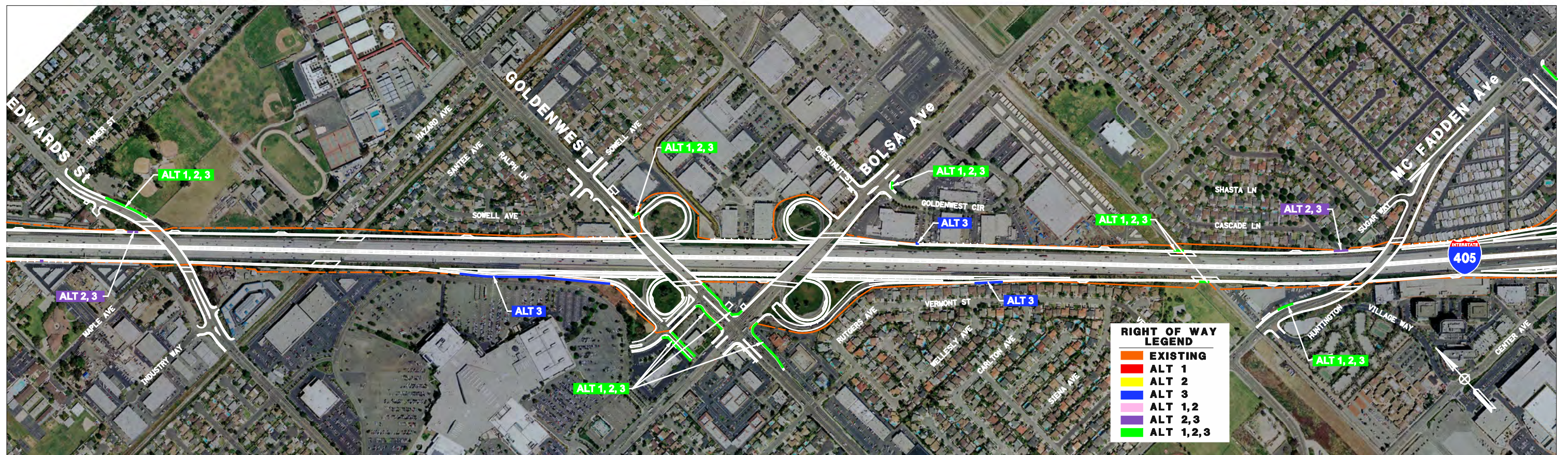
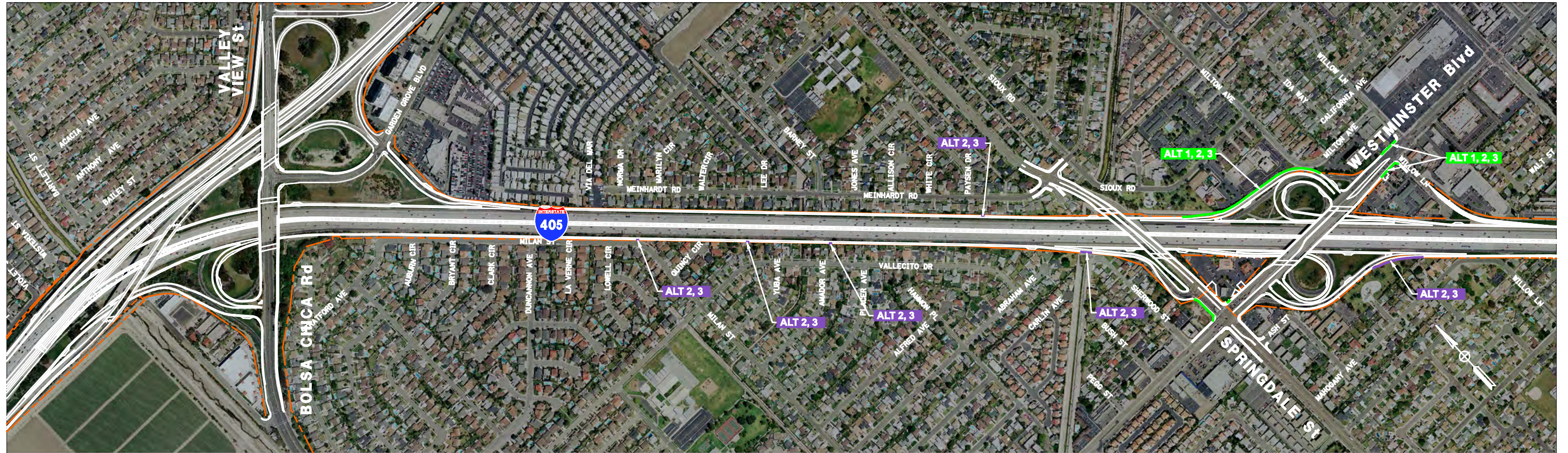
# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED RIGHT OF WAY



# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED RIGHT OF WAY

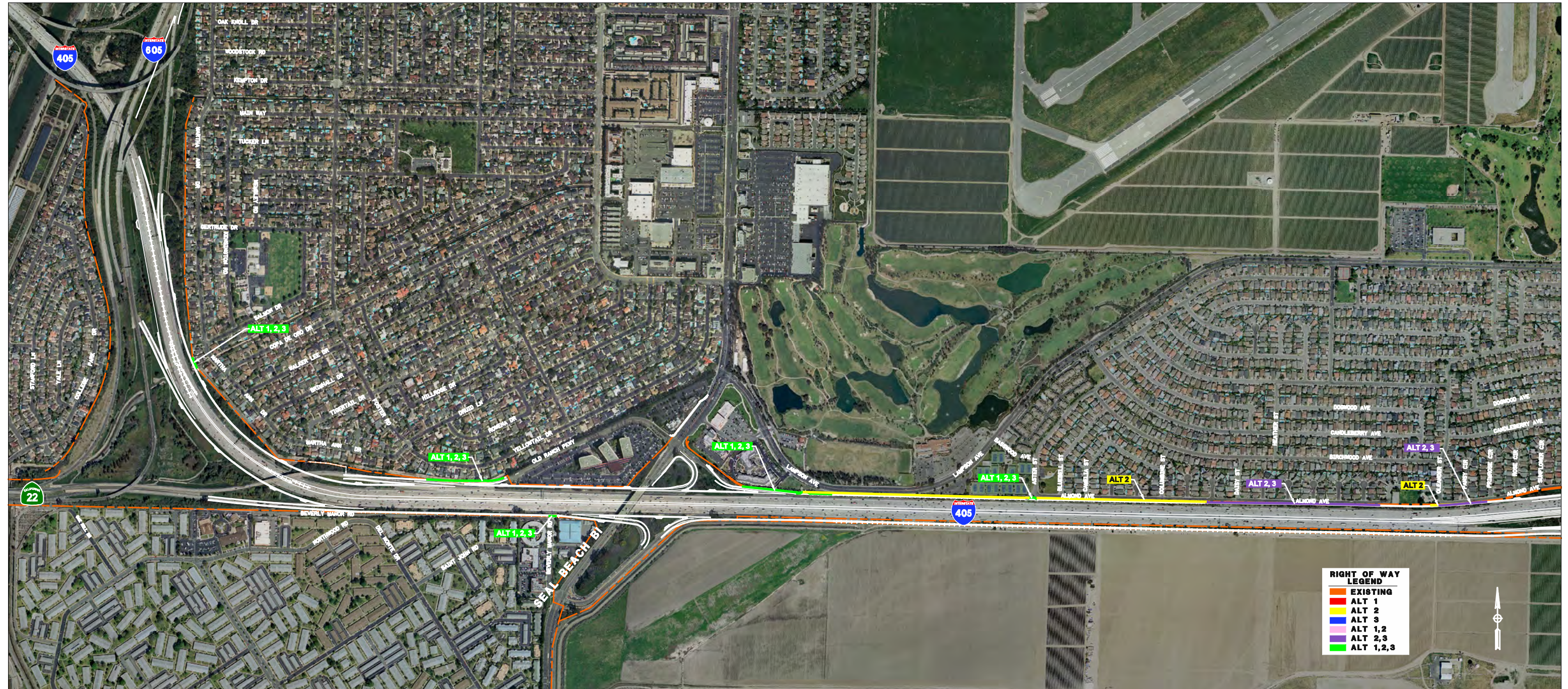


# I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED RIGHT OF WAY





## I-405 IMPROVEMENT PROJECT EXISTING AND PROPOSED RIGHT OF WAY

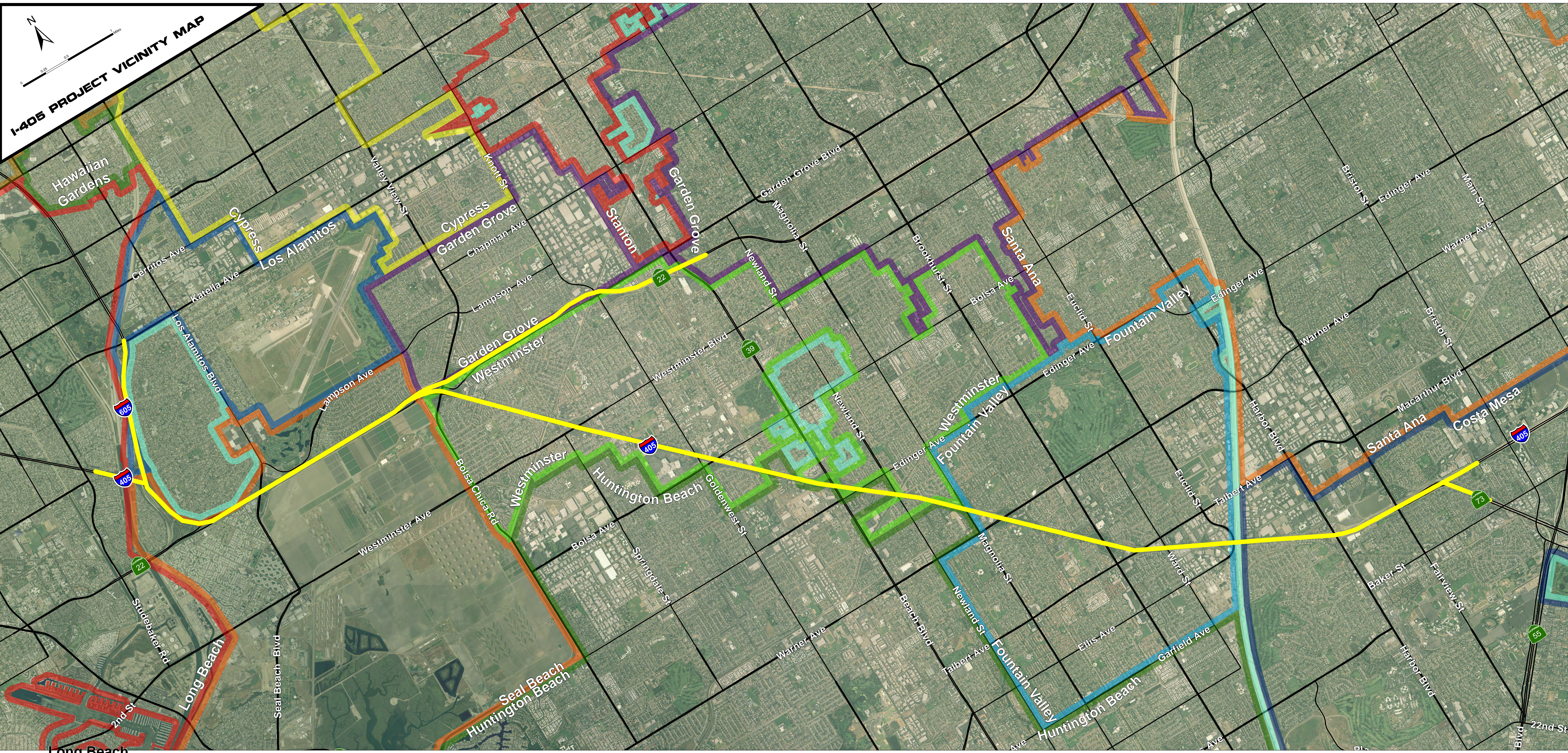


# *Project Schedule*

Prepare Draft EIR/EIS*	2009 – 2012
Public Review	May 18 - July 2, 2012
Preferred Alternative/ Finalize EIR/EIS	July 2012 – April 2013
Design and Construction	2015 - 2019

\*Environmental Impact Report / Environmental Impact Statement

# I-405 PROJECT VICINITY MAP



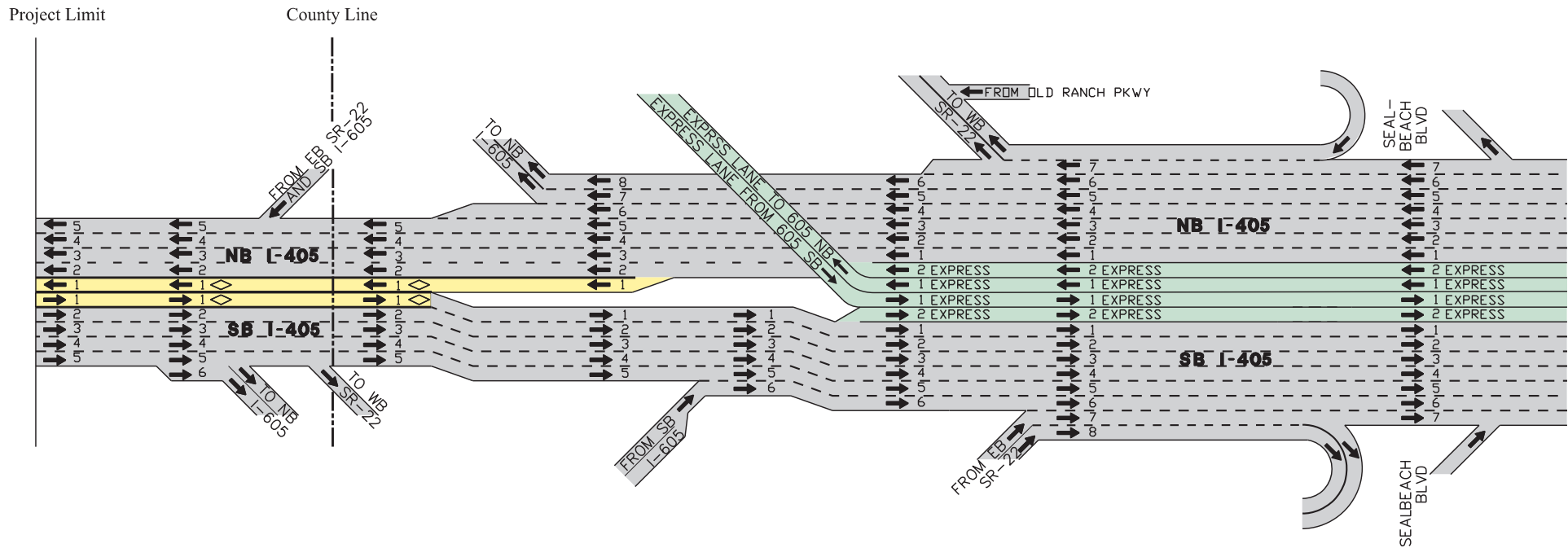
**Project Segments:** Hawaiian Gardens, Cypress, Los Alamitos, Garden Grove, Stanton, Garden Grove, Santa Ana, Fountain Valley, Westminister, Fountain Valley, Santa Ana, Costa Mesa, Huntington Beach, Seal Beach, Huntington Beach, Fountain Valley, Huntington Beach.

