

## MEMO

TO: District Manager

FROM: Director of Operations

SUBJECT: OPERATIONS DEPARTMENT STATUS REPORT  
JANUARY 2019

DATE: FEBRUARY 20, 2020

### RECOMMENDATION:

It is recommended that the District Manager review and file the Operations Department Project Status Report for the month of January 2019.

### BACKGROUND:

#### DISTRICT WIDE FLUSHING

In February 2020 District staff began the District's flushing program. Flushing began Monday February 3, 2020 starting on Quail Hollow Rd. and continuing down to East Zayante Rd. the first week. Flushing of the Quail Hollow Rd. and East Zayante Rd. areas went extremely well. Staff was able to complete this area of flushing in two days stemming from the District's ability to stay on surface water for an extended period of time in 2019. The high quality surface water has a very low mineral content thus lessening mineral deposits in the District mainlines.

In the following weeks flushing will be done throughout the West Zayante Rd. and Hihn Rd. areas. There will be another update to follow at the board of directors meeting on March 19, 2020 in this section of the operations status report.

#### BEAR CREEK ROAD SLIDE AND WATER MAIN BREAK

On January 28, 2020 District on-call staff was called out to a main break on Bear Creek Rd. Staff responded and found that a portion of Bear Creek Rd. had slid and 26 feet of 8 inch transite pipe was missing. Staff shut down the main line and made temporary repairs with a two inch polyethylene pipe as a jumper across the slide and break area. Estimated a total of 45,000 gallons of water were lost.

#### ALTA VIA ROAD MAIN REPLACEMENT

In December 2020 a cross country line off of Alta Via Rd. began leaking as it has in the past many of times. It was decided this 100 feet of main line was very deteriorated and becoming a hazard. Staff procured replacement parts and replaced this 100 feet of 6 inch steel water main with 4 inch HDPE pipe on this cross country line.

## FELTON ACRES TANK

In August 2020 the 100,000 gallon redwood water tank failed in the flooring of the tank causing it to completely drain. Repairs could no longer be made to this tank with the flooring failure so significant. In January 2020 District staff disassembled and took down the redwood tank to relieve the danger of it collapsing or falling in. The redwood from the tank has been stacked and covered on site ready for surplus.

## FELTON WATER SYSTEM WATER METER REPLACEMENT

Domestic water meters are being replaced as existing meters have reached their life expectancy. Meters are being changed to the new Beacon "Eye on Water" system that will allow customers to monitor their water usage over the internet.

## MAINTENANCE ISSUES

7940 East Zayante Rd. repaired a leak on the 6 inch fire hydrant lateral

Full service line replacements 122235 Volver and 10581 Visitar Lompico

Replaced three deteriorated failing valve boxes in Lompico Rd. at the bottom of West Dr.

Replaced a deteriorated failing valve box in the middle of Graham Hill Rd. at the intersections of Hwy 9

Installed new sample stations sites on El Solyo Heights Felton and Gladys Way Lompico

Facility site maintenance multiple locations

Repaired approximately 15 leaks system wide

James Furtado

Director of Operations

# SAN LORENZO VALLEY WATER DISTRICT PRODUCTION COMPARRISON

Source	January-20	December-19	January-13	Difference This Year To 2013
<b>North System</b>				
<b>Surface Water Sources</b>				
Foreman Creek	15,433,738	4,958,854	15,866,000	
Peavine Creek + Hydro	540,689	611,431	9,002,000	
Clear Creek	7,091,744	11,081,829	4,965,000	
Sweetwater Creek	4,727,829	7,387,886	3,310,000	
<b>Sub-Total (Streams)</b>	<b>27,794,000</b>	<b>24,040,000</b>	<b>33,143,000</b>	-16.14%
<b>Wells (North)</b>				
Olympia No. 2	162,000	1,886,000	0	
Olympia No. 3	-	-	0	
Quail Well No. 4-A	-	1,782,000	0	
Quail Well No. 5-A	-	3,439,700	3,800	
<b>Sub Total North Wells</b>	<b>162,000</b>	<b>7,107,700</b>	<b>3,800</b>	4163.16%
<b>South System Wells</b>				
Pasatiempo 5A	2,785,500	4,582,000	N/A	
Pasatiempo 6	N/A		1,644,000	
Pasatiempo 7	724,000	2,144,000	4,357,000	
Pasatiempo 8	1,611,000	1,184,920	N/A	
<b>Sub Total Pasatiempo Wells</b>	<b>5,120,500</b>	<b>7,910,920</b>	<b>6,001,000</b>	-14.67%
<b>North South All Sources Combined</b>	<b>33,076,500</b>	<b>39,058,620</b>	<b>39,147,800</b>	-15.51%
<b>Felton System - Surface Water</b>				
Fall Creek	4,023,419	3,699,619	3,873,810	
Bennett Spring	2,748,900	2,710,004	3,651,200	
Bull 1 & 2	1,216,996	1,241,680	4,487,200	
<b>Total Felton System Sources</b>	<b>7,989,315</b>	<b>7,651,303</b>	<b>12,012,210</b>	-33.49%
<b>Manana Woods System</b>				
Well 1	-	-	106,775	
<b>Total Manana Woods Sources</b>	<b>-</b>	<b>-</b>	<b>106,775</b>	
<b>Sub - Total Production</b>				
<b>North / Felton / Manana</b>	<b>41,065,815</b>	<b>46,709,923</b>	<b>51,266,785</b>	-19.90%
<b>Surface</b>	<b>35,783,315</b>	<b>31,691,303</b>	<b>45,155,210</b>	-20.75%
<b>Wells</b>	<b>5,282,500</b>	<b>15,018,620</b>	<b>6,111,575</b>	-13.57%
<b>Total Surface Water Percentage</b>	<b>87.14</b>	<b>67.85</b>	<b>88.08</b>	-1.07%
<b>Total Wells Percentage</b>	<b>12.86</b>	<b>32.15</b>	<b>11.92</b>	7.91%

