

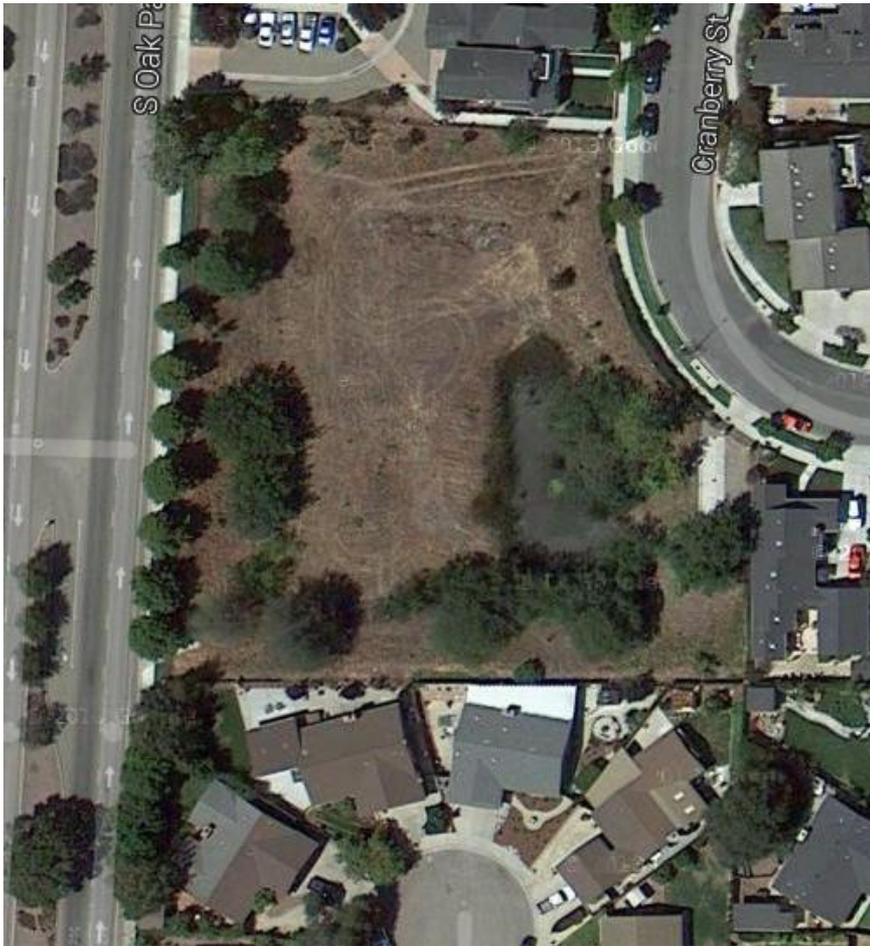
City of Arroyo Grande

Public Works Department

2014 Water Audit of

City Properties

Berry Gardens



Recommendation:

Remove all turf (2730 sf.) and replant with drought tolerant plants and a drip system. Convert basin spray heads to a drip system and plant more trees and shrubs.

**Current water use 10,395 gallons per month.
After recommendation, around 5,790 gallons per month.**

Council Chambers



Recommendation –

Front – Remove turf (247 sf.) and replace with drought tolerant/low maintenance vegetation. Convert irrigation system to drip. Cover bare areas with bark. Current spray irrigation system uses **2,121 gallons per month**.

Rear area- Remove turf area (1000 sf.) and replace with decomposed granite. Install picnic tables.

Current irrigation inventory

Front – Station # 1 – 4 H, 10F sprays
11 min, 4 days

Turf 19'x13'

Station # 2 - 2H, 4Q, 15 F sprays
12 min, 4 days

Rear – Station #1 3F, 5H, 15F sprays
35 min, 3 days

Diana Place



Recommendation –

Replace existing heads with MP rotors.

Current water use 8,640 gallons per month.

