Safe, Clean Water Program

Upper Los Angeles River
Watershed Area Steering Committee (WASC)

Meeting Minutes:
Wednesday, February 3, 2021
2:00pm - 4:00pm
WebEx Meeting

Attendees

Committee Members Present:
Paul Lui (LA Dept. of Water and Power)
Alfredo Magallanes (Los Angeles - Sanitation)
David Nahai (Lewis Brisbois Nisgaard & Smith)
Veronica Padilla-Campos (Pacoima Beautiful)
Teresa Villegas* (Los Angeles)
Patrick DeChellis (La Canada Flintridge)
Miguel Luna (Urban Semillas)
Cathie Santo Domingo (LA Recreation & Parks)
Ernesto Pantoja (Laborers Local 300)
Yazdan Emrani (Glendale)
Genevieve Osmena (Los Angeles County Flood Control District)
John Luker (Santa Susana Mountain Park Association)
Max Podemski (Los Angeles)
Delon Kwan (LA Dept. of Water and Power)
TJ Moon* (Los Angeles County)
Kris Markarian (Pasadena)
Rafael Prieto (Los Angeles)

Committee Members Not Present:
None

*Committee Member Alternate

See attached sign-in sheet for full list of attendees

1. Welcome and Introductions

David Nahai, Chair of the Upper Los Angeles River (ULAR) WASC called meeting to order. David Nahai noted to have been appointed by the Governor to serve on the Los Angeles Regional Water Quality Control Board. He stated that there was no conflict of interest with his position as Chair of the ULAR WASC. Teresa Villegas inquired about the potential conflict of interest between his appointment and the ULAR WASC. David Nahai confirmed having had discussions with County staff and they had indicated there was no conflict of interest.

Justin Jones (District) welcomed Committee members and facilitated roll call voting for attendance and quorum was established. He provided an overview of WebEx raised hand function to the public providing a comment during the Public Comment Periods.

2. Approval of Meeting Minutes from January 13, 2021

The District provided a copy of the meeting minutes from the previous meeting. David Nahai asked the committee members for comments or revisions, there were none.

The Committee voted to approve the meeting minutes. (Approved, see vote tracking sheet).

3. Committee Member and District Updates

The District provided the District updates, noting: Municipalities were requested to submit their Transfer Agreements, Resolutions and Annual Plans and for the Regional Transfer Agreements, project developers were requested to submit the executed Transfer Agreements, Resolutions, Authorizations and Scope of

Work, and California Environment Quality Act determination (if applicable) to the District as soon as possible. Municipal Annual Plans are due April 1st the upcoming Fiscal Year and can be found on the Safe, Clean Water (SCW) website. The first Regional quarterly report is due May 2021 and the reporting timeline is in the SCW website.

The Scoring Committee (SC) completed all the scoring of projects and that the SCW Projects Module is being updated to reflect the revised scores. Of the 62 projects scored only 3 projects scored below 60 points and all ULAR WASC projects submitted to the Infrastructure Program passed the soring threshold.

With regards to the Scientific Study Independent Review Panel, the District will work with the Southern California Coastal Water Research Project (SCCWRP) to provide an independent scientific analysis and review of every scientific submission in year 2. The SCCWRP and District will prepare standardized summaries that they expect to distribute to each WASC Committee by April 2021. The summaries can be used to aid the WASC Committee's decision process during the Stormwater Investment Plan (SIP) deliberation. The SCCWRP is expected to hire a panel of technical experts across multiple fields to provide an unbiased analysis of each study.

Regarding Phase 2 of the Watershed Coordinator selection process, the District noted that the selection process was completed January 13, 2021 by the ULAR WASC. Twelve coordinators were selected by the nine WASCs. Onboarding is anticipated to begin March 2021 with a kick-off meeting April 2021.

Finally, the District noted that there are tax reduction and credit programs. Low-income Senior-Owned property owners may apply for exemption from the special SCW parcel tax. Low-income and very low-income owners may be eligible for a special SCW parcel tax reduction. A credit program is available for property owners which demonstrate stormwater improvements that result in water quality benefits, water supply benefits and community enhancement benefits. More information on the tax reduction and credit program is on the SCW website.

David Nahai noted that there will be six scientific studies before the Committee and asked when their analysis would be provided. The District indicated that the summaries would be ready by April 2021.

4. Ex Parte Communications

No Ex Parte Communication Disclosures received.

5. Public Comment Period

No public comments were received.

6. Discussion Items

a) Summary of feasibility studies, project concepts, and scientific studies submitted for Upper Los Angeles River WASC for consideration (SCW Program Portal).

The District provided an overview SCW Program Portal and highlighted the program's Dashboard tool capabilities such as accessing project details: 16 Infrastructure Program projects, 2 Technical Resources Program projects, and 6 Scientific Studies. The District also provided brief overview of the SIP Tool noting that the ULAR WASC allocated 71% of funds from year 1 which corresponds to approximately $11.31M of funds rolling over to year 2. The ULAR WASC earmarked 67% of year 2 which corresponds to approximately $16.48M remaining balance for year 2.

Teresa Villegas requested confirmation on the remaining funds and/or rollover as $16.5 M available for allocation. The District confirmed that the amount was correct and that the SIP is available on the SCWP website in the Projects section within the Regional Program tab. Miguel Luna clarified that some projects may receive funding from outside sources and that would reduce the amount required from SIP funding.

b) Infrastructure Program (IP) Presentations (ULAR Scoring Rubric):

i) Los Angeles Pierce College Northeast Campus Stormwater Capture & Use and Biofiltration
Presented by Daniel Apt, President for Olanun (LACCD Stormwater Consultant)

The project consists of underground cisterns for the capture and use of stormwater for irrigation and biofiltration areas for local treatment at the LAPC campus.

Ernesto Pantoja asked if the Project would fall under LACCD's Project Labor Agreement. Daniel Apt indicated not have an answer to this question but noted they would coordinate with the District to find out more information.

Max Podemski inquired about enhanced connectivity for pedestrians and cyclists from the Orange Line Station to the LAPC Campus. Daniel Apt indicated that they have not integrated that particular element into the Project but from a signage perspective, they will be educating people on the Project.

David Nahai asked if it was possible for the project to acquire funds from Measure CC for the second year as opposed to seeking the entire amount from the WASC. Daniel Apt acknowledged the suggestion.

Cathie Santo Domingo asked about the type of signage that would be used around the campus. Daniel Apt commented that they would be including student input for the signage process and find ways to create outside classrooms for integrating stormwater and water supply education.

ii) Metro Orange Line a Water Infiltration and Quality Project
Presented by Melissa Faigeles Levitt, Senior Environmental Specialist for the Los Angeles County Metropolitan Transportation Authority (LACMTA).

The project consists of implementing Best Management Practices along Metro right-of-way to capture runoff from 2,300-acres drainage area and provide multiple benefits to disadvantaged communities in the City of LA.

Ernesto Pantoja asked if the project had a local-hire requirement. Melissa Levitt stated that it would fall under Metro's Project Labor Agreement which includes local-hire requirements.

David Nahai asked if Los Angeles Department of Water and Power (LADWP) would be providing the balance of the funds needed for the project as it be difficult for the WASC to allocate funds for the project. Melissa Levitt stated that the total cost of the project includes operations and monitoring after construction. David Nahai suggested that LADWP commit to an earlier funding participation.

Max Podemski commented on the low community benefit score and why these improvements were not integrated from the beginning. Melissa Levitt agreed that the project was not as strong in terms above ground improvements for green infrastructure, but any area disturbed would be revegetated and the focus was on water capture.

Teresa Villegas asked about allocation of funds from LADWP and whether it would be used for maintenance or infrastructure. Melissa Levitt replied that the funding would be used for capital costs for the dry wells.

iii) Altadena – Lake Avenue Green Improvement Project
Presented by Haris Harouny, Associate Civil Engineer for the Los Angeles County Public Works

The project will capture, treat, and infiltrate urban and stormwater runoff as part of a multi-benefit project to improve water quality and enhance the community.

David Nahai requested clarification on the source for the remaining project funds that are needed and what is the health of the Raymond Groundwater Basin. Haris Harouny noted that the County is requesting design costs only and would come back to the Committee with a firmer number for construction costs. He also added that the Raymond Groundwater Basin is an active aquifer that would be potentially recharged.

Veronica Padilla-Campos asked about the project's community engagement plan. Haris Harouny indicated that the County has an extensive community engagement plan during the design phase that includes workshops and presentations. Veronica Padilla-Campos asked if the County plans to partner with outside organizations. Haris Harouny said they are open to partnering with non-profit organizations.

iv) Westmont – Vermont Avenue Green Improvement Project
Presented by Haris Harouny, Associate Civil Engineer for the Los Angeles County Public Works

The project will capture, treat, and infiltrate urban and stormwater runoff as part of a multi-benefit project to improve water quality and enhance the community.

Teresa Villegas expressed concern about not having more information on the project's full cost and requested the County provide information on a comparable project for the WASC to review. Haris Harouny indicated that the costs are estimated at $10 million but that the design, final plans and specifications would generate accurate project costs.

David Nahai requested clarification on the balance of funds needed for the project and asked about the water supply benefits. Haris Harouny indicated that the project would request SCW funds in increments of $1M per year. He also indicated that water supply benefit of 196 acre-feet water capture was based on the SCW Projects Module.

Max Podemski asked if there was coordination with the County's Vision Zero plan for safety enhancements and Metro. Haris Harouny confirmed coordination with the County's Vision Zero team and that the County has a team in the County that works with Metro in planning efforts.

7. Public Comment Period

A member of the public commented that he and five Spanish speaking residents had watched the project presentations and wanted the Committee members and the public to know. He also noted that although the presentations were in English, that he translated the content discussed in the presentations in Spanish.

8. Voting Items

None.

9. Meeting Schedule

Next meeting, Thursday February 18, 2021 2:00pm – 5:00pm
Recurring meetings on Wednesday and additional meetings on the third Thursdays in February and March to accommodate presentations.

10. Items for Next Agenda

a) Infrastructure Program Presentations

11. Adjournment

David Nahai thanked the WASC members and the public for their time and participation and adjourned the meeting.

Next Meeting: Thursday, February 18, 2021
2:00PM – 5:00PM

Upper Los Angeles River
February 3, 2021

	Quorum Present				Voting Items
Member Type	Member	Voting?	Alternate	Voting?	Meeting Minutes
Agency	Genevieve Osmena	x	Carolina Hernandez		y
Agency	Delon Kwan	x	Art Castro		A
Agency	Paul Liu	x	Rafael Villegas		y
Agency	Alfredo Magallanes	x	Michael Scaduto		y
Agency	Cathie Santo Domingo	x	Javier Solis		y
Community Stakeholder	Ernesto Pantoja	x	Sergio Rascon		y
Community Stakeholder	Miguel Luna	x	Yvette Lopez-Ledesma		y
Community Stakeholder	John Luker	x	Wendi Gladstone		y
Community Stakeholder	David Nahai	x	Jacob Lipa		y
Community Stakeholder	Veronica Padilla-Campos	x	Felipe Escobar		y
Municipal Members	Yazdan Emrani	x			y
Municipal Members	Patrick DeChellis	x			y
Municipal Members	Barbara Romero		Teresa Villegas	x	y
Municipal Members	Max Podemski	x	Ackley Padilla		y
Municipal Members	Rafael Prieto				
Municipal Members	Paul Alva		TJ Moon	x	y
Municipal Members	Kris Markarian	x	Sean Singletary		
Total Non-Vacant Seats	17			Yay (Y)	14
Total Voting Members Present	16			Nay (N)	0
Agency	5			Abstain (A)	1
Community Stakeholder	5			Total	15
Municipal Members	6				Approved

Attendees
Upper Los Angeles River WASC Meeting - February 3, 2020

Adi Liberman
Adriana A
Alfredo Magallanes
Alvin Cruz - LACFCD
Alynn Sun
Ana Tabuena-Ruddy
Andrew Yon Farreck
Blake Whittington, TreePeop
Brad Parks
Carlos Moran
Carmen Andrade
Cathie Santo Domingo
Clarasophia Gust
Conor Mossavi
Craig Reiter
Curtis Fang
Daniel Apt
david nahai
Dawn Petschauer
Delon Kwan
Drew
Eileen Alduenda
Ernesto Pantoja
Francisco Romero
Genevieve Osmena
Gregor Patsch - Torrent Reso
Gus Orozco
Hans Tremmel
Haris Harouny
Heather Repenning
I EC
ilene Ramirez
Itzel Flores Castillo Wang
Jason Casanova
Joe Venzon
Johanna Chang
John Luker
Jon Ball
Jonathan Guerrero
Justin Jones - LACFCD
katie m
Katie Ward
Ken Susilo
Kevin Chang
Kris Markarian
Kris Markarian
Larry Tortuya
Lorena Matos
Lorena Matos
Mara Luevano
Maritsa DRA Inc.
Mary Ann Breckell
max Podemski
Mayra Cabrera - LACFCD
Melissa Levitt
Merrill Taylor
Miguel Luna
Mike Antos
Mike Rudd
Nayiri Vartanian
Oliver Galang (Craftwater)
Patrick DeChellis
Paul Glenn (GHD)
Paul Liu
Peter Tonthat
phuoc le
Rafael Prieto
Ruth Siegel
Safe Clean Water LA
shahram kharaghani
sheila brice
Somer Sherwood-White
Teresa Villegas
Thuan Nguyen
TJ Moon
Tracey Chavira
Veronica Padilla
Vik Bapna
w d
Wendi Gladstone
Yazdan Emrani
Yvette Lopez-Ledesma
Michael Gagan

Los Angeles Pierce College Northeast Campus Stormwater Capture & Use and Biofiltration Project

Funding Program (IP/TRP)

Project Lead: Los Angeles Community College District & BuildLACCD

Presenter: Daniel Apt, Olaunu (LACCD Stormwater Consultant)

Project Overview

The project consists of underground cisterns for the capture & use of stormwater for irrigation and biofiltration areas for local treatment at the LAPC campus.

- Description of Primary and Secondary Objectives
  - Primary: Water Quality: Assist in compliance with the Small MS4 Permit
  - Secondary: Water Supply: Provide water for irrigation of LAPC athletic fields
- Project Status – Phases for which SCW funding is being requested
  - Design & Construction
- Total Funding Requested
  - $ 5,243,675

Project Location

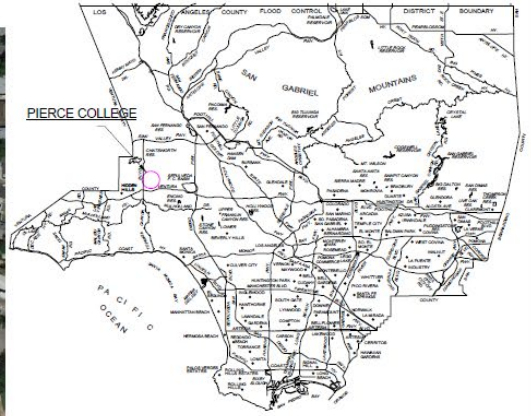
VICINITY MAP
NTS

- Project Location:
  Los Angeles Pierce College
- Watershed Area:
  Upper Los Angeles River
- Capture Area: 132.09 acres
- Municipality Benefits
  - Water Quality improvement
  - Helps to meet compliance with downstream TMDLs through capture and retention of the 85th percentile storm event for the projects' drainage area.
  - Water supply enhancement

Project Background

- Why was the Project Location selected?
  - Project captures 80% of the impervious surface runoff for the LAPC campus
- How was the Project developed?
  - LACCD is developing stormwater projects for all of its 9 campuses
  - The LAPC Northeast project is the largest of 8 LAPC stormwater projects
- Which regional water management plan includes the proposed project? - None
- Description of benefits to municipality/municipalities
  - Water quality improvement
  - Assistance in meeting downstream TMDLs
  - Water supply enhancement
- Description of how the Feasibility Study or Project Concept will provide Disadvantaged Community (DAC) Benefits – Not applicable

Project Concept Design



VICINITY MAP
NTS

LEGEND

- DRAINAGE BOUNDARY
- SUBAREA DESIGNATION / AREA (ACRES)
- UNDERGROUND CAPTURE AND USE STORAGE TANK
- BIOFILTRATION AREAS
- UNDERGROUND IRRIGATION AREAS
- EXISTING STORM DRAIN
- PROPOSED STORM DRAIN
- PROPOSED HYDRODYNAMIC SEPARATOR

SCALE: 1"=150'

GENERAL NOTES:

1. EXISTING UTILITY LOCATIONS WERE BASED OFF OF AVAILABLE UTILITY MAPS AND LIMITED AS-BUILTS.
2. EXISTING STORM DRAIN LOCATIONS AND DEPTHS SHALL BE FIELD VERIFIED AND POTHOLED AS NEEDED TO VERIFY INVERT ELEVATIONS AND DRAINAGE DIRECTIONS.
3. PROPOSED STORM DRAIN LOCATIONS ARE APPROXIMATE AND ELEVATIONS WILL NEED TO BE DETERMINED DURING FINAL DESIGN.
4. AT A MINIMUM THE UNDERGROUND STORAGE SYSTEM SHALL BE CONSTRUCTED WITH THE FOLLOWING:
   - 4.1. INTERNAL BAFFLE SYSTEM AND INITIAL CONTAINMENT AREA FOR ADDITIONAL PRETREATMENT (NOT SHOWN ON MAP).
   - 4.2. WET WELL PUMP STATION CONVEYING CAPTURED RUNOFF THROUGH A MEDIA FILTRATION SYSTEM AND/OR MECHANICAL FILTER SIZED PER IRRIGATION MANUFACTURER'S SPECIFICATIONS (NOT SHOWN ON MAP). MUST MEET LA COUNTY DEPARTMENT OF PUBLIC HEALTH REQUIREMENTS.
   - 4.3. PRESSURE TRANSDUCERS TO MONITOR PUMP AND FILTER PERFORMANCE (NOT SHOWN ON MAP).

