NORTH SANTA MONICA BAY
COASTAL WATERSHEDS
ENHANCED WATERSHED
MANAGEMENT PROGRAM

Public Workshop #2
King Gillette Ranch, Calabasas
November 13, 2014
REVIEW & OVERVIEW

Public Meeting #1
• Overview of Enhanced Watershed Management Program (EWMP) Process
  • Water Quality Priorities
  • Control Measures to Address Water Quality Priorities
  • Reasonable Assurance Analysis (RAA)
• Overview of Coordinated Integrated Monitoring Program (CIMP)

Public Meeting #2
• Identification of Potential Regional EWMP Projects
BACKGROUND

• The Municipal Stormwater Permit requires agencies to identify potential projects to improve water quality and provide other benefits ("Regional EWMP Projects")
• Areas not draining to these projects must use scientific modeling to show that water quality objectives will be met
  • This modeling process is called the Reasonable Assurance Analysis (RAA)
  • The RAA may lead to the identification of additional, smaller-scale water quality improvement projects
REGIONAL EWMP PROJECTS

Regional EWMP Project
- Design storm: 85th percentile, 24-hour
- Design storm must be fully retained
- Size of drainage area not limited
- Identified prior to RAA
- No RAA required

Regional BMP
- Design storm: not specified
- Design storm not required to be retained (treat and release ok)
- Typically defined by tributary area ≥ 5 acres
- Identified via RAA
APPROACH

- Input from NSMBCW Group
- Previous Studies to Identify Projects
  - Greater LA County Integrated Regional Water Management Plan (GLAC IRWMP)
  - North Santa Monica Bay Beaches J1/4 Bacteria TMDL Implementation Plan (IP)
  - Santa Monica Bay Beaches Bacteria TMDL J1/4 Site Evaluations Technical Report
  - Additional work conducted by the City of Malibu
- Desktop-level Screening
  - Drainage area ≥ 5 acres
  - Can the 85th percentile storm be retained?
  - Environmental and construction feasibility
Prioritization based on:

- SBPAT/Land Uses
- Receiving Water Quality
- ASBS

**ASBS** = Area of Special Biological Significance. These areas are specially protected by the State of California.
Source: County of Los Angeles, City of Malibu, and Caltrans, 2005.

Prioritization based on:
- Monitoring Data
- Land Uses & Runoff Potential
- MS4 Location
- Beach Usage
J1/4 SITE EVALUATION PRIORITIZATION

Source: County of Los Angeles, 2010.

Prioritization based on:
• Monitoring Data

Figure 3. Subwatershed Prioritization from SMBBB J1/4 Site Evaluations Report
NSMBCW EWMP
November 2014
PREVIOUSLY IDENTIFIED BMPS

Figure 4. Existing Regional BMPS, Planned and Potential Distributed BMPS, and Planned Regional BMPS

NSMBCW EWMP Work Plan

June 2014
## SAMPLE OF SCREENING ANALYSIS

<table>
<thead>
<tr>
<th>Subwatershed</th>
<th>Agency</th>
<th>Project Name</th>
<th>BMP Category</th>
<th>Siting Notes</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Los Aliso</strong></td>
<td>Malibu/SMMC</td>
<td>Chamlee Nature Center Public Rec Area</td>
<td>Infiltration</td>
<td>Minimal benefit based on tributary land use (limited development); Ownership being transferred No</td>
</tr>
<tr>
<td><strong>Trancas</strong></td>
<td>County</td>
<td>Trancas-2</td>
<td>Infiltration Trench</td>
<td>Minimal benefit based on tributary land use (limited development) No</td>
</tr>
<tr>
<td></td>
<td></td>
<td>Trancas-3</td>
<td>Infiltration Trench</td>
<td>Minimal benefit based on tributary land use (limited development) No</td>
</tr>
<tr>
<td><strong>Trancas/Zuma</strong></td>
<td>County</td>
<td>Zuma-3</td>
<td>Bioretention</td>
<td>Not capable of retaining the design storm No</td>
</tr>
<tr>
<td></td>
<td>LACDBH</td>
<td>Zuma County Beach Parking Lots</td>
<td>Infiltration</td>
<td>Potential Yes</td>
</tr>
</tbody>
</table>

