



# Stormwater Funding Strategy Update

*October 2022*



# Agenda



- **Mounting challenges exist**
- **Imminent system failures anticipated**
- **Funding and resources have improved but massive funding gap remains**
- **Dedicated funding source imperative**
- **Ongoing education and engagement is essential**



# Underfunding Stormwater has Serious Consequences That Will Only get Worse

- Livability of San Diego declining
- Polluted, unsafe water is harmful
- Closed beaches impact residents & tourists
- Lost opportunity to capture water for drought preparedness
- Fines, claims, litigation
- Clean Water Act Violations



Erosion and mud slide during 2020 rain event due to stormwater pipe failure near 163

# Challenges and needs continue to increase



- A changing climate, with longer periods of drought, impacts of fires, and more extreme rainfall
- Aging and failing infrastructure
- Urbanization
- Clean Water Act requirements

Crater Channel at Trade Place





# Stormwater Failures are Impacting Livability

- 2,000+ known pipe failures
- 3 pump stations with critical infrastructure needs
  - 2 in Mission Beach
  - 1 in Midway-Pacific Highway
- Active emergencies require defunding planned projects



Sinkhole on Mississippi Street



# Flooding Causes Unsafe Conditions and Often Causes Significant Damage to Property

- Many areas unable to manage flooding
- Known vulnerabilities pushed to failures
- Mudslides, erosion, sinkholes are concerns



Flooding in Chollas Creek



# Failure to Meet Clean Water Act Significantly Impacts Public Health & Environment

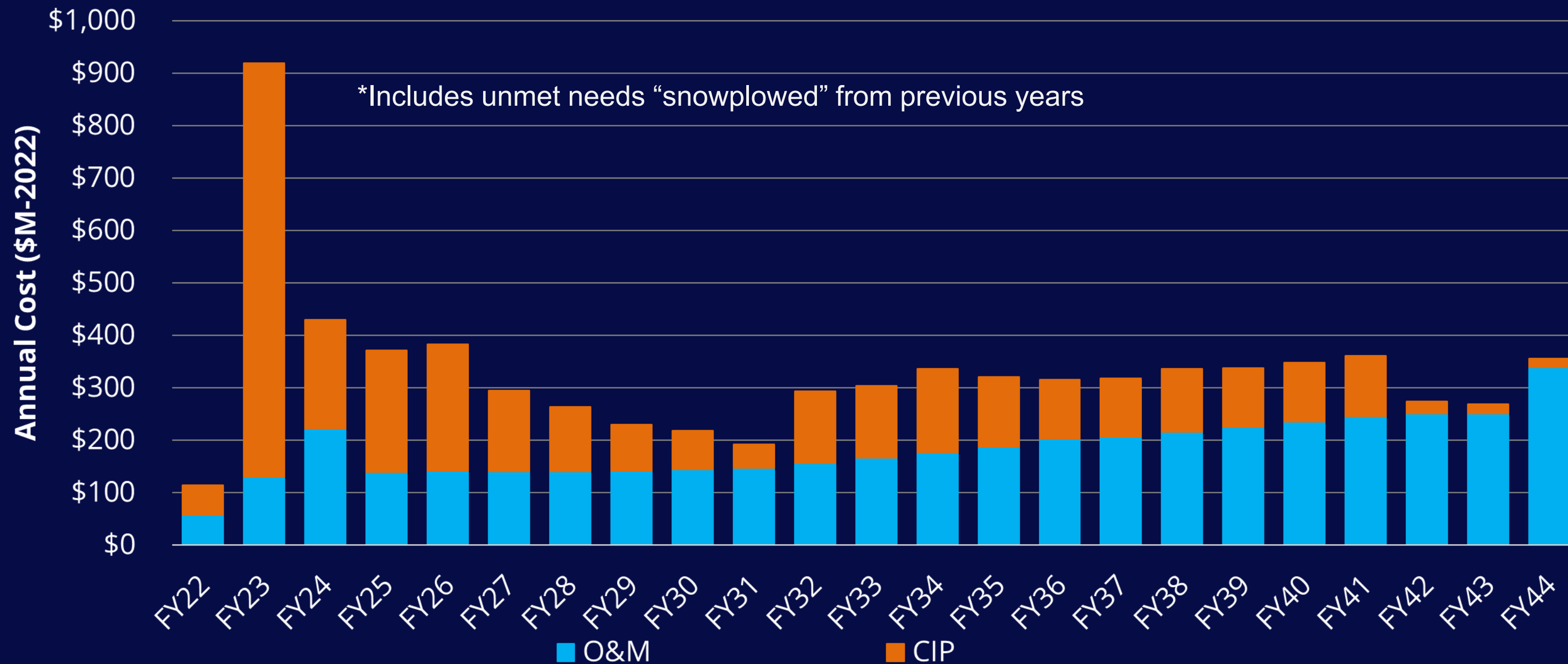
- >99% of system goes to a degraded water source
- 101 impairments
- Major deadlines missed in April 2021
- 586 beach advisories & 55 beach closures per year (on average)



