



Carlsbad TOMORROW

Growth Management Citizens Committee

Meeting 4
June 23, 2022





Call to Order & Roll Call

Approval of Minutes

Public Comment





Welcome & Introductions

Carlsbad
TOMORROW 

GROUND RULES

- ✓ Encourage diversity of ideas; every idea is a good idea during brainstorming.
- ✓ Avoid applying personal biases based on geography, organizational affiliation, etc. – think about the city as a whole.
- ✓ Establish and follow general time limits for discussion items.
- ✓ Always be respectful.
- ✓ Be prepared by reading materials and thinking about topics ahead of meetings.
- ✓ Encourage all to speak – both primary and alternate members.
- ✓ Actively search for ways to identify gaps in data and make requests based on those gaps.

COMMITTEE PURPOSE

Promote balanced consideration of a range of perspectives on issues affecting the future growth and quality of life in Carlsbad and identify the key elements of a new plan to manage growth in Carlsbad in a way that maintains an excellent quality of life while also complying with state law.

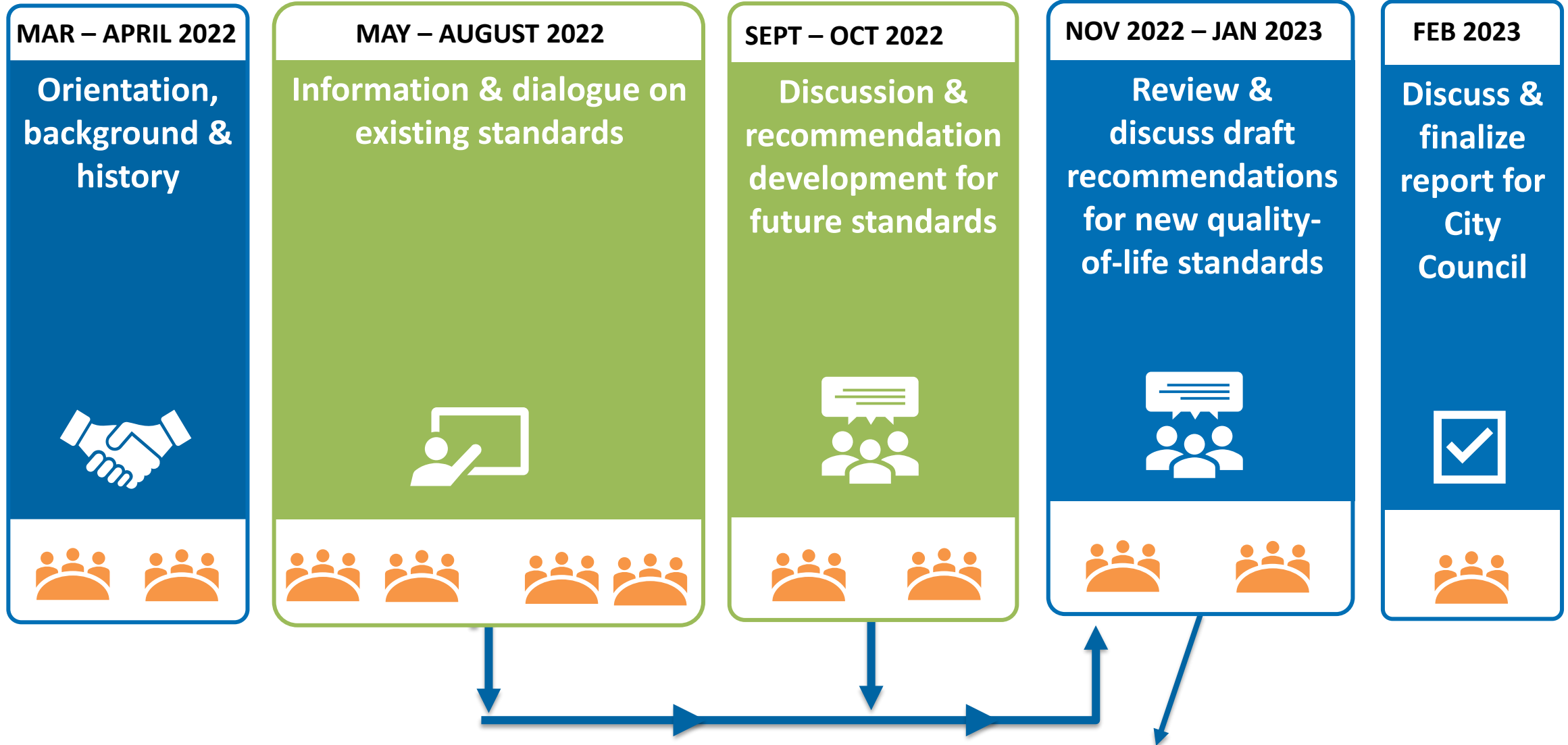
11 PERFORMANCE STANDARDS

- City Administrative Facilities
- Libraries
- Parks
- Open Space
- Circulation
- Fire Response
- Schools
- Drainage
- Sewer Collection
- Water Distribution
- Wastewater Treatment

MEETING TOPICS & SCHEDULE

DATE/TIME	POTENTIAL TOPICS
June 23, 2022 5 p.m.	Wastewater treatment, drainage, sewer and water distribution, schools
July 28, 2022 5 p.m.	Traffic and mobility circulation, emergency response, SANDAG demographics/growth projections
Aug. 25, 2022 5 p.m.	Libraries, parks and open space

COMMITTEE PROCESS



Committee meetings are open to the public and livestreamed.

Draft recommendations available for public review

CHARTER AMENDMENT (JUNE 14, 2022)

If a committee member that was appointed to represent one of the Boards and Commissions has a term that concludes prior to the committee completing its work, the member is allowed to remain on the committee until the work concludes but must report back to the represented board or commission at the represented board or commission's request. If a committee member resigns his or her appointment before the committee's work has concluded, he or she shall notify the Mayor and City Council in writing, with copies sent to the City Clerk, City Manager and the Community Development Director. The resigning committee members designated alternate shall automatically become a regular committee member for the remaining duration of the committee. If the alternate member chooses not to fill the vacancy, at their next scheduled meeting, the committee will consider whether to recommend that the Mayor and City Council fill the vacated position.

TODAY'S AGENDA

- Discussion Items
 - Committee Business
 - Schools Performance Standard
 - Wastewater Treatment Performance Standard
 - Drainage Performance Standard
 - Sewer and Water Distribution Performance Standard
- Committee Member Requests for Agenda Items
- Public Comment (continued if needed)
- Adjourn



1. Committee Business



Schools Performance Standard

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SCHOOLS

PERFORMANCE STANDARD

School capacity to meet projected enrollment within the Local Facility Management Zone as determined by the appropriate school district must be provided prior to projected occupancy.