After recommendation, around 6,048 gallons per month.

Current turf irrigation inventory

Station # 1 4Q, 2H, 2F 25min, 3d

Station # 2 3Q, 3H, 1F` 25min, 3d



Dower Park



Recommendation –

Eliminate one sprinkler head in corner behind sign and replace remaining sprinkler heads with MP rotors. Adjust to appropriate moisture.

Current water use 7,430 gallons per month.

After recommendation around 4,109 gallons per month.

Current turf irrigation inventory

8H

30'o.c.

45 min, 3d

Fire Station



Recommendation –

Spray out and remove (1315 s.f.) of turf. Replace existing spray heads in turf with MP rotors. Replant turf areas with drought tolerant plants and 6” cobbles. Station # 4 would need to be converted to a drip system. The area in front of the sign can be cobbles, matching the entrance to the Miner’s center. Plant various succulents similar to what is planted on the bridge at Tiger Tail.

Current water use 26,729 gallons per month.

After recommendation, around 13,653 gallons per month.

Current turf irrigation inventory

Station # 3 6F, 25H

18’ o.c.

Station # 4 19H

Foremaster

Recommendations –

Parks and Recreation Commission– Remove all turf (14500 s.f.) from Foremaster tract and replace with drought tolerant/low maintenance shrubs and trees. Something that seasonally flowers, similar to Poplar basin along Courtland Ave... Convert irrigation to drip. Provide a DG driveway for the Utilities Department for well #9. Bark between plants.

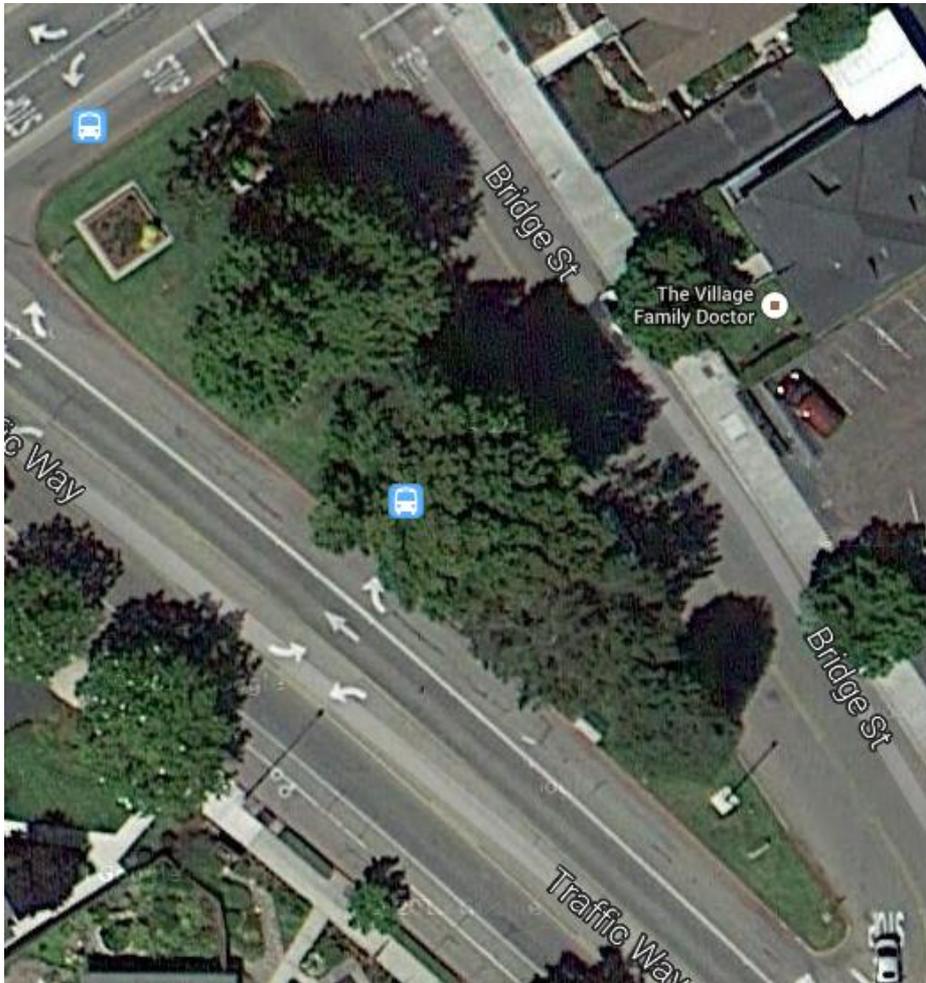
PW Staff– Same as the above recommendation except leave a small turf area on either side of the entrance to the neighborhood. Convert the remaining heads to MP rotors and adjust to optimum moisture. Current gallons per month **43,382**. Would expect a saving of about 18,000 gallons a month after conversion.