**SAN LORENZO VALLEY WATER DISTRICT  
PRODUCTION BY SYSTEM  
+/- INTERTIES  
January 2020**

North System All Sources	<u>33,076,500</u>
Interties IN +	<u>446,851</u>
Interties OUT -	<u>2</u>
<b>TOTAL NORHT SYSTEM</b>	<b><u>33,523,349</u></b>
Felton Water system All Sources	<u>7,989,315</u>
Interties IN +	<u>0</u>
Interties OUT -	<u>0</u>
<b>TOTAL FELTON SYSTEM</b>	<b><u>7,989,315</u></b>
Manana Woods System	
Manana Woods Well 1	<u>0</u>
Interties IN +	<u>0</u>
<b>TOTAL MANANA WOODS</b>	<b><u>0</u></b>

**SAN LORENZO VALLEY WATER DISTRICT**  
**INTERTIE USAGE**  
**January 2020**

**INTERTIE 2**

SLVWD to SVWD 0

SVWD to SLVWD 0

**INTERTIE 3**

SLV SOUTH to SLV NORTH 446,851

SLV NORTH to SLV SOUTH 2

**INTERTIE 4**

SLVWD to MHWD 0

MHWD to SLVWD 0

**INTERTIE 6**

SLV NORTH to SLV FELTON -

SLV FELTON to SLV NORTH -

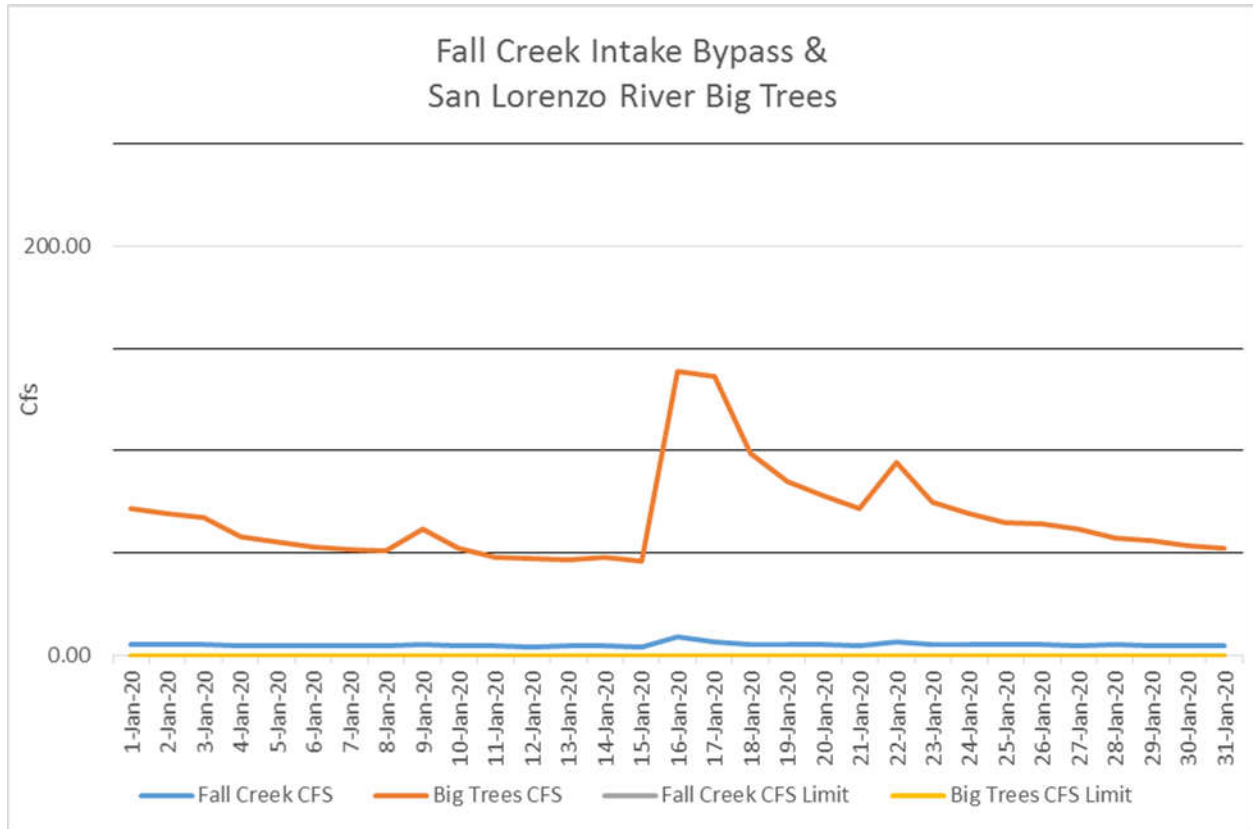
**LOMPICO INTERTIE**

SLV NORTH to LOMPICO

**MANANA WOODS INTERTIE**

SLVWD to MANANA WOODS -

## Fall Creek Intake January 2020



### Normal Rainfall Fall Creek Intake Bypass Requirements

April 1 through October 31                      1.0 cubic feet per second

November 1 through March 31                  1.5 cubic feet per second

### Dry Conditions Fall Creek Intake Bypass Requirements

April 1 through October 31                      0.5 cubic feet per second

November 1 through March 31                  0.75 cubic feet per second

Number of Days in month 0.75 cfs or below, ZERO days

### *San Lorenzo River USGS Big Trees Flow Requirements*

September    11 cubic feet per second

October    26 cubic feet per second

November 1 through May 31                      21 cubic feet per second

June - August    No Requirements

## Fall Creek Intake January 2020

For the protection of fish and wildlife, during the period: (a) April 1 through October 31 bypass a minimum of 0.5 cfs; (b) November 1 through March 31 bypass a minimum of 1.5 cfs past the Fall Creek point of diversion. The natural streamflow shall be bypassed whenever it is less than 1.5 cfs; provided, however, that during a dry year, the bypass requirement shall be reduced from 1.5 to 0.75 cfs. A dry year is defined on a monthly basis of cumulative runoff beginning October 1 of each season in the San Lorenzo River at the USGS gage at Big Trees. These runoff figures are based on approximately 50 percent of normal runoff as the dividing level between normal and dry year runoff and are as follows:

- November 1 for the month of October 500 af
- December 1 for October-November, inclusive 1,500 af
- January 1 for October-December, inclusive 5,000 af
- February 1 for October-January, inclusive 12,500 af
- March 1 for October-February, inclusive 26,500 af

Fall Creek Weir Measurement											
	Month:	January		Year:	2020	Big Trees > 26,500 Acre-ft Oct-Feb Normal Year			Big Trees <26,500 Acre-ft Oct-Feb Dry Year		
Date	Time	Initials	Pump #	Fall Cr. GPM into Kirby plant	Weir Board Height (inches)	Fall Creek Bypass (CFS)	Big Trees Bypass (CFS)	Rainfall (Felton gauge)	Met Fall Cr, Bypass Requirement: Normal Year April 1 - Oct 31 1.0 cfs; Nov 1 - March 31 1.5 cfs Dry Year April 1- Oct 31 0.5 cfs Nov. 1 - March 31 0.75 cfs (yes/no)	Met Big Trees Requirement Nov-May 20cfs Sept 10 cfs Oct 25 cfs (yes/no)	Notes
1	7:30	HO	2	96	25	5.552	72.1	0	yes	yes	
2	8:20	TH	2	118	25	5.376	69.1	0	yes	yes	
3	8:10	TH	2	123	25	5.191	67.2	0	yes	yes	
4	9:05	TH	2	122	25	5.112	58.1	0.03	yes	yes	
5	9:20	TH	2	100	25	4.995	55.5	0	yes	yes	
6	9:00	JG	2	103	25	4.907	53	0	yes	yes	
7	8:30	JG	2	89	25	4.838	52	0	yes	yes	
8	10:00	JG	2	97	25	4.741	51.4	0	yes	yes	
9	8:00	JG	2	92	25	5.298	61.6	0.25	yes	yes	
10	8:00	JG	1	92	25	4.682	52.2	0	yes	yes	
11	11:40	JG	1	103	25	4.604	48.3	0.05	yes	yes	
12	11:45	JG	1	108	25	4.467	47.6	0	yes	yes	
13	8:00	JG	1	73	25	4.535	46.8	0.05	yes	yes	
14	8:00	JG	1	76	25	4.624	48.3	0.15	yes	yes	
15	10:20	TH	1	103	25	4.34	46.1	0	yes	yes	
16	11:15	JG	1	80	25	9.042	139	1.1	yes	yes	
17	7:45	TH	1	80	25	6.481	136	0.89	yes	yes	
18	10:10	SS	1	83	25	5.728	98.7	0	yes	yes	
19	10:30	SS	1	77	25	5.425	84.9	0	yes	yes	
20	9:20	SS	1	94	25	5.161	78	0	yes	yes	
21	08:00	SS	1	102	25	5.005	72	0	yes	yes	
22	08:00	JG	1	111	25	6.54	94.3	0.8	yes	yes	
23	08:00	JG	1	74	25	5.758	75	0	yes	yes	
24	9:15	JG	1	86	25	5.425	69	0	yes	yes	
25	9:30	JT	1	92	25	5.43	65.2	0	yes	yes	
26	9:15	JT	1	0	25	5.35	64.3	0.1	yes	yes	
27	8:00	JG	1	84	25	5.152	61.6	0	yes	yes	
28	8:30	JG	1	83	25	5.249	57.2	0	yes	yes	
29	11:30	JG	1	106	25	4.936	56.4	0	yes	yes	
30	13:30	JG	1	88	25	4.868	53.9	0	yes	yes	
31	8:20	TH	1	83	25	4.78	52.2	0	yes	yes	