CLIENT
LOS ANGELES COMMUNITY COLLEGE DISTRICT

LACCD PROJECT NAME
LOS ANGELES PIERCE COLLEGE NORTHEAST CAMPUS STORMWATER CAPTURE & USE AND BIOFILTRATION PROJECT

LACCD PROJECT NUMBER

BUILDER

PROGRAMMING CONSULTANT
OLAUNU
SAN CLEMENTE, CA 92672

REGISTRATION STAMP

DATE:

AGENCY APPROVAL

ISSUE

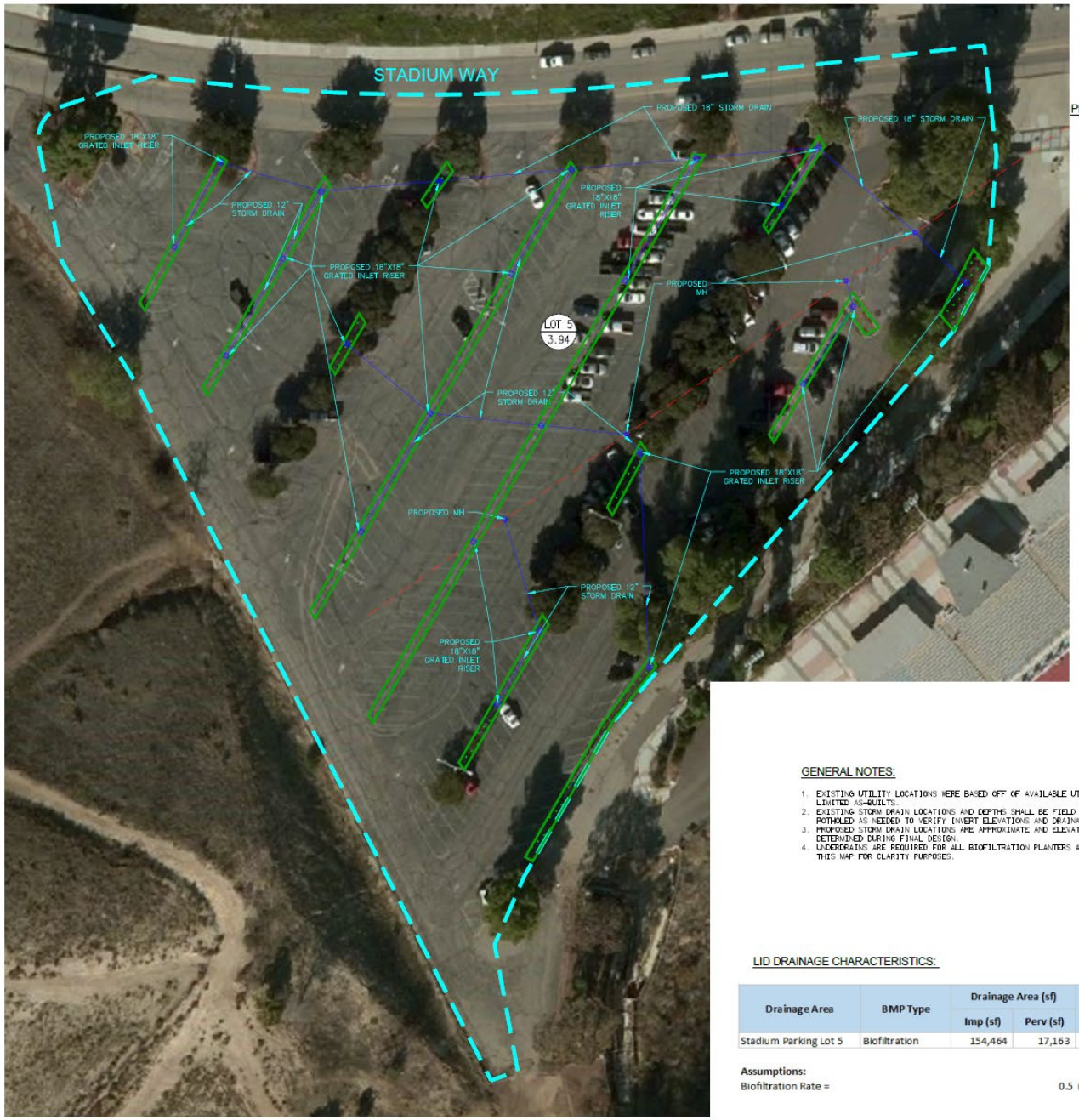
MARK	DATE	DESCRIPTION

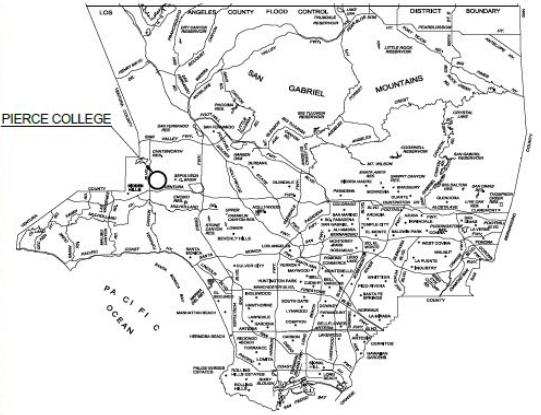
DESIGNED:
DATE:
DRAWN:
PROJ. NO.:
APPROVED:

SHEET TITLE
DRAINAGE EXHIBIT

SHEET NUMBER
1

Project Concept Design





VICINITY MAP
NTS

LEGEND

- DRAINAGE BOUNDARY
- 1A / 2.22 — SUBAREA DESIGNATION / AREA (ACRES)
- POTENTIAL BIOFILTRATION AREA
- PROPOSED STORM DRAIN
- EXISTING STORM DRAIN

GENERAL NOTES:

1. EXISTING UTILITY LOCATIONS WERE BASED OFF OF AVAILABLE UTILITY MAPS AND LIMITED AS-BUILTS.
2. EXISTING STORM DRAIN LOCATIONS AND DEPTHS SHALL BE FIELD VERIFIED AND POTHOLED AS NEEDED TO VERIFY INVERT ELEVATIONS AND DRAINAGE DIRECTIONS.
3. PROPOSED STORM DRAIN LOCATIONS ARE APPROXIMATE AND ELEVATIONS WILL NEED TO BE DETERMINED DURING FINAL DESIGN.
4. UNDERDRAINS ARE REQUIRED FOR ALL BIOFILTRATION PLANTERS AND ARE NOT SHOWN ON THIS MAP FOR CLARITY PURPOSES.

30 15 0 30 60 90
SCALE: 1"=30'

LID DRAINAGE CHARACTERISTICS:

Drainage Area	BMP Type	Drainage Area (sf)		Imp %	Precip Depth (in)	Design Volume (cf)	Areq (sf)		BMP Ponding Depth (ft)
		Imp (sf)	Perv (sf)				Min Required	Avaliable	
Stadium Parking Lot 5	Biofiltration	154,464	17,163	90%	1	11,728	7,819	7,840	1.5

Assumptions:
Biofiltration Rate = 0.5 in/hr

CLIENT
LOS ANGELES COMMUNITY COLLEGE DISTRICT

LACCD PROJECT NAME
LOS ANGELES PIERCE COLLEGE STADIUM PARKING LOT 5 BIOFILTRATION PROJECT

LACCD PROJECT NUMBER

BUILDER

PROGRAMMING CONSULTANT
OLAUNU
SAN CLEMENTE, CA 92672

REGISTRATION STAMP

DATE:
AGENCY APPROVAL

ISSUE

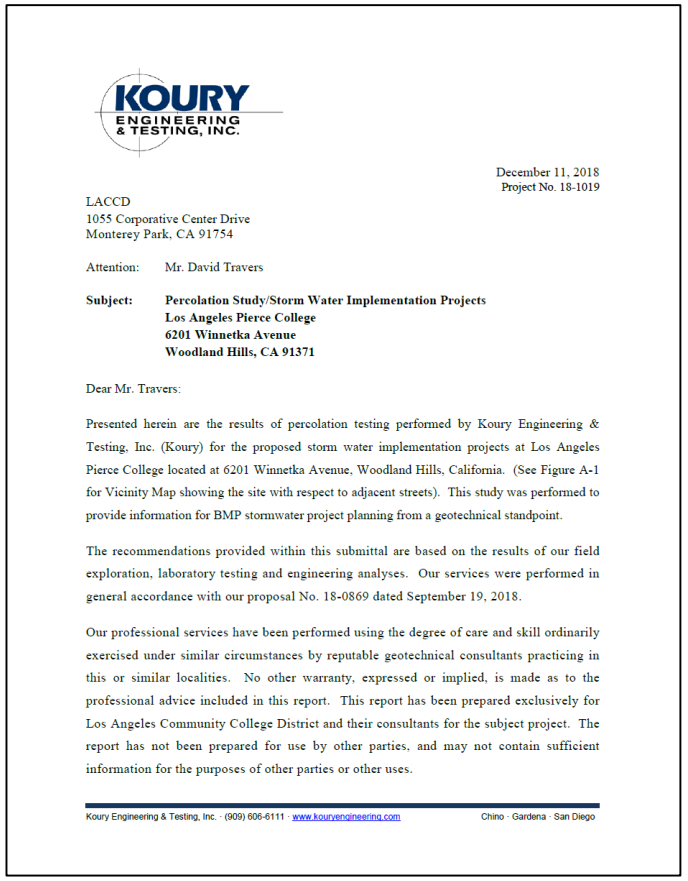
MARK	DATE	DESCRIPTION

DESIGNED:
DATE:
DRAWN:
PROJ. NO.:
APPROVED:

SHEET TITLE
DRAINAGE EXHIBIT

SHEET NUMBER
1

Project Details



KOURY ENGINEERING & TESTING, INC.

December 11, 2018
Project No. 18-1019

LACCD
1055 Corporative Center Drive
Monterey Park, CA 91754

Attention: Mr. David Travers

Subject: **Percolation Study/Storm Water Implementation Projects**
Los Angeles Pierce College
6201 Winnetka Avenue
Woodland Hills, CA 91371

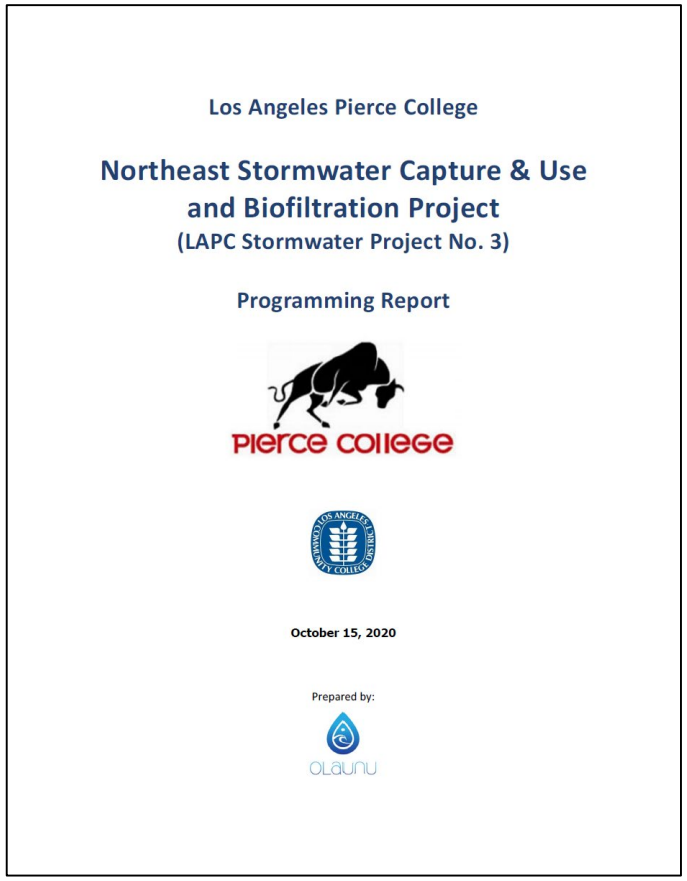
Dear Mr. Travers:

Presented herein are the results of percolation testing performed by Koury Engineering & Testing, Inc. (Koury) for the proposed storm water implementation projects at Los Angeles Pierce College located at 6201 Winnetka Avenue, Woodland Hills, California. (See Figure A-1 for Vicinity Map showing the site with respect to adjacent streets). This study was performed to provide information for BMP stormwater project planning from a geotechnical standpoint.

The recommendations provided within this submittal are based on the results of our field exploration, laboratory testing and engineering analyses. Our services were performed in general accordance with our proposal No. 18-0869 dated September 19, 2018.

Our professional services have been performed using the degree of care and skill ordinarily exercised under similar circumstances by reputable geotechnical consultants practicing in this or similar localities. No other warranty, expressed or implied, is made as to the professional advice included in this report. This report has been prepared exclusively for Los Angeles Community College District and their consultants for the subject project. The report has not been prepared for use by other parties, and may not contain sufficient information for the purposes of other parties or other uses.

Koury Engineering & Testing, Inc. · (909) 606-6111 · www.kouryengineering.com Chino · Gardena · San Diego



Los Angeles Pierce College

Northeast Stormwater Capture & Use and Biofiltration Project
(LAPC Stormwater Project No. 3)

Programming Report

Pierce College

October 15, 2020

Prepared by:

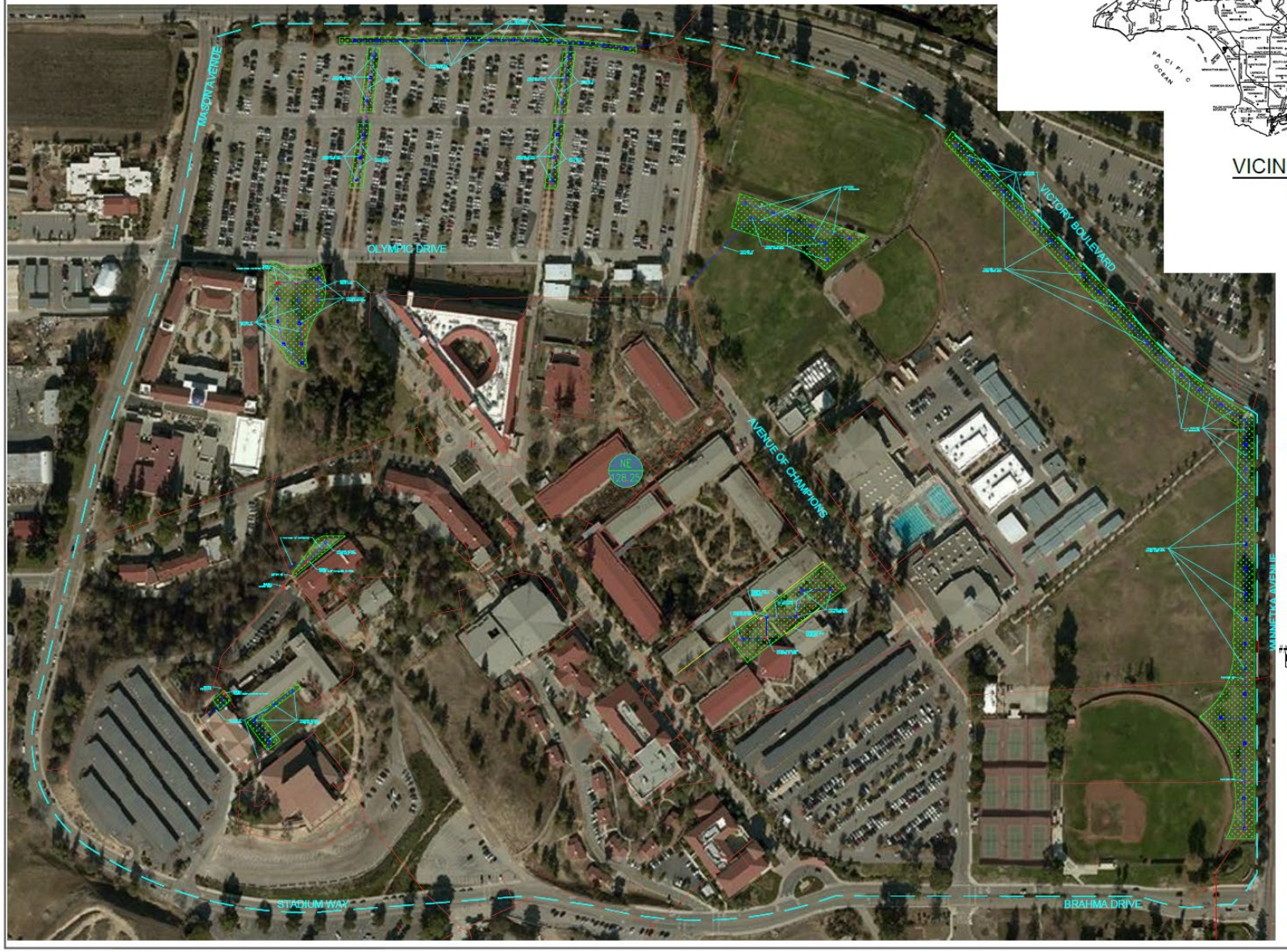
OLAUNU

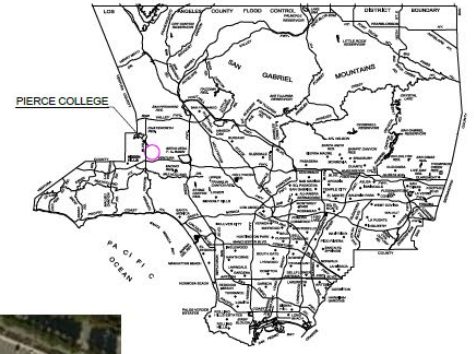
- Current site conditions – Existing ballfields and parking lots
- Completed studies/analysis – Geotechnical report & Concept design/programming report
- Description of any alternatives considered – Evaluated distributed biofiltration

