Connected Corridors
I-210 Pilot Project

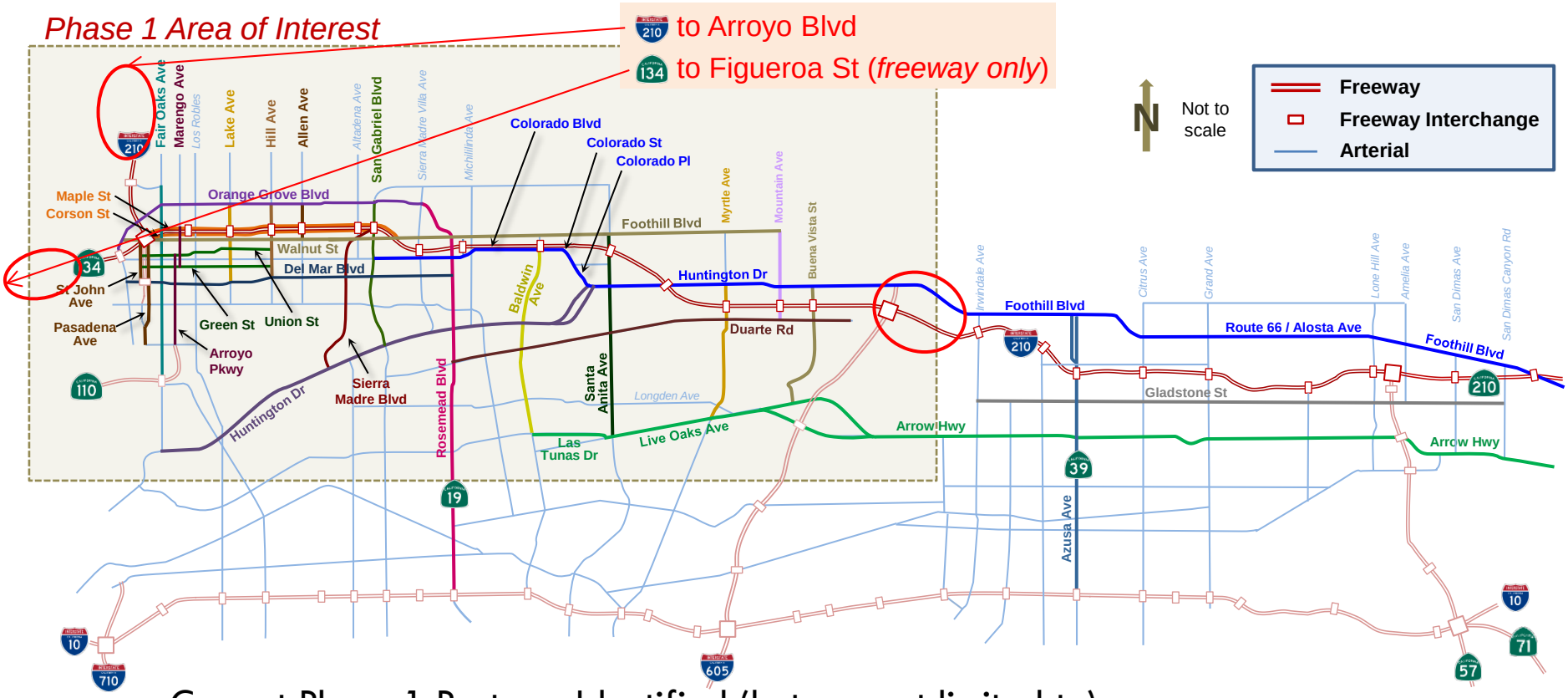
San Gabriel Valley
Council of Governments