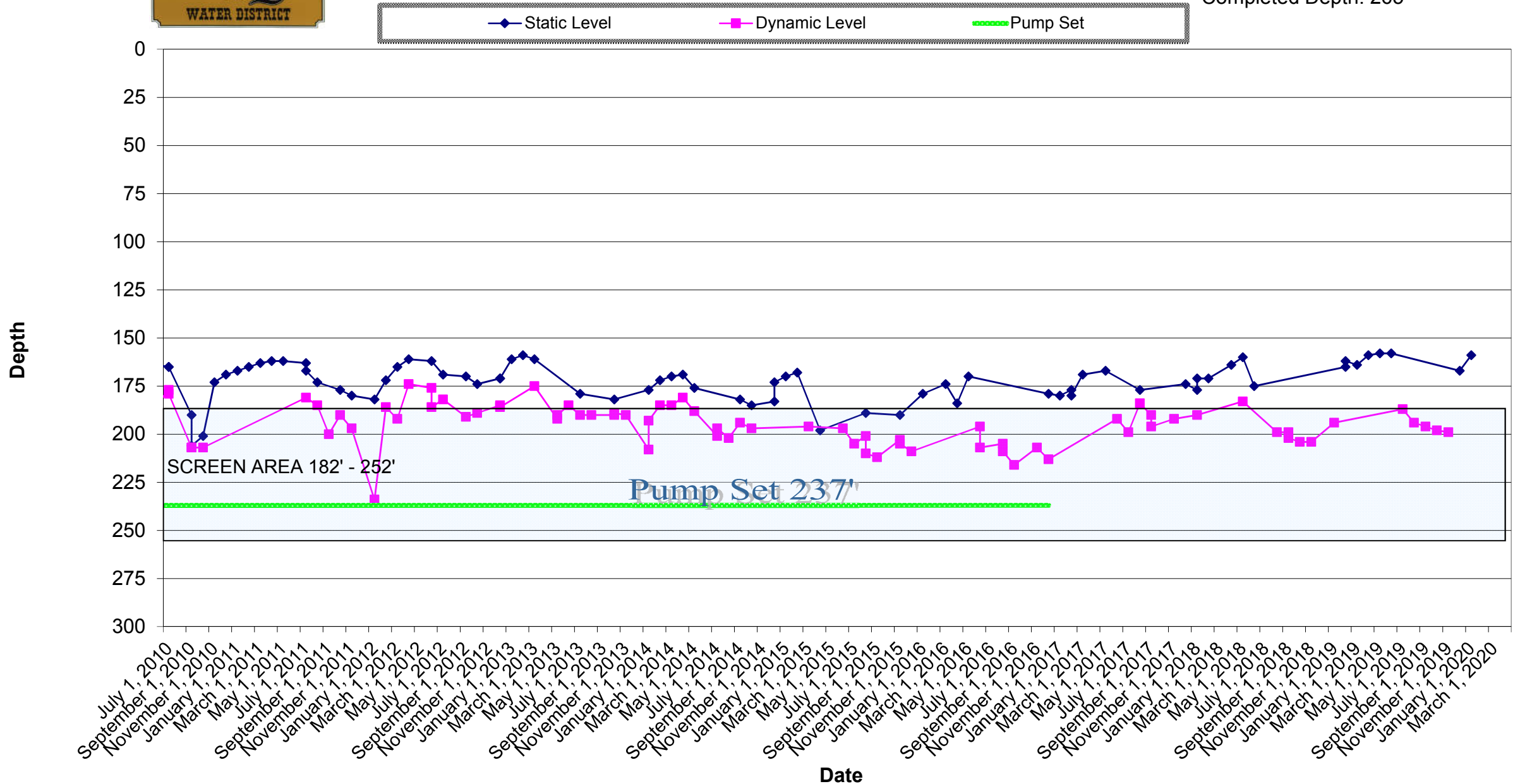


# SAN LORENZO VALLEY WATER DISTRICT

## Well Drawdown Report

### Quail Well 4-A

Location: Cumora Ln. Ben Lomond  
Elevation: 596.54 ft @ Pad  
Installed: 6-07-2001  
State Well #: 4410014-026  
Completed Depth: 265



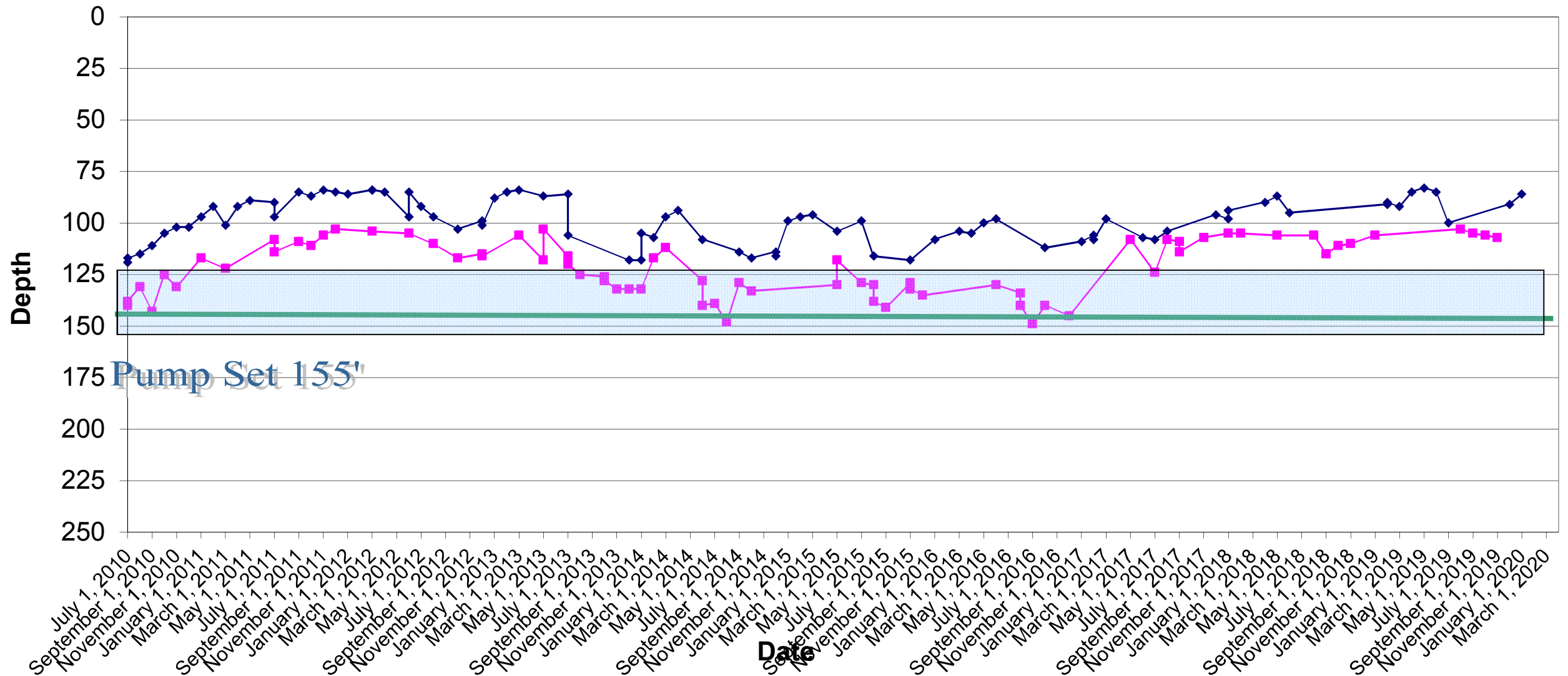


# SAN LORENZO VALLEY WATER DISTRICT

## Well Drawdown Report

### Quail Well 5-A

Location: 1161 Quail Hollow Rd.  
Ben Lomond  
Elevation: 517.65 ft. @ Pad  
Installed: March 2000  
State Well #: 4410014-025  
Completed Depth: 174'