**Major Roads:** I-405, I-605, SR 22, SR 39, SR 73, SR 55, Seal Beach Blvd, Studebaker Rd, 2nd St, Cerritos Ave, Katella Ave, Los Alamitos Blvd, Lampson Ave, Valley View St, Knott St, Chapman Ave, Garden Grove Blvd, Magnolia St, Brookhurst St, Bolsa Ave, Euclid St, Edinger Ave, Warner Ave, Main St, Bristol St, Edinger Ave, Harbor Blvd, MacArthur Blvd, Santa Ana, Costa Mesa, 22nd St, Blvd.

**Other Labels:** Long Beach, Seal Beach, Huntington Beach, Westminister, Garden Grove, Stanton, Santa Ana, Fountain Valley, Huntington Beach, Seal Beach, Huntington Beach, Fountain Valley, Huntington Beach.

# Alternative 3

## General Purpose and Express Lane Configuration\*

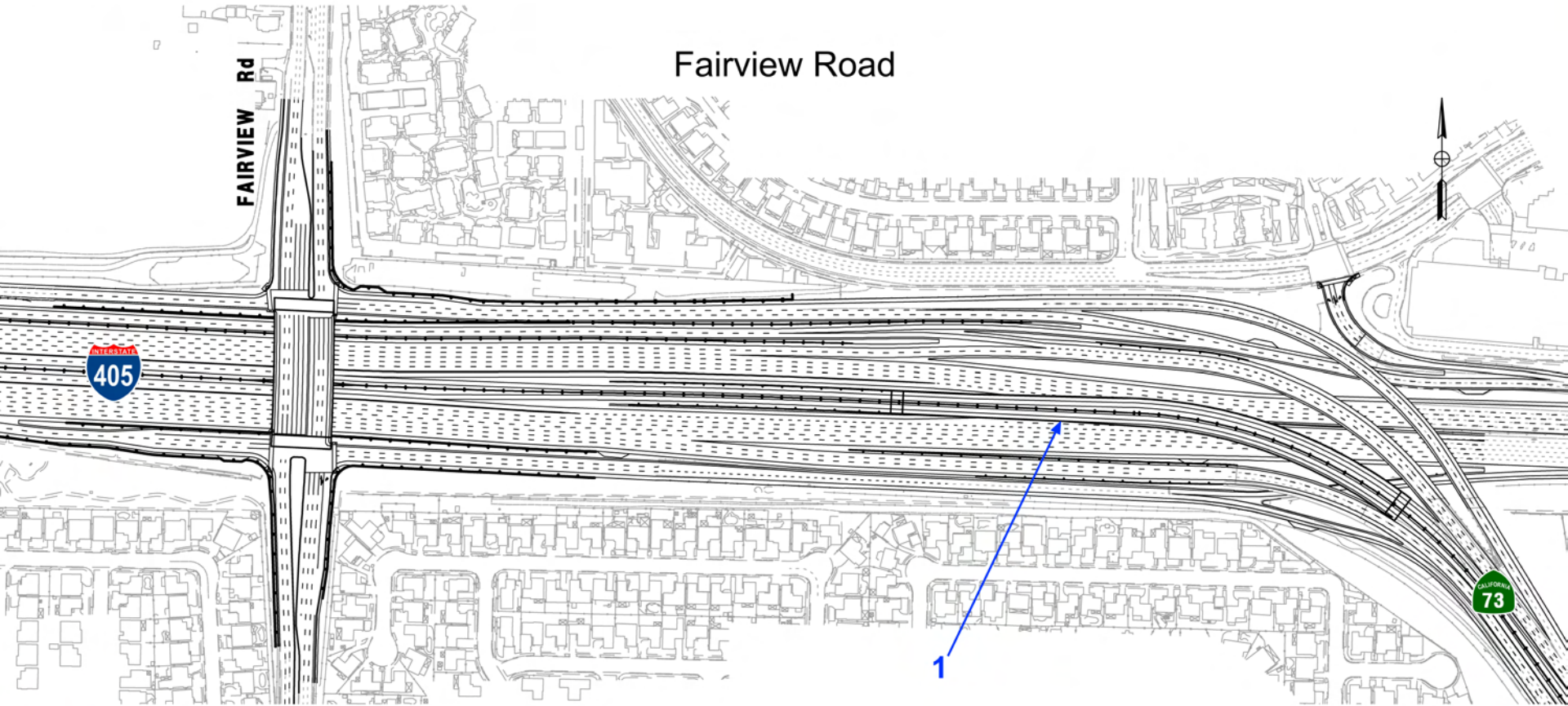


\* Final transition treatments may be modified based on latest Caltrans Guidelines



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change



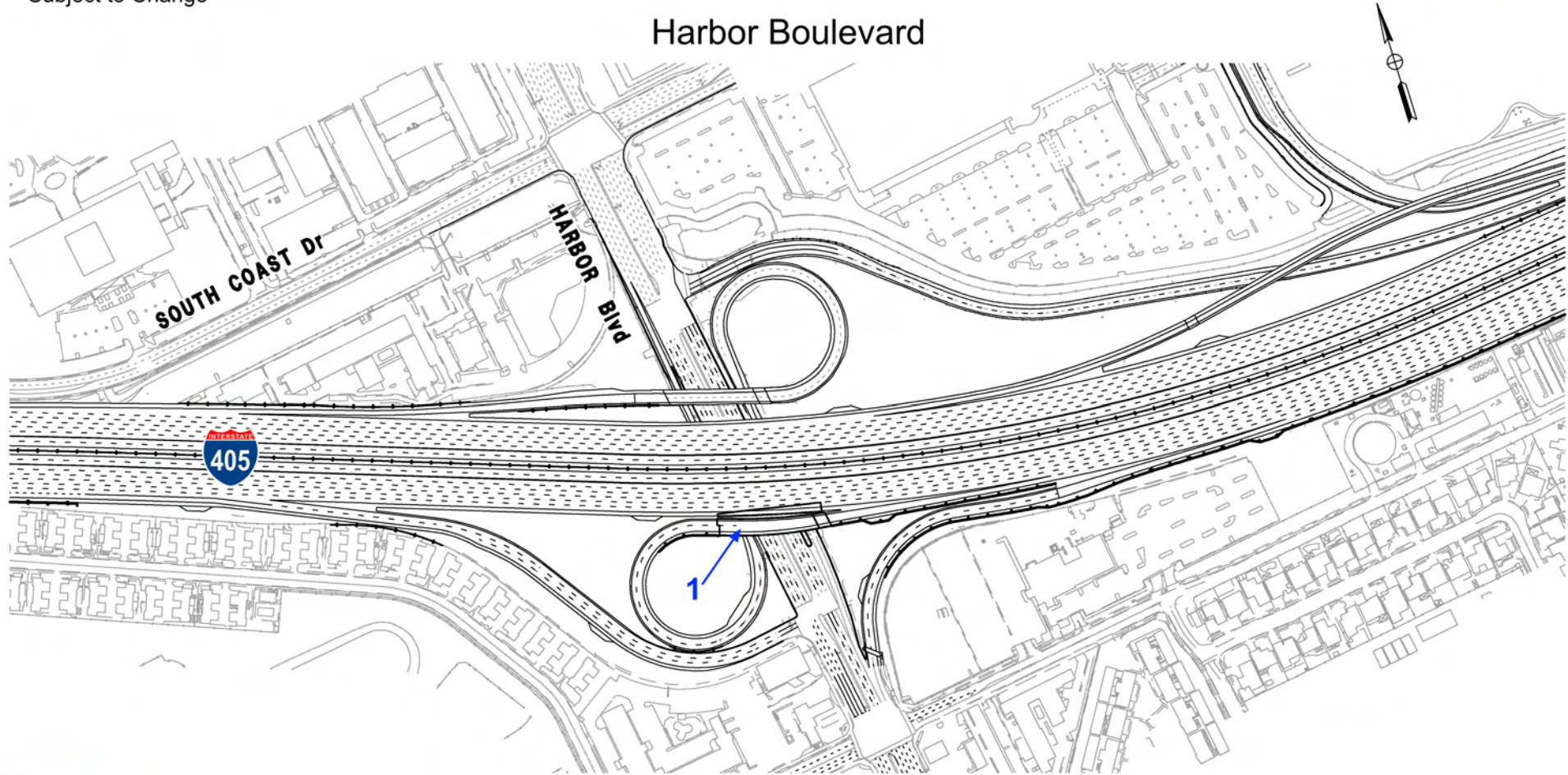
1 A direct Express Lane Connector between the I-405 and the SR-73 for Alternative 3