BACKGROUND

- Established with original Citywide Facilities and Improvements Plan
- 4 school districts in Carlsbad
- School districts control production of schools
- City has limited control
- City verifies capacity when development is proposed

SCHOOL STANDARD – STATUS



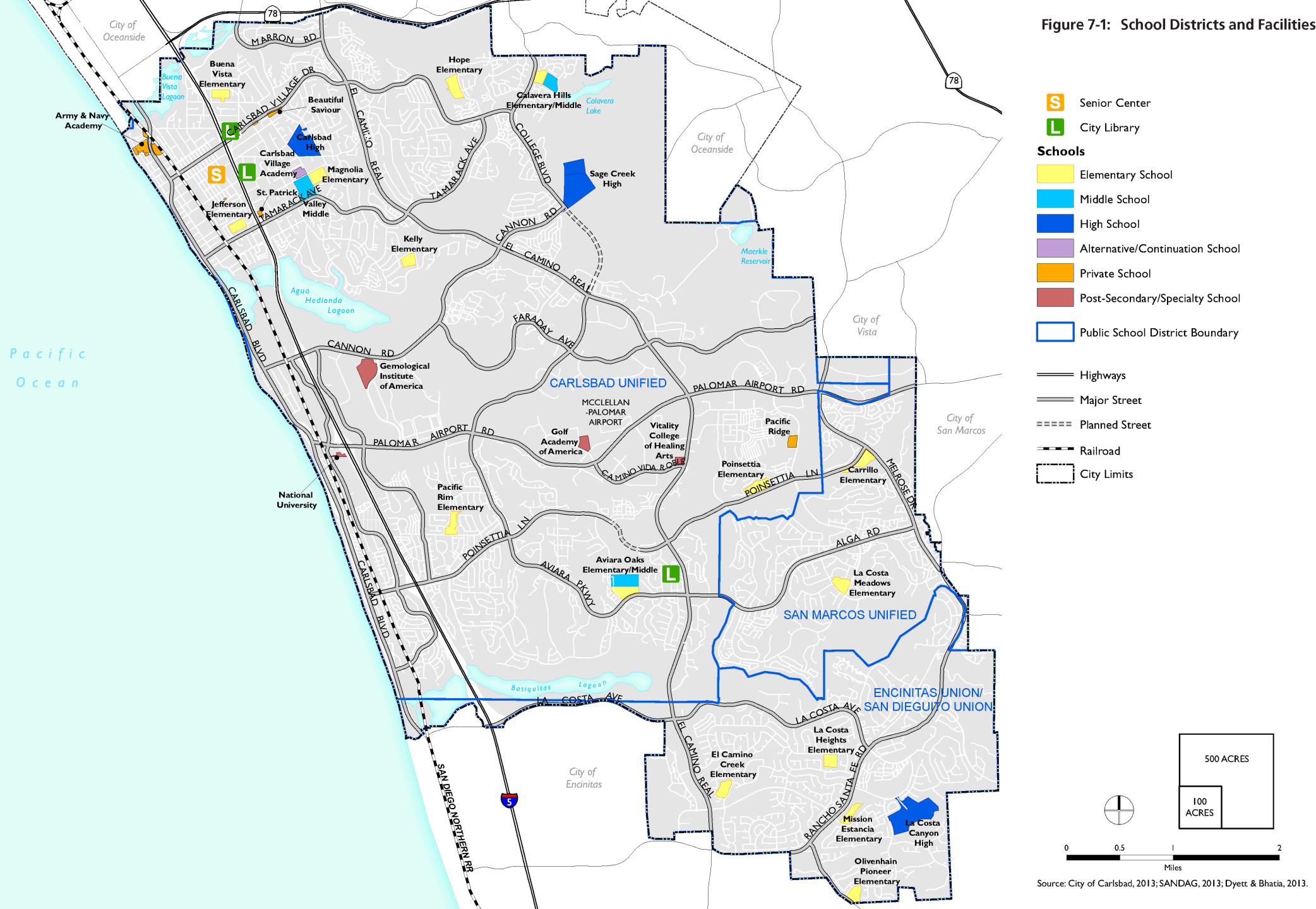
- Carlsbad Unified School District
 - Sufficient capacity for current enrollment and expected future growth
- San Marcos Unified School District
 - Currently at maximum capacity
 - Issuing will-serve letters for development in Carlsbad
 - Schools serving Carlsbad can accommodate expected future growth



SCHOOL STANDARD – STATUS

- Encinitas Union Elementary School District
 - Sufficient capacity for current enrollment and expected future growth
- San Dieguito Union High School District
 - Sufficient capacity for current enrollment and expected future growth

Figure 7-1: School Districts and Facilities





SCHOOL STANDARD BUILDOUT ANALYSIS

- Capacity sufficient for future population (based on buildout of General Plan)
- Future demand based on two main factors:
 - Increase in housing from planned land uses
 - Average number of students in a household
- Average household student population expected to decline

SCHOOL STANDARD BUILDOUT ANALYSIS



- Sufficient school capacity for buildout of General Plan, based on:
 - Currently planned housing units
 - Declining student population per household
- School capacity evaluated when more housing units are considered (e.g., Housing Element)



SCHOOL FUNDING

- Local, State and Federal funding sources
- State Proposition 98 (largest funding source)
- Carlsbad Proposition P (2006)
 - \$198 million bond measure + \$47 million from State
 - Renovations, modernization, new construction (CUSD)
- SMUSD Proposition K (2010)
 - \$287 million bond measure
 - Renovations, modernization, new construction

OTHER CONSIDERATIONS



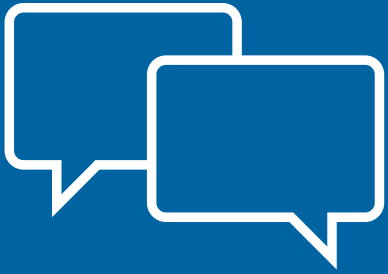
- Limited local control
- School districts comply with local zoning
- School districts can vote to deem local zoning inapplicable
- Schools must comply with local rules for drainage, roads and grading

OTHER CONSIDERATIONS



- City can require dedication of land and/or fees when approving development
- Development impacts on school capacity evaluated per Growth Management and California Environmental Quality Act

DISCUSSION QUESTIONS



- Is this standard important to quality of life in Carlsbad?
- Should this standard be re-evaluated in any way?