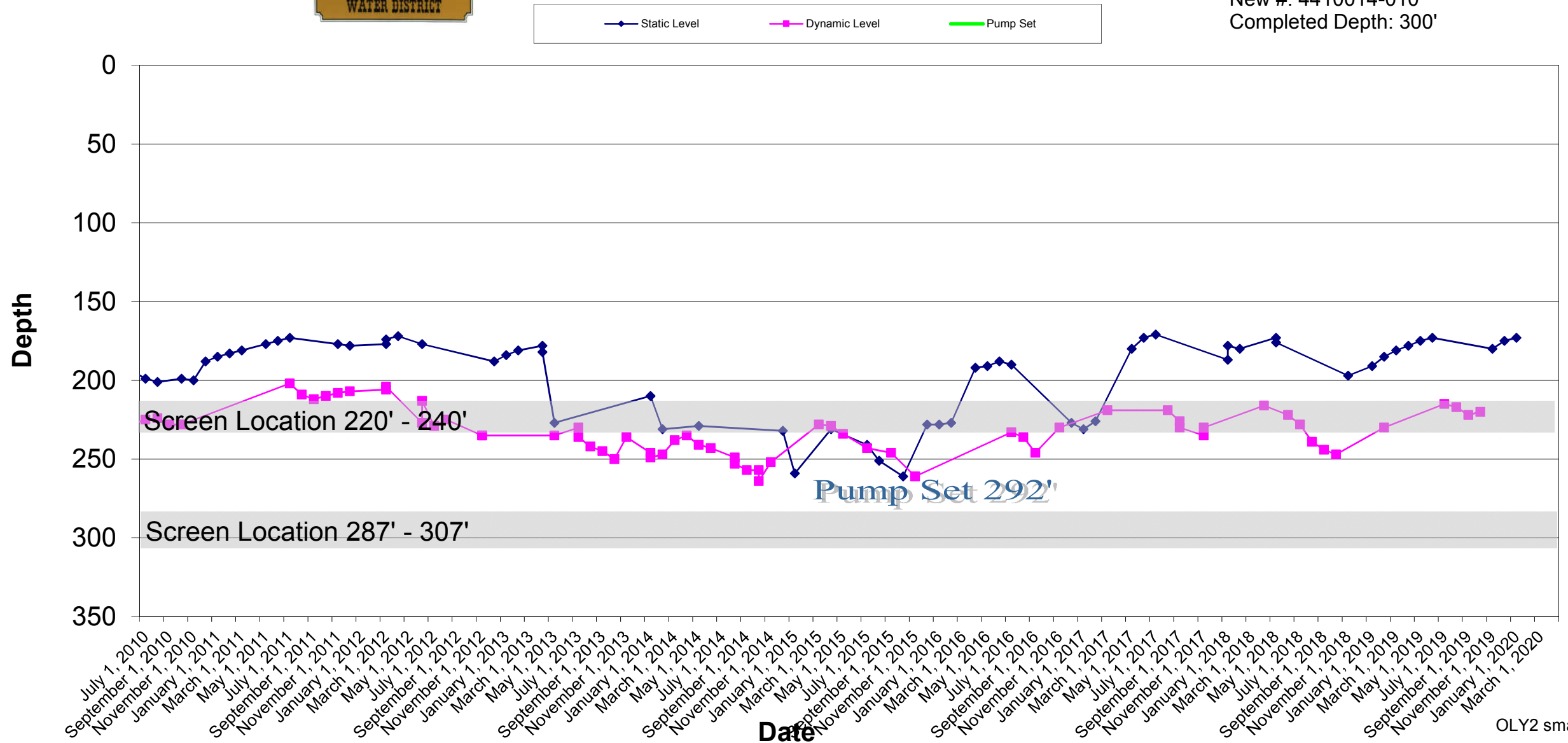


# SAN LORENZO VALLEY WATER DISTRICT

## Well Drawdown Report

### Olympia 2

Location: 7701 E. Zayante Rd.  
Elevation: 525'  
Installed: April 28, 1980  
State Well #:10S/O2W-11P01  
New #: 4410014-010  
Completed Depth: 300'