Current irrigation Head inventory

STA #1	9 PGP's	16' O.C.
STA #2	22 sprays	15' H
STA #3	32 sprays	4Q, 23H, 5F
STA #4	13 PGP's	22' O.C.
STA #5	12 PGP's	25' O.C.
STA #6	26 sprays	2Q, 23H, 1F 12' O.C.



Hart-Collet



Recommendation –

Remove every other sprinkler head around the curb edge (22 heads) and replace with MP 3000 rotors. Replace center heads (17 f) with MP2000. Adjust time for appropriate moisture

Current water use 62,049 gallons per month.

After recommendation, around 37,732 gallons per month.

Current turf irrigation inventory

Station # 2	5F, 26H
	25m, 4d
Station # 3	12F, 18H

Kingo Park



Remove turf from parkways (station #1 and #2). Convert to drip for existing trees and new shrubs. Install DG along parkway. Remove turf behind fountain between concrete and wall (station # 9). Convert station #4 to MP3500 rotors. Total potential water savings of up to **39,413 gallons per month** minus whatever emitters are used for new plants and existing trees.

Current irrigation inventory

Station # 1	35 heads			
Station # 2	33 heads			
Station # 3	4 heads	I25 orange		
Station # 4	7 heads	35' o.c.	I25 orange	
Station # 5	4 heads		I25 orange	
Station # 6	drip –		fountain and sign	
Station # 7	3 heads		I25	35'-40'-50'
Station # 8	5 heads	44' o.c.	I25 orange	
Station # 9	17 heads	2F, 9H, 6Q		
Station # 10	2 heads		35 o.c.	I25 38ft
	wall			
Station # 11	5 heads	44 o.c.	I25 orange	

Loomis



Recommendation –

Remove turf (1070 sf.) and plant with drought tolerant plants (similar to village entrance at Shell station). Provide drip to existing trees and new plants. Bark in between plants.

Current water use 5,364 gallons per month.

After recommendation, around 1,900 gallons per month.

Current turf irrigation inventory

Station # 1 1F, 10H, 6Q

15 min, 3d

Newport Ave.



Recommendation –

Spray out and remove turf (5160 sf.) and install a drip system. Plant with various drought tolerant plants and ground cover. Chip open areas with chips from corp. yard.

Replace older leaking Toro 600 stream sprays and PGP's with MP 3000 rotors.

Current water use 17,718 gallons per month on turf area
After recommendation, around 10,630 gallons per month.

Current turf irrigation inventory

Station # 2	6F	15min, 3d
Station # 3	6H, 1Q	
Station # 4	6F, 7H	

Old City Hall



Recommendation –

Convert existing spray heads on larger lawn to MP 1000 rotors.

Completely remove turf in both small areas. Add drought tolerant plants and convert to drip.