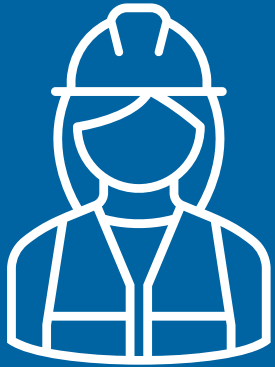
Drainage Facilities Performance Standard

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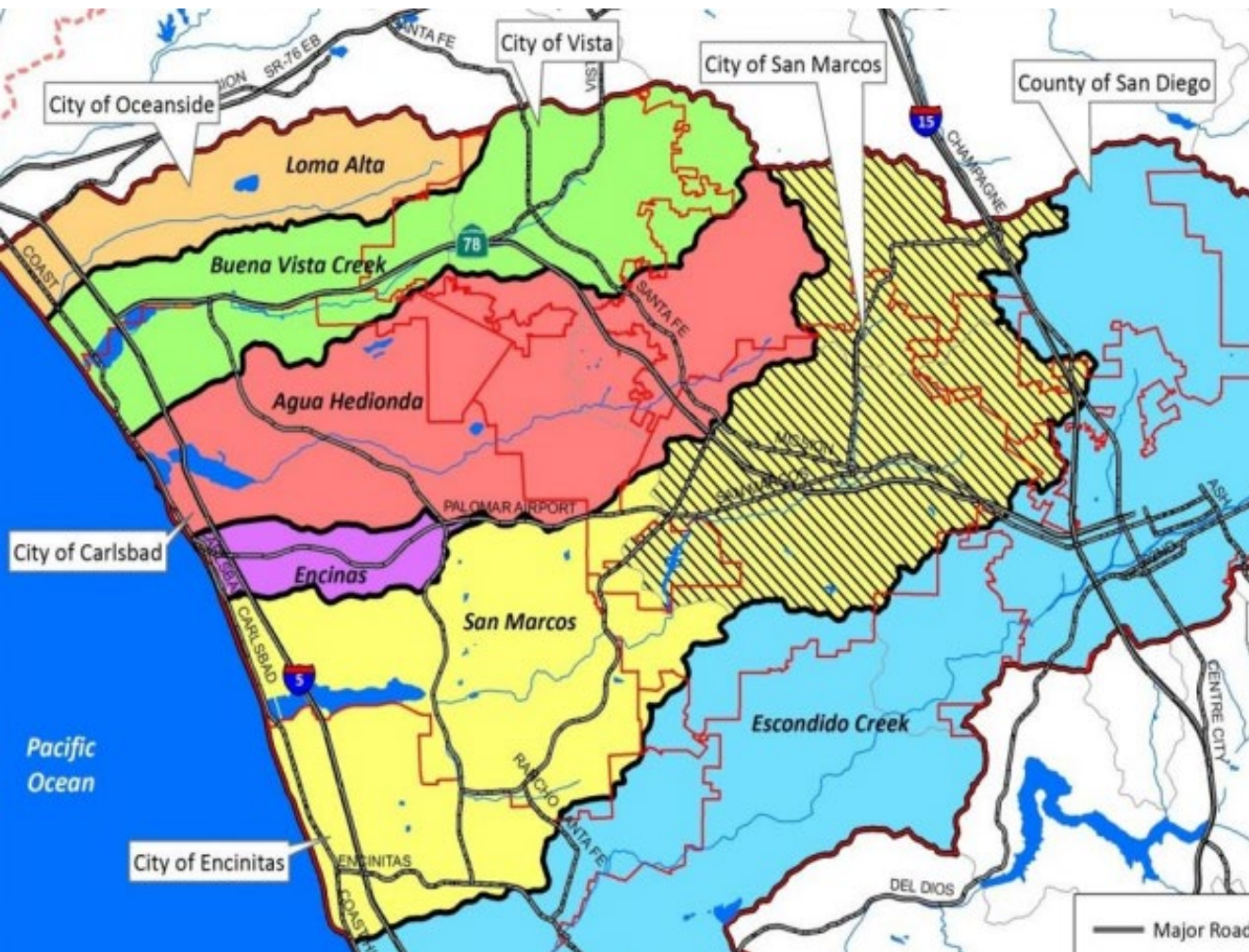
DRAINAGE FACILITIES PERFORMANCE STANDARD

Drainage facilities must be provided as required by the city concurrent with development.



Background

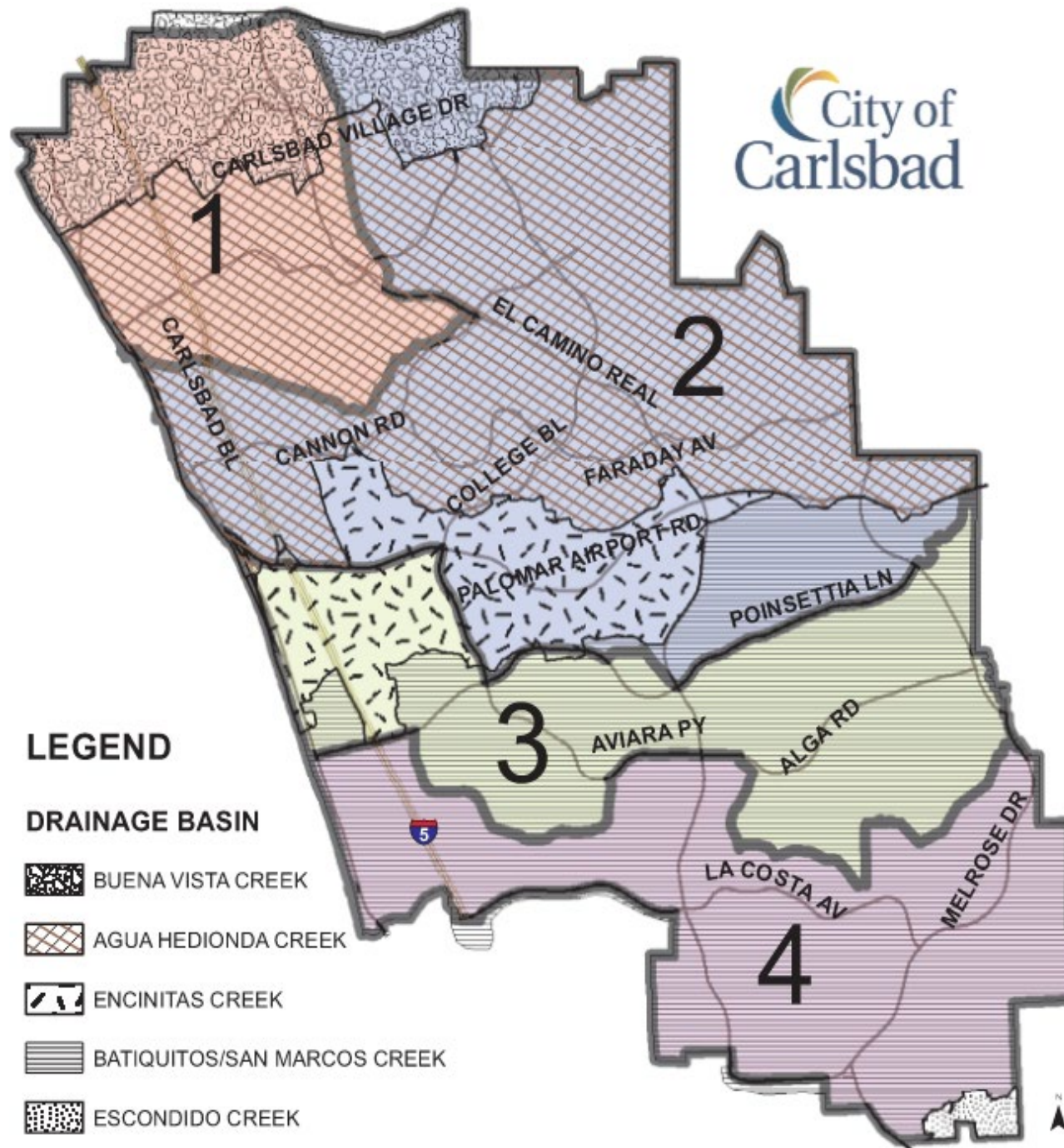
- Original 1980 Drainage Master Plan goals:
 - **Assess performance** of existing drainage facilities
 - Identify **drainage infrastructure** needs
 - Develop funding mechanism for planned facilities
- Current plan (2008) is being updated
- Maintenance, repair and replacement projects incorporated into city's Capital Improvement Projects program