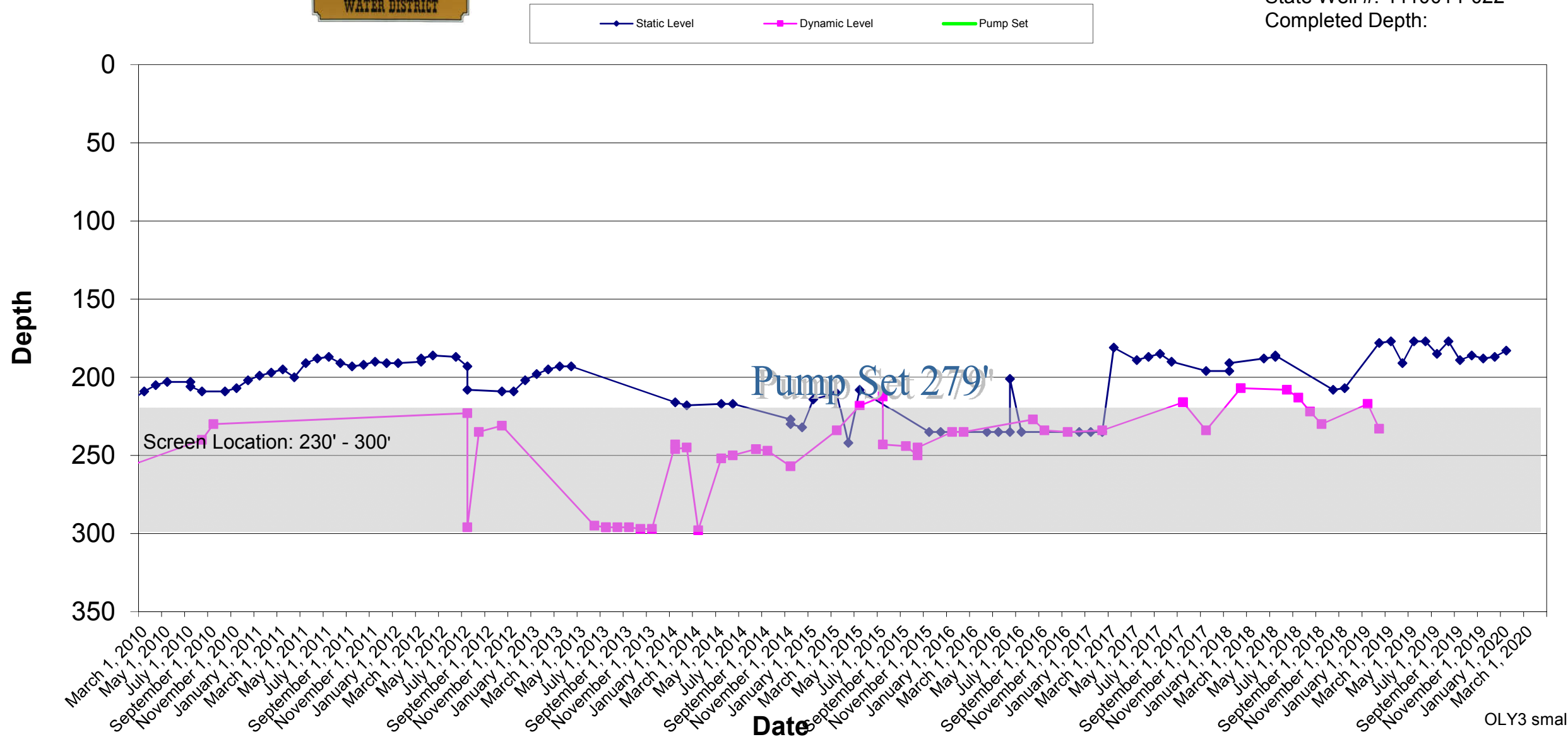


# SAN LORENZO VALLEY WATER DISTRICT

## Well Drawdown Report

### Olympia 3

Location: 7701 E. Zayante Rd  
Elevation: 538' Mean Sea Level  
Installed: 8-15-90  
State Well #: 4410014-022  
Completed Depth:



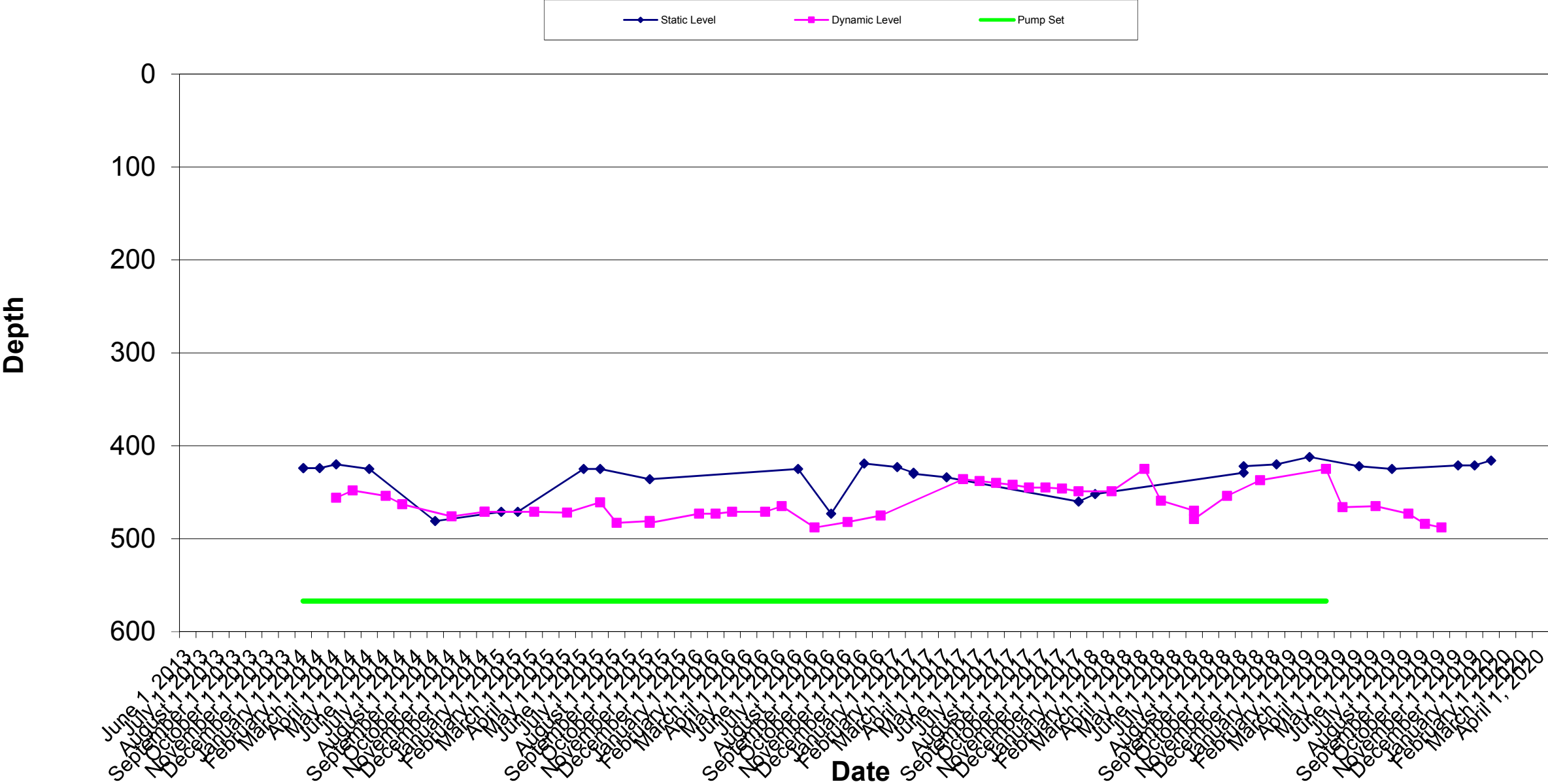


# SAN LORENZO VALLEY WATER DISTRICT

## Well Drawdown Report

### Pasatiempo 5-A

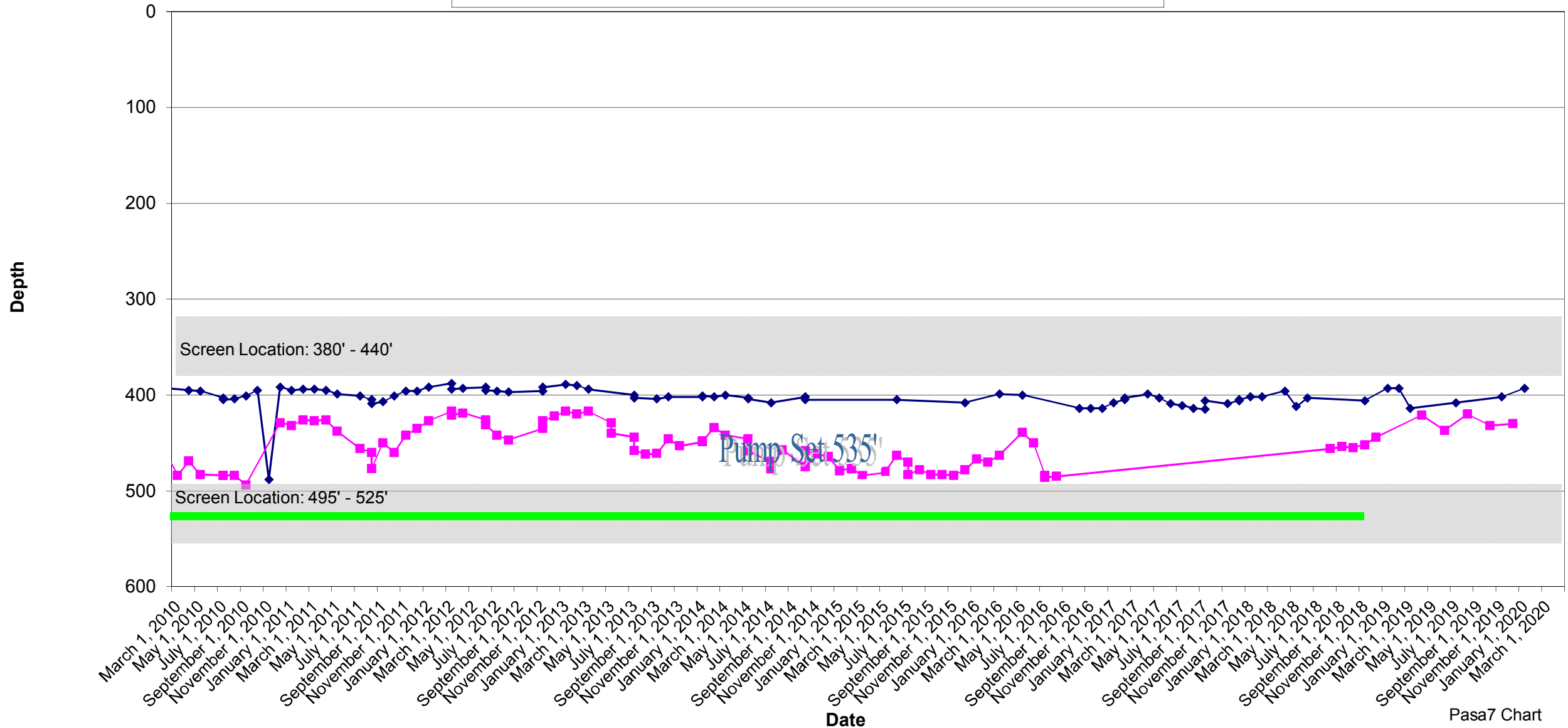
Location: So. Of 3650 Graham Hill Rd  
Elevation: 752'  
Installed 1-1-14  
State Well #:4410014-014  
Completed Depth: 710'





**SAN LORENZO VALLEY WATER DISTRICT**  
**Well Drawdown Report**  
**Pasatiempo 7**

Location: South of Probation  
Center  
Elevation: 734' MSL  
Installed: July 21, 1990  
State Well #: 4410014-024  
Completed Depth: 540'

