Vista Grande Drainage Basin Alternatives Analysis

Public Meetings

February 21 and 26, 2008

Presentation Outline

Overview of previous study and recommendations Outline of the current study Objectives ■ Alternatives Evaluation process and methodology Next steps

Previous Study

- Vista Grande Watershed Plan prepared by RMC
 - Two public workshops were held to solicit input
- Vista Grande Watershed Plan was presented to the City by RMC in October 2006 with the following findings:
 - Recommended construction of a new tunnel south of the County Line
 - Downstream improvements are needed before other storm drain improvements can begin
 - Recommended use of a 25-year design storm event for design of system improvements

Alternatives Analysis

In March 2007, Jacobs Associates was hired to evaluate alternatives for managing downstream storm flows

City objectives:

- Evaluate alternatives to manage storm flows generated in a 25 year 4 -hour storm event
- Encourage the environmental uses of storm water including:

Wetlands areas

Lake level enhancement

- Storage and groundwater recharge
- Narrow the focus of the study to a manageable number of alternatives for further investigation

Initial Screening Approach of Alternatives:

- Eleven alternatives initially screened
- Leverage existing storm water assets
- Minimize right-of-way acquisition due to time and cost
- Minimize permitting effort and duration
- Locate where there is acceptable ground stability
- After initial screening seven alternatives remained

Initial Alternatives



Geotechnical Considerations



Currently Known Environmental Issues to be Identified by Study

- Impact to environmental resources:
 - Bird habitat
 - Beach erosion and access
 - Water quality, public health and safety
 - Recreation activities and park resources
 - Aesthetics
 - Ocean resources
- Regulatory process to follow CEQA and NEPA:
 - Right-of-way
 - Permitting
 - Wetlands
 - Recreational activities and park resources

Water Quality Improvements





This GSRD utilizes a modular well-casing with 5 mm x 64 mm (0.2 in x2.5 in nominal) louvers to screen out gross solids. The modular well-casing is placed on a 2 percent slope. Runoff flows into the device and exits radially through the louvers.



Selected Alternatives



Evaluation Criteria:

- Capacity of the combined alternative system (25year 4hr)
- Provide environmental benefits
- Constructability (duration and affordability)
- Minimize operating and maintenance cost and complexities
- Minimize environmental compliance requirements
- Minimize right-of-way acquisition
- Minimize construction cost and maximize life cycle savings

Screened Alternatives



Range of Costs \$145M - \$196M

Next Steps

Public Input

- Draft Alternatives Evaluation Report is available on-line at <u>www.dalycity.org</u>
- Public Meetings (February 21 and 26 2008)
- Comments accepted through March 17, 2008
- Continue evaluation of top alternatives, Supplemental Alternative Analysis, June 13, 2008
- Public outreach, July 2008
- Prepare final draft report with methodology and ranking of alternatives, September 2008
- Public hearing, October 2008

Comments and Questions