Trash build up at the mouth of Chollas Creek



# Funding Needs Continue to Grow at a Rapid Rate



➤ Average Annual Funding Gap of \$274M





# FY2023 funding and resources have improved, but funding gap and backlog remain

- \$72.2 M operating budget
- \$28.1 M capital improvement program budget





# Near-term Funding and Financing Options



**WIFIA**



**CWSRF & State Budget Allocation**



**Other Grants**



**Cost Recovery: Stormwater Enforcement**



**Cost Recovery: Stormwater Inspections**



**Cost Recovery: Street Sweeping Citations**



# WIFIA will fund essential upgrades to chronically underfunded projects and programs

- \$733 million total funding
  - \$551.9 to fix failing infrastructure (corrugated metal pipes)
  - \$54.5 million pump station and other stormwater feature upgrades
  - \$35.9 million for green infrastructure
  - \$90.8 million for restoration and revitalization projects





# Unfortunately, WIFIA will not fund other underfunded essential projects and services

- Operations and maintenance activities
- Water quality programs (monitoring, inspections, source control, street sweeping, etc.)
- Water quality improvement projects
- Stormwater harvesting





# Funding Measure Design



# A Thorough Funding Measure has Many Complimentary Components





# Funding Measure Considerations: Program Goals



**IMPROVE/PROTECT  
WATER QUALITY**



**SAFEGUARD  
FROM FLOODING**



**PRIORITIZE GREEN  
INFRASTRUCTURE**



# Funding Measure Considerations: Program Goals



**MODERNIZE  
INFRASTRUCTURE**



**REVITALIZE OUR  
WATERWAYS**



**CAPTURE STORMWATER  
FOR LOCAL SUPPLY**





# Funding Measure Program Design Elements: What Could the Potential Measure Fund?

- Capital Investments
- Operations & Maintenance
- Compliance Planning
- Debt & Issuance of Bonds
- Administration