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

Harbor Boulevard

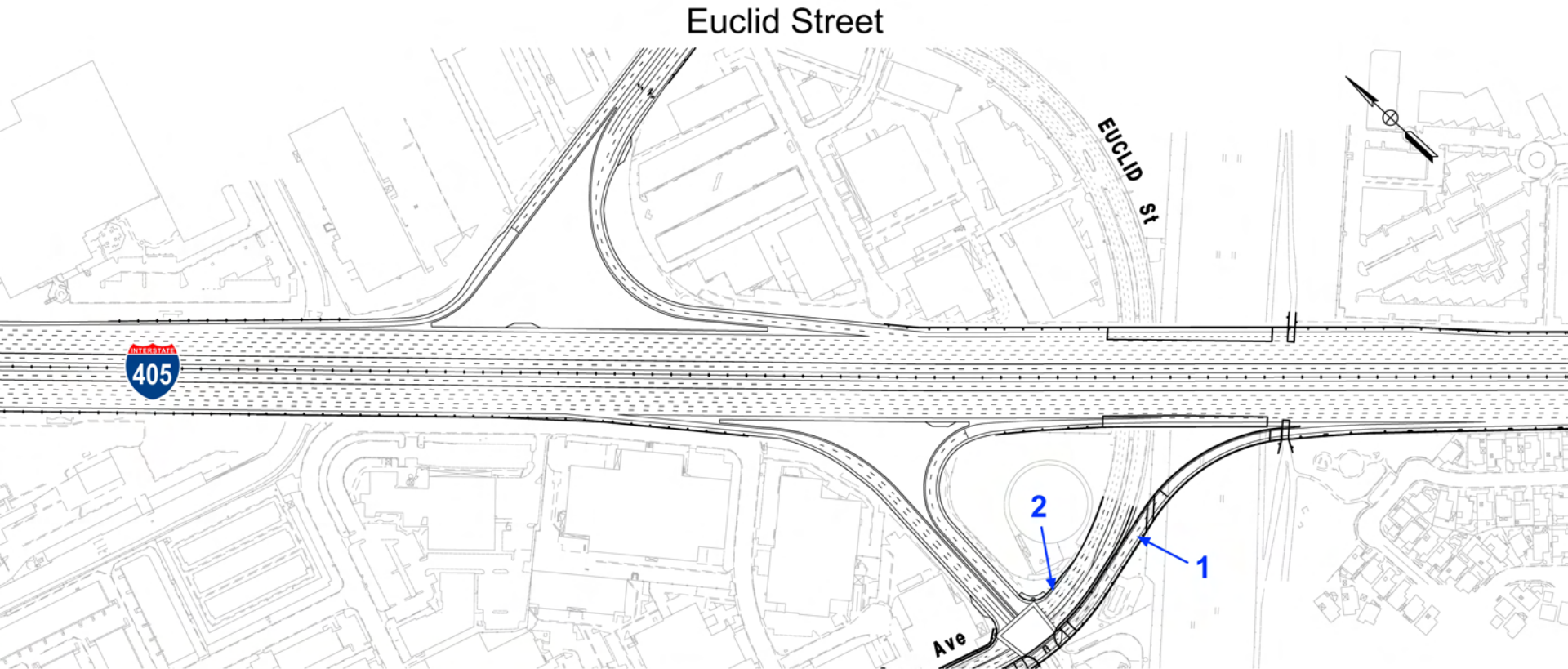


- 1 Construct a new bridge over Harbor Blvd. to handle traffic at the loop on ramp to southbound I-405



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change



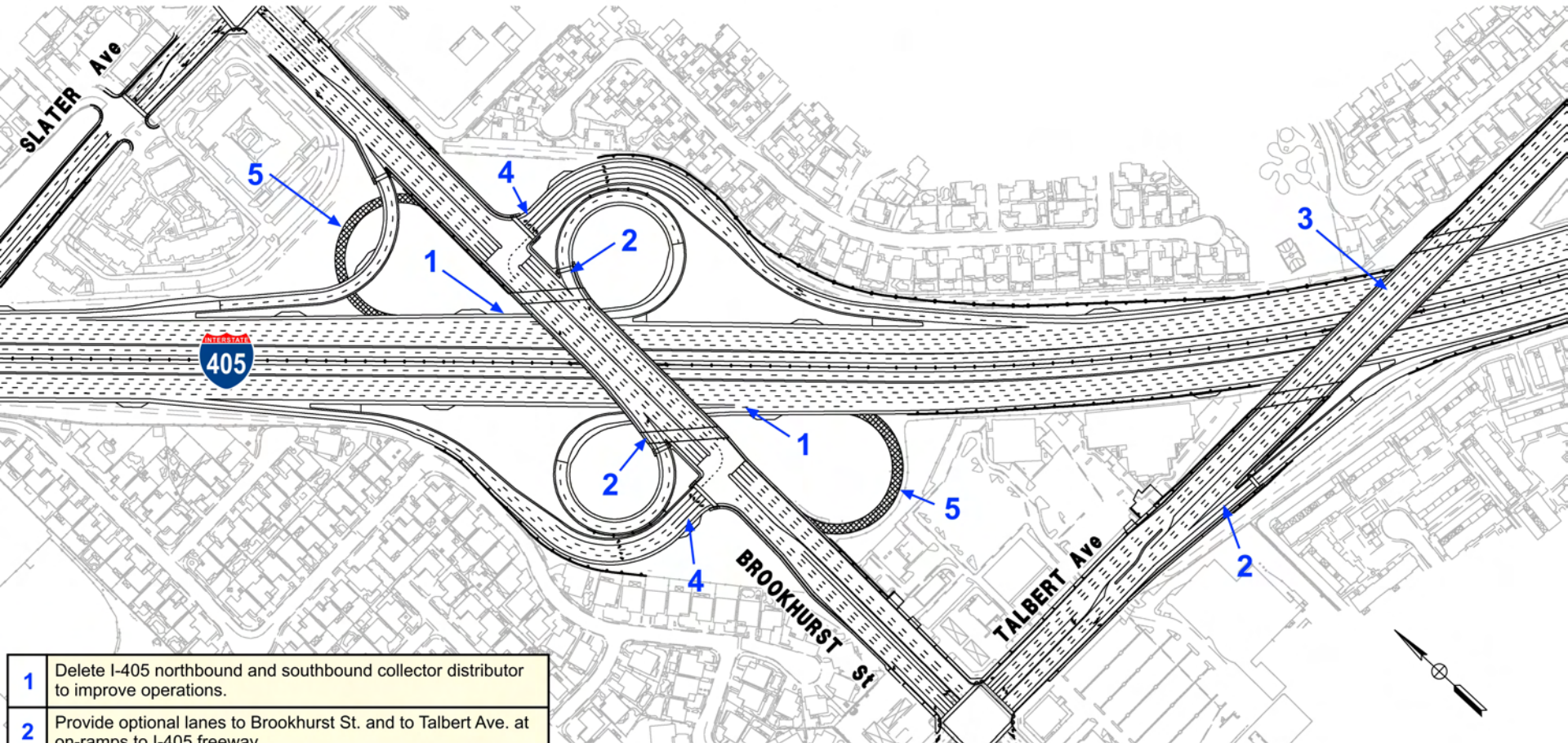
- |   |                                                                                                                                                          |
|---|----------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Add new ramp from eastbound Ellis to serve all traffic traveling to the southbound I-405. Delete existing left turn movement onto the existing loop ramp |
| 2 | Remove signal controlled right turn lane from southbound Euclid St. to southbound I-405 on-ramp with free right turn                                     |



