

OPTIMIZING YOUR URBAN WATER USE OBJECTIVE

Compliance starts with your data

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WHAT WE WILL COVER:

How agencies are strengthening the data behind their Urban Water Use Objective

Why Baseline Data is important

- How data quality directly impacts how landscapes are represented under the Urban Water Use Objective.

Common Validation Hot Spots

- Service area boundaries + parcels
- Meter-to-parcel reconciliation
- Land use classification

Optimizing the UWUO

- SLA identification & mapping
- Residential Parcel Extension

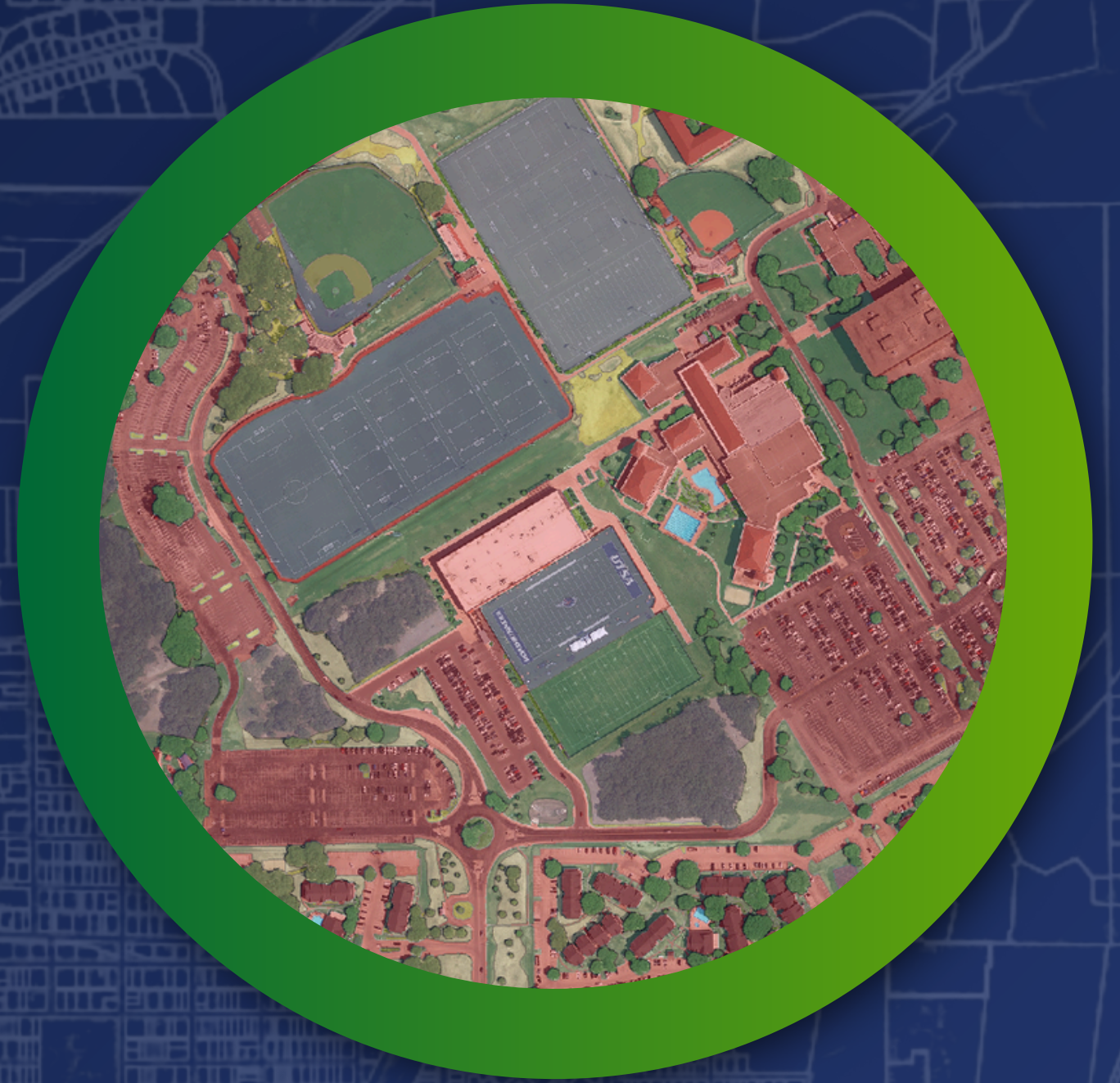
Key Takeaways

- How agencies can build a stronger baseline before outreach, new programs, or implementation planning begins

THE QUESTION

**DOES YOUR
URBAN WATER USE OBJECTIVE
FULLY REFLECT THE
LANDSCAPES YOU ACTUALLY
SERVE?**

When baseline data is validated, objective calculations become more accurate, more defensible, and more achievable.