Considered Alternative

LID DRAINAGE CHARACTERISTICS:

Drainage Area	BMP Type	Drainage Area (sf)		Precip Depth (in)	Design Volume (cf)	Area (sf)		BMP Depth (ft)
		Imp (sf)	Perv (sf)			Min Required	Available	
Northeast	Biofiltration	3,351,942	2,234,628	1	270,018	180,012	210,247	1.5





VICINITY MAP
NTS

LEGEND
DRAINAGE BOUNDARY
SUBAREA DESIGNATION
AREA (ACRES)
BIOFILTRATION AREAS
EXISTING STORM DRAIN
PROPOSED STORM DRAIN

SCALE: 1"=###'

CLIENT
LOS ANGELES COMMUNITY COLLEGE DISTRICT

LACCD PROJECT NAME
LOS ANGELES PIERCE COLLEGE NORTHEAST CAMPUS BIOFILTRATION AREAS (PROJECT NO. 3)

LACCD PROJECT NUMBER

BUILDER

PROGRAMMING CONSULTANT
OLAUNU
SAN CLEMENTE, CA 92672

REGISTRATION STAMP

DATE:

AGENCY APPROVAL

ISSUE

MARK	DATE	DESCRIPTION

DESIGNED:
DATE:
DRAWN:
PROJ. NO.:
APPROVED:

SHEET TITLE
DRAINAGE EXHIBIT

SHEET NUMBER
1

Cost & Schedule

Phase	Description	Cost	Completion Date
Planning/Feasibility Analysis	Concept Designs, Site Investigations, and Feasibility Study	$78,619.00	10/2020
Design	Engineering Design and associated Costs	$953,395.00	08/2022
CEQA Compliance/ EIS	CEQA compliance and environmental impact studies	$20,480.00	08/2022
Permitting	Permitting	$18,800.00	08/2022
Construction	Construction of the project	$9,533,955.00	04/2023
Inspections/Audits	Intermediate and project completion inspections/audits	$11,040.00	04/2023
TOTAL		**$10,616,289**	

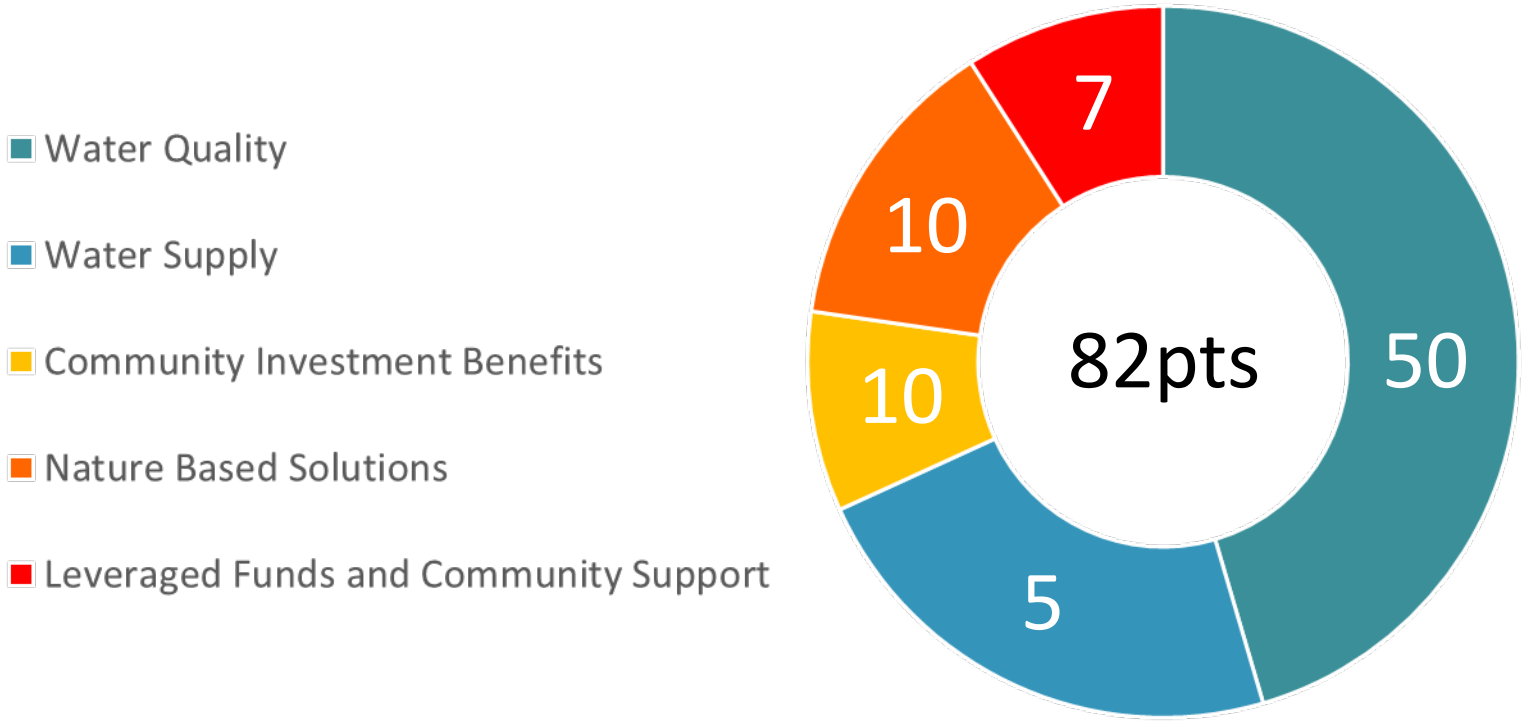
- Description of Annual Costs: Maintenance, operation, and monitoring costs
- Project Lifespan & Lifecycle Cost: $11,239,182.06

Funding Request

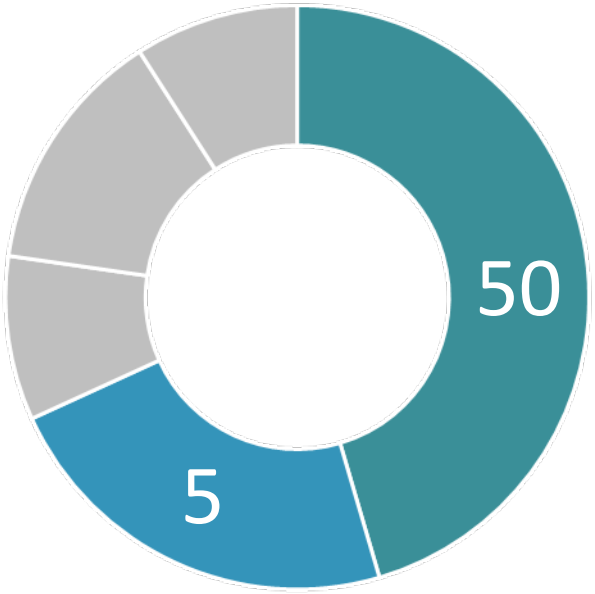
Year	SCW Funding Requested	Phase	Efforts during Phase and Year
1	$476,697.00	Design	Engineering Design for project.
2	$ 4,766,978.00	Construction	Construction of project
3			
4			
5			
TOTAL	**$ 5,243,675.00**		

- Leveraged Funding amount and percent: $5,372,614 and 50.6%
- Description of future potential SCW funding requests, if applicable:
  - No further funding requests for the LAPC Northeast project, potential for other LACCD stormwater projects

Preliminary Score

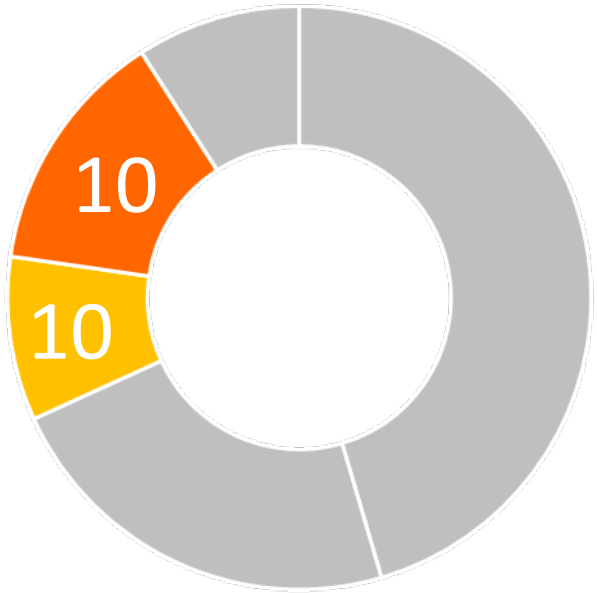


Water Quality & Water Supply Benefits



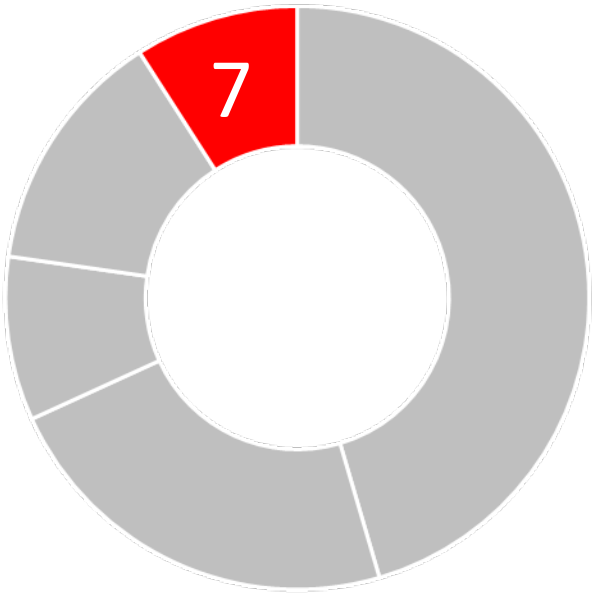
- Primary mechanisms that achieve Water Quality and Water Supply Benefits claimed:
  - Retention of the design storm volume (DSV), which is based on the 85th percentile 24-hour storm event.
- Wet/Dry runoff captured (no measured dry weather runoff)
- Tributary Area: 132.09 acres
- Capacity: 10.86 ac-ft
- Pollutant Reduction: 100.0 %
- Annual Water Supply Volume: 106.18 ac-ft
- Water Supply Use: LAPC athletic fields subsurface irrigation
- Water Supply Cost Effectiveness: $6408 per acre-ft

Community Investment Benefits and Nature Based Solutions



- Community Investment Benefits
  - Reduces stormwater volumes (7.52 ac-ft) associated with LAPC to the greater Los Angeles storm drain system.
  - The biofiltration component of Stadium parking lot enhances the aesthetic of the area by increasing vegetation.
  - The use of captured stormwater for irrigation assists in maintaining healthy ball fields for recreational use on campus.
  - Enhances recreational opportunities for the community
  - Creates green spaces at a school
  - Reduces heat local island effect through increased vegetation associated with the biofiltration area of stadium parking lot
  - Increases vegetation at the site location with the biofiltration area of stadium parking lot
- Nature Based Solutions
  - Project implements natural processes through vegetated biofiltration areas
  - Project uses natural materials such as an engineered soil matrix and native plant species in the biofiltration areas

Leveraging Funds and Community Support



- Leveraging Funds
  - The LACCD sustainable building program is funded mainly through bond measures
  - Most recently, Bond Measure CC was approved in 2016 for $3.3 billion allocated to improvement of facilities throughout the nine LACCD colleges
  - Leveraged funding amount: $5,372,614
  - Leveraged funding status: Commitment Received
  - 50.6% funding matched

- Community Support
  - Los Angeles Pierce College Citizens' Oversight Committee – Unanimous support at October 15, 2020 meeting
  - Council for Watershed Health – letter of support
  - Planned outreach:
    - Coordination with LAPC faculty and student groups on campus to help develop educational signage for the project
    - Further coordination with the Los Angeles Pierce College Citizens' Oversight Committee for targeted outreach of users of the LAPC ball fields and stadium


Questions?

Metro Orange Line Water Quality and Infiltration Project

Infrastructure Program

Los Angeles County Metropolitan Transportation Authority (Metro)

Melissa Levitt, Craig Reiter, and Heather Repenning, Metro

Ken Susilo and Curtis Fang, Geosyntec Consultants

Project Overview

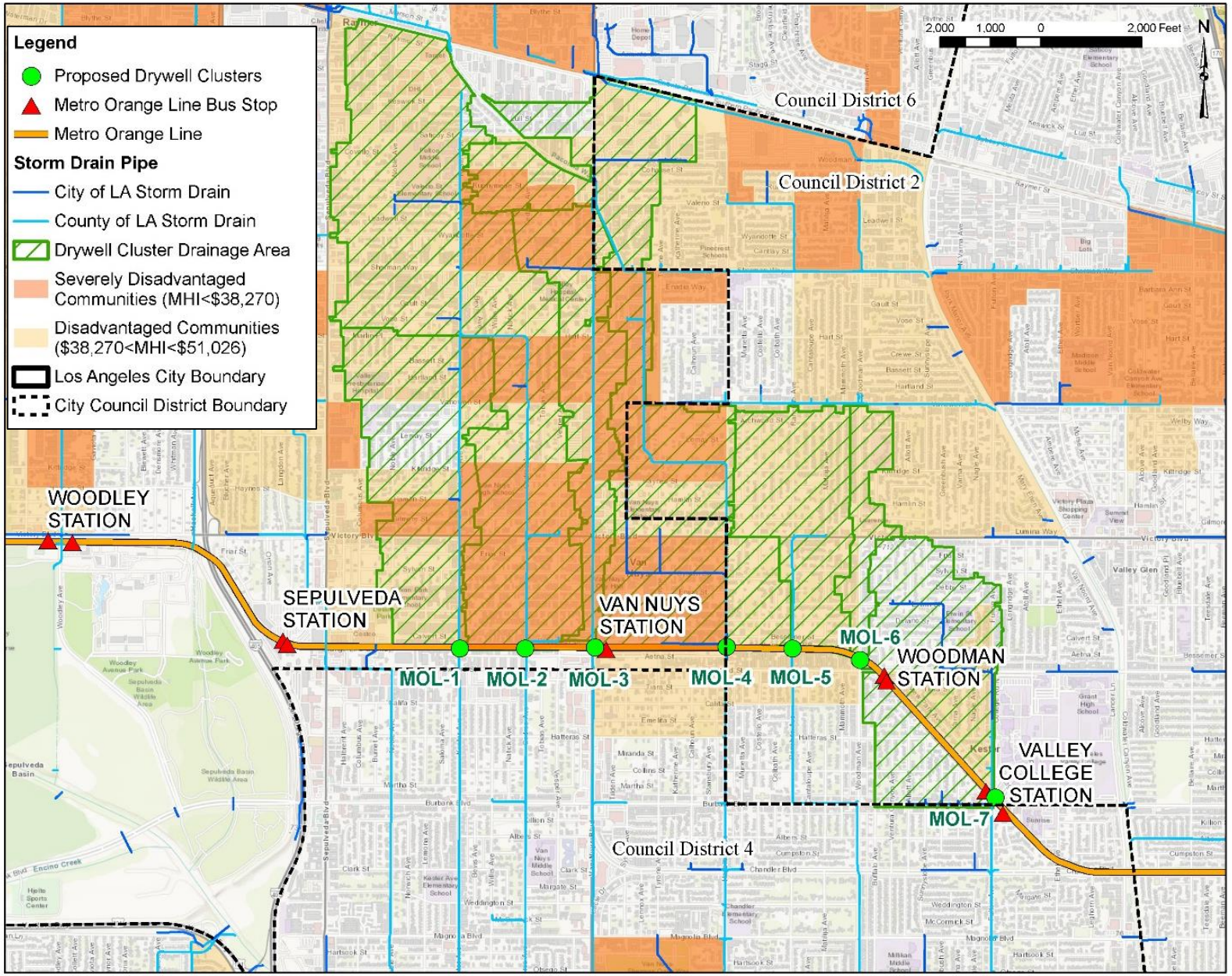
Implement BMPs along Metro ROW to capture runoff from 2,300-acres drainage area and provide multiple benefits to DACs in City of LA.