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

Brookhurst Street



- |   |                                                                                                                                    |
|---|------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Delete I-405 northbound and southbound collector distributor to improve operations.                                                |
| 2 | Provide optional lanes to Brookhurst St. and to Talbert Ave. at on-ramps to I-405 freeway                                          |
| 3 | Widen Talbert Ave. overcrossing from 4 to 6 lanes                                                                                  |
| 4 | Signalize I-405 off ramps to allow movements to both northbound and southbound Brookhurst St.                                      |
| 5 | Remove northbound I-405 loop off ramp to southbound Brookhurst St. and southbound I-405 loop off-ramp to northbound Brookhurst St. |

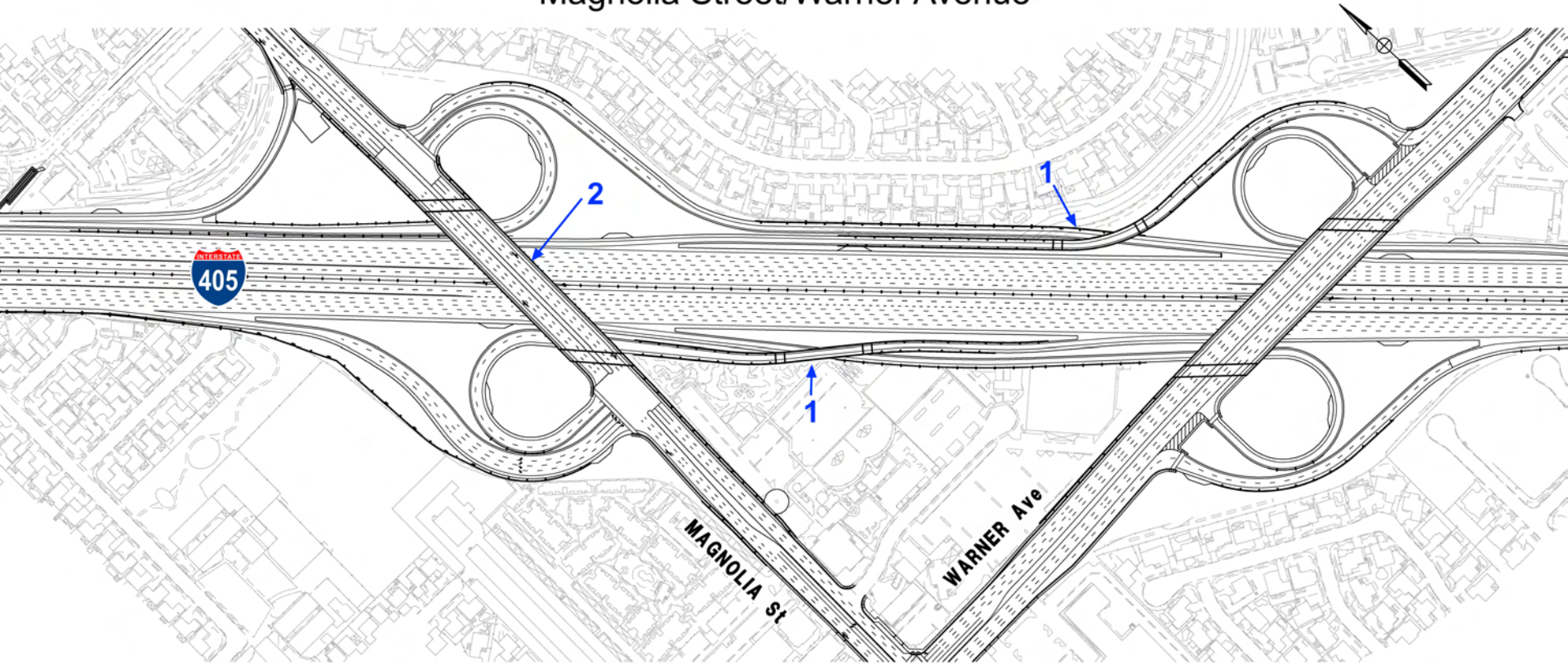




# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Magnolia Street/Warner Avenue