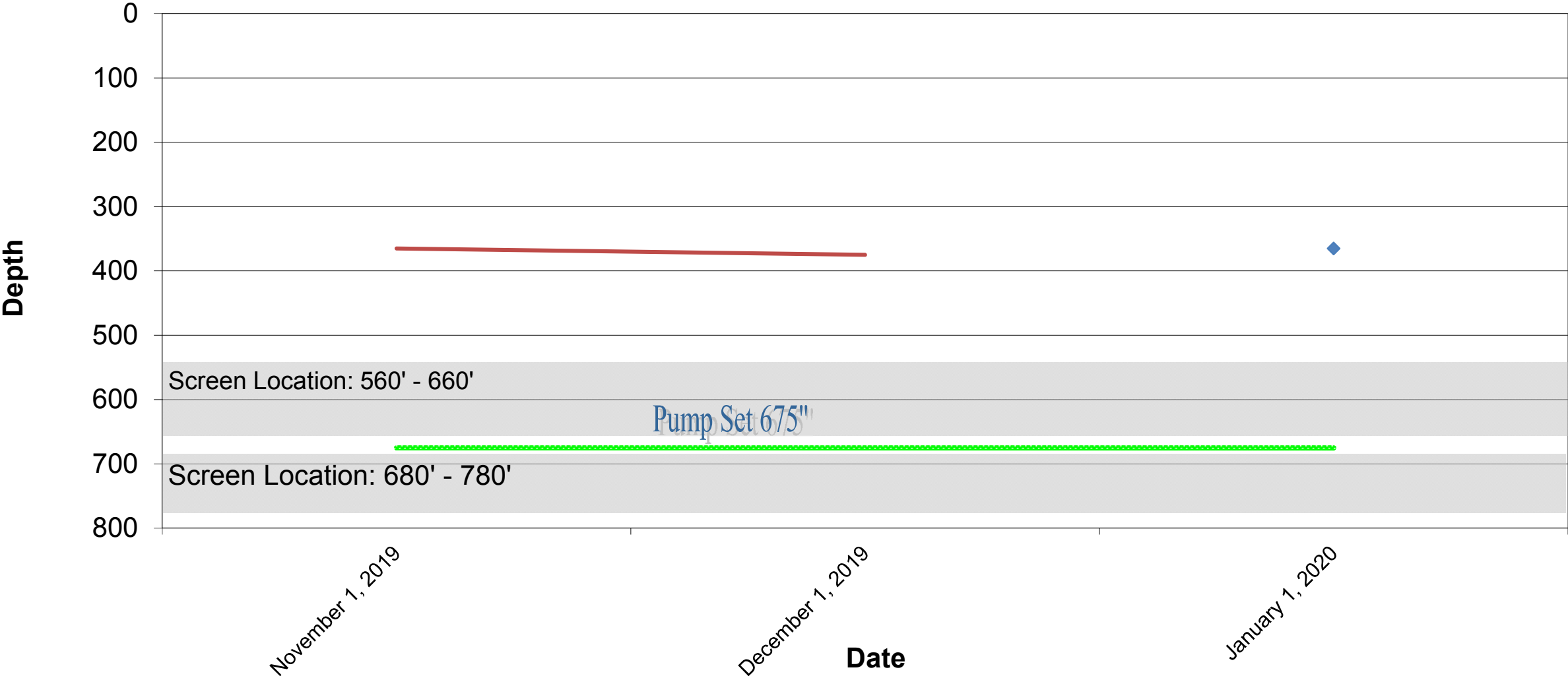




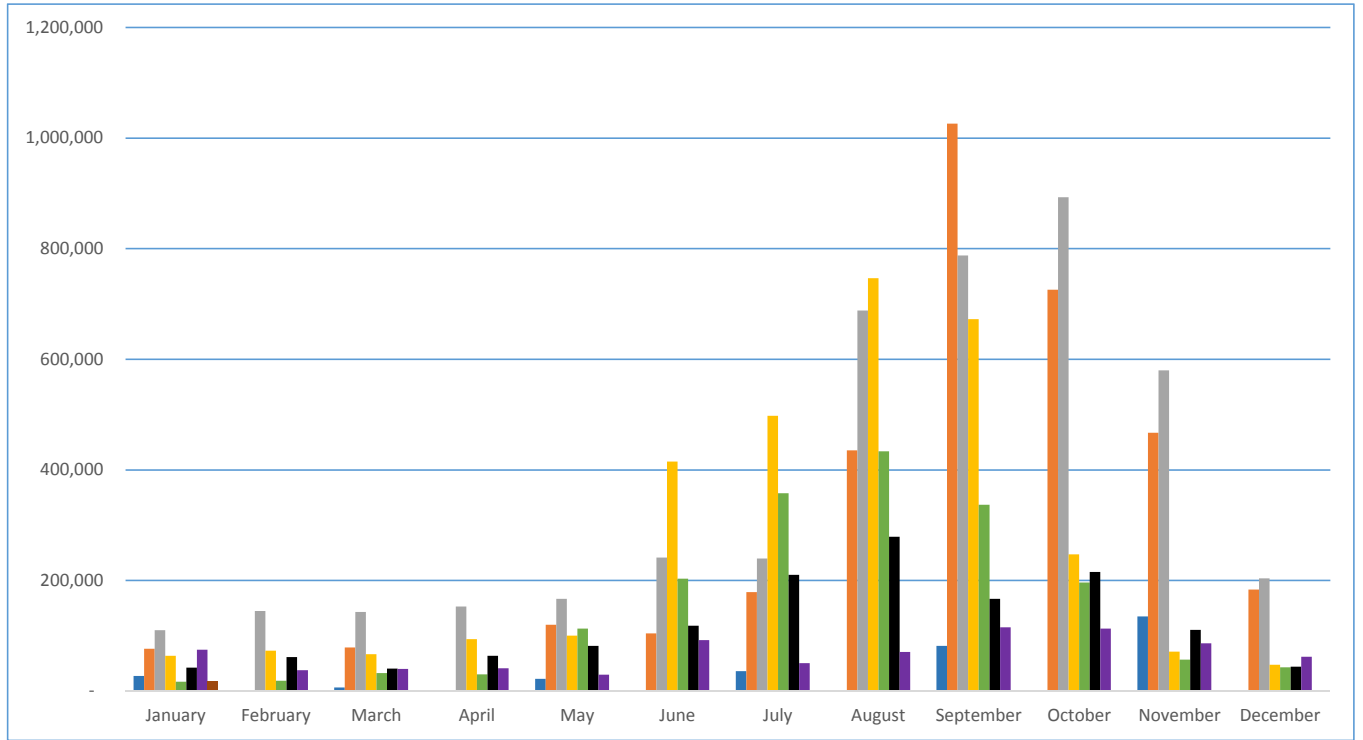
**SAN LORENZO VALLEY WATER DISTRICT**  
**Well Drawdown Report