Potential water savings of 3,154 gallons per month

Current turf irrigation inventory

Station # 2 3H, 4Q

30x8 and 11x21

Olohan Alley



Recommendation –

Convert Kiwanis lawn and Mason St lawn to MP 1000 rotors. Remove turf at Bridge St entrance and fill with DG. Existing tree has a root zone watering system already in place. These three turf areas currently use **19,974 gallons per month**. If converted, usage should drop to about **9,472 gallons per month**. A savings of up to **10,502 gallons per month**.

Current turf irrigation inventory

Mason bridge lawn	3F, 4Q, 6H	7m, 4d
Bridge St. lawn		1F, 4Q, 4H
	6m, 4d	
Kiwanis lawn		3F, 4Q, 4H
	10m, 4d	
		1F, 2Q, 6H

Oro Park



Recommendation –

Take out 16'x10' triangle of turf (80 sf.) along drive way and replace with concrete. Change out all heads to MP 3000's rotors. Cap and remove every other spray head. Adjust time for moisture control/optimum watering.

**Current water use 16,486 gallons per month.
After recommendation around 10,500 gallons per month.**

Current turf irrigation inventory

Station # 1 1F, 3H, 1Q

Station # 2 1F, 5H, 1Q

Station # 3 7H, 3F

15' o.c.

Parkside Park



Recommendation –

Convert all heads to MP2000 rotors. Eliminate Station # 3 (500 sf.) of turf and replace with DG or bark. Adjust watering time for optimum moisture.

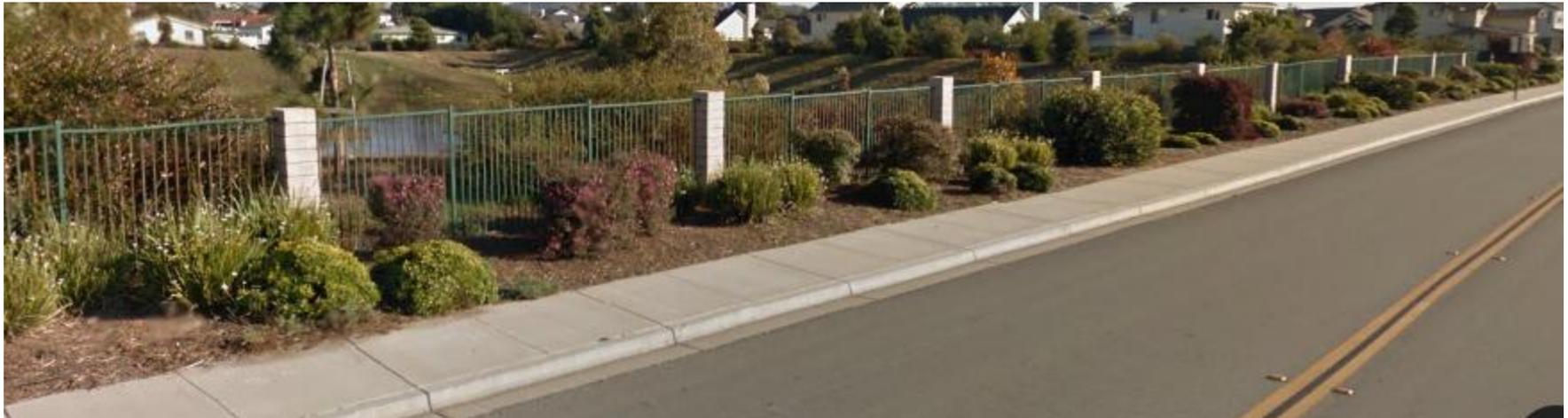
Eliminate all irrigation inside of fence area around pond. Remove red fescue grass outside of basin and replace with drought tolerant plants and convert to drip.

Current water use is 28,583 gallons per month. After conversion 15,720 for a potential savings of 12,862 gallons per month.