Alamo Project  
Construction



# Funding Measure Program Design Elements: What Could the Potential Measure Fund?

Pipe Replacement



Water Capture



Drain Cleaning



Community  
Education and  
Engagement



Green  
Infrastructure



Restoration



Monitoring



**Example  
Eligible  
Expenditures**



# Public Opinion Research

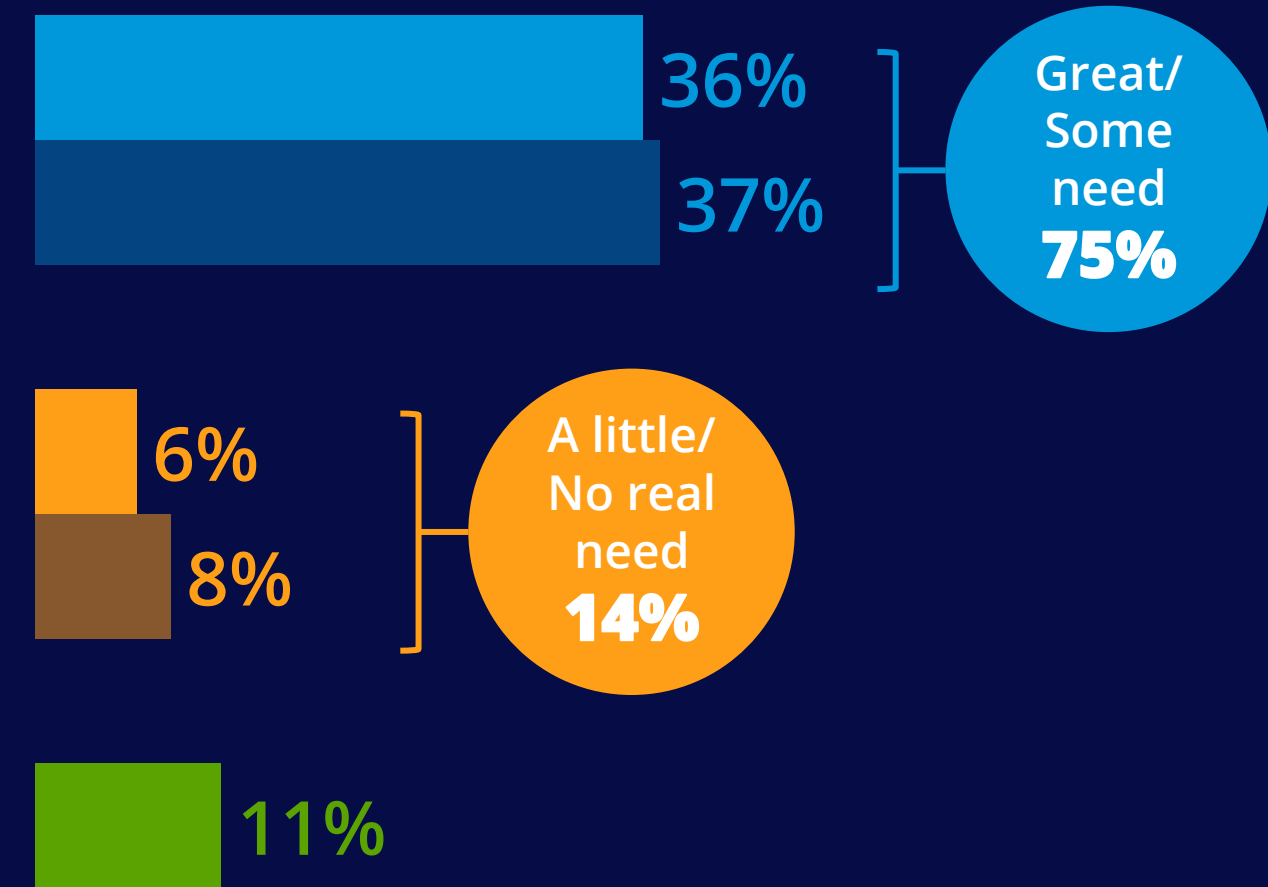
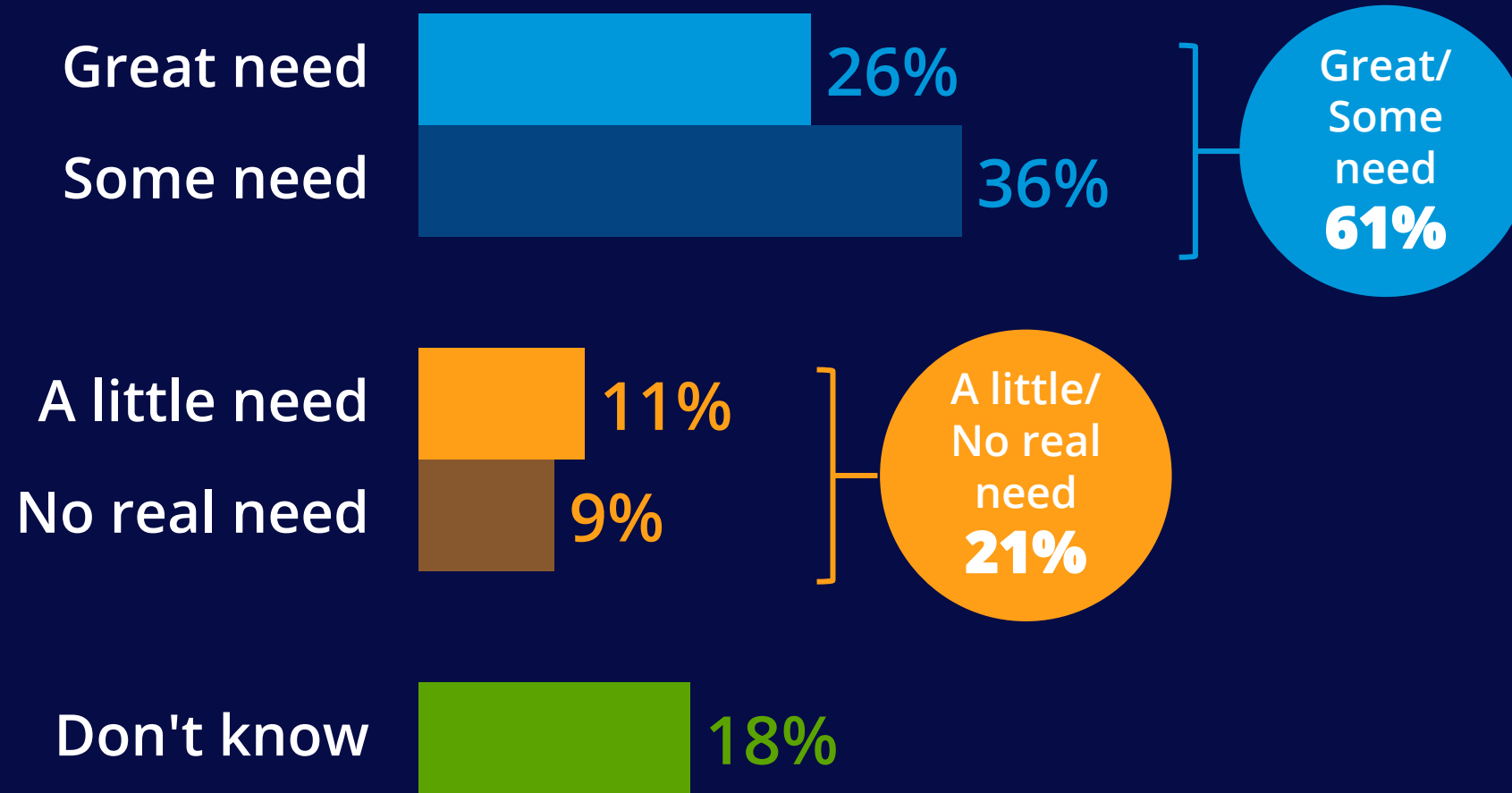