DRAINAGE BASINS

- Four drainage basins
 - Buena Vista Creek
 - Agua Hedionda
 - Encinas Creek
 - San Marcos Creek
- All areas currently meet drainage performance standards

DRAINAGE BASINS VS. COUNCIL DISTRICTS





Drainage Facilities Adequacy

- Existing drainage facilities adequate to serve **current needs**
- 2008 Drainage Master Plan proposes construction of new facilities to **reduce flooding risk**
- New facilities provide backbone drainage system through city buildout



DRAINAGE FACILITIES FUNDING

- **Planned Local Drainage Area (PLDA) fee program**
 - Four PLDAs
 - Collect fees from new development/ redevelopment
 - Funds projects in city's CIP
 - Reimburse developers who construct planned facilities
- **Infrastructure Replacement Funds**
 - Funds used to rehabilitate or replace existing drainage facilities

CAPITAL IMPROVEMENT PROGRAM DRAINAGE PROJECTS

Drainage Master Plan Update	Magnolia Ave Drainage Improvements
Tamarack/El Camino Real Channel Restoration	Merwin Drive Storm Drain Improvements
Surface Drainage Improvements	Park Drive Drainage Improvements
Storm Drain Condition Assessment Program	Kelly Drive Channel Repair
Storm Drain System Repair Program	Romeria St Drainage Channel Improvements

IMPROVEMENT PROJECTS



Kelly Drive Channel Repair



Tamarack/El Camino Real Channel Restoration

FLOOD CONTROL AND DRAINAGE FACILITIES MAINTENANCE

Buena Vista Creek Channel Maintenance	Agua Hedionda Creek Vegetation Maintenance
Buena Vista Creek Assessment District	Calavera Dam Mitigation and Maintenance
Trash Capture Amendment Compliance Program	

DRAINAGE FACILITIES

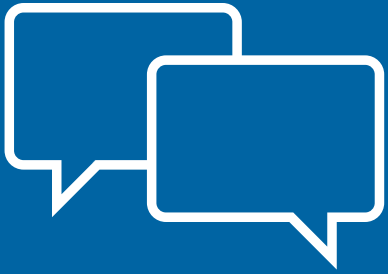


Buena Vista Creek Channel
Maintenance



Agua Hedionda Creek
Vegetation Maintenance

DISCUSSION QUESTIONS



- Is this standard important to quality of life in Carlsbad?
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Wastewater Treatment Performance Standard



WASTEWATER TREATMENT STANDARD

Sewer plant capacity is adequate for at least a five-year period.