Primary Objective	Achieve water supply benefits through capture and infiltration
Secondary Objectives	Improve surface water quality downstream of the Project area; and Reduce the risk of potential localized flooding by alleviating peak flow rate
Phases Requested for Funding	Planning, Design, Construction, O&M
Total Funding Requested	$34,515,458

Project Location

- **<u>Project Location</u>**:
  City of Los Angeles
- **<u>Watershed</u>**:
  Upper Los Angeles River

Project Location (Cont.)



- **Capture Area**:

Drywell Cluster ID	Drainage Area (ac)	Number of Drywells Proposed
MOL-1	308	24
MOL-2	683	40
MOL-3	197	14
MOL-4	579	39
MOL-5	193	13
MOL-6	67	10
MOL-7	292	28
Total	**2,319**	**168**

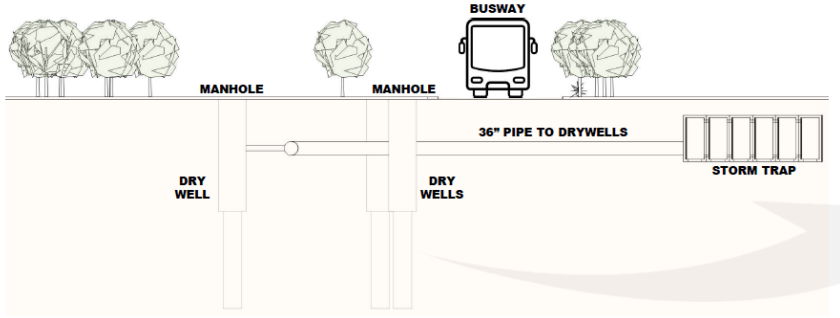
- **Municipality Benefits**: Stormwater management, Groundwater recharge, and flood risk reduction
- **DAC:** Project components treat runoff from DACs

Metro's Role in the Region

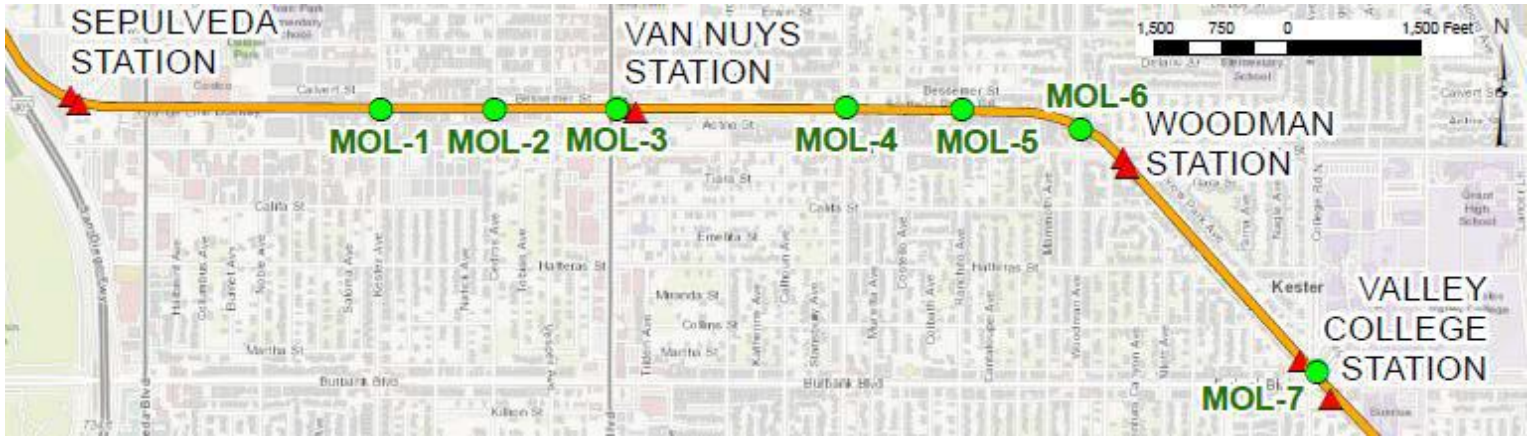
- Major land owner in LA County
- Expansive capital project construction planned & in progress
- Metro's Moving Beyond Sustainability Strategic Plan sets stormwater infiltration and capture targets
- Key partner in meeting regional water quality mandates & supply goals

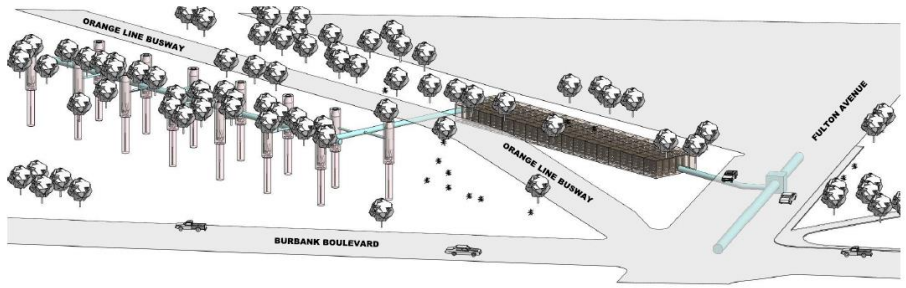
Project Background

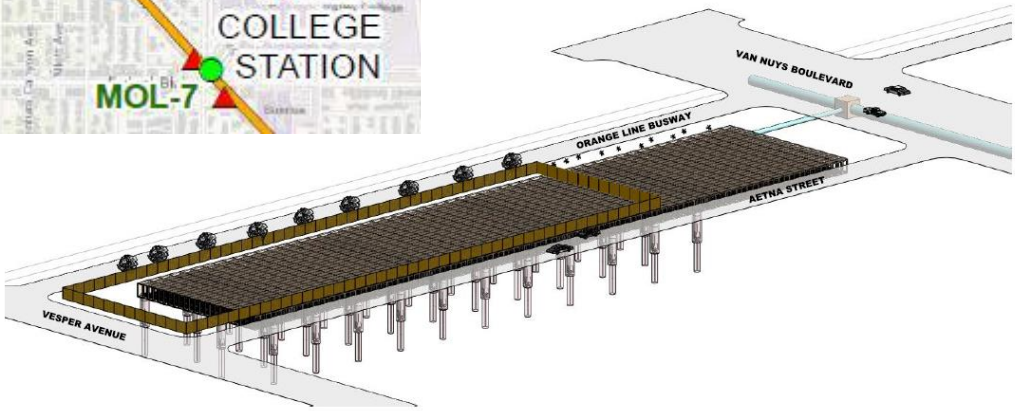
- Project Location:
  - Metro Orange Line (Kester Ave to Valley College Station)
  - Utilize existing Metro right-of-way and parking lots adjacent to the active busway
  - Intersect regional drainage infrastructures
  - Overlap high value groundwater aquifer with favorable geologic conditions
- Project Development:
  - Feasibility evaluation of Metro alignments within the San Fernando Groundwater Basin
  - The Project is integrated with the MOL Bus Rapid Transit (BRT) Improvement Project
  - LADWP project funding partner ($11,088,000 funding match)
  - Coordination with LASAN, StreetsLA, LACFCD, ULARA Watermaster, ULAR WMG, Council for Watershed Health, Climate Resolve, NRDC, & LA Conservation Corps



Project Details







The Project will implement a network of **168 drywells** across **7 locations** within Metro owned parcels and ROW along the MOL with pretreatment facilities to capture, treat, and infiltrate stormwater runoff from **2,319 acres**, resulting in an estimated groundwater recharge yield of **890 acre-feet/ year** into the San Fernando Groundwater Basin and constructed as a component of the **MOL BRT Improvements Project**.

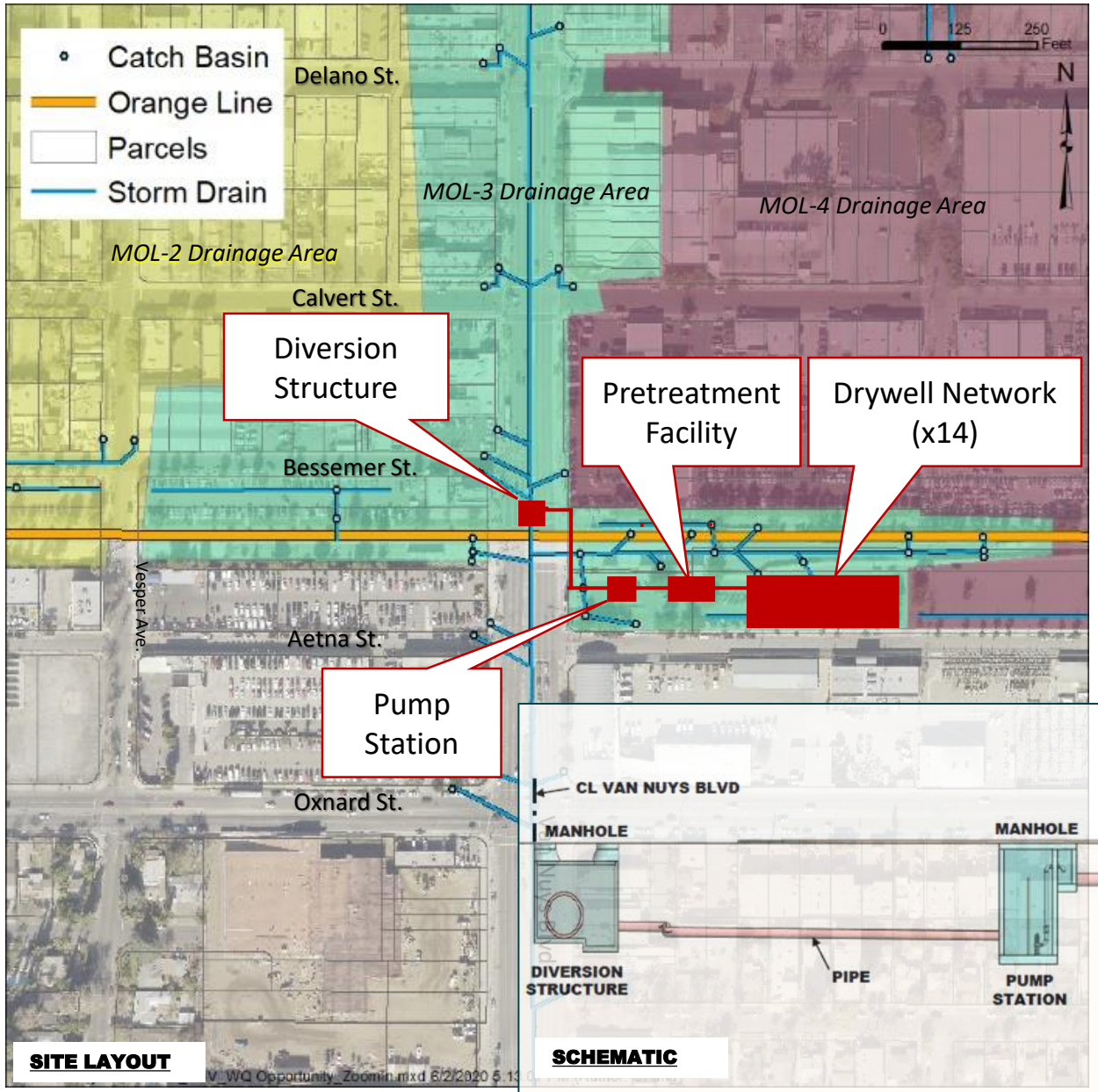
Project Details – Metro Orange Line Bus Rapid Transit Improvements Project

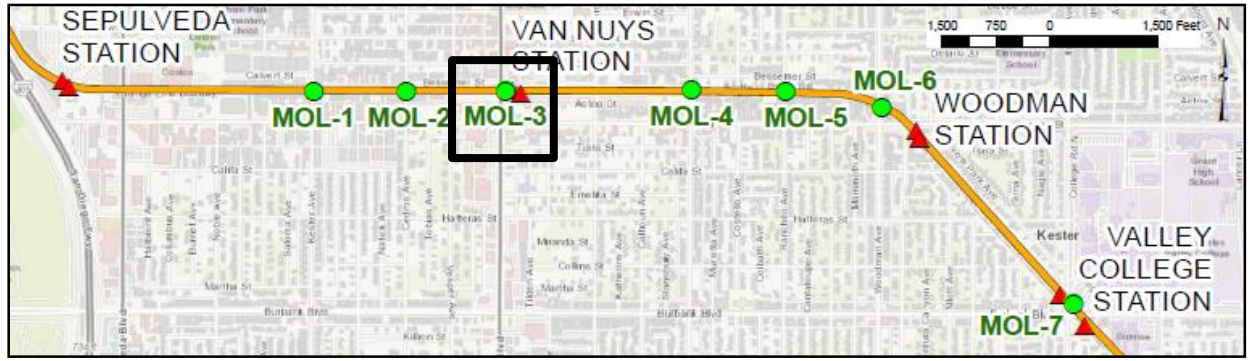
Gating Rendering – Orange Line Vanowen Crossing

1. Four Quadrant Gate System with Flashing lights and Bells
2. Raced Median
3. Pedestrian/Bicyclist Crosswalk Gates
4. Bike/Ped Path

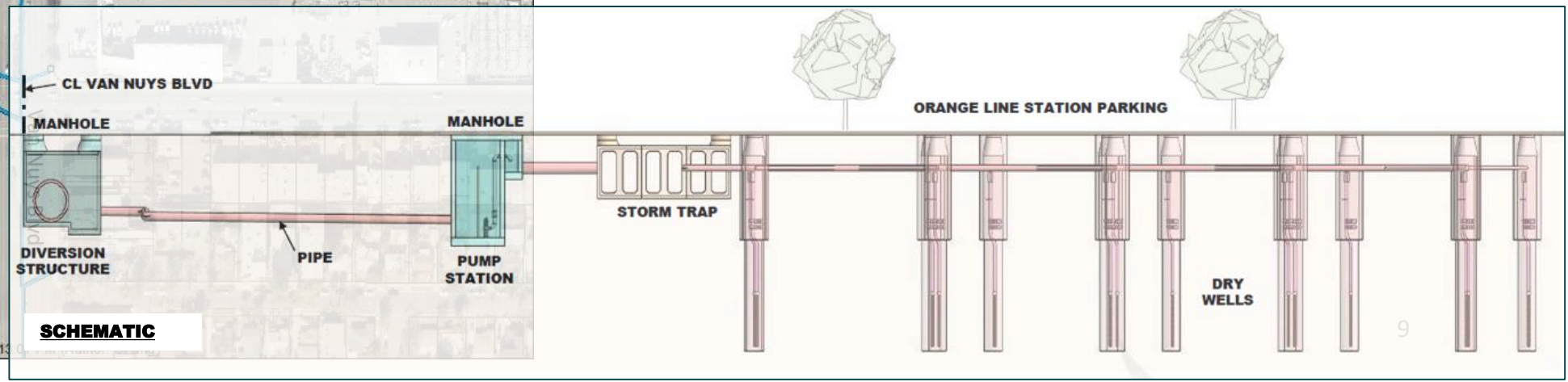
MOL - Sepulveda Grade Separation Rendering

Project Details – Typical Site Layout (MOL-3)