# There is a strong perceived need for additional stormwater funding

## Maintain Existing Storm Drain System

## Clean and Protect Local Water Quality



December 2020 Survey



# San Diegans value the outcomes that could be achieved by funding stormwater



- Improving and protecting water quality
- Protecting Marine Life
- Reducing trash and pollution
- Capturing stormwater for use
- Preventing flooding
- Preventing damage from failed stormwater infrastructure



# Various Funding Mechanism Scenarios Tested

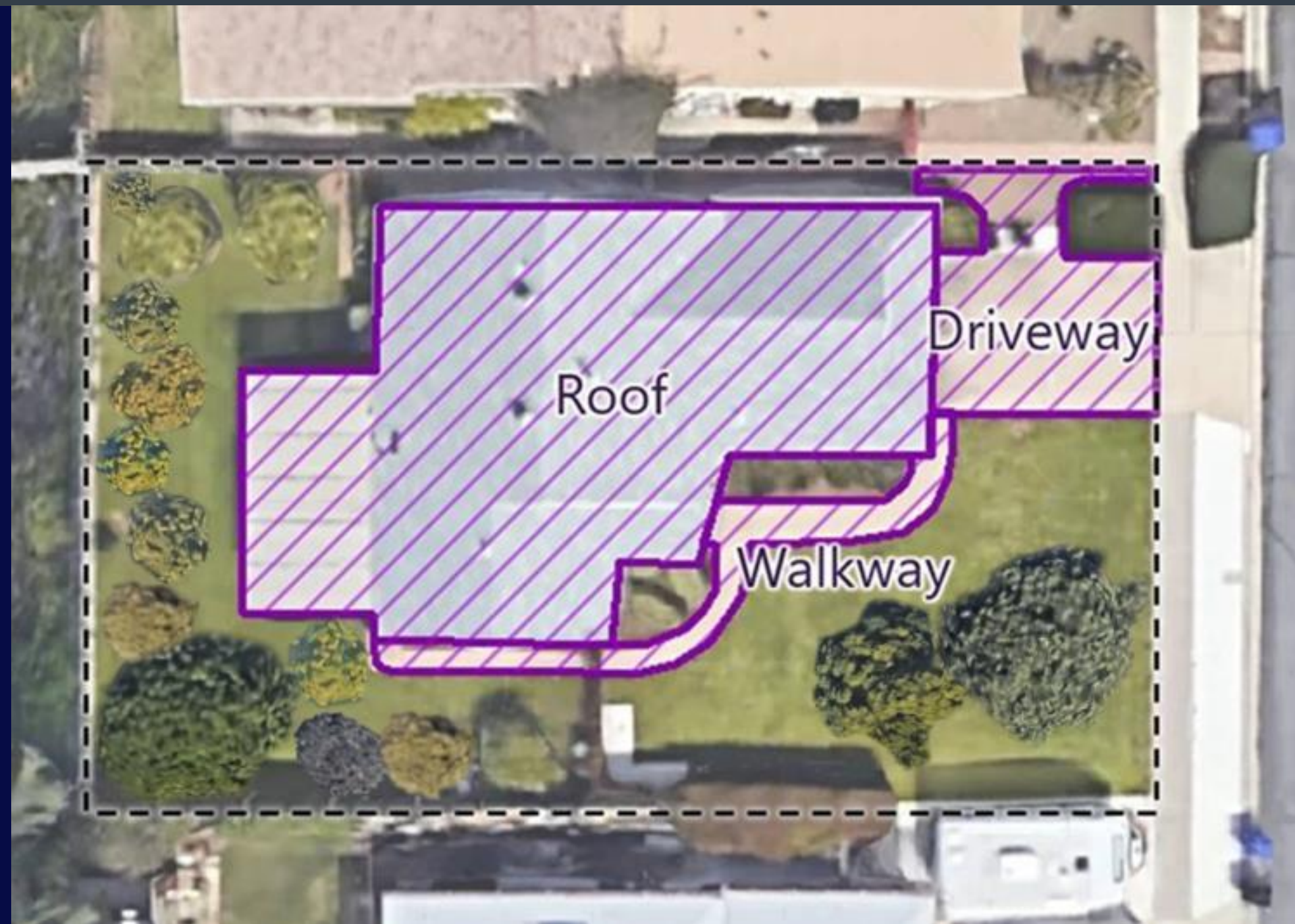
- Impermeable area (per square foot) and property type (flat rate per parcel)
- Variable rates amounts
- Typical ratepayer impacts and estimated revenue estimated for each scenario





# Impermeable area recommended as the basis for a stormwater funding measure

- Impermeable area perceived as more equitable
  - Cents per square foot
  - New Citywide dataset collected (March 2021)
- Impermeable area is most common basis for stormwater charges nationwide



Impermeable Area Example (Demonstration Purposes)