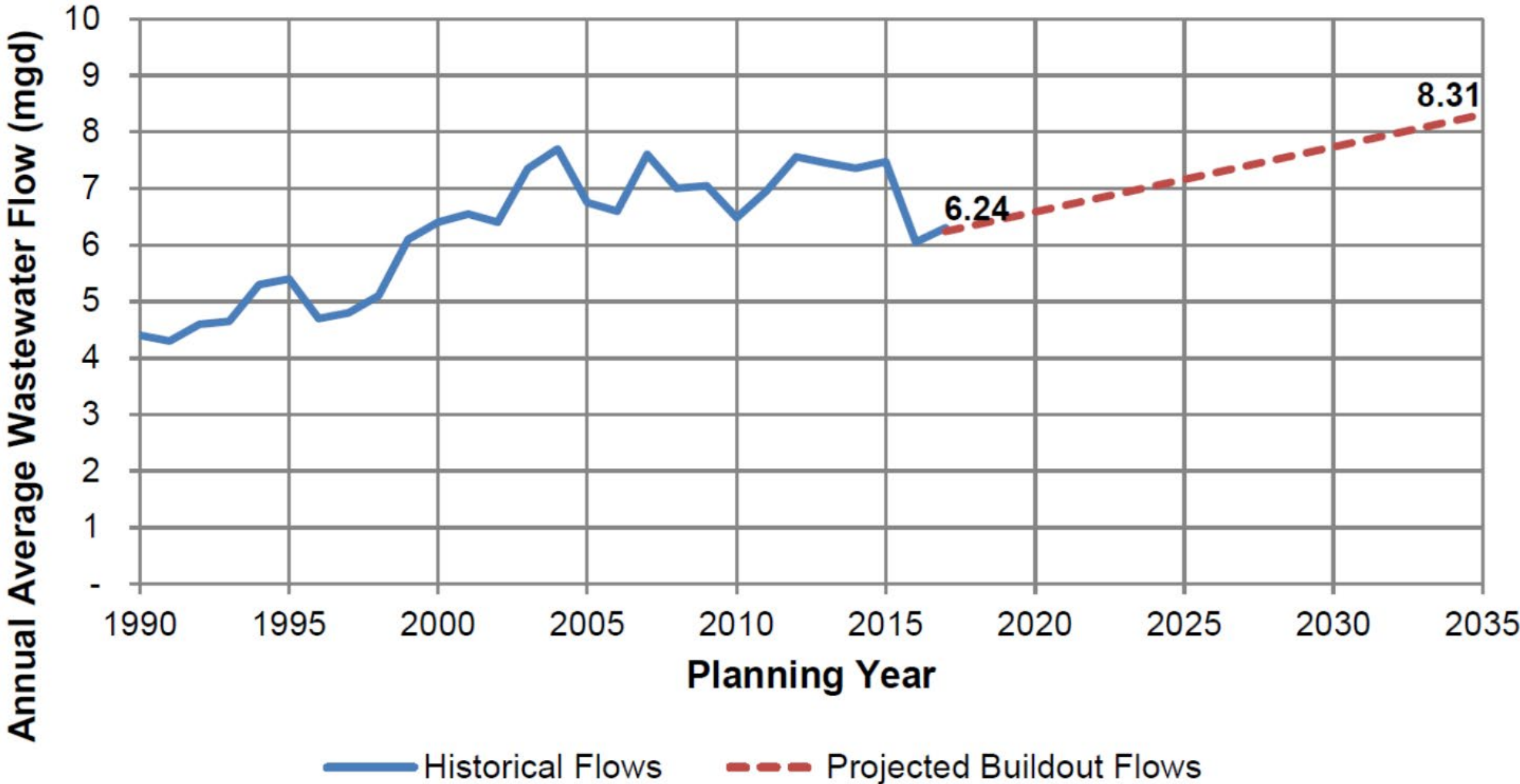


WASTEWATER TREATMENT STANDARD



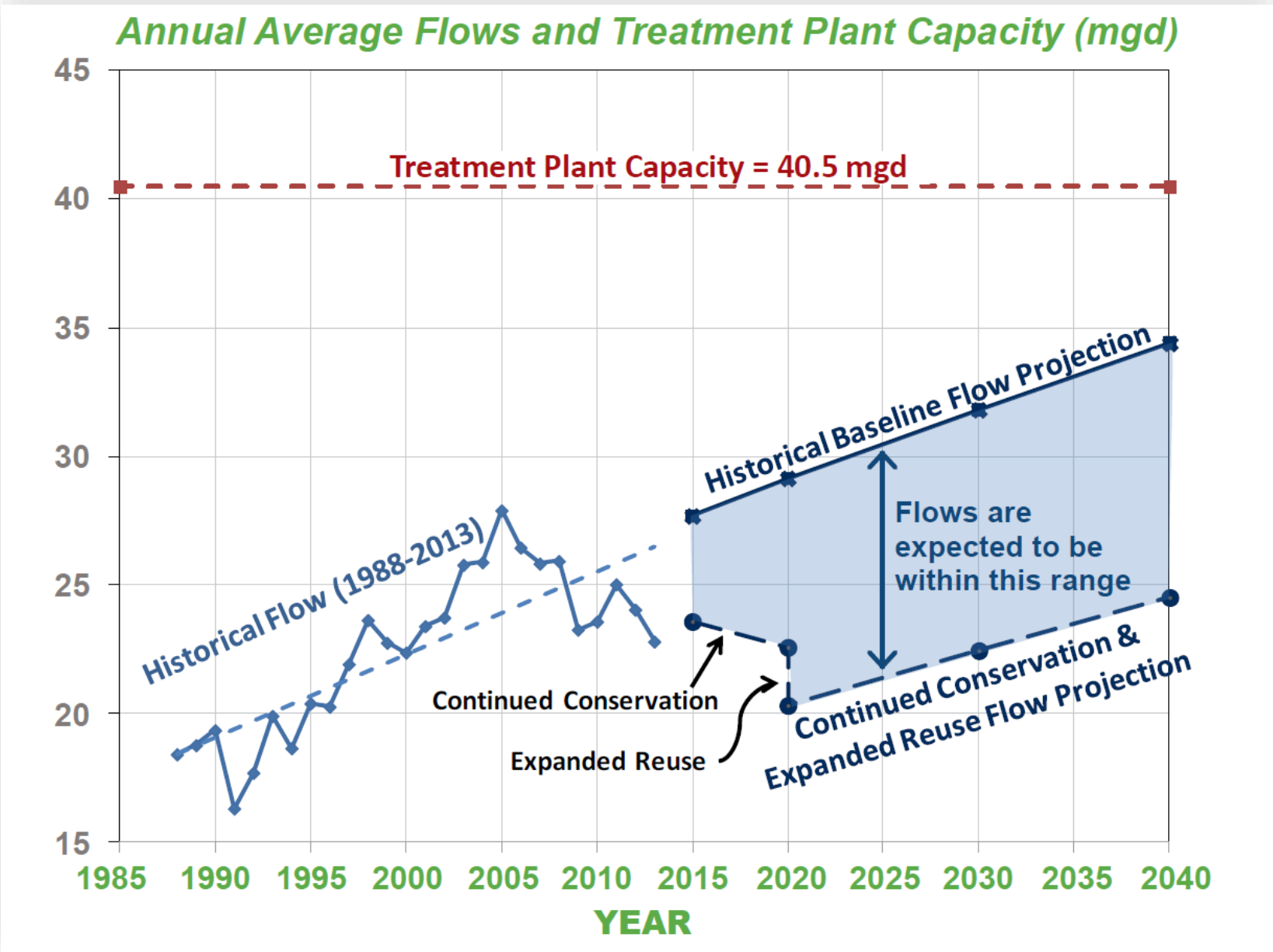
- 2021 average sewer flow = 6.3 million gallons/day
- Carlsbad capacity rights at Encina Water Pollution Control Facility = 10.26 mgd
- EWPCF total capacity = 40.5 mgd

Carlsbad Projected Sewer Flows



Encina Water Pollution Control Facility

WASTEWATER TREATMENT



WASTEWATER TREATMENT FUNDING



- Sewer rates:
 - Pay for operation, maintenance and capital improvement of wastewater treatment system
 - Will fund replacement or rehabilitation through capital reinvestment (depreciation funding from rate revenue)
- Sewer Connection Fees:
 - Charged to new users that connect to the sewer collection system
 - Based on the quantity of sewer discharge (equivalent dwelling units)
 - Pays for the capital cost of the portion of the system used