YOUR OBJECTIVE IS ONLY AS GOOD AS THE DATA BEHIND IT

Your Urban Water Use Objective

State Data

Agency Data

Parcel Data

Spatial Validation



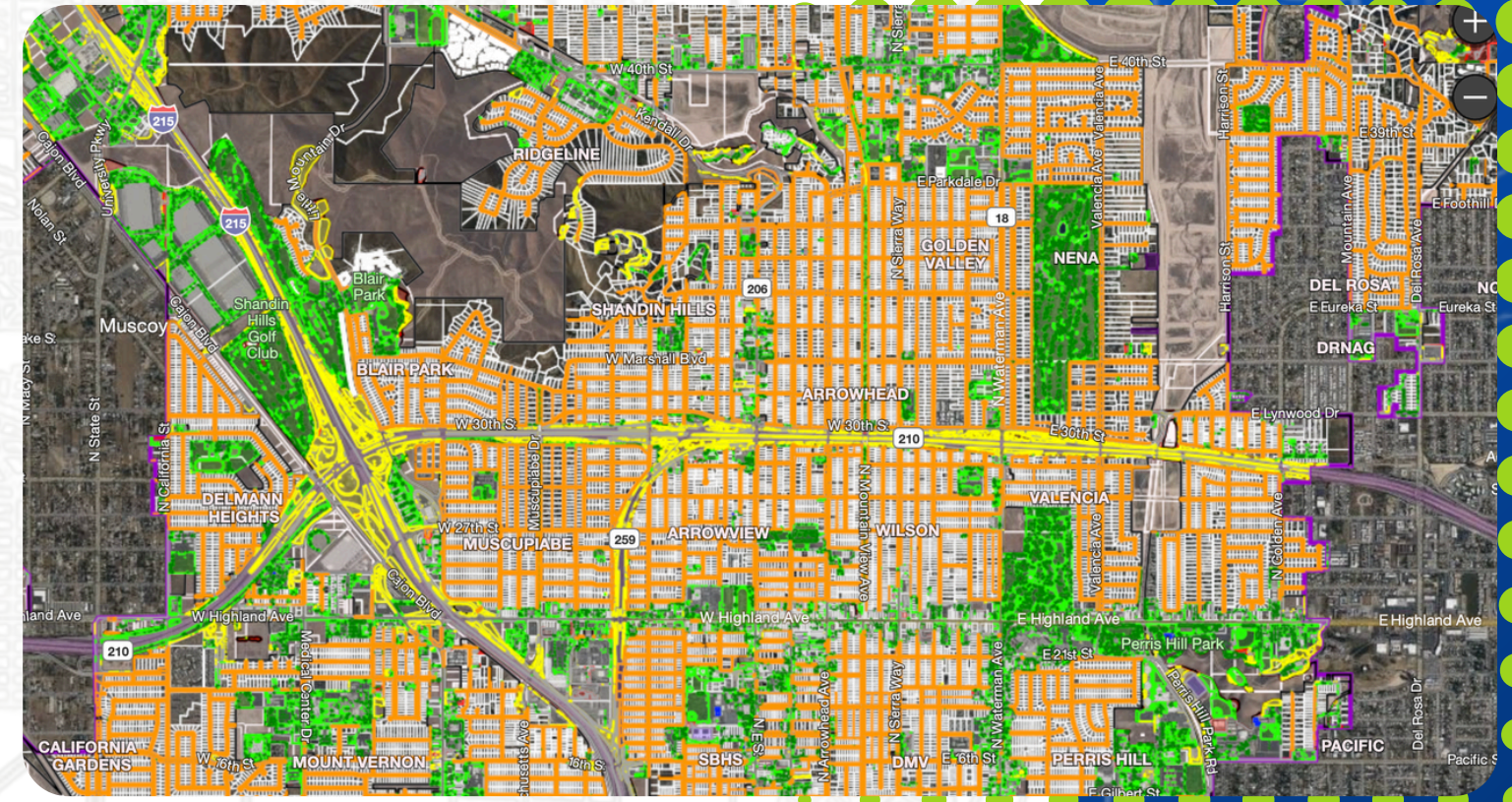
VALIDATION HOT SPOTS:

 SERVICE AREA BOUNDARIES + PARCELS

 LAND USE CLASSIFICATION

 IRRIGABLE LANDSCAPE REVIEW

 METER-TO-PARCEL RECONCILIATION



OPTIMIZING YOUR UWUO:

 RESIDENTIAL PARCEL EXTENSIONS

 SPECIAL LANDSCAPE AREAS

SERVICE AREA BOUNDARY & PARCELS

● Review Includes:

- LAM Service area boundary alignment with the current agency Service Area
- Parcels overlapping multiple agencies
- Parcel inclusion/exclusion review
- Alignment between parcel records and analysis footprint
 - Missing Parcels, misclassified parcels, new development

If the boundary or parcel framework is incomplete, every downstream calculation can be affected.

MISCLASSIFIED LAND USE

Making sure parcels are categorized correctly

✔ Review Includes:

- Identification of misclassified parcels
- Review of parcel land use against source parcel data (County Assessor data) Land Use Codes
- LAM vacant parcel review (True / False)
- Landscape estimate review for vacant parcels

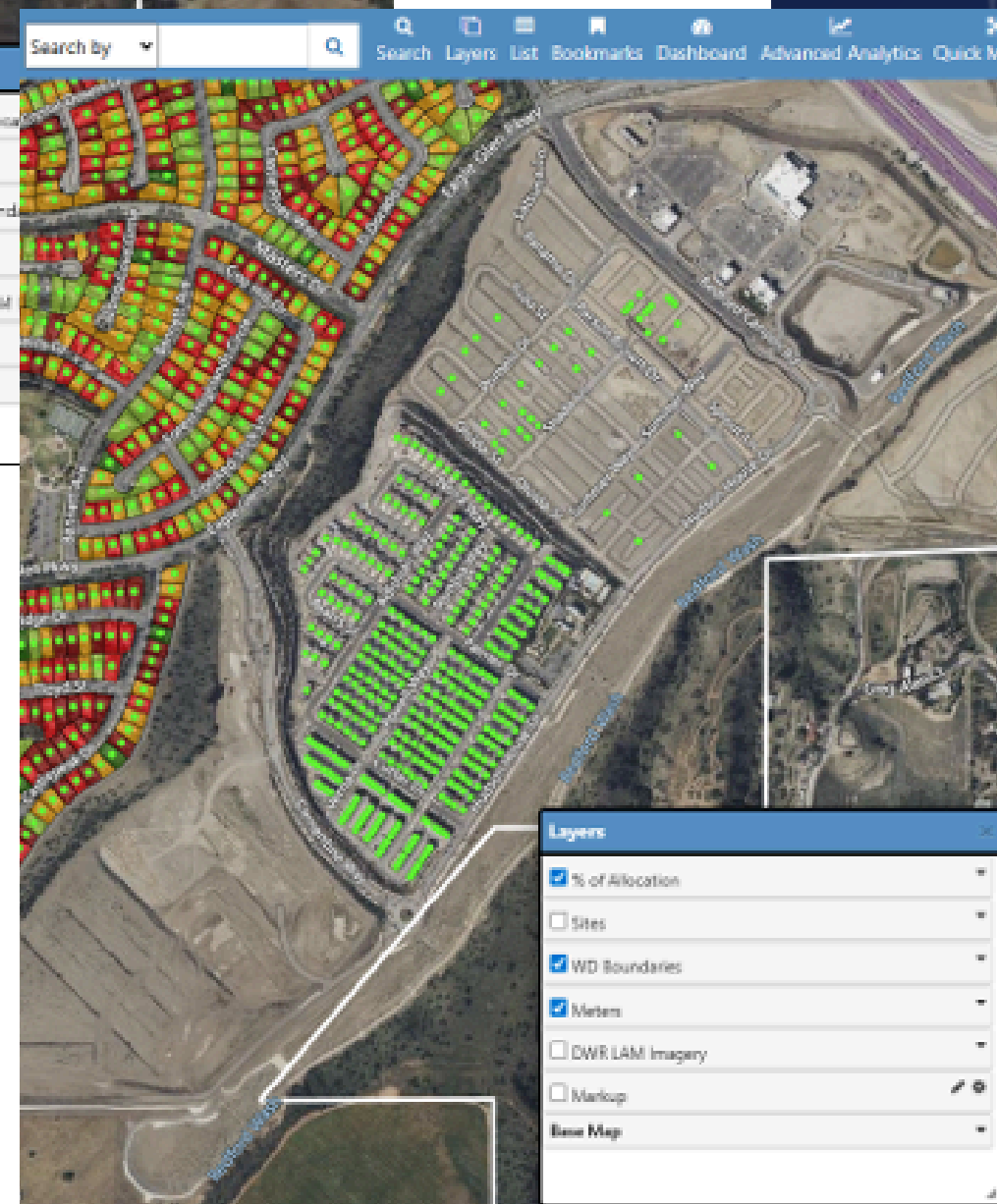
Correct parcel classification helps ensure landscapes are evaluated under the appropriate methodology.