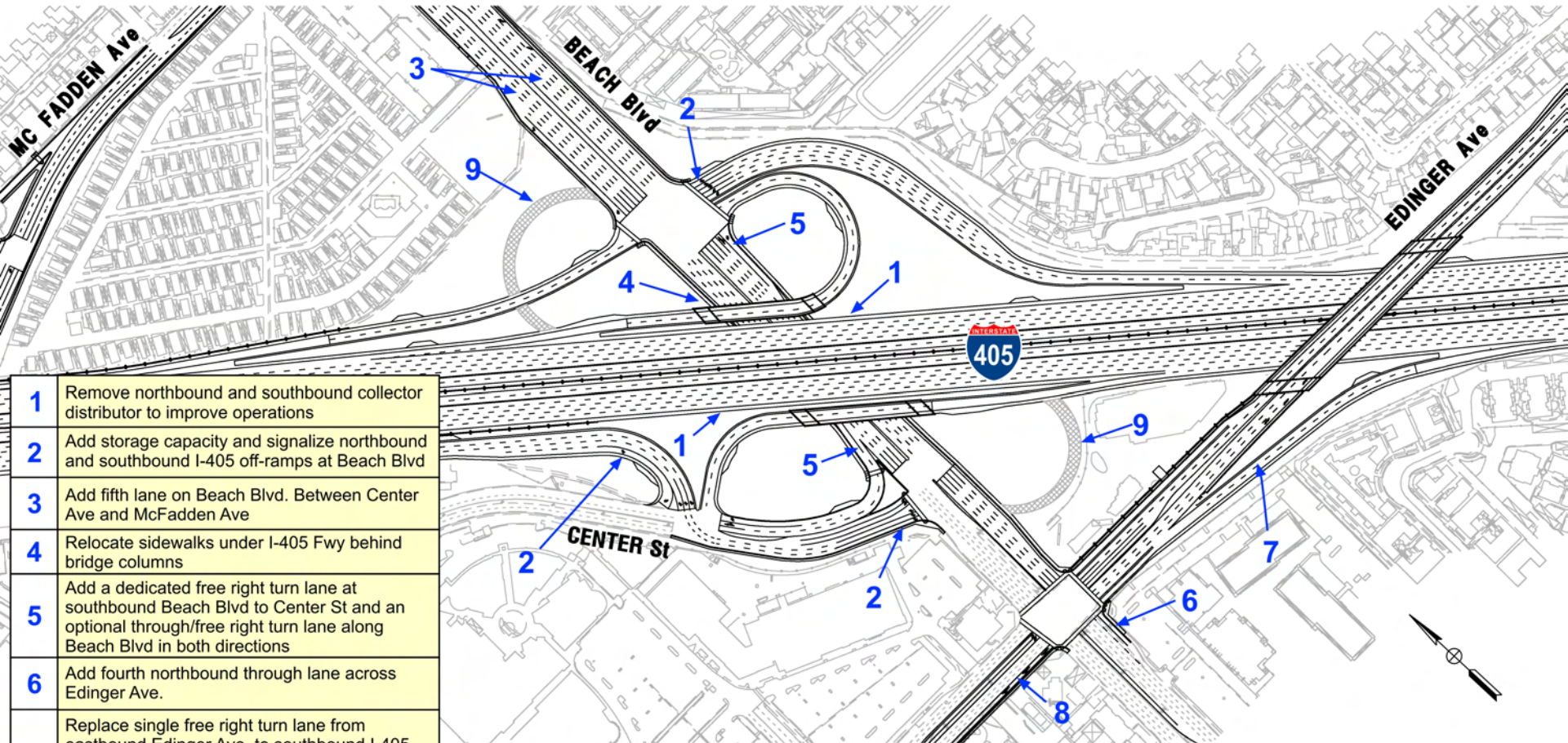
- |          |                                                                                                                             |
|----------|-----------------------------------------------------------------------------------------------------------------------------|
| <b>1</b> | Replace collector-distributor road with braided ramps separated traffic to improve operations at Warner Ave and Magnolia St |
| <b>2</b> | Widen Magnolia St. overcrossing from 4 to 6 through lanes                                                                   |



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Beach Boulevard



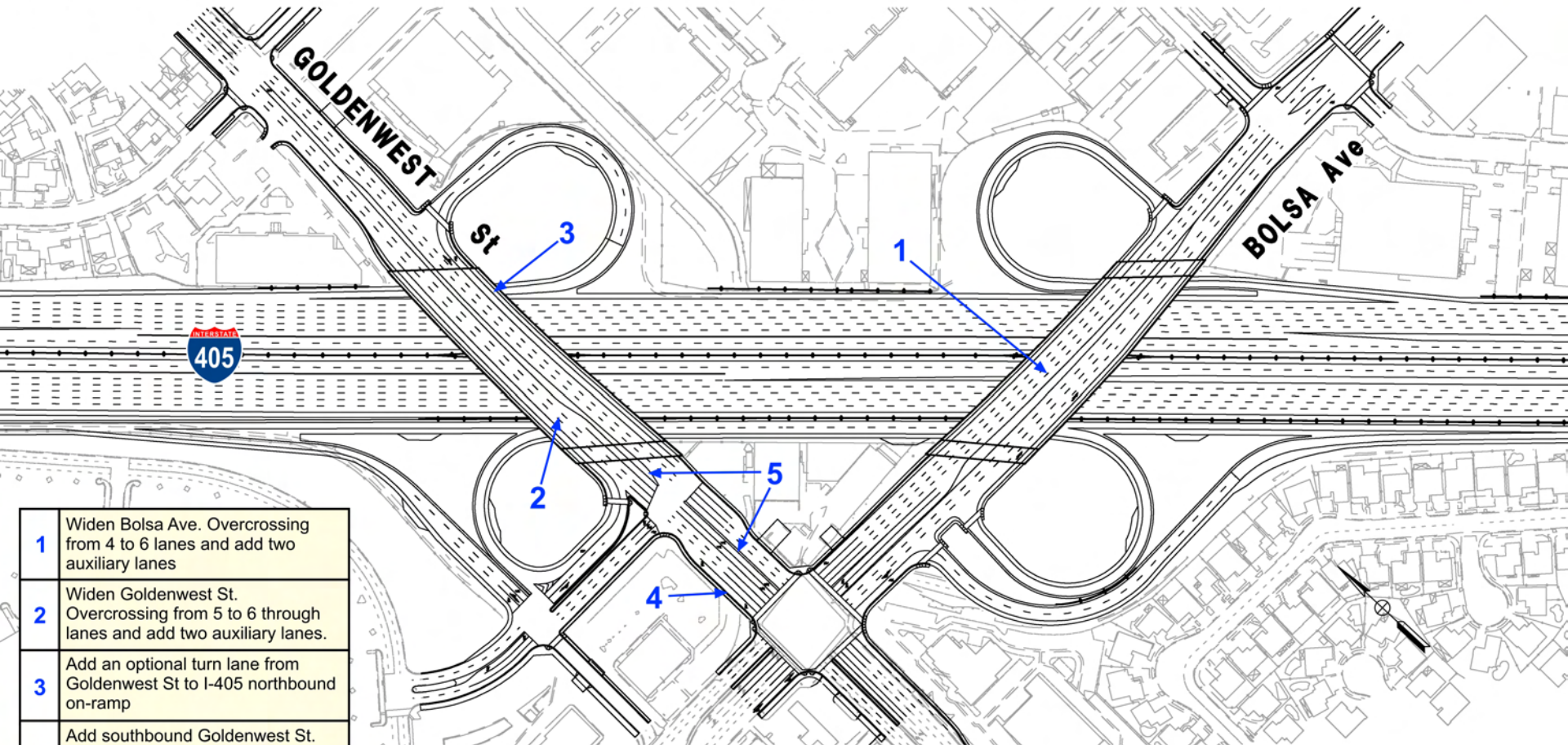
- |   |                                                                                                                                                                                |
|---|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Remove northbound and southbound collector distributor to improve operations                                                                                                   |
| 2 | Add storage capacity and signalize northbound and southbound I-405 off-ramps at Beach Blvd                                                                                     |
| 3 | Add fifth lane on Beach Blvd. Between Center Ave and McFadden Ave                                                                                                              |
| 4 | Relocate sidewalks under I-405 Fwy behind bridge columns                                                                                                                       |
| 5 | Add a dedicated free right turn lane at southbound Beach Blvd to Center St and an optional through/free right turn lane along Beach Blvd in both directions                    |
| 6 | Add fourth northbound through lane across Edinger Ave.                                                                                                                         |
| 7 | Replace single free right turn lane from eastbound Edinger Ave. to southbound I-405 on-ramp with a dedicated free right turn lane and an optional through/free right turn lane |
| 8 | Replace eastbound Edinger Ave. exclusive right turn lane to southbound Beach Blvd. with a shared right/through lane                                                            |
| 9 | Remove northbound I-405 loop off-ramp to southbound Beach Blvd and southbound I-405 loop off-ramp to northbound Beach Blvd                                                     |