DISCUSSION QUESTIONS

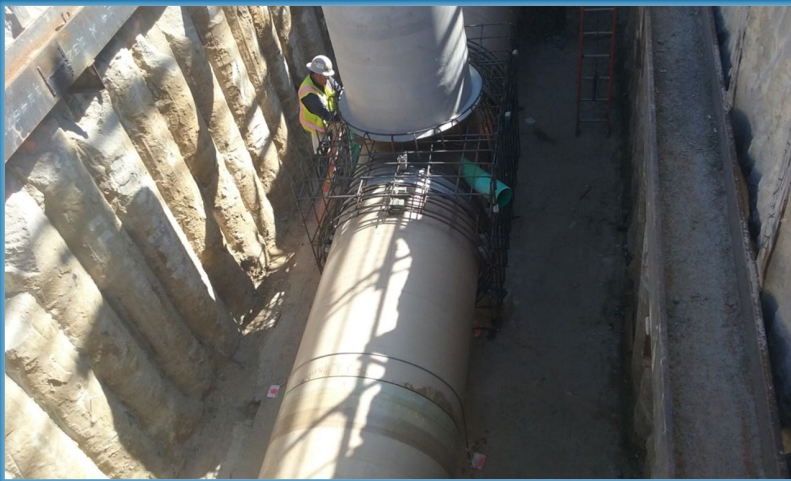


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Sewer Collection Performance Standard



SEWER COLLECTION STANDARD

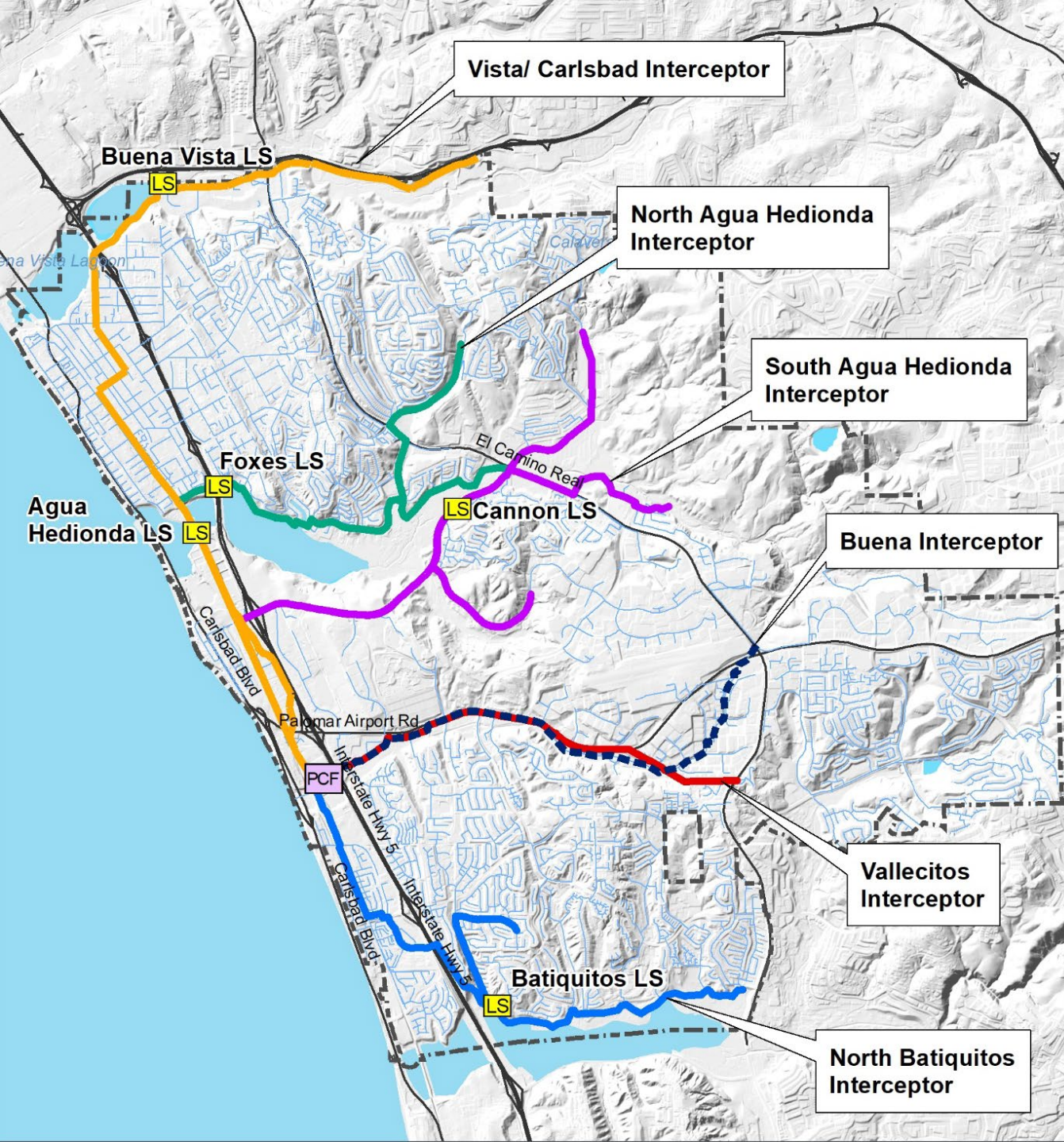


Trunk-line capacity to meet demand, as determined by the appropriate sewer districts, must be provided concurrent with development.

- 2021 average sewer flow = 6.3 million gallons/day
- Projected sewer flow = 8.3 mgd (2040)

SEWER COLLECTION SYSTEM

- 265 miles of gravity sewer
- 13 lift stations
- 4 miles of force main
- 6 interceptors



SEWER PLANNING & DESIGN CRITERIA

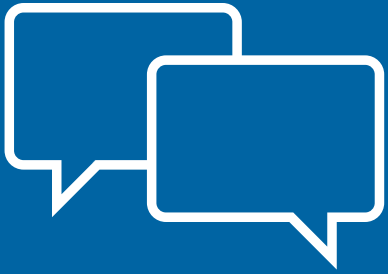
- Sewer Generation Rate:
 - Residential (single or multi-family)
 - Commercial, industrial, institutional
- Design Parameters:
 - Gravity or force main system
 - Pipe size and % full
 - Velocity (min./max.)
 - Pipe type (roughness)

SEWER COLLECTION FUNDING

- Sewer connection fees:
 - Charged to new users that connect to the sewer collection system
 - Based on the quantity of sewer discharge (equivalent dwelling units)
 - Pay for the capital cost of the portion of the system used
- Sewer rates:
 - Pay for operation, maintenance and capital improvement of wastewater treatment system
 - Will fund replacement or rehabilitation through capital reinvestment (depreciation funding from rate revenue)



DISCUSSION QUESTIONS



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Water Distribution Performance Standard