MISCLASSIFIED LAND USE

Making sure parcels are categorized correctly

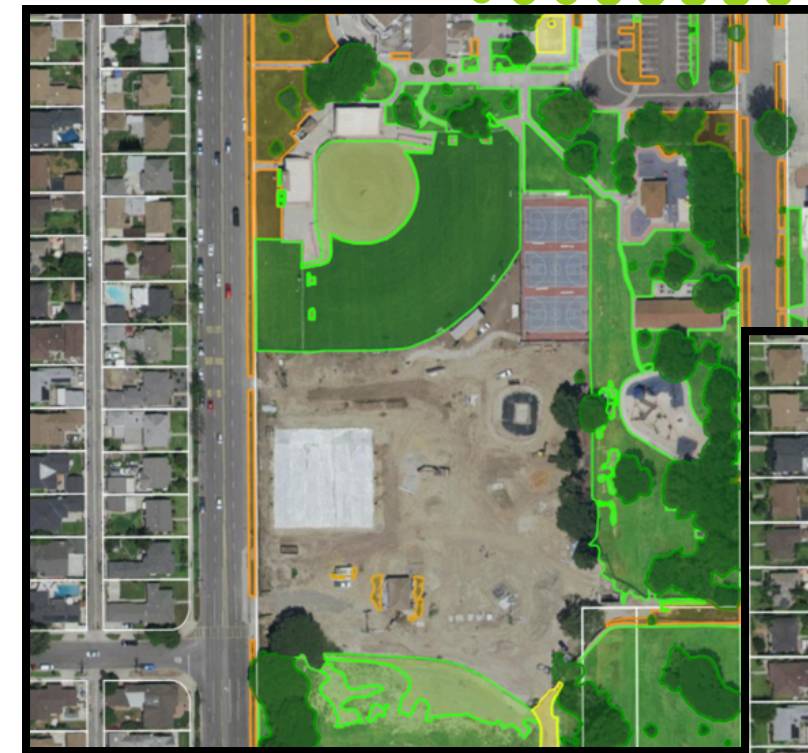


IRRIGABLE LANDSCAPE NOT FULLY CAPTURED

Statewide datasets provide a strong baseline, but irrigable irrigated landscape may not always be fully represented at the agency level

✔ Review Includes:

- Identification and review of parcels with missing or low II area
- Comparison against aerial imagery and parcel conditions