Mar 18, 2014

Agenda

- Introductions
- Project Overview and Corridor Boundaries
- Project Goals
- Integrated Corridor Management (ICM); other ICM Projects; ICM California
- Caltrans Paradigm Shift
- Corridor Issues
  - Congestion
  - Incidents, Events, Accidents
- Current Operations and Corridor Assets (Transit, Parking, etc.)
- I-210 Pilot Definition and Pilot Phases
- How to involve the SGVCOG
- Next Steps: (Project Support Letter; Charter; MOU); Outreach and Communications; Resource Needs

I-210 Project Corridor



Current Phase 1 Partners Identified (but are not limited to):

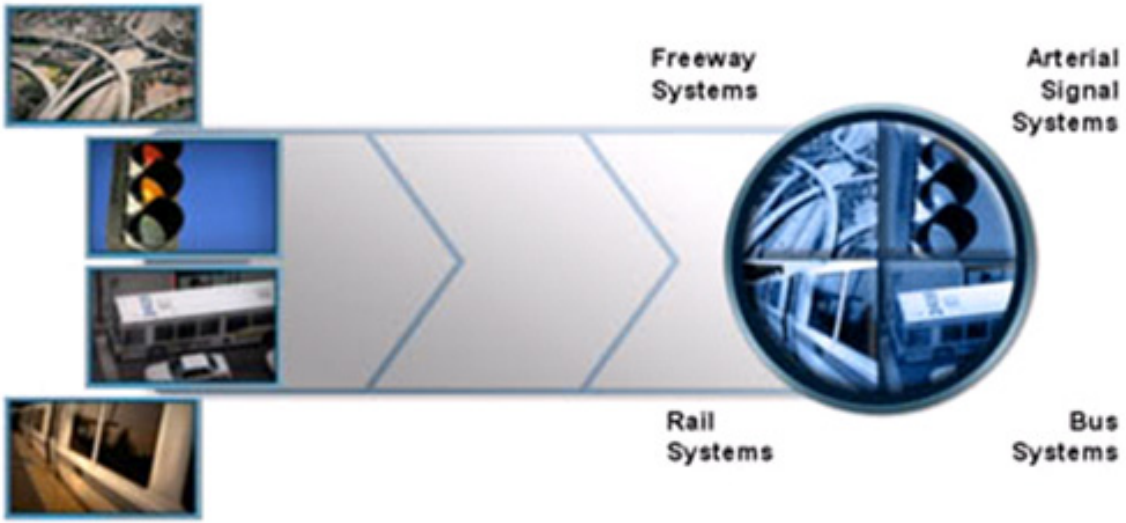
- Caltrans, Metro, LA County, Pasadena, Arcadia, Monrovia, Duarte, SGVCOG, UC Berkeley/PATH (Phase 2 – East to La Verne)

I-210 Pilot Project Goals

- **Bring together corridor stakeholders** to create an environment for mutual cooperation, including sharing knowledge, developing working pilots, and researching and resolving key issues
- **Formulate a roadmap** for the cost-effective implementation of future innovations
- Develop and deploy an integrated, **advanced decision support system** for use by the stakeholders as they actively manage the corridor
- Develop a **set of performance measures** to quantify the successes of the Connected Corridors pilot project
- **Demonstrate project effectiveness** that can lead to additional phases and funding for more advanced tools and capabilities
- Develop a pilot system that **can be replicated** on other corridors and be a model for other corridors in the state and country

Integrated Corridor Management (ICM)

- With ICM, partner agencies manage the transportation corridor as a system, rather than managing individual assets, in order to improve travel time reliability and predictability, help manage congestion, and empower travelers through better information and more choices through all facilities and modes.