WATER DISTRIBUTION FACILITIES STANDARD

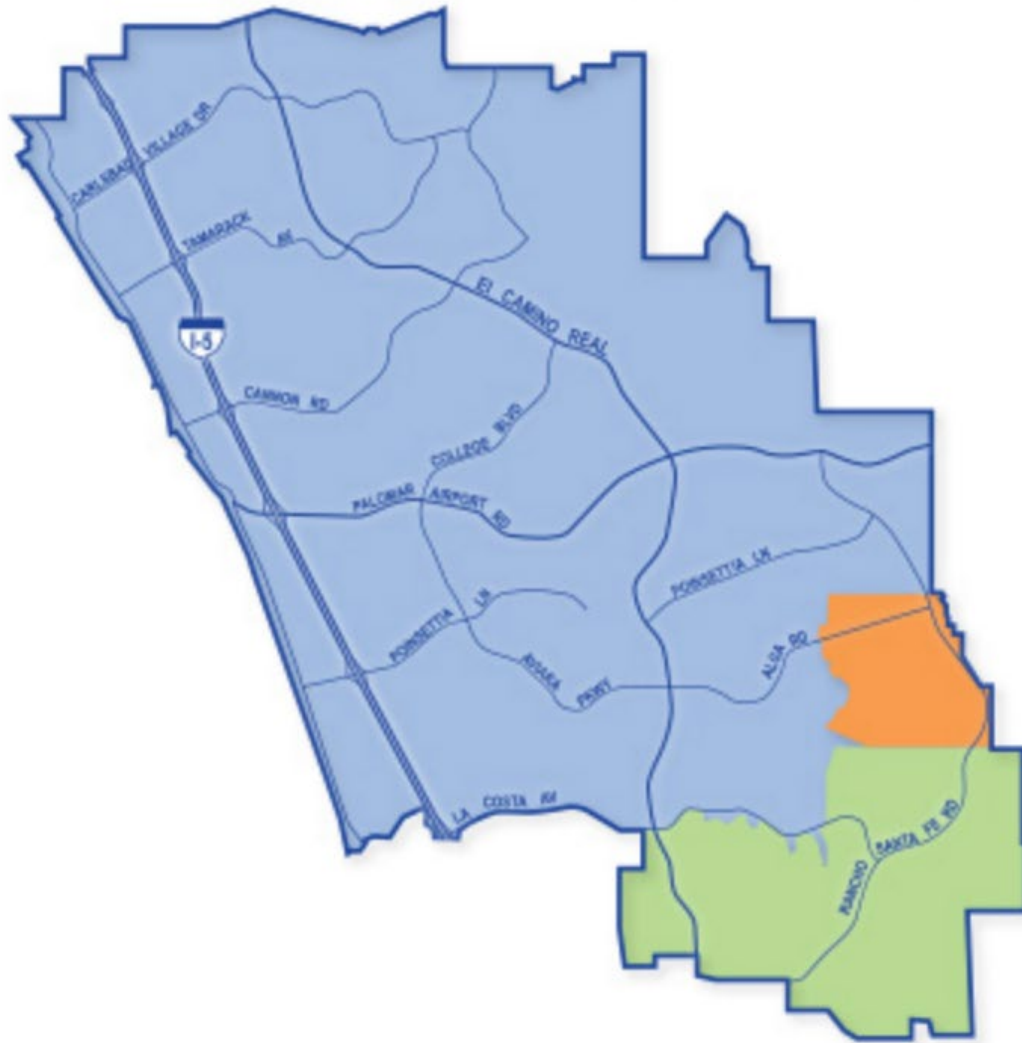
- Line capacity to meet demand (as determined by the water district) must be provided concurrent with development.
- A minimum of 10-day average storage capacity must be provided prior to any development.

WATER DISTRIBUTION FACILITIES

- 72 pressure regulating stations
- 3 pump stations
- 450 miles of water mains
- 1 water storage reservoir
- 12 water storage tanks
- 12 interagency connections