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Bolsa Avenue / Goldenwest Street



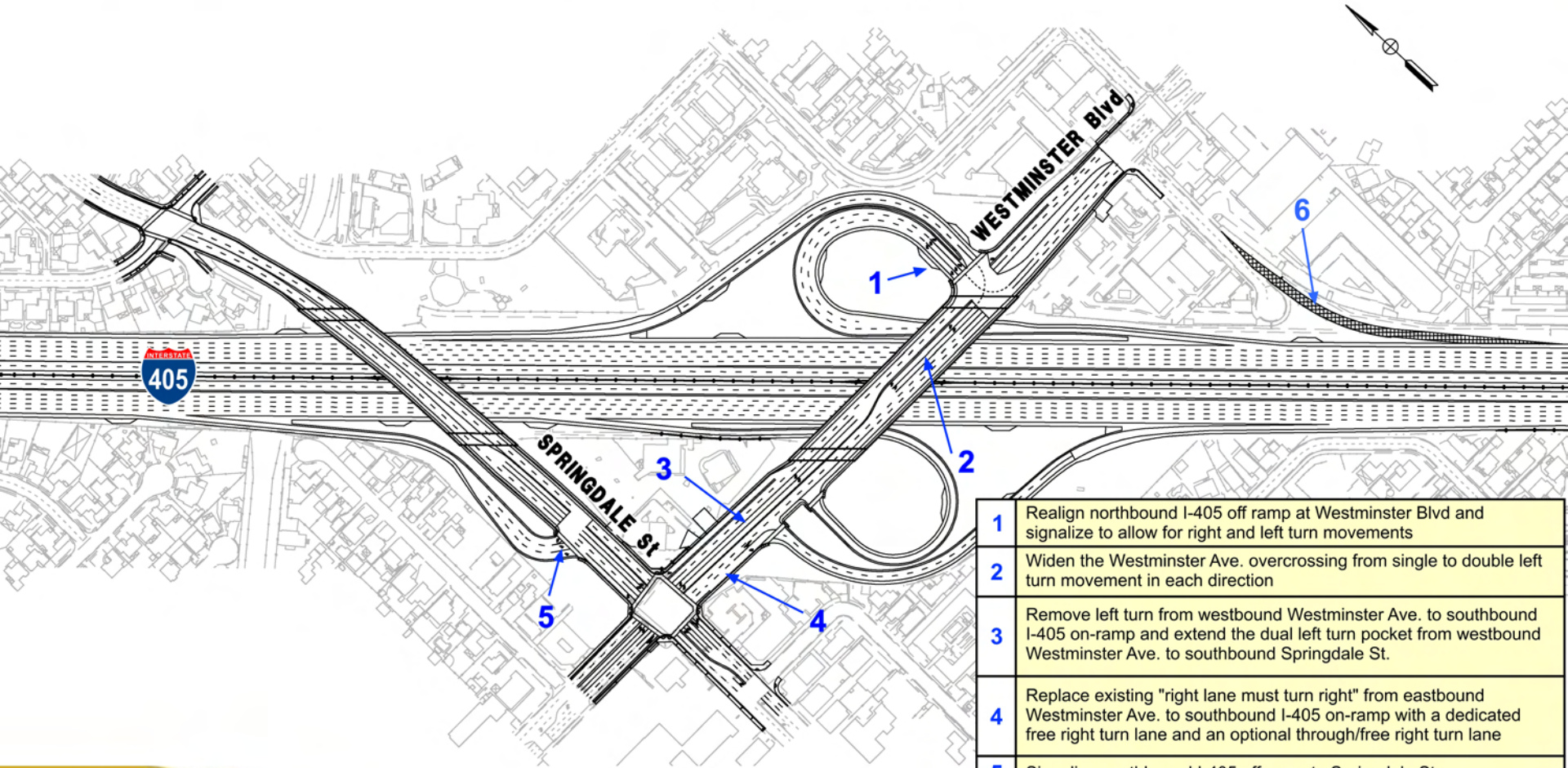
1	Widen Bolsa Ave. Overcrossing from 4 to 6 lanes and add two auxiliary lanes
2	Widen Goldenwest St. Overcrossing from 5 to 6 through lanes and add two auxiliary lanes.
3	Add an optional turn lane from Goldenwest St to I-405 northbound on-ramp
4	Add southbound Goldenwest St. right turn only lane to westbound Bolsa Ave.
5	Add left turn lane from southbound Goldenwest St. to eastbound Bolsa Ave



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Westminster Boulevard



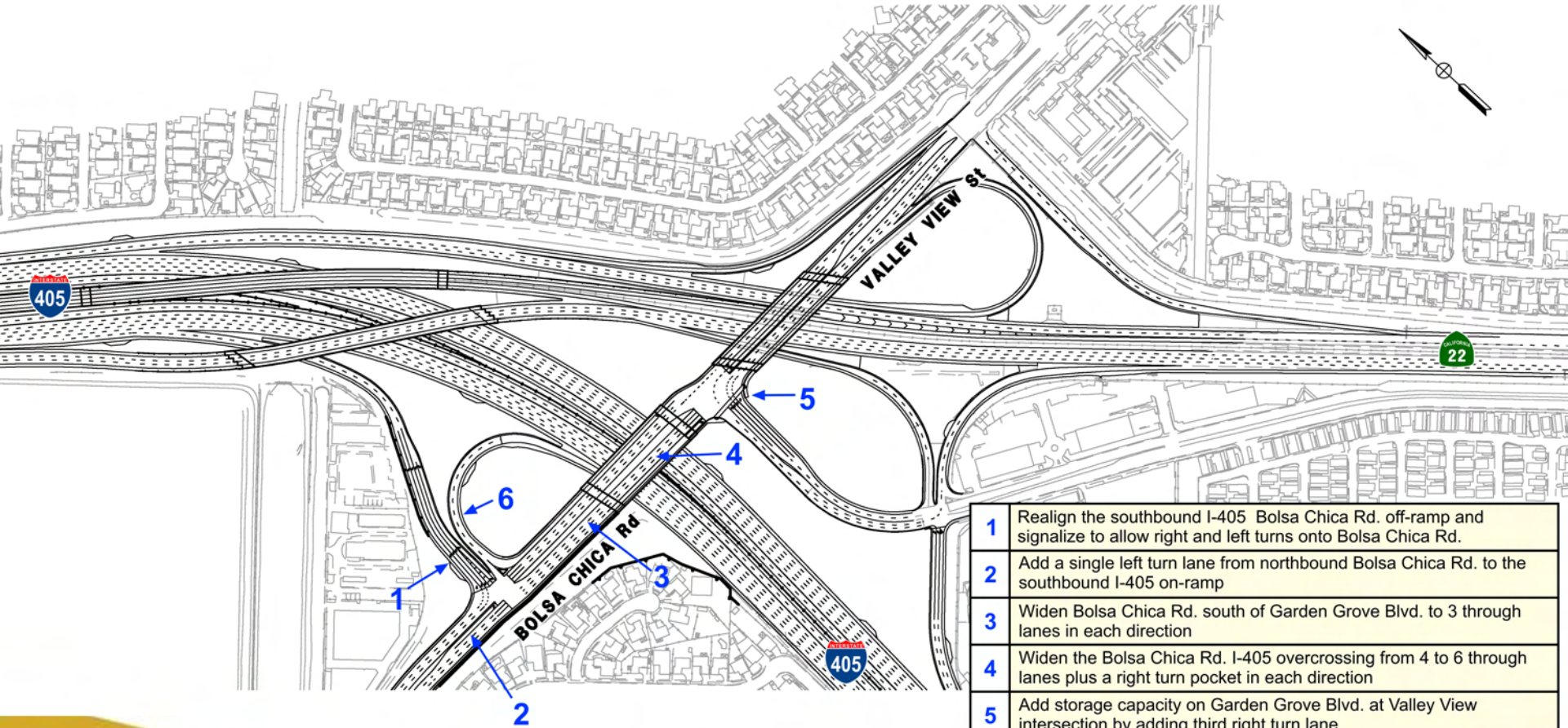
- |   |                                                                                                                                                                                              |
|---|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Realign northbound I-405 off ramp at Westminster Blvd and signalize to allow for right and left turn movements                                                                               |
| 2 | Widen the Westminster Ave. overcrossing from single to double left turn movement in each direction                                                                                           |
| 3 | Remove left turn from westbound Westminster Ave. to southbound I-405 on-ramp and extend the dual left turn pocket from westbound Westminster Ave. to southbound Springdale St.               |
| 4 | Replace existing "right lane must turn right" from eastbound Westminster Ave. to southbound I-405 on-ramp with a dedicated free right turn lane and an optional through/free right turn lane |
| 5 | Signalize southbound I-405 off-ramp to Springdale St                                                                                                                                         |
| 6 | Remove northbound I-405 off-ramp to Willow St                                                                                                                                                |