Existing ICM Efforts (United States)

Corridor	Corridor Type	Lead Agencies	Activities
I-15 Diego	Suburban	SANDAG	• ConOps and System Requirements developed in 2008 • Simulation evaluation in 2009-2010 • System launched October 2013 • Currently in evaluation phase
US-75 Dallas	Suburban & urban	DART	• ConOps and System Requirements developed in 2008 • Simulation evaluation in 2009-2010 • System launched in April 2013 • Currently in evaluation phase
I-80 Bay Area	Suburban & urban	MTC / Caltrans	• ConOps developed in 2010 • Groundbreaking in October 2012 • Expected to be completed Summer 2015
I-95 / I-395 Virginia	Rural, Suburban & Urban	Virginia DOT	• ConOps development initiated in 2012 • Currently developing deployment plan & partnerships

Caltrans Paradigm Shift

- The I-210 "*Connected Corridors Pilot*" is the first *Caltrans-led* ICM effort in California and the first corridor site in the "ICM California" plan.
- Caltrans will, with equal buy in and cooperation of stakeholders, lead the planning, implementation and ongoing operational support for 50 corridor segments in California over the next ten years.
- The Connected Corridors Program will mark the beginning of a paradigm shift away from building our way out of congestion, to managing and coordinating our way to improved transportation network performance.