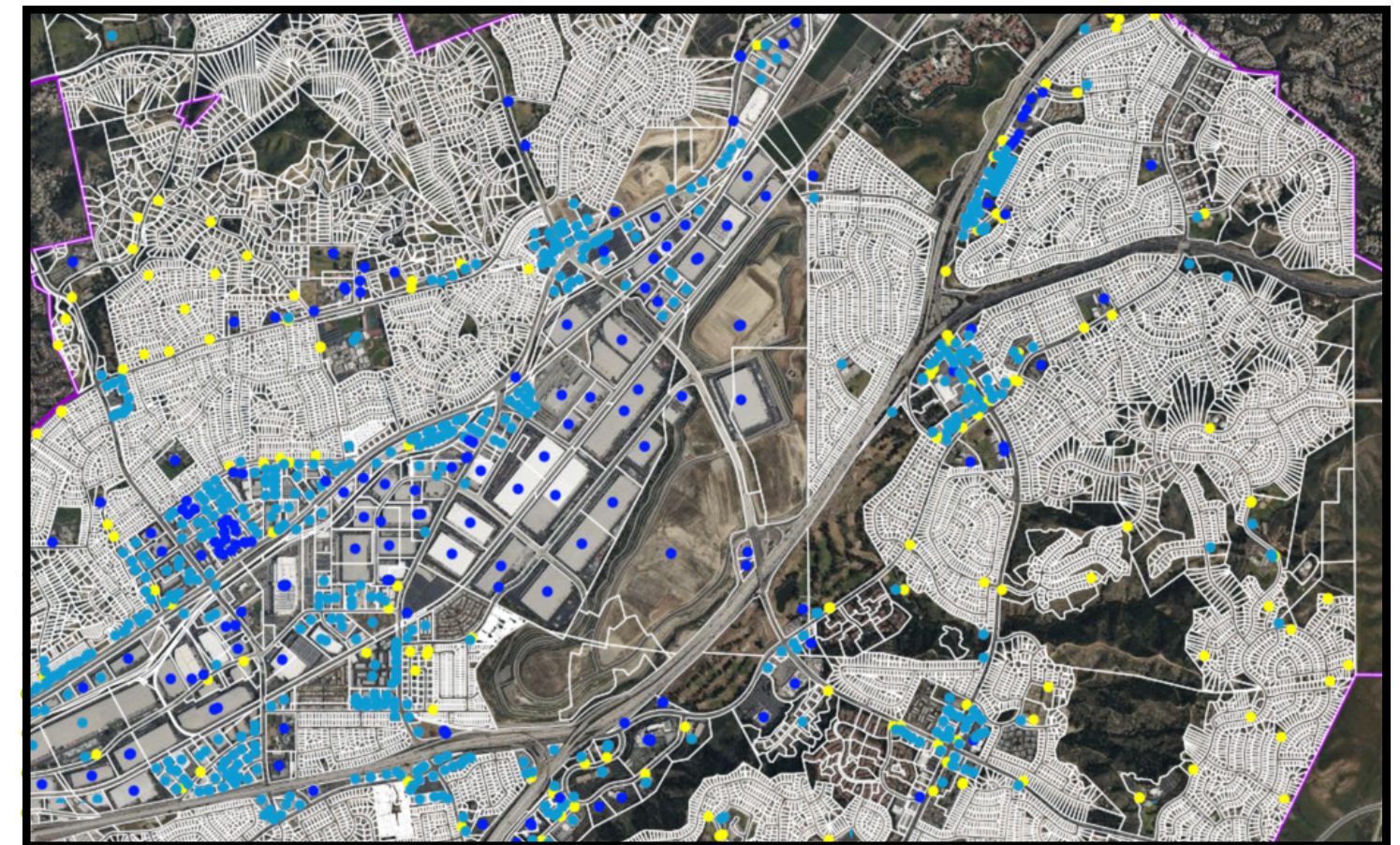
METER-TO-PARCEL RECONCILIATION

Connect operational records to geography

✔ Review Includes:

- Alignment of agency meter records with LAM parcels
- Account review and validation

Operational data strengthens parcel and landscape validation.



RESIDENTIAL PARCEL EXTENSIONS

Supplier Tools x

CalWEP LAM Explorer Download

Water District Totals

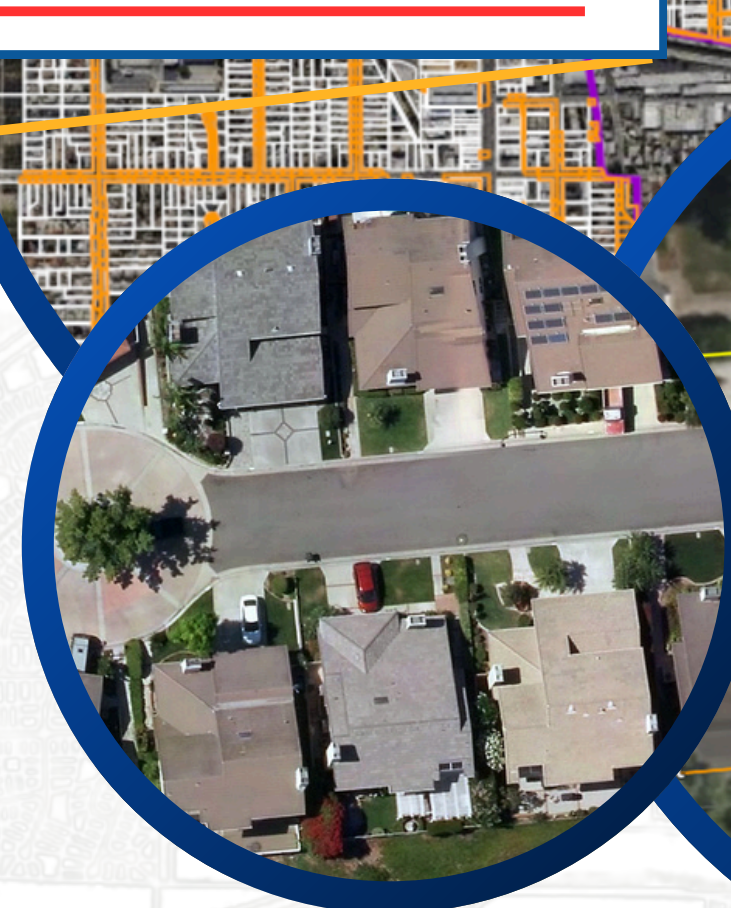
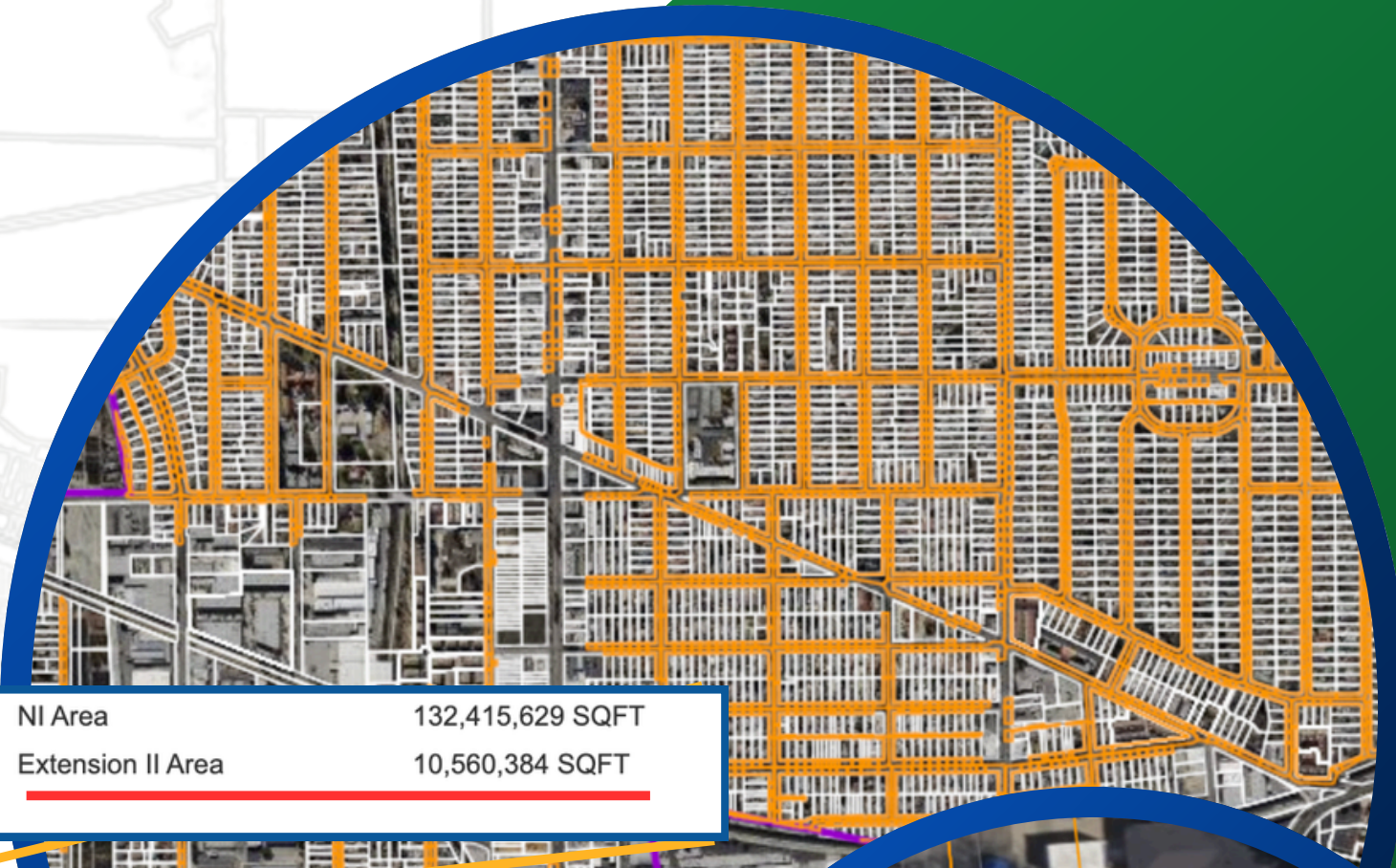
Service Area	34 SQMI	ET	
Population	120,377	Peff	
Total Parcels	32,659	LEF (2025)	
Total RES Extensions	28,192	GPCD	
Source	DWR Annual Report	Vintage	12/1/2024