Analysis conducted for 39 project sites
EXAMPLE PROJECTS

TRANCAS CANYON, ZUMA BEACH, TOPANGA CANYON
TRANCAS CANYON CREEK

PO TENTIAL REG I ONAL EWMP PRO JEC T
AERIAL PHOTO OF TRANCAS CANYON WATERSHED, FACING NORTH
TRANCAS CANYON CREEK
POTENTIAL REGIONAL EWMP PROJECT

- Underground infiltration gallery at Zuma Beach
- Pretreatment via a large solids separator (e.g., “CDS unit”)
- Diversion of two County-owned storm drain lines draining approximately 130 acres
- Designed to retain 85th percentile, 24-hr storm event
- Treating runoff from single family residences and undeveloped land
Potential Project Partners:
- LA County FCD
- LA County Beaches and Harbors
- Private R/W Access (PPP)
POTENTIAL LOCATION OF ZUMA-01, FACING NORTHEAST, SHOWING GUERNSEY AVE MEETING PACIFIC COAST HIGHWAY
ZUMA BEACH
POTENTIAL REGIONAL EWMP PROJECTS

- Underground infiltration galleries
- Pretreatment via large solids separators (e.g., “CDS units”)
- Located at the terminus of the Agency-owned storm drains at Zuma Beach, under parking lots
- Collectively, designed to retain 85th percentile, 24-hr storm event from 111 acres of single family residential neighborhood
Potential Project Partners:
- LA County FCD
- LA County Beaches and Harbors
- City of Malibu
Potential Topanga BMP Tributary Areas

Legend:
- Water Body
- Topanga Canyon Subwatershed
- Storm Drains
- Potential Topanga BMPs
  - Public Roads
  - Private Roads

Potential Topanga BMPs
- Drainage to Public Roads
- Drainage to Private Roads

Topanga Canyon Subwatershed
Potential Regional EWMP Projects
Permeable Pavement and Infiltration Trenches
NSMBCW EWMP

DRAFT
November 2014
POTENTIAL LOCATION OF TRANCAS-06, FACING WEST ALONG VIEWRIDGE ROAD
TOPANGA CANYON CREEK
POTENTIAL REGIONAL EWMP PROJECTS

• Green Street BMPs: permeable pavement and underground infiltration trenches
• Located in the neighborhood near the intersection of Viewridge Rd and Topanga Canyon Blvd.
• Designed to retain 85th percentile, 24-hr storm event from 103 acres of single family residential property
Potential Project Partners:
- LA County FCD
- LA County DPW
- Private R/W Access (PPP)
POTENTIAL CONSTRAINTS

- **Environmental Screening**
  - CA Environmental Quality Act (CEQA): Clearance is likely Mitigated Negative Declaration
  - National Environmental Policy Act (NEPA): Not anticipated to be required

- **Proximity to septic systems**

- **Private ownership and/or access**

- **Geotechnical Issues**
  - Landslide and liquefaction potential, based on desktop-level screening
  - Depth to groundwater (> 10 ft) at beach (climate change impacts)
  - Geotechnical investigation planned

---

1. CEQA is a statute that requires state and local agencies to identify the significant environmental impacts of their actions and to avoid or mitigate those impacts, if feasible.
2. NEPA is similar to CEQA, but for federal projects.
PERMITTING

- Los Angeles County Flood Control District
  - Redirected flows from MS4
- Los Angeles County Beaches and Harbors
- Los Angeles County DPW
  - Grading
  - Building and Safety
- City of Malibu
  - Building and Safety
- Regional Water Quality Control Board
- Private Community Agreements (as needed)
NEXT STEPS

- Geotechnical Investigation and Feasibility Analysis for Potential Projects
- Evaluation of Minimum Control Measures
- RAA
  - Establish Target Load Reductions
  - Estimate non-structural BMP benefit
  - Conduct RAA on all portions of NSMBCW that do not drain to a Regional EWMP Project, in order to identify additional BMPs
- Project Cost Opinions
- Develop EWMP
SCHEDULE

- Draft EWMP – February 2015
- Public Workshop #3 – TBD (May 2015?)
- Draft Final EWMP – June 2015
- Receive and Address Comments from Regional Board
- Final EWMP
QUESTIONS/COMMENTS

Comments can be included on the provided comment cards

City of Malibu contact:

Rob DuBoux
Assistant Public Works Director/Assistant City Engineer

rduboux@malibucity.org
www.malibucity.org/ewmp