Lots of Incidents on I-210

E/210 to E/210
Tunnel Accident
Nov 21, 2013
First Rain of the
Season

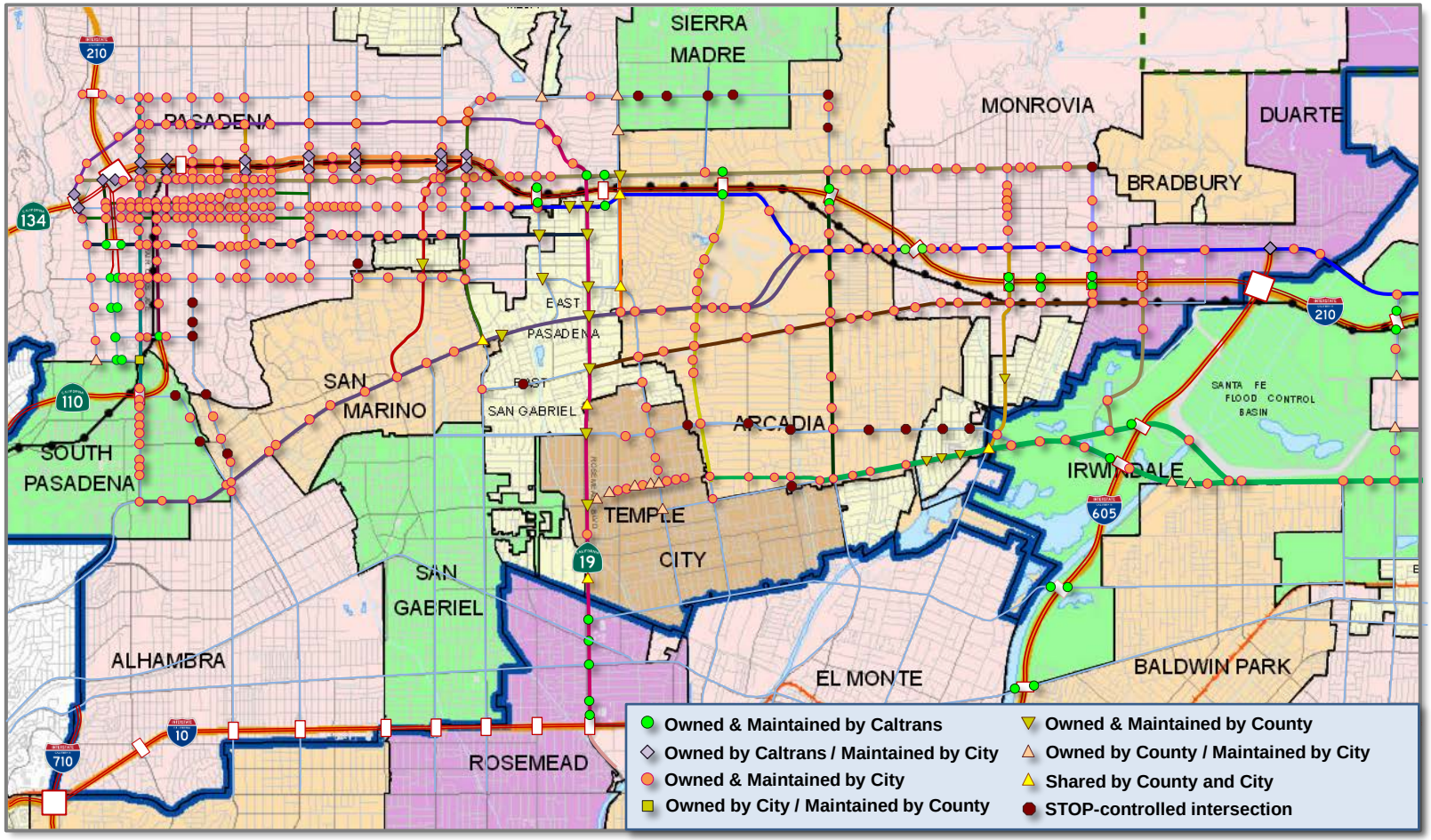
Lots of Incidents on I-210

E/210 @ Madre
Nov 21, 2013
First Rain of the Season

Current Operations

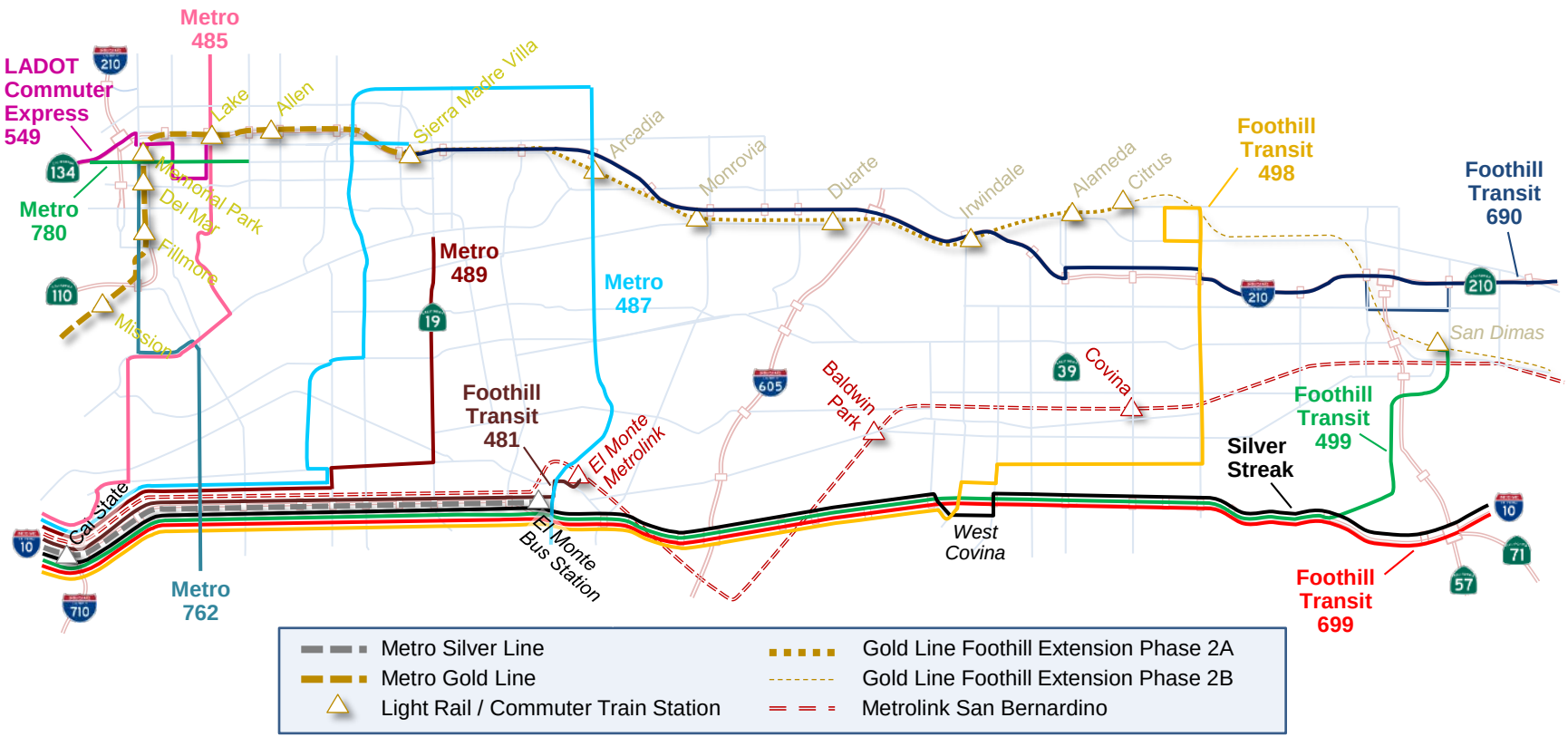
- Transportation corridors often contain unused capacity in the routes, the non-peak direction on freeways and arterials, single-occupant vehicles and transit services that could be leveraged to help reduce congestion.
- Traffic information today is often fragmented, outdated, or not completely useful.
- Networks are independently operated and efforts to date to "reduce congestion“ have focused on optimization of individual networks.