RES LAM Totals

Total Res Parcels	29,194	NI Area	132,415,629 SQFT
II Area	68,554,334 SQFT	Extension II Area	10,560,384 SQFT
INI Area	30,113,832 SQFT		

CII LAM Totals

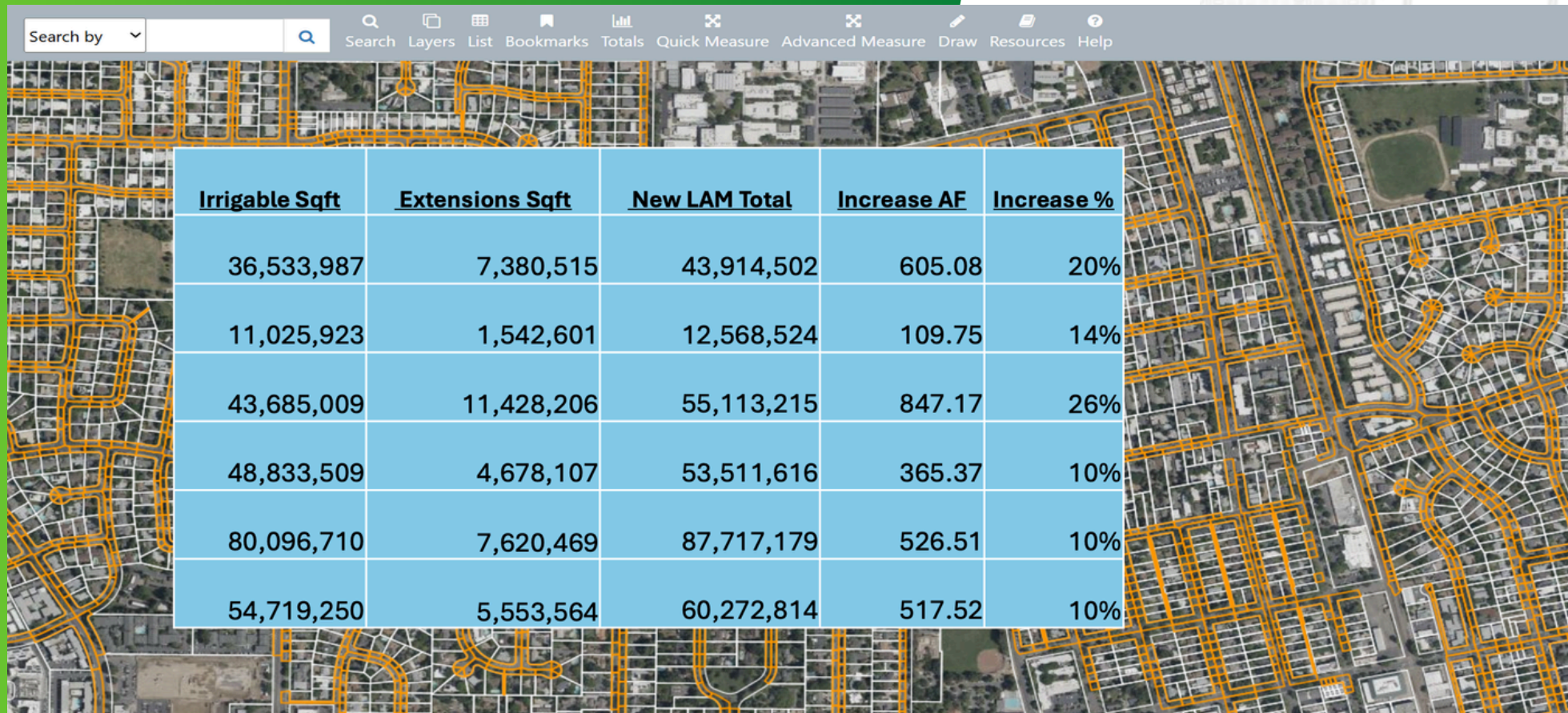
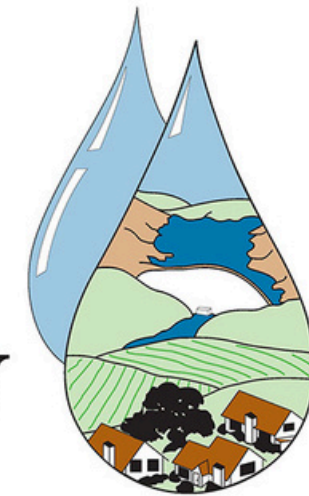
Total CII Parcels	2,977	Vegetative Cover INI	1,680,883 SQFT
II Area	67,031,606 SQFT	Bare Earth INI	4,522,253 SQFT
NI Area	396,514,041 SQFT	Pervious NI	3,402,625 SQFT
Impervious	96,714,800 SQFT	Undeveloped Lands	294,230,688 SQFT
Pools	69,854 SQFT	Horse Corrals	0 SQFT
Turfgrass II	25,178,337 SQFT	Open Water	1,763,308 SQFT
Canopy II	21,625,705 SQFT	Artificial Turf	402,619 SQFT
Vegetative Cover II	6,673,162 SQFT	Agricultural Land	9,586,911 SQFT
Bare Earth II	3,897,637 SQFT	Functional Turf	20,066,413 SQFT
Turfgrass INI	7,012,385 SQFT	Non Functional Turf	12,124,309 SQFT
Canopy INI	3,905,875 SQFT		