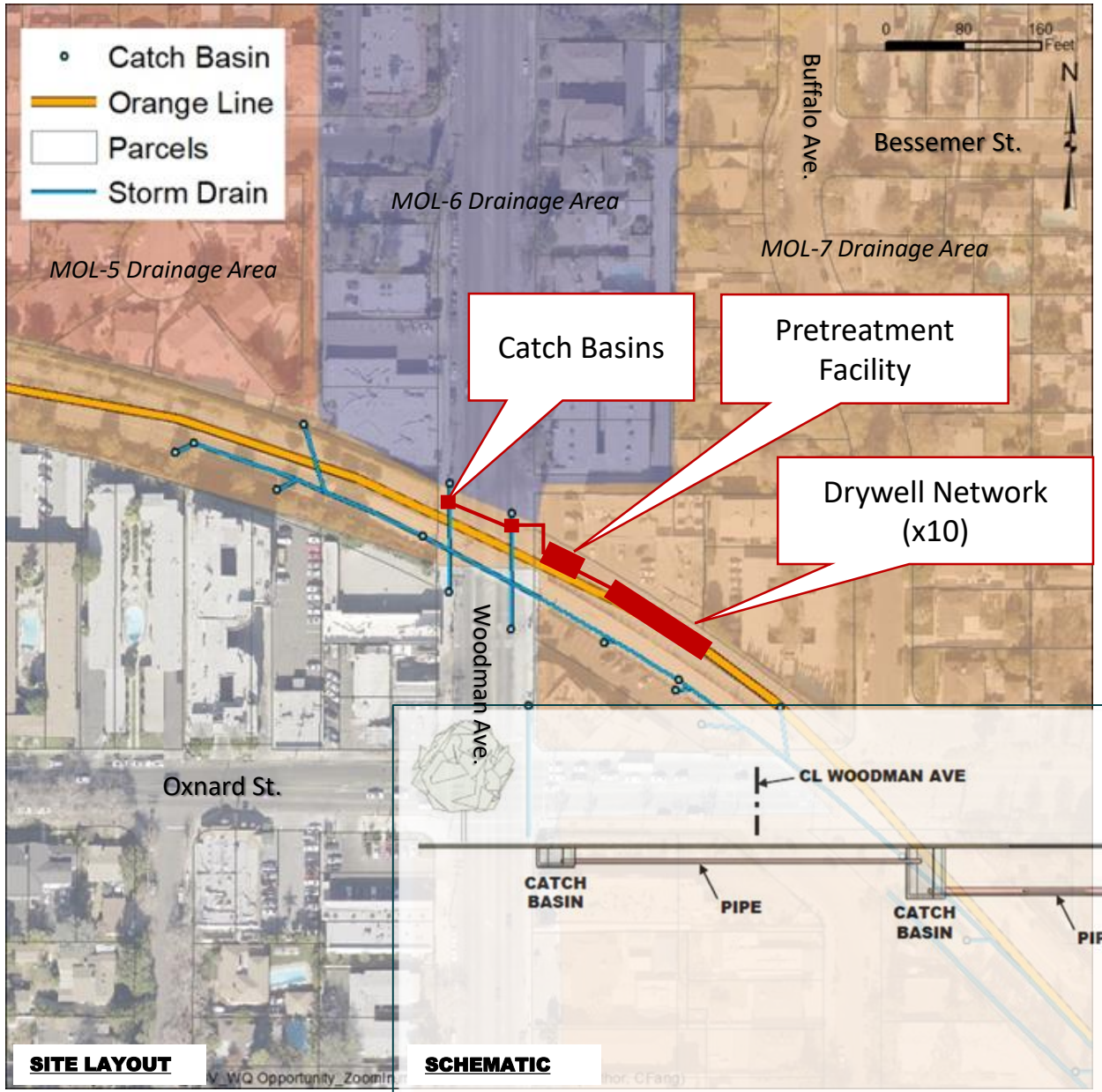


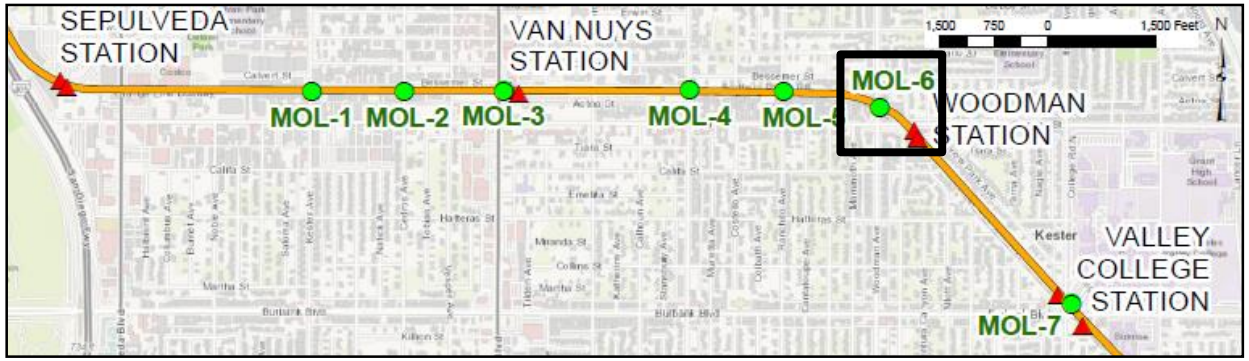


Stormwater is diverted from LACFCD storm drain to drywells via pumping.

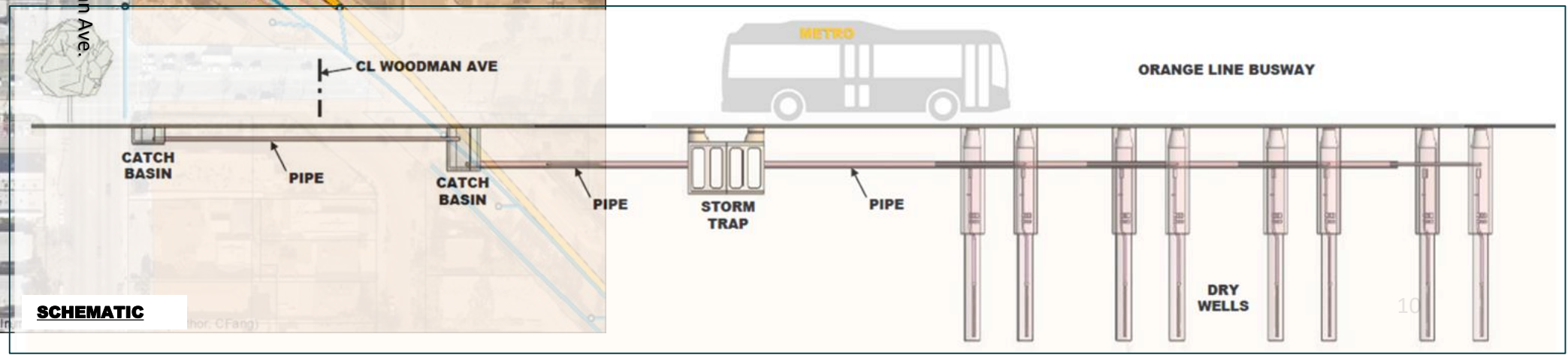


Project Details – Typical Site Layout (MOL-6)



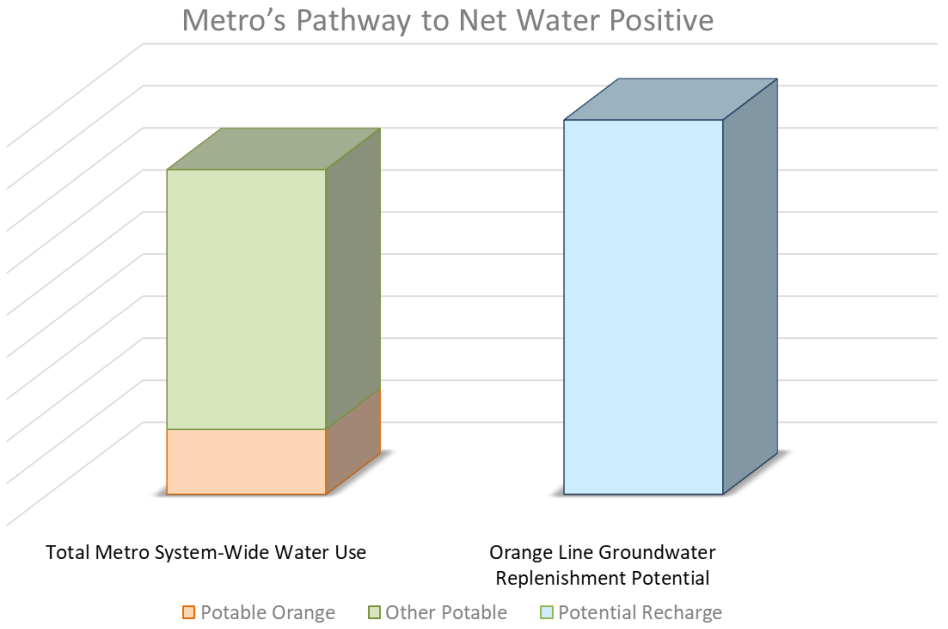


Surface runoff along Woodman Ave. is diverted to the drywells via gravity.



Project Benefits

- Significant stormwater management and groundwater recharge (890 AF/year)
- The Project will make Metro Net Water Positive
- Reduce environmental hazards by reducing surface water pollution
- Increase community wellbeing by mitigating localized nuisance flooding
- Provide faster & more reliable multi-modal travel, increased ridership, and enhanced safety to disadvantaged communities
- Eliminate tailpipe emissions of GHGs & criteria air pollutants emissions in DACs
- Explore maintenance contract with organization employing at risk workers



Cost & Schedule

Phase	Description	Cost	Completion Date
Planning	Early concept design, site investigations, and CEQA and other environmental impact studies and permitting	$241,000	05/2021
Design	Pre-project monitoring, site investigations, formal project design, intermediate and final project completion audits.	$2,153,000	06/2022
Construction	Labor, equipment, material, plus overhead and contingencies. In addition, it includes the present value of 2-years post-construction monitoring.	$27,829,000	06/2025
	TOTAL CAPITAL COST	**$30,223,000.00**	

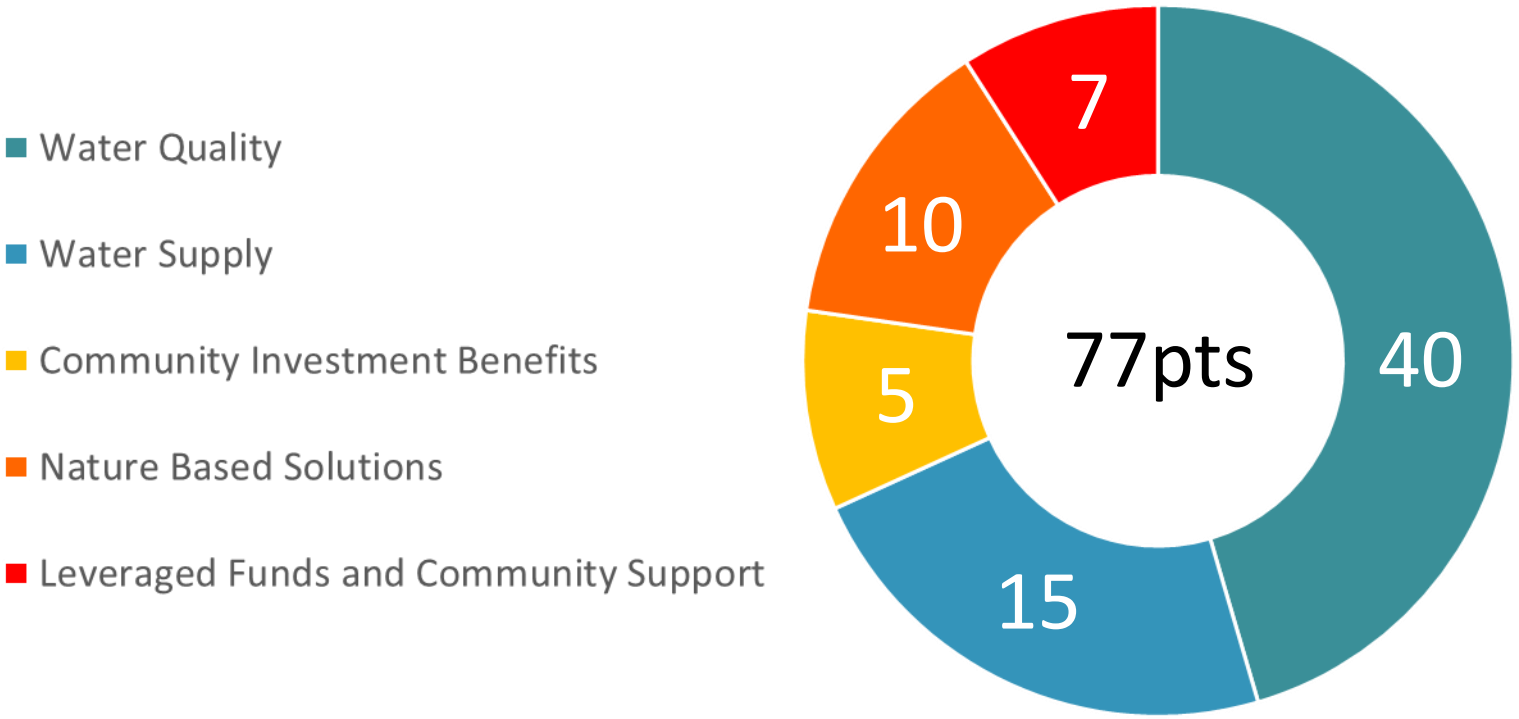
Annual Cost Item	Description	Cost ($/Year)
Operation	Labor and energy cost associated with operating pump stations, and labor cost associated with inspecting drywells and pretreatment facilities	$82,000
Annual Inspection and Maintenance	Material, labor, equipment and waste disposal associated with inspecting, repairing drywells, pretreatment facilities, and pump stations	$741,000
	TOTAL 30-YEAR LIFECYCLE COST	**$45,599,521.35**

Funding Request

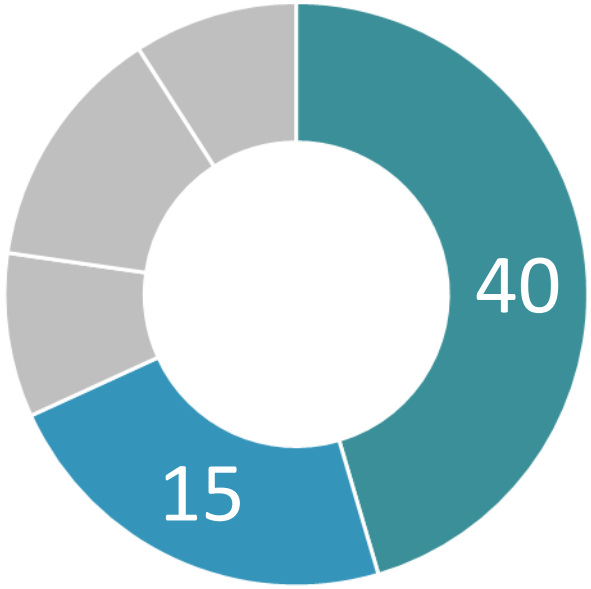
Year	SCW Funding Requested	Phase	Efforts during Phase and Year
1	$ 241,000	Planning	Early concept design, site investigations, and CEQA and other environmental impact studies
	$ 1,359,000	Design	Pre-project monitoring, site investigations, formal project design, intermediate and final project completion audits, CEQA and other environmental impact studies, and permitting
2	$ 5,070,400	Construction	Project construction
3	$ 6,000,000	Construction	Project construction
4	$6,464,800	Construction	Project construction
	$823,200	O&M	Operation and maintenance of pump stations, drywells, and pretreatment facilities
5	$823,200	O&M	Operation and maintenance of pump stations, drywells, and pretreatment facilities
5+	$13,733,858	O&M	Present values of 28-years of operation and maintenance of pump stations, drywells, and pretreatment facilities
TOTAL	**$34,515,458**		

Leveraged Funding Amount: $11,088,000 (37% of Capital Cost)

Preliminary Score

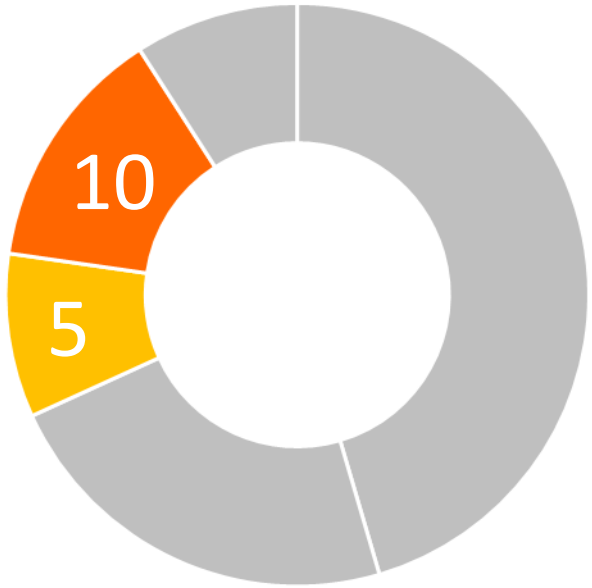


Water Quality & Water Supply Benefits



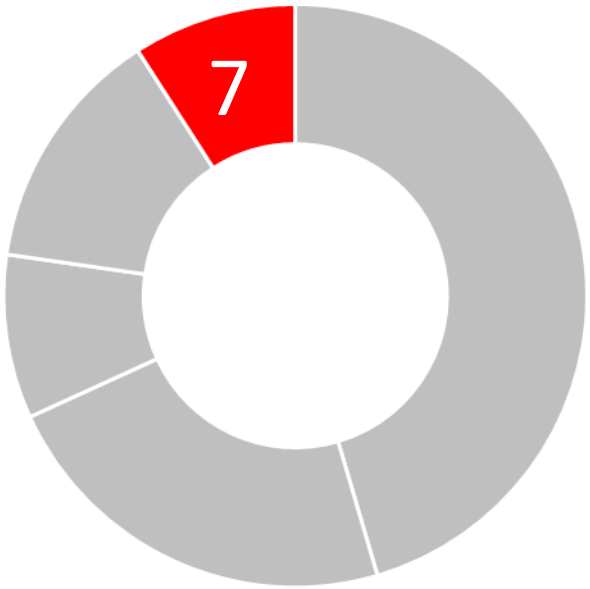
- Primary mechanisms to achieve water quality and water supply benefits: 168 drywells with pretreatment facilities
- Wet weather focus
- Tributary Area: 2,319 acres
- 24-Hour Management Capacity: 268 acre-feet
- Pollutant Load Reduction: 65% (zinc and bacteria)
- Annual Water Supply Volume: 890 acre-feet/year
- Water Supply Use: Groundwater aquifer recharge
- Water Quality Cost Effectiveness: 8.9 acre-feet / $-Million construction cost
- Water Supply Cost Effectiveness: $2,219/acre-feet
- Letters of Support: Received from ULARA Watermaster, LADWP, and LACFCD