Freeway and Arterial Traffic Control

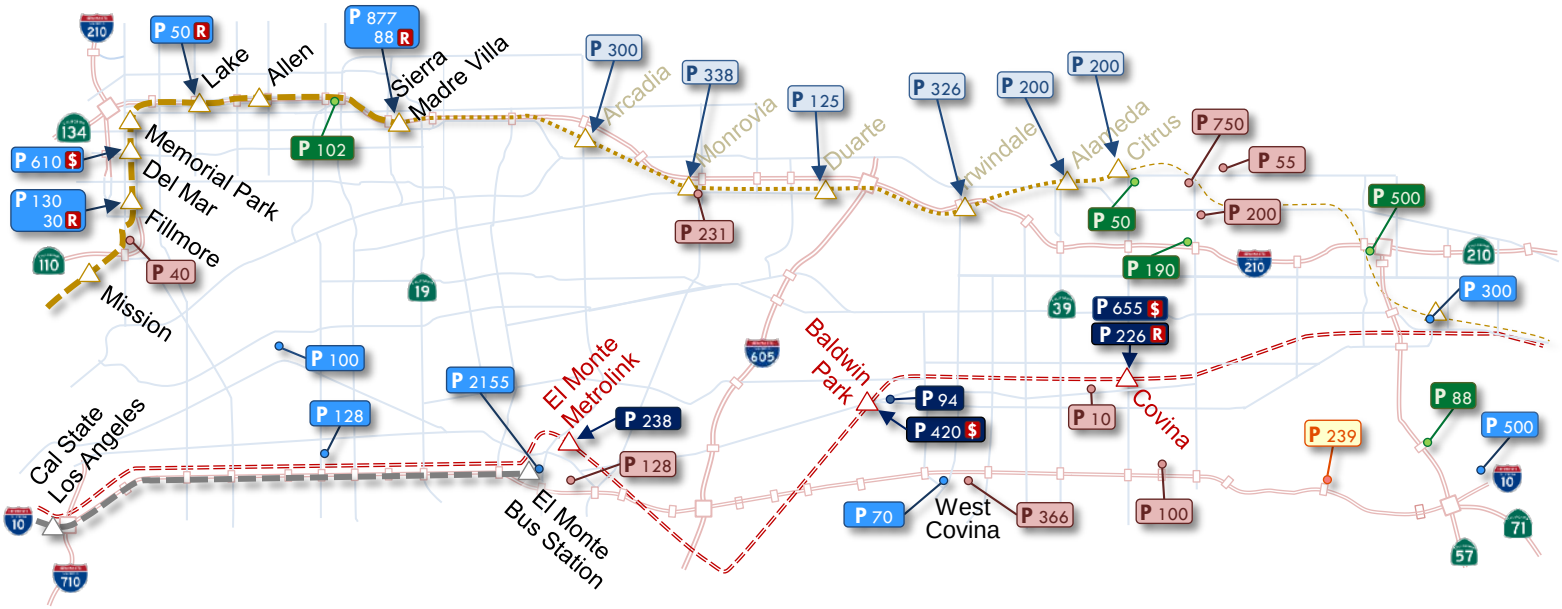


Light-Rail, Transitway & Commuter Rail

Express Commuter Buses



Parking Facilities

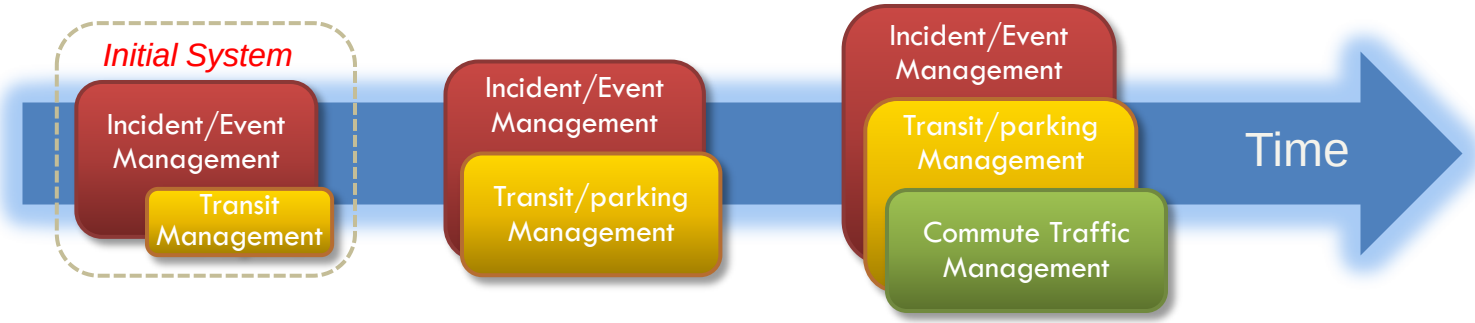


Metro Silver Line	P 100 Existing LA Metro Lots	$ Parking Fee
Metro Gold Line	P 100 Future LA Metro Lots (late 2015)	R Paid Reserved Parking
Gold Line Extension Phase 2A	P 100 Metrolink Lots	
Gold Line Extension Phase 2B	P 100 Caltrans Lots	
Metrolink San Bernardino	P 100 Los Angeles County Lots	
Express Bus Lines	P 100 Other Park-and-Ride Lots	

I-210 Pilot Project Definition

- **Development and deployment of an ICM system to promote coordinated operations along the I-210**

- **Initial primary focus on managing incidents/events, with gradual expansion to transit, parking and demand management**



Define Incidents and Strategies Approach

- **Define incidents/events categories**

Location(s)	*Event Type*	*Lanes Blocked*	*Impact*
Arterial Arterial I/S Freeway ramp Freeway mainline HOV Lane	Stall/Collision Scheduled Closure Police Activity Emergency Event Hazmat Spill Other	1 Lane 2 Lanes 3 Lanes … or % Capacity	Minor Major Long

- **Develop response strategies to defined incident categories**
  - Develop multiple response options (play book of 3-5 options, from low impact to high impact) for each category or type of incident
  - Develop process for best option selection (modeling, analysis, testing, etc.)
  - Download selected response option to all integrated ATMS/TCS

Next Steps/Summary

- Additional SGVCOG Presentations/briefings
- SGVCOG participation and support
- Stakeholder Support Letter; Charter; MOU
- Outreach Meetings
- Resource Needs