Residential Extensions can add 10-20% to your Residential Outdoor Allocation

RESIDENTIAL PARCEL EXTENSIONS

SOLANO COUNTY WATER AGENCY



Estimated **increase** in Residential allocation from a residential parcel extension audit and reporting

Fairfield	↑	16%
Rio Vista	↑	13%
Vallejo	↑	10%
Suisun	↑	11%
Vacaville	↑	10%

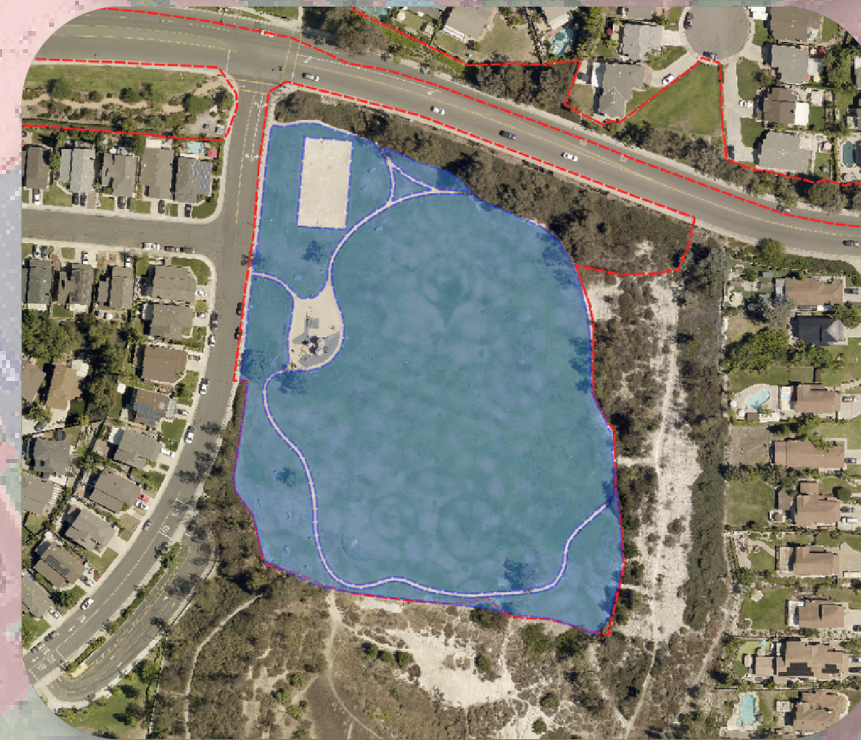
Parcel extension review helps ensure residential landscape is fully represented and documented

REAL LIFE EXAMPLES!

SPECIAL LANDSCAPE AREAS (SLAS)

SLAs play a critical role within the UWUO framework because qualifying landscapes receive a higher water efficiency factor than standard irrigated landscapes.

By accurately identifying and spatially mapping eligible SLAs, agencies can ensure these areas are properly accounted for within their objective calculations, often resulting in a meaningful increase in overall allocation.