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Bolsa Chica Road



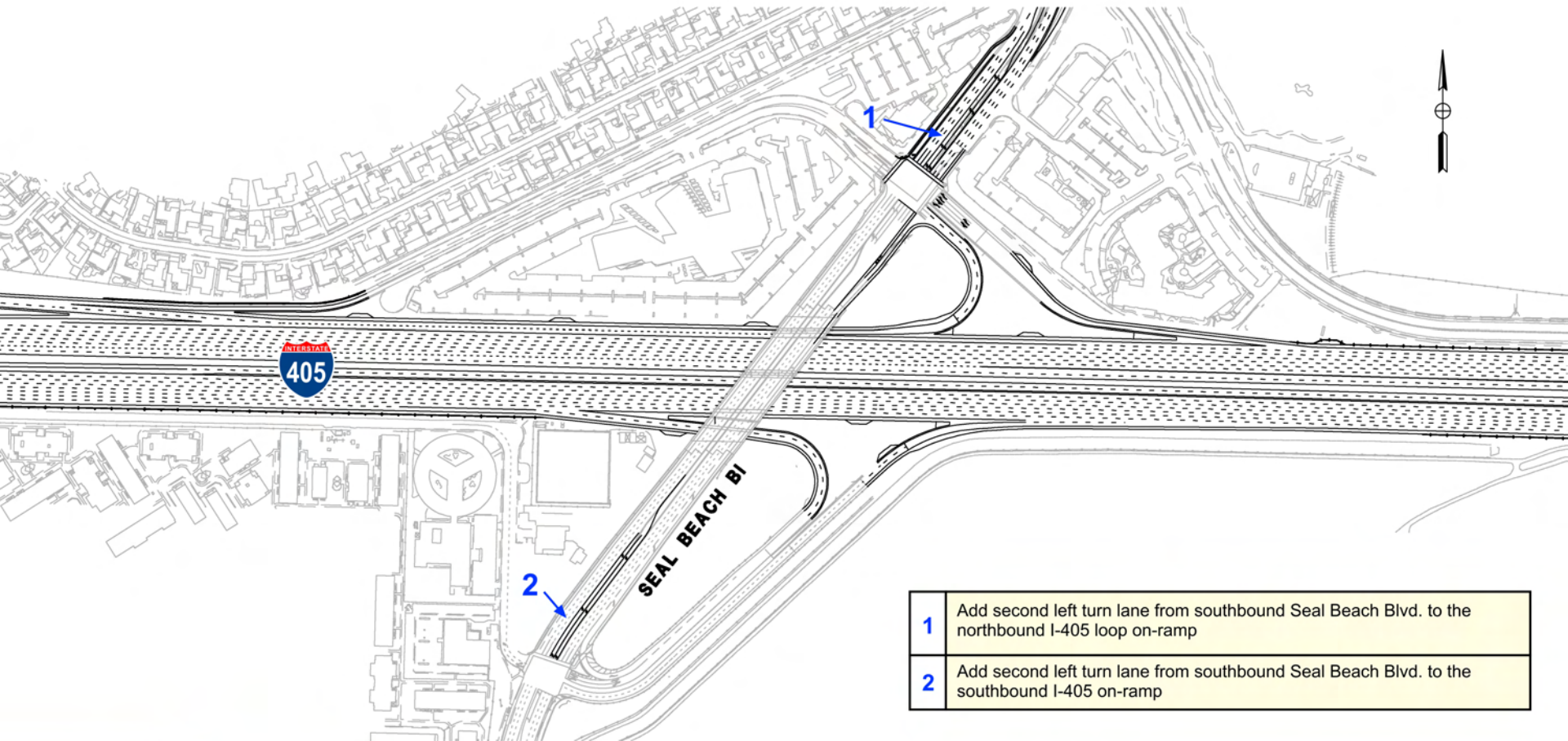
1	Realign the southbound I-405 Bolsa Chica Rd. off-ramp and signalize to allow right and left turns onto Bolsa Chica Rd.
2	Add a single left turn lane from northbound Bolsa Chica Rd. to the southbound I-405 on-ramp
3	Widen Bolsa Chica Rd. south of Garden Grove Blvd. to 3 through lanes in each direction
4	Widen the Bolsa Chica Rd. I-405 overcrossing from 4 to 6 through lanes plus a right turn pocket in each direction
5	Add storage capacity on Garden Grove Blvd. at Valley View intersection by adding third right turn lane
6	Add second lane at southbound Bolsa Chica Rd. loop on-ramp



# Local Interchange Improvements

Preliminary Design Shown  
Subject to Change

## Seal Beach Boulevard



- |   |                                                                                                 |
|---|-------------------------------------------------------------------------------------------------|
| 1 | Add second left turn lane from southbound Seal Beach Blvd. to the northbound I-405 loop on-ramp |
| 2 | Add second left turn lane from southbound Seal Beach Blvd. to the southbound I-405 on-ramp      |



# The Problem



**Current volume:**  
**257,000 – 370,000**  
vehicles per day

**2040 forecast:**  
**288,000 – 427,000**  
vehicles per day

\* Volumes may vary depending on location

**If built for demand – freeway would double in size**

# I-405 IMPROVEMENT PROJECT PURPOSE & OBJECTIVES

## PURPOSE

- **Reduce congestion**
- **Enhance operations**
- **Increase mobility, improve trip reliability, maximize throughput, and optimize operations; and**
- **Minimize environmental impacts and Right of Way acquisition**

## OBJECTIVES

- **To be consistent with regional plans and find cost-effective early project solution for delivery**



# Environmental Analysis in Draft Environmental Impact Report/Statement

- Air Quality
- Biological Resources
- Community Impacts
- Cultural Resources
- Energy
- Farmlands
- Geology/ Soils Topography
- Hydrology and Floodplains
- Hazardous Waste and Materials
- Land Use
- Noise
- Paleontology
- Utilities/Emergency Services
- Traffic/Transportation/Pedestrian & Bicycle Facilities
- Visual/Aesthetics
- Water Quality/Stormwater Runoff