Community Investment Benefits and Nature Based Solutions



- **Community Investment Benefits**
  - Flood Risk Mitigation: Reduce peak flows to alleviate localized flooding and restore capacity to the drainage system downstream
  - Public Access to Waterways: Provides improved, safer pedestrian and bike path, increased bus speeds, and improved ridership and capacity that will provide multi-modal access for local communities in San Fernando Valley to Los Angeles River
  - Recreational Opportunities: The grade separation and gating component enhances the safety of bicyclists and pedestrians who utilize the Orange Line bike path for recreational uses
- **Nature Based Solutions**
  - Natural Infiltration: Rely on infiltration to manage stormwater and correct precipitation-runoff response curve toward the natural, pre-development condition
  - Natural Materials: Use natural materials for natural filtration
  - Landscaping: Disturbed landscape during construction will be restored with native, drought-tolerant plants

Leveraging Funds and Community Support



- **Leveraging Funds**
  - Cost-share agreement: Secured with LADWP
  - Substantial match: 37% of capital cost matched

- **Community Support**
  - Open houses and tours: Multiple events hosted for local communities, City staff and local transit advocates between December 2017 and March 2019 to provide updates on Metro projects in the San Fernando Valley
  - Pop-up events showcasing the Project: Set up at MOL stations throughout 2019
  - Letters of support: Climate Resolve, Council for Watershed Health, and Natural Resources Defense Council

Questions?

Melissa Levitt, Metro

LevittM@metro.net

Altadena – Lake Avenue Green Improvement Project

Infrastructure Program

Los Angeles County Public Works

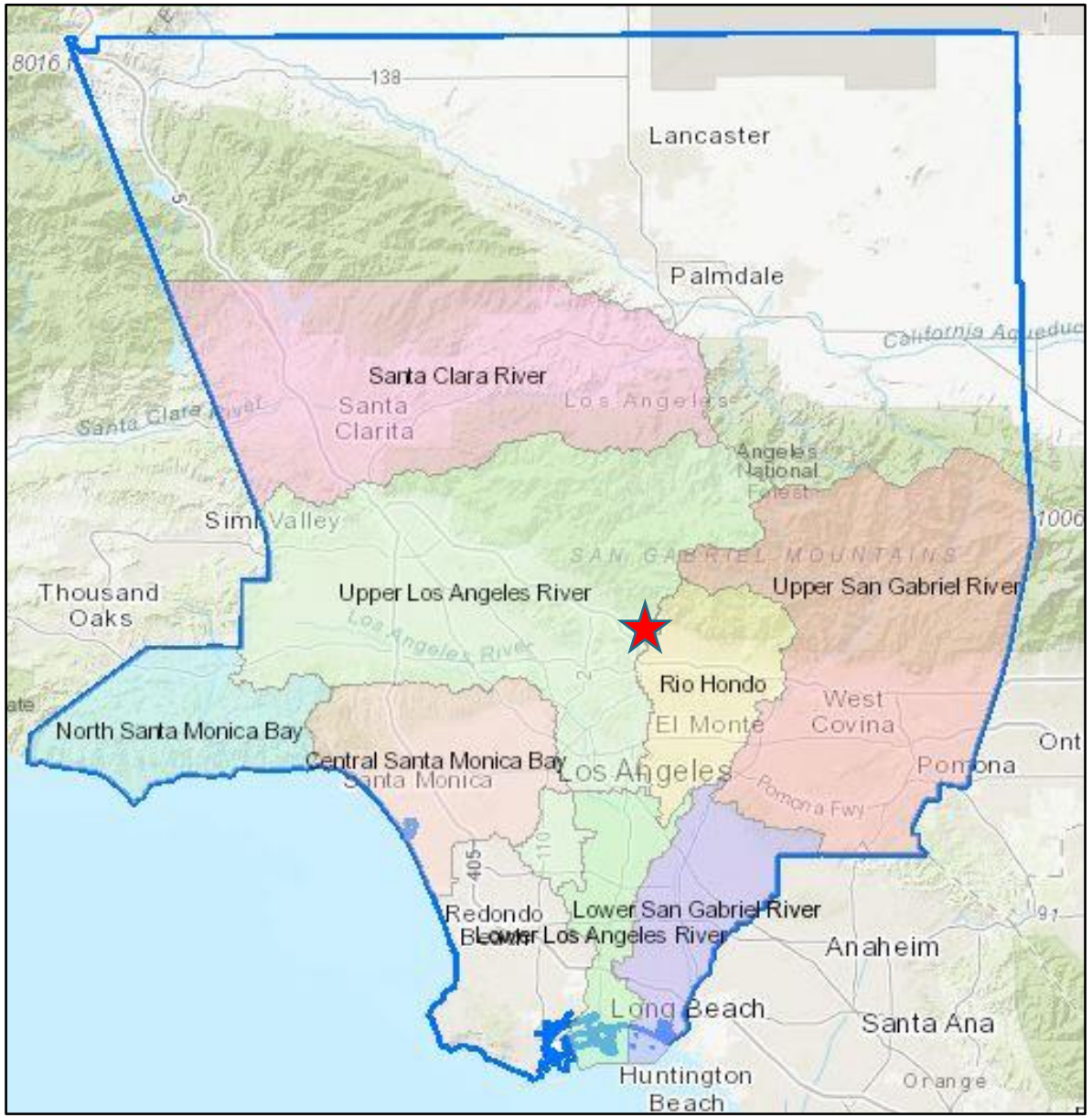
Haris Harouny, P.E.

Project Overview

The Project will capture, treat, and infiltrate urban and stormwater runoff as part of a multi-benefit project to improve water quality and enhance the community.

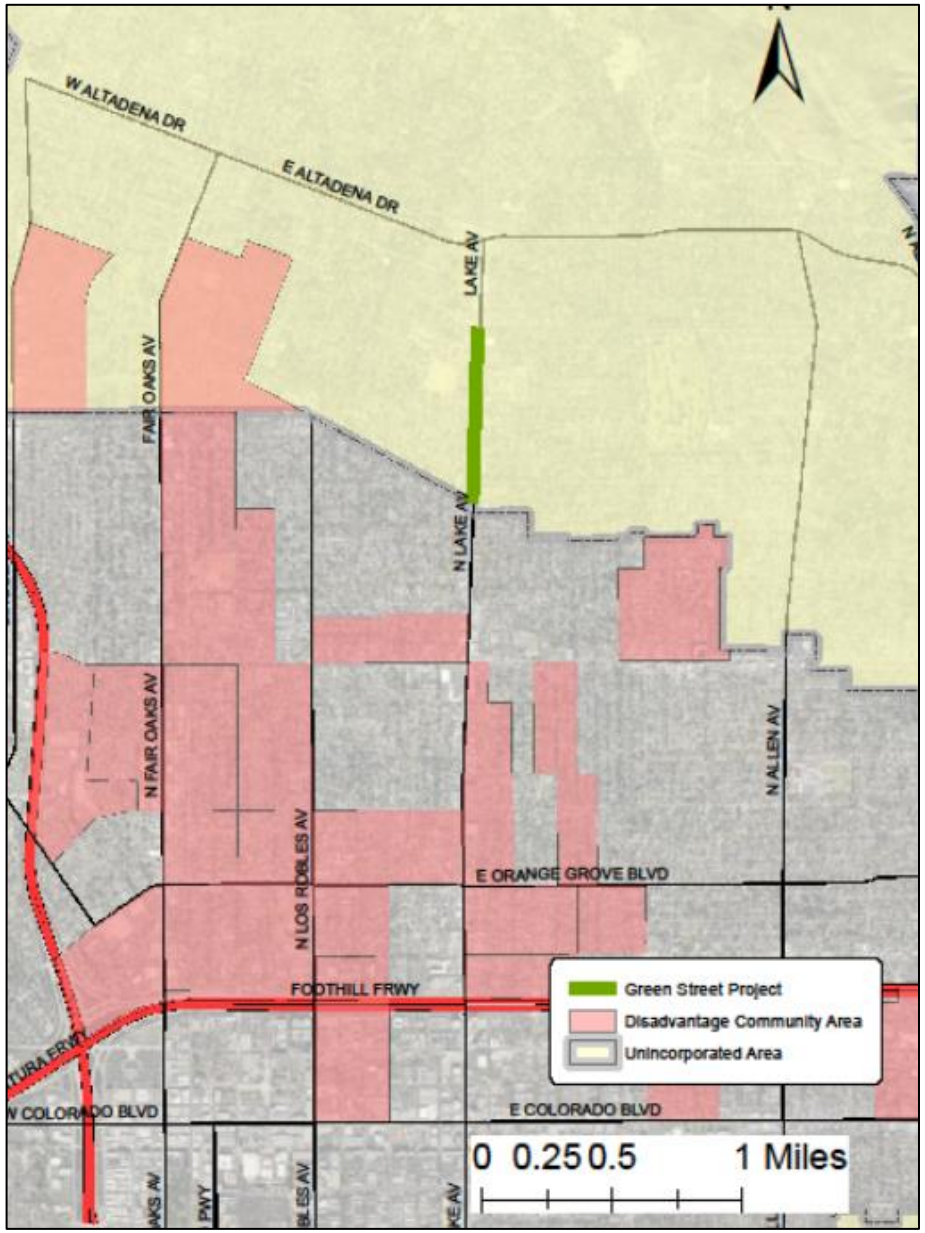
- Primary Objective: Water Quality
- Secondary Objectives: Water Supply & Community Enhancements
- Planning phase complete – requesting funds for design
- $500,000 requested from SCW Regional Funds

Project Location



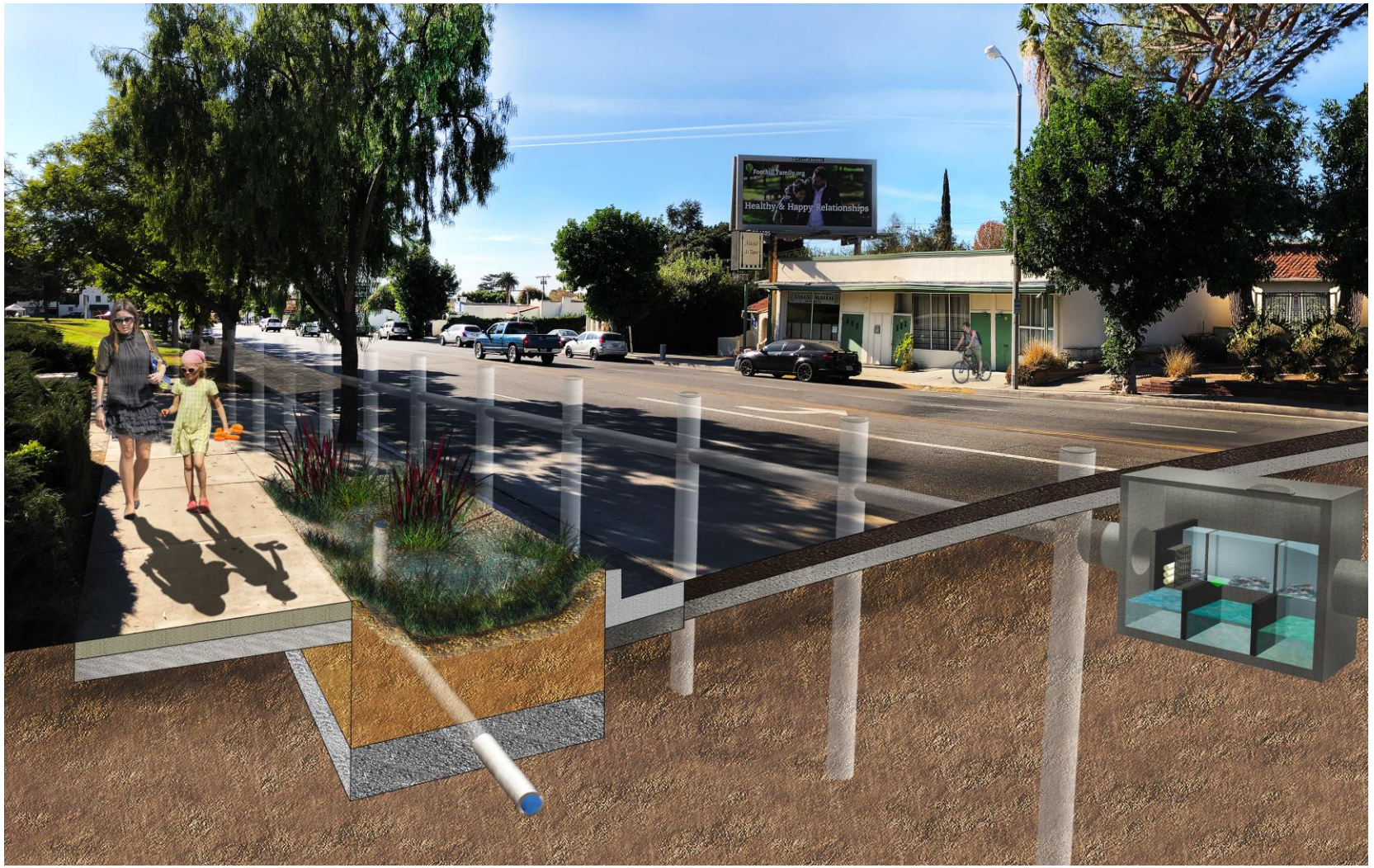
- Upper Los Angeles River (ULAR) Watershed
- Unincorporated Area of Los Angeles County: Altadena

Project Location



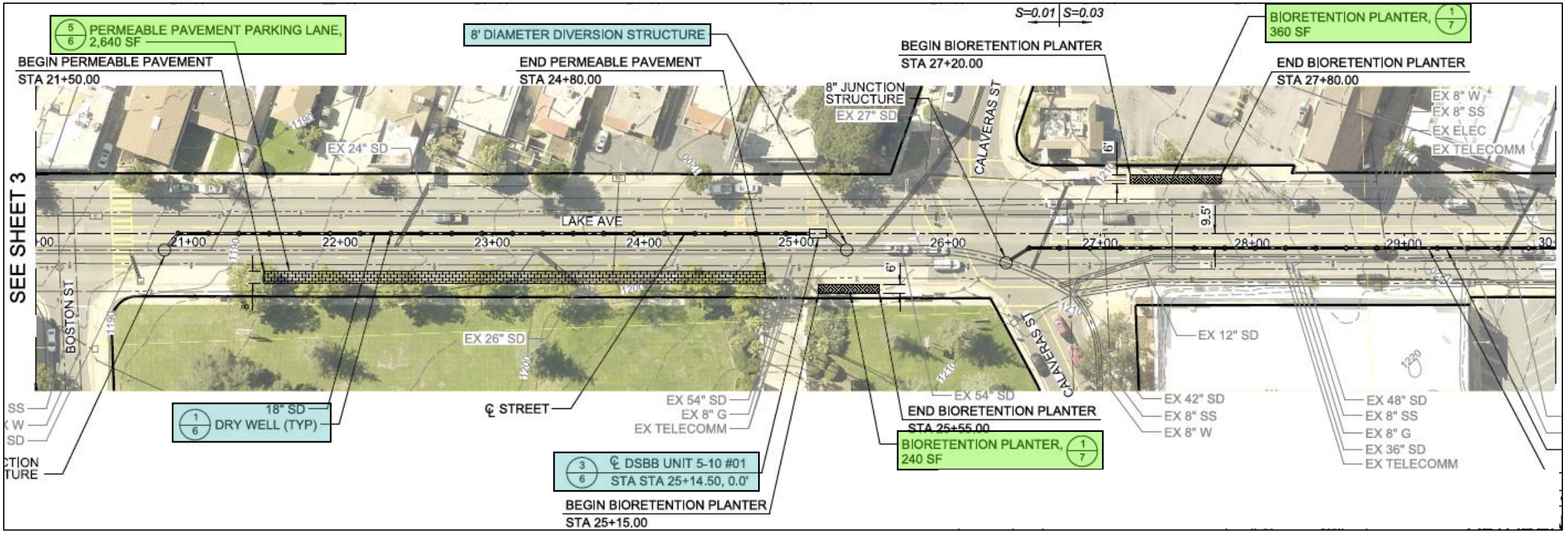
- Lake Avenue between Mendocino Street and Woodbury Road
- Capture Area = 262 acres
- DAC within ½-mile of project limits