SPECIAL LANDSCAPE AREAS

DIM Objective Formula

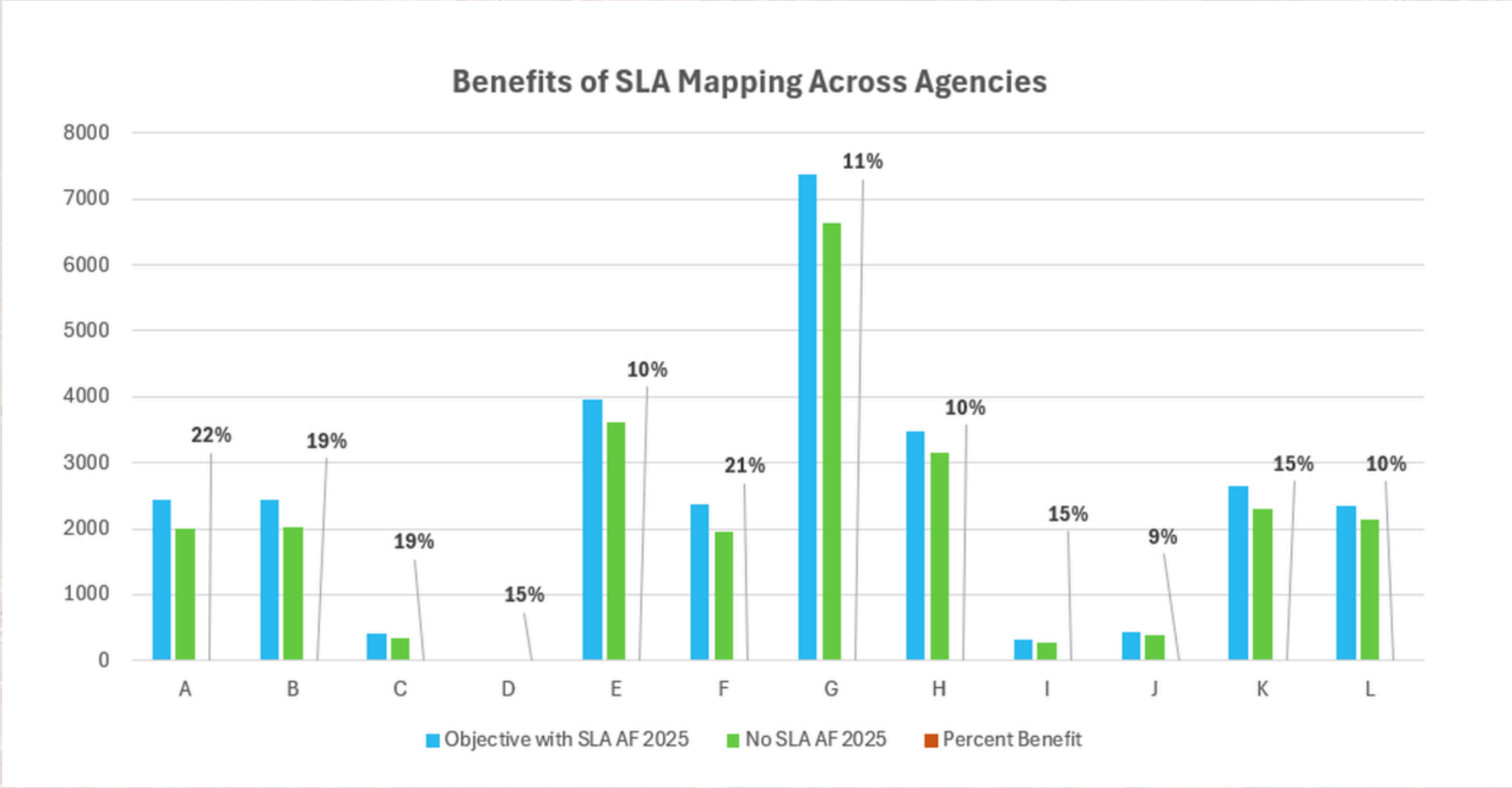
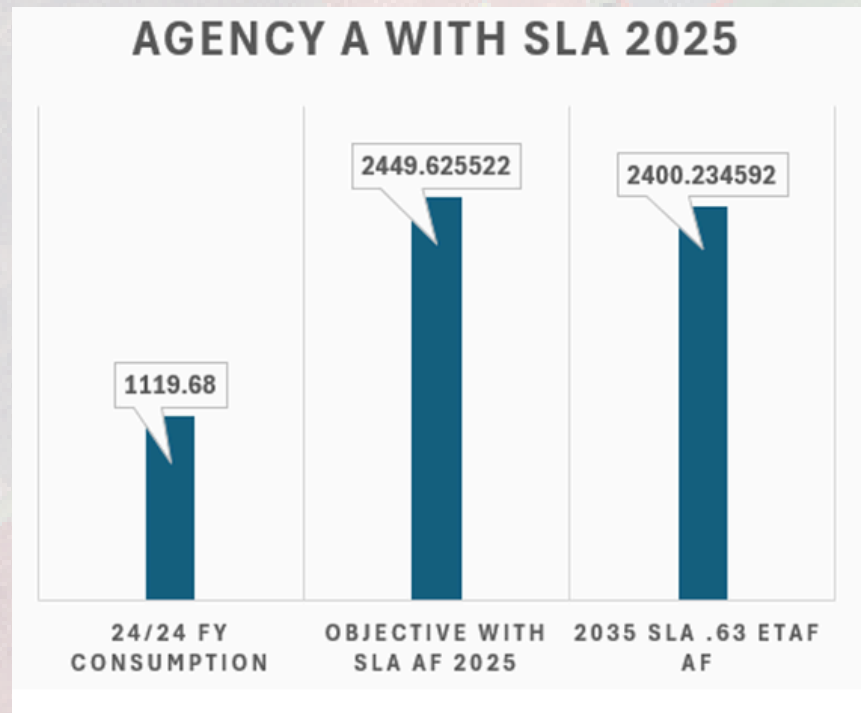
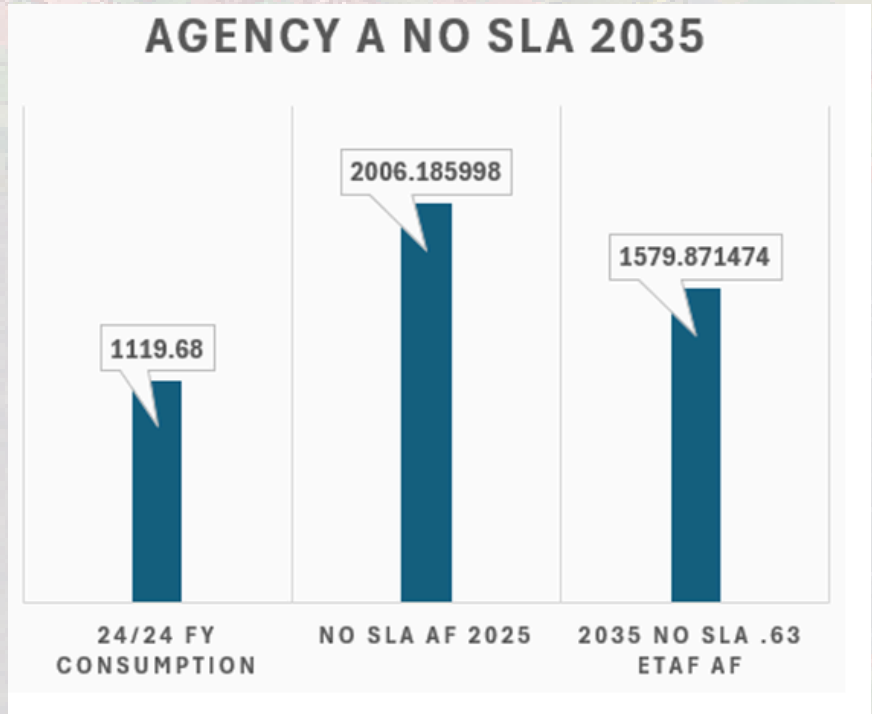
$$(0.62) * \{ [LADIM \times ETF \times (ETo - Peff)] + (1.0 \times SLA \times ETo) + (LAMWELO \times 0.45 \times ETo) \} + \text{Exempt Water Use Volume}$$