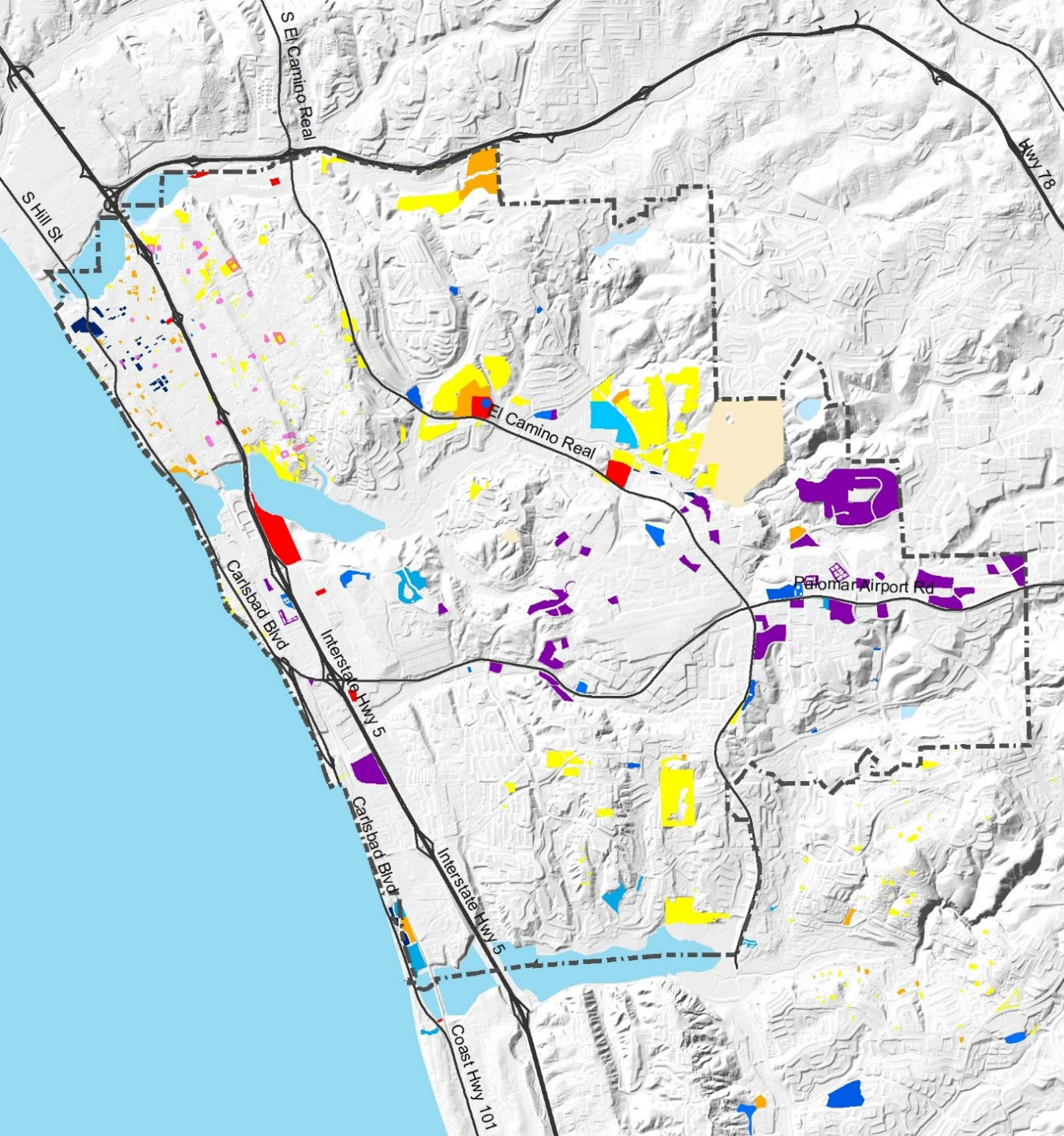
WATER DISTRICTS SERVING CARLSBAD



Carlsbad Municipal Water District

Vallecitos Water District

Olivenhain Municipal Water District



AREAS WITH INCREASED POPULATION

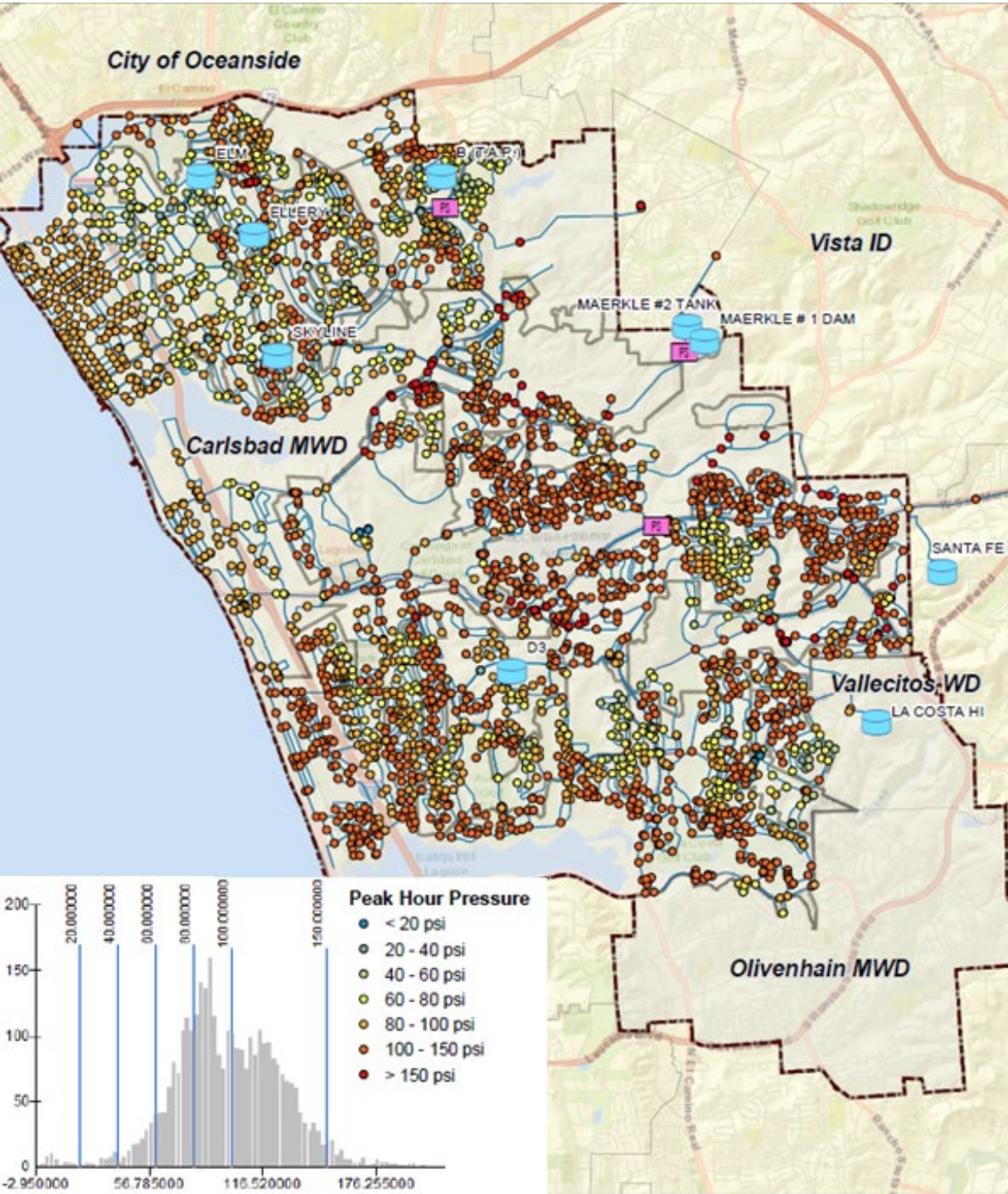
Planned Land Use

- | | |
|---------------------------|--------------------|
| Rural Residential | Public Services |
| Single Family Residential | Healthcare |
| Multi-Family Residential | Schools |
| Mobile Home Park | Outdoor Recreation |
| Group Quarters Facility | Park/ Open Space |
| Hotel/Motel | Agriculture |
| Industrial | Waterbody |
| Roads/ ROW/ Utilities | Mixed Use |
| Commercial | |
| Government/ Office | |

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WATER PLANNING & DESIGN CRITERIA

- Customer Type/Water Demand:
 - Residential (single or multi-family)
 - Non-residential (commercial, industrial, institutional, irrigation)
- Design Parameters:
 - Flow demand (average, maximum day, peak hour, fire)
 - Pressure (static, maximum day, peak hour, fire)
- Velocity
- Head loss



WATER SYSTEM HYDRAULIC MODELING

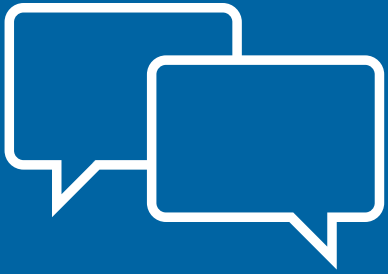
- Maximum flow velocity
- Minimum water pressure
 - Maximum day demand
 - Max. day demand + fire flow

WATER DISTRIBUTION FUNDING



- Water connection fees:
 - Charged to new users that connect to the water distribution system
 - Based on estimated consumption and water meter size
 - Pay for the capital cost of water distribution facilities
- Water rates:
 - Pay for the costs of operation, maintenance and capital improvement of the water distribution system
 - Will fund replacement or rehabilitation through capital reinvestment (depreciation funding from rate revenue)

DISCUSSION QUESTIONS



- Is this standard important to quality of life in Carlsbad?
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Committee Member Requests for Future Agenda Items

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Public Comment





Adjournment

Next Meeting: July 28, 2022

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