Project Background



- Project location: County's Green Street Master Plan
- ULAR EWMP
- Benefits:
  - water quality
  - water supply
  - community enhancement

Project Details



Underground Features

3 Diversion Points

Debris-Separating Baffle Boxes

55 Drywells

Above Ground Features

600 SF of Bioretention Planters w/ native and drought tolerant plants

2,640 SF of Pervious Pavement

Cost & Schedule

Phase	Description	Cost	Completion Date
Design	Final Plans and Specifications	$1,000,000	01/2022
Construction	Construction (Stormwater Components)	TBD	06/2023
TOTAL		**$1,000,000**	

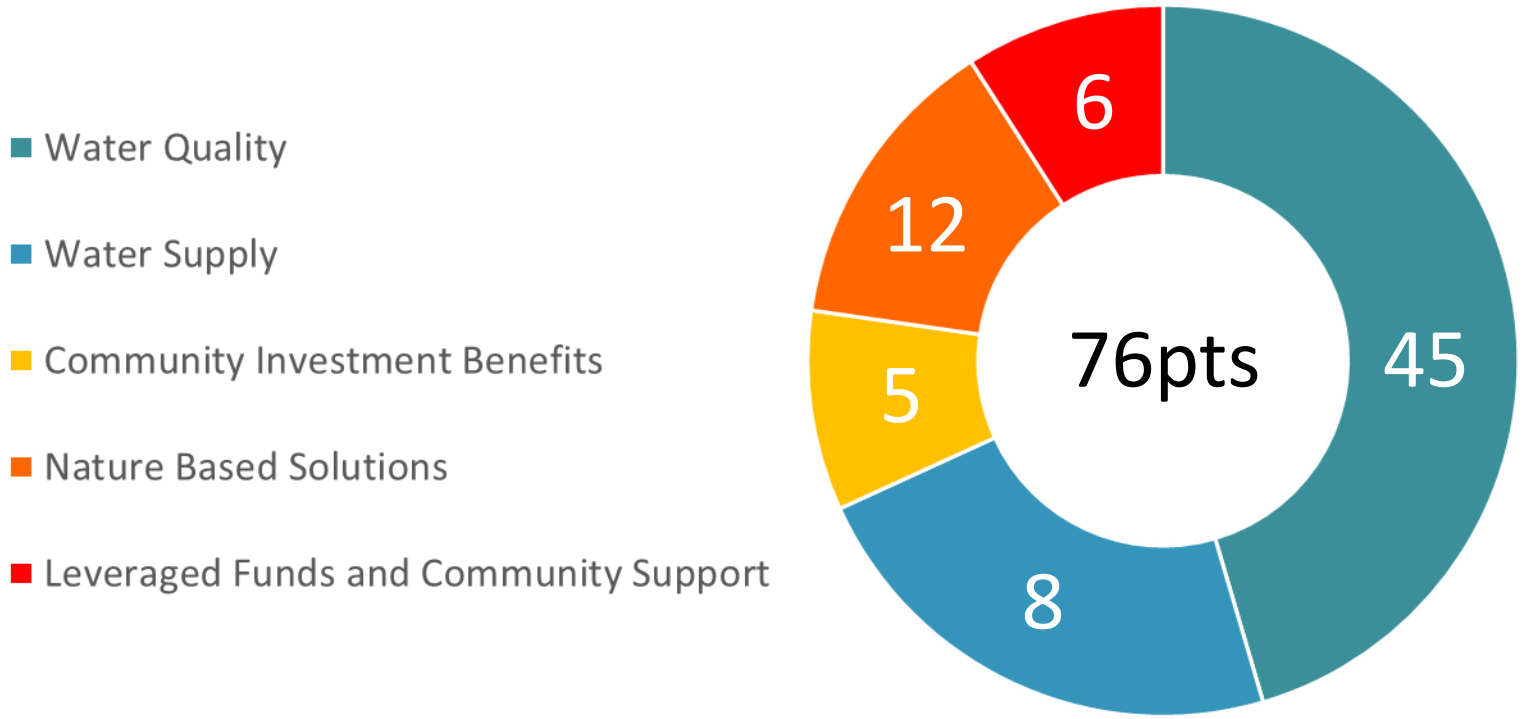
- Operation & Maintenance Cost: $50,000/year

Funding Request

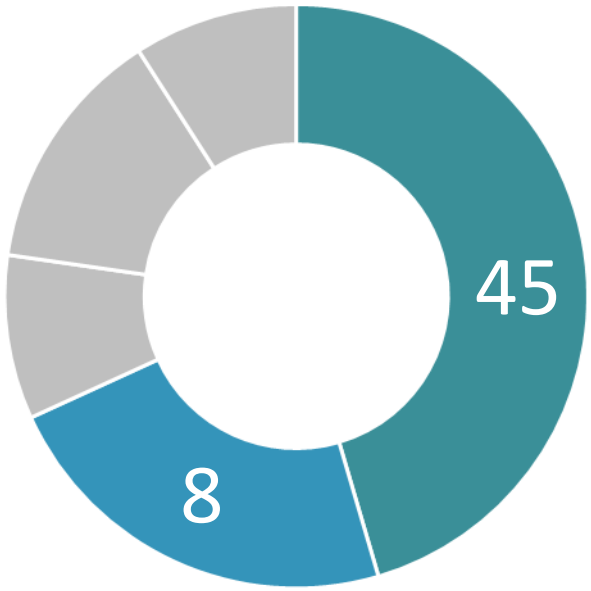
Year	SCW Funding Requested	Phase	Efforts during Phase and Year
1	$500,000	Design	Development of project plans, specifications, and estimate.
2			
3			
4			
5			
TOTAL			

- Leveraged Funding amount: $500,000 (50%)
- Other funds covered by County
  - Feasibility Study: $300,000

Preliminary Score

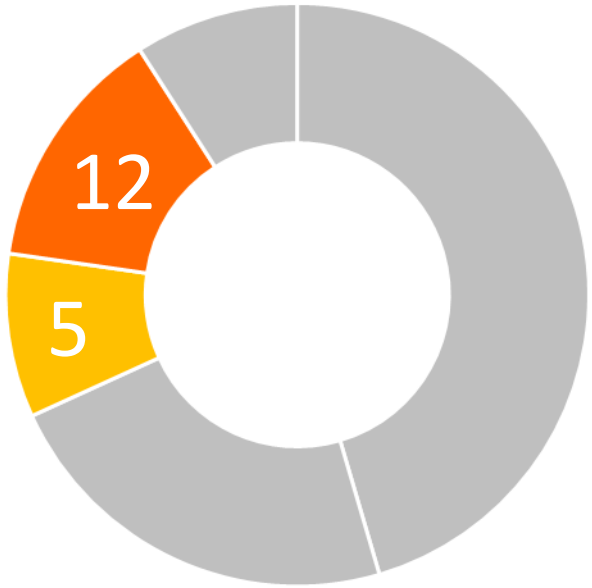


Water Quality & Water Supply Benefits



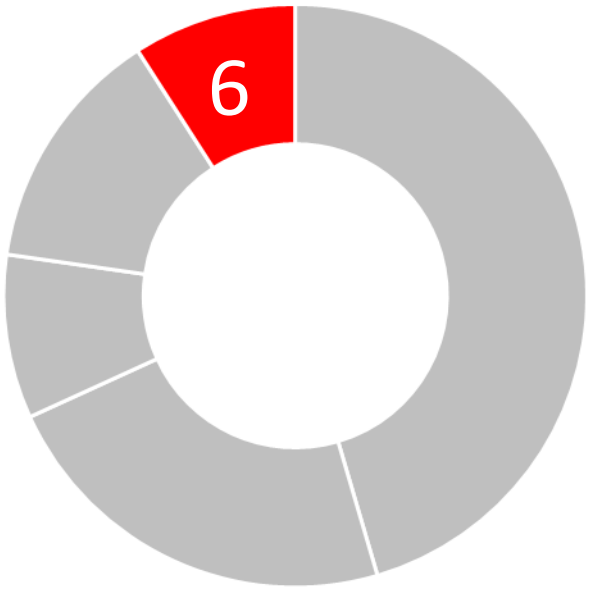
- Project will capture, treat, and infiltrate wet and dry weather runoff via diversion structures, pretreatment devices and drywells.
- Tributary Area = 262 acres
- Capacity = 14 acre-feet (calculated based on the 85th percentile, 24-hour storm event)
- Reduces metals and trash
- Annual Water Supply Volume = 196 AF
- Water Supply Use: groundwater recharge of Raymond Basin

Community Investment Benefits and Nature Based Solutions



- Community Investment Benefits
  - Improves localized flood management
  - Creates new habitat and wetlands
  - Reduces heat local island effect
- Nature Based Solutions
  - Implements natural processes (permeable pavement)
  - Utilizes natural materials (bioretention planters)
  - Removes 54% of impermeable area

Leveraging Funds and Community Support



- Leveraging Funds
  - $500,000 in leveraging funds from LA County General Funds
  - 50% funding matched
- Community Support
  - Project is from the County's Green Street Master Plan
  - Additional community outreach planned during design


Questions?

Westmont – Vermont Avenue Green Improvement Project

Infrastructure Program

Los Angeles County Public Works

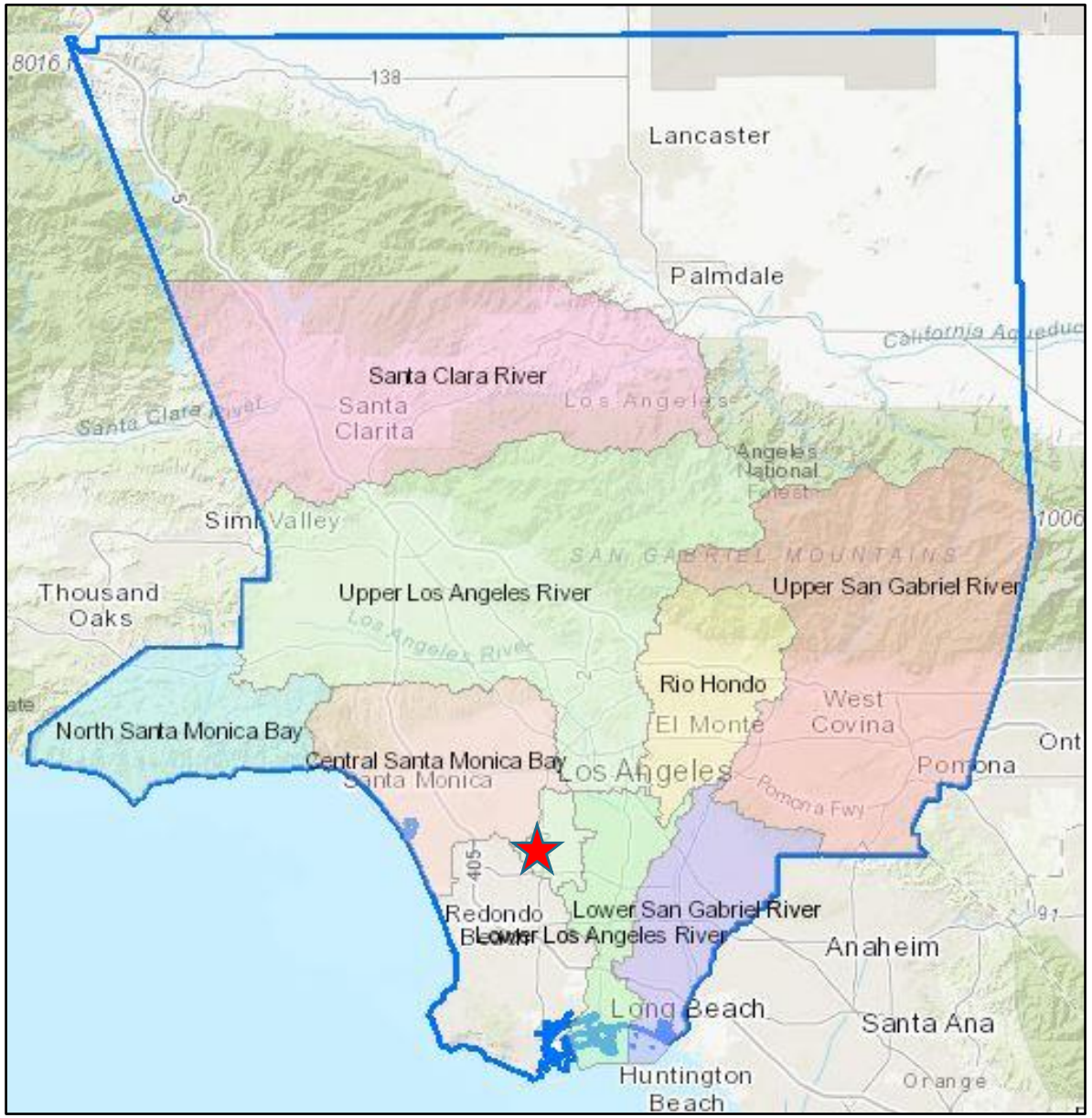
Haris Harouny, P.E.

Project Overview

The Project will capture, treat, and infiltrate urban and stormwater runoff as part of a multi-benefit project to improve water quality and enhance the community.

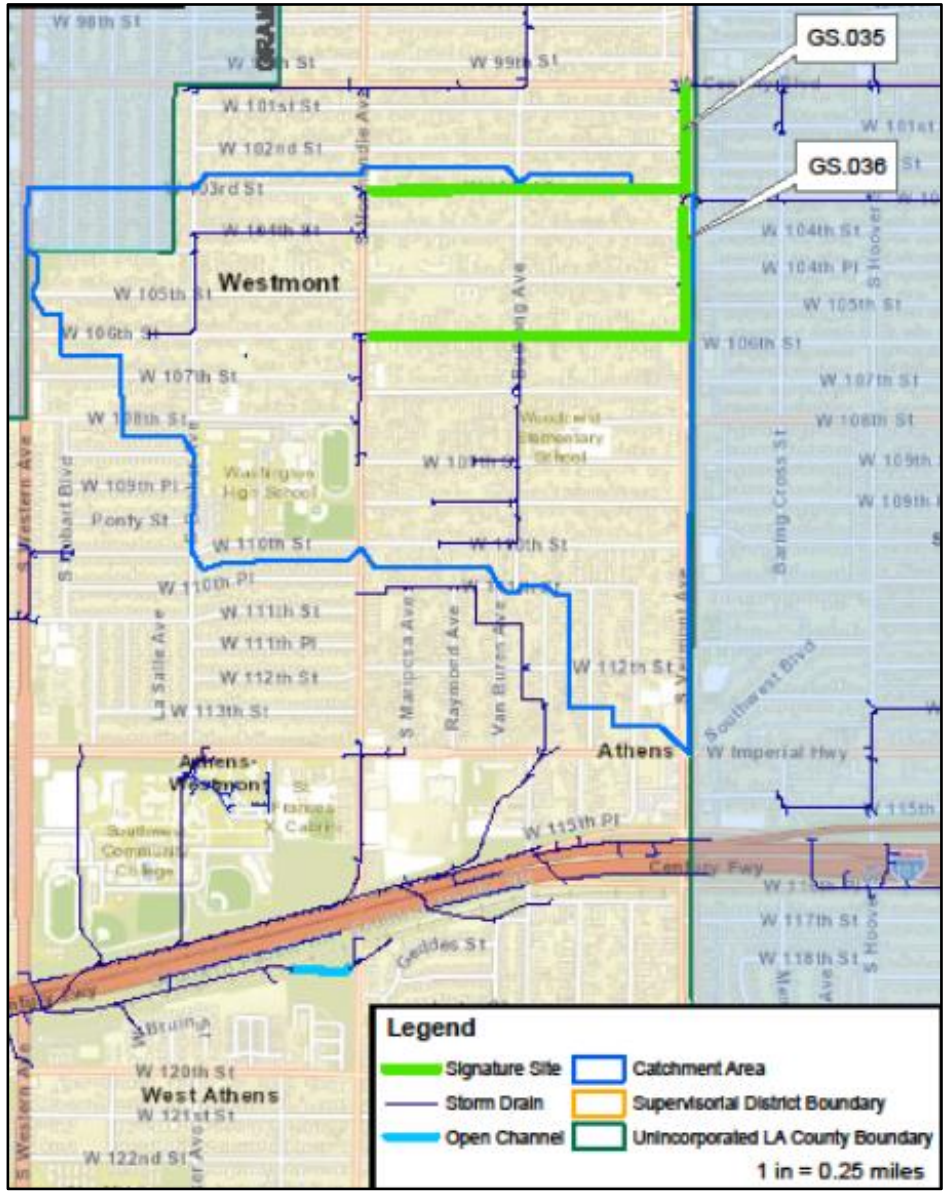
- Primary Objective: Water Quality
- Secondary Objectives: Community Enhancements
- Planning phase complete – requesting funds for design
- $500,000 requested from SCW Regional Funds