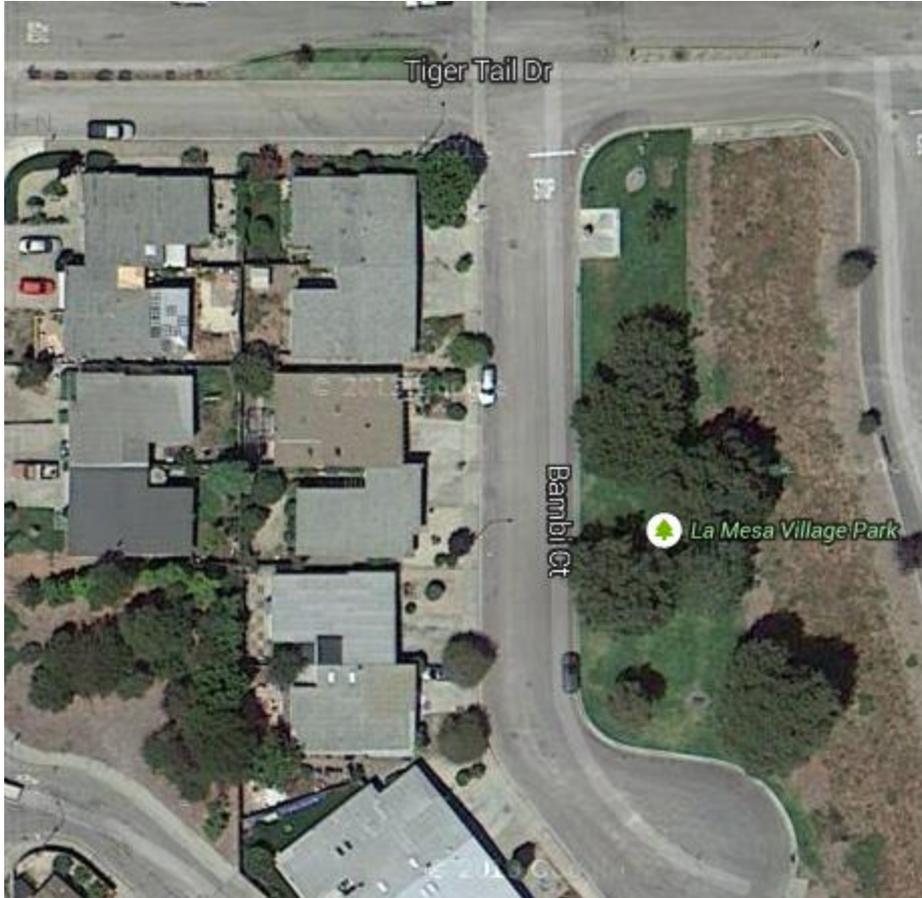
Parkside Park



From this  to this 



Tiger Tail Park



Recommendation –

Remove turf (825 sf.) on island and replace with plants growing on the rest of the planter. Extend existing drip system. Remove south side of station # 2 and under Oak tree (1120 sf.) and replace with DG. Replace existing spray heads with MP 2000 and MP 3000 rotors. Full heads can be replaced every other one. Some of the half heads on curb can be removed because of overlap.

**Current water use 50,224 gallons per month.
After recommendation, around 38,834 gallons per month.**

Current turf irrigation inventory

Station # 1	8H	
Station # 2	11H, 8F	22 ft. o.c.
Station # 3	24F, 12H	

Woodland Dr.



Recommendation –

Remove a 6' collar of turf (3342 sf.) around the whole perimeter of the park area. Replace removed turf with compacted DG and eliminate 2 sprinkler heads in corners. Move existing heads to the new edge of the turf. Woodland Park has had issues of bad coverage because the heads were improperly spaced. So the park has had to be over watered to get uniform moisture and an even green appearance. This will solve the issue.

Current water use 6,579 gallons per month. (March – October)

After recommendation, around 4,276 gallons per month.

Current turf irrigation inventory

Station # 1 3F, 2Q, 10H

38' oc.

PGP#4 nozzles