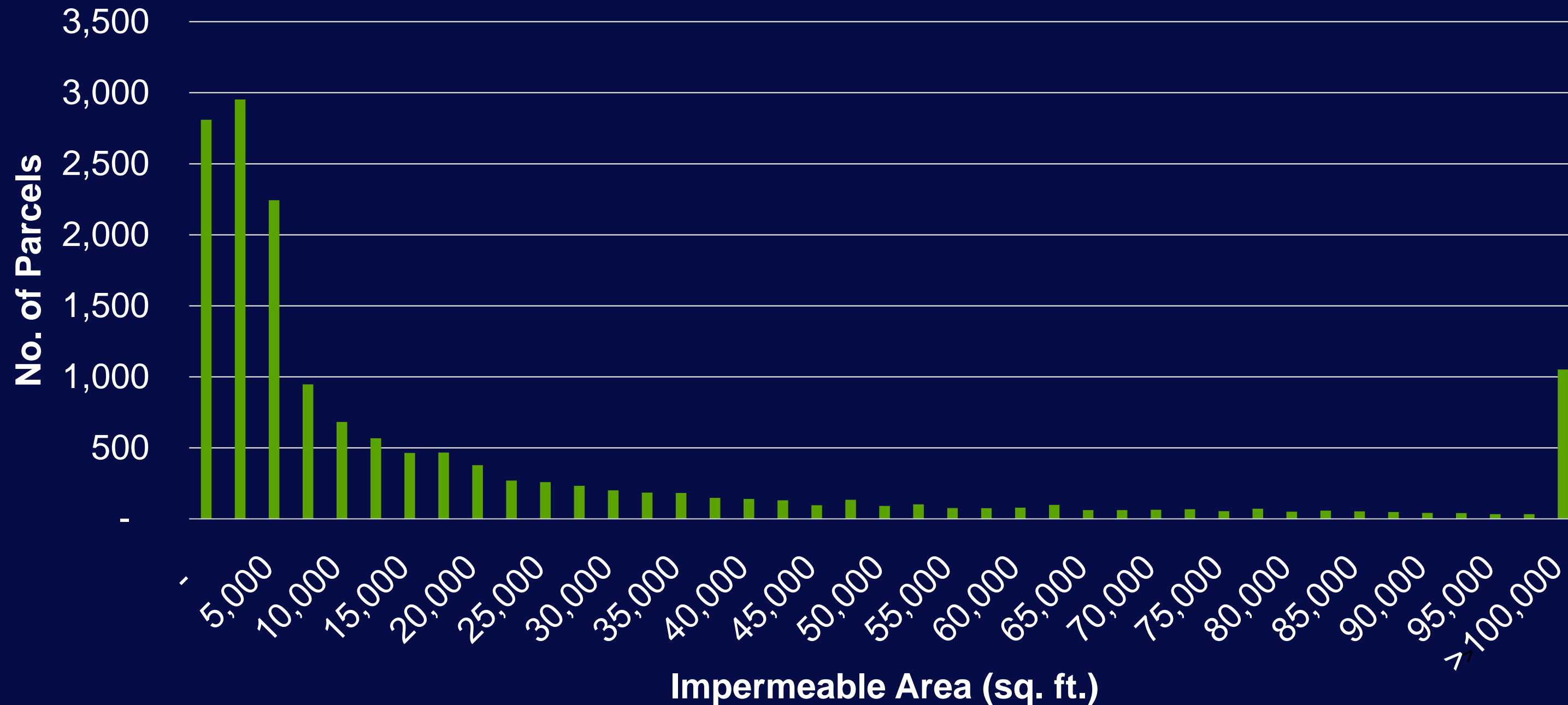
# Impermeable Area Funding Mechanism Scenarios Tested

Rate Basis Tested in Surveys	Typical Single-Family Residential Bill		Commercial/Industrial Bill	Estimated Annual Revenue Generated (\$M)
	Median Annual	Median Monthly		
\$0.04 per SF	\$128	\$10.67	See Next Slide  Non-residential ratepayer impacts vary widely based on parcel-specific impermeable area	~\$74 M
\$0.045 per SF	\$144	\$12.00		~\$83 M
\$0.05 per SF	\$160	\$13.33		~\$93 M





# Commercial/industrial ratepayer impacts vary widely based on impermeable area



Example: Parcel with 5,000 sq-ft impermeable area at rate of 4 cents per sq-ft impermeable area  
 $5,000 \text{ sq-ft} * \$0.04 \text{ per sq-ft} = \$200 \text{ per year}$

# Ongoing education and engagement for stormwater is essential



- Stormwater issues and services are not well understood, **but the outcomes are valued**
- **Ongoing education & engagement** continuing through Think Blue San Diego



Think Blue 2021  
Relaunch Event



# Ongoing education, outreach and engagement

- FY22 Highlights
  - Relaunch of Think Blue San Diego, including new website and foundational campaign “We All Think Blue”
  - 4,100 radio/TV PDAs with 6.6 million impressions
  - Social media, print, billboard with 12 million impressions
- FY23 Lookahead
  - Continue consistent communications efforts
  - Target new partnerships, hard to reach communities





# Moving Forward

- Responsibilities continue to expand
- SWD addressing critical needs and continues to innovate and improve delivery of other key services
- WIFIA loan a great success/huge infusion of resources
- Other program areas still significantly underfunded
- Continued coordination with Mayor, City Councilmembers, and key stakeholders on future dedicated funding measure



San Dieguito River



# Thank you!