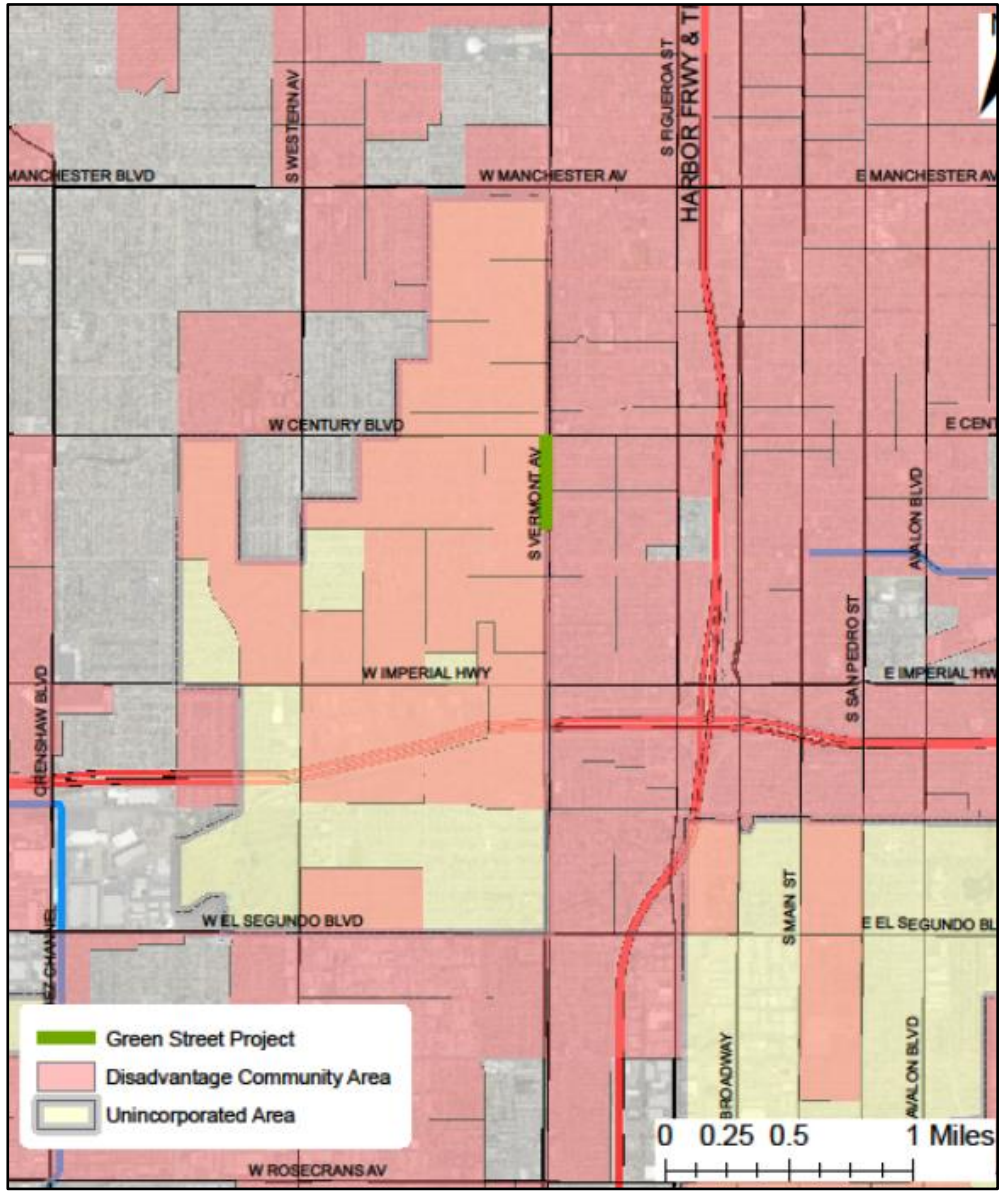
Project Location



- Upper Los Angeles River (ULAR) Watershed
- Unincorporated Area of Los Angeles County: Westmont

Project Location



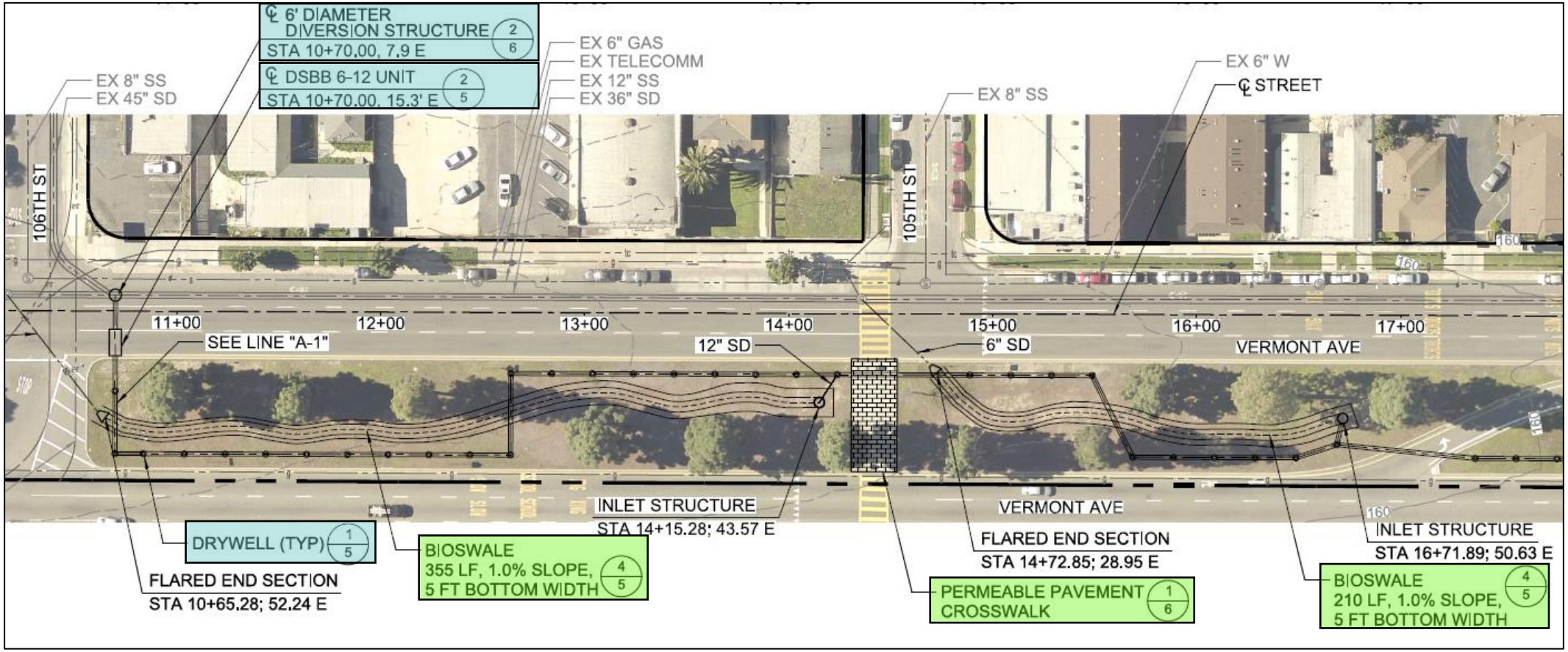


- Vermont Avenue between Century Blvd and 106th Street
- Capture Area = 353 acres
- Project within DAC

Project Background

- Project location: County's Green Street Master Plan
- ULAR EWMP
- Benefits:
  - water quality
  - community enhancement

Project Details



Underground Features

2 Diversion Points

Debris-Separating Baffle Boxes

83 Drywells

Above Ground Features

4,000 SF of Bioswales w/native and drought tolerant plants

2,400 SF of Pervious Pavement

Cost & Schedule

Phase	Description	Cost	Completion Date
Design	Final Plans and Specifications	$1,000,000	01/2022
Construction	Construction (Stormwater Components)	TBD	06/2023
TOTAL		**$1,000,000**	

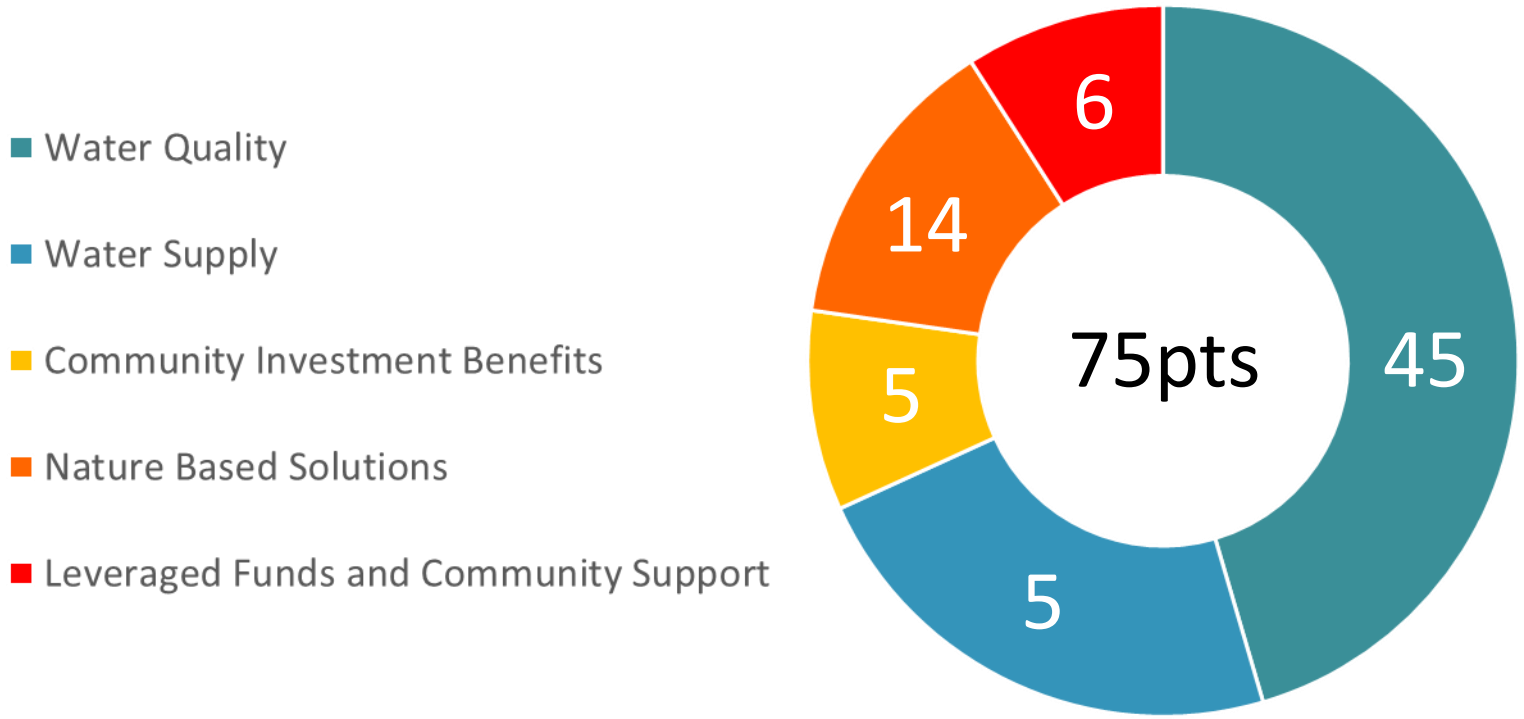
- Operation & Maintenance Cost: $50,000/year

Funding Request

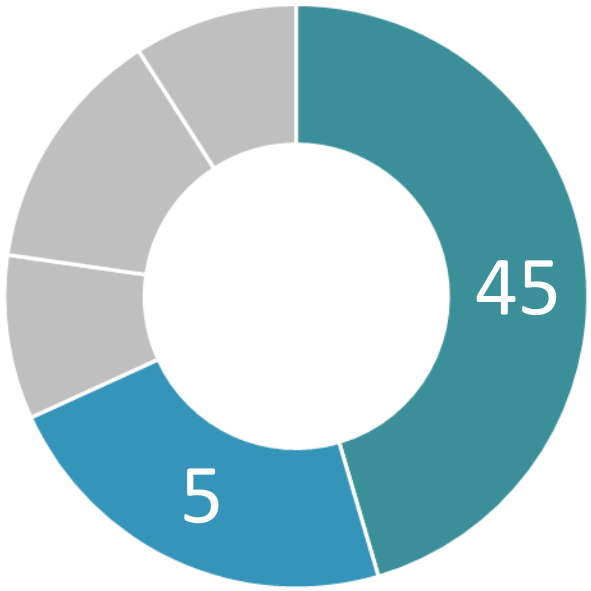
Year	SCW Funding Requested	Phase	Efforts during Phase and Year
1	$500,000	Design	Development of project plans, specifications, and estimate.
2			
3			
4			
5			
TOTAL			

- Leveraged Funding amount: $500,000 (50%)
- Other funds covered by County
  - Feasibility Study: $300,000

Preliminary Score

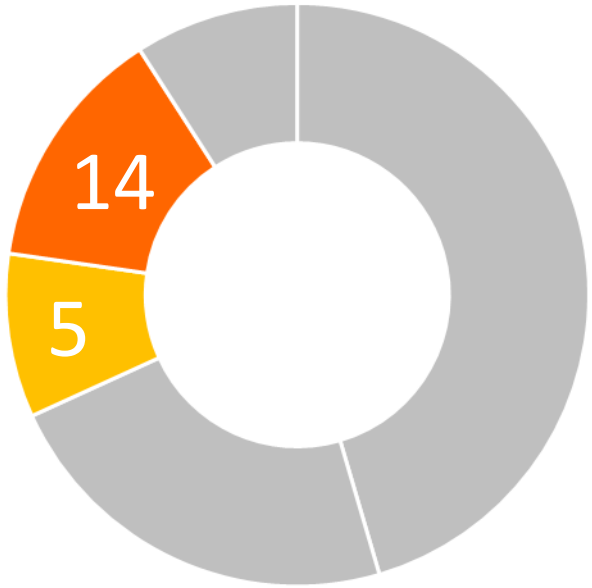


Water Quality & Water Supply Benefits



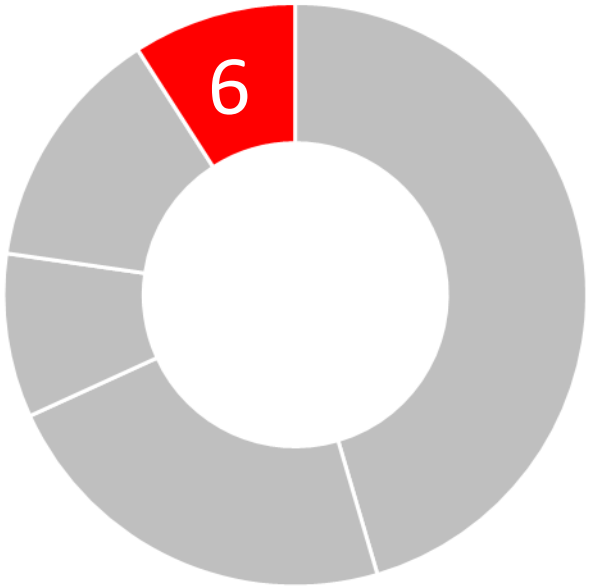
- Project will capture, treat, and infiltrate wet and dry weather runoff via diversion structures, pretreatment devices and drywells.
- Tributary Area = 353 acres
- Capacity = 16 acre-feet (calculated based on the 85th percentile, 24-hour storm event)
- Reduces metals and trash
- Annual Water Supply Volume = 197 AF
- 1.5 Acre-Feet / $-Million

Community Investment Benefits and Nature Based Solutions



- Community Investment Benefits
  - Improves flood management
  - Creates new habitat and wetlands
  - Reduces heat local island effect
- Nature Based Solutions
  - Implements natural processes (permeable pavement)
  - Utilizes natural materials (bioswales)
  - Removes 90% of impermeable area

Leveraging Funds and Community Support



- Leveraging Funds
  - $500,000 in leveraging funds from LA County General Funds
  - 59% funding matched
- Community Support
  - Project is from the County's Green Street Master Plan
  - Additional community outreach planned during design


Questions?