DIM Areas	SLAs	MWELO	Except Water Use
Landscapes with DIMs that were developed before 2020	Landscapes with DIMs that meet the SLA requirements	Landscapes with DIMs built after 2020 (new and rehabilitated)	New builds exempt from MWELO*
LADIM x ETF x (ETo - Peff)	1.0 x SLA x ETo	LAMWELO x 0.45 x ETo)	Volume of water applied to these landscapes

- Active or Passive Recreation
- Recycled water
- Areas dedicated to edible plants
- Engineered slopes
- Ponds or lakes receiving supplemental water for sustaining wildlife
- Plants collections (arboretums)
- Public pools
- Cemeteries (built before 2015)

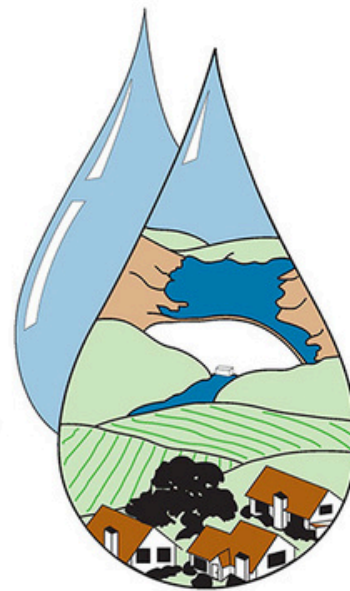
Timeline	ETF
2023-2030	.80
2030-Forward	.63
MWELO	.45

SPECIAL LANDSCAPE AREAS



SPECIAL LANDSCAPE AREAS

SOLANO COUNTY
WATER AGENCY



Accurate SLA identification helps ensure qualifying landscape is fully accounted for

Increase in CII Allocation from mapping & reporting Special Landscape Areas

Fairfield	↑	22%
Rio Vista	↑	15%
Vallejo	↑	15%
SuiSun	↑	9%
Vacaville	↑	10%

WHY THIS WORK MATTERS

Validating your baseline helps agencies:

- Fully account for the landscapes they actually serve
- Build a more accurate and defensible data foundation for the Urban Water Use Objective
- Improve confidence in reporting and annual submissions
- Reduce uncertainty before launching outreach or conservation programs
- Prioritize implementation based on a stronger baseline
- Ensure conservation efforts are built on data that reflects real conditions



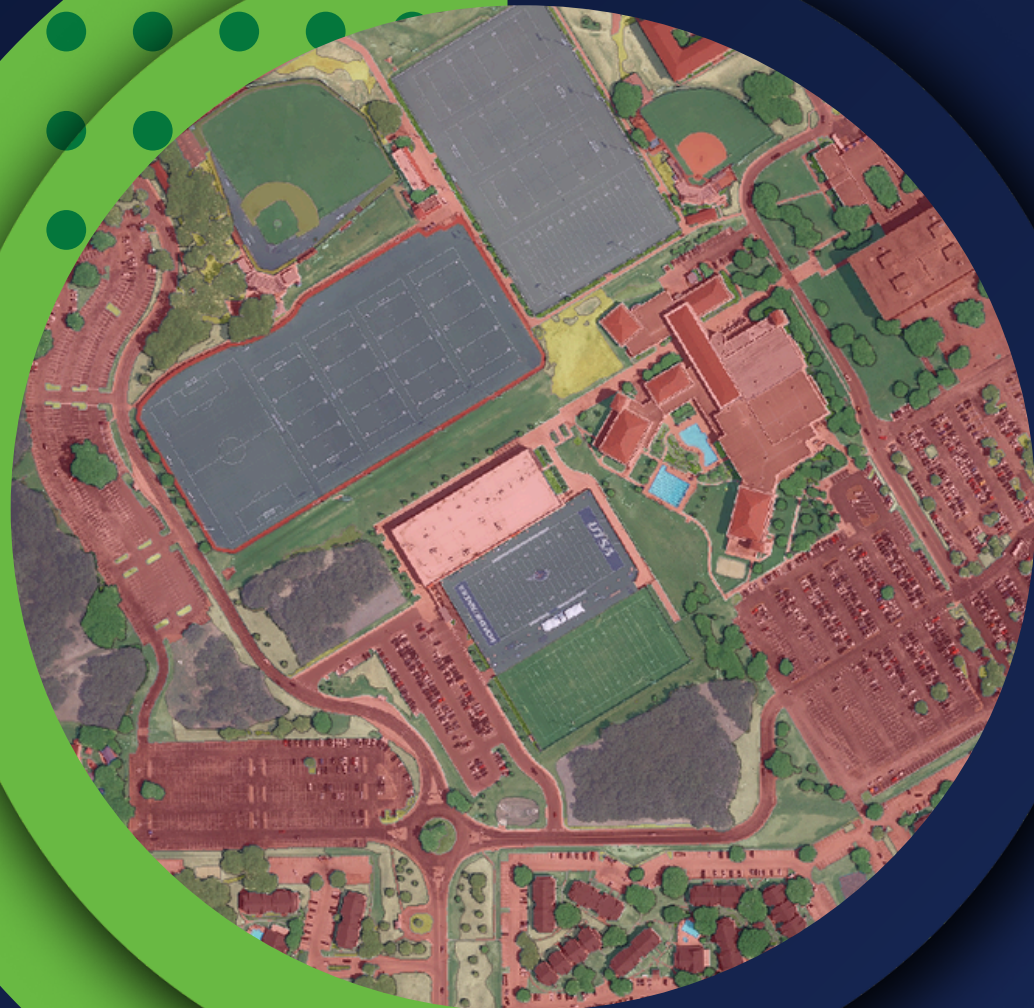
YOUR OBJECTIVE STARTS WITH YOUR DATA



When service area boundaries, parcel data, landscape measurements, and qualifying uses are fully validated, agencies can move forward with greater confidence.

A stronger baseline supports a more accurate, more defensible, and more achievable Urban Water Use Objective.

QUESTIONS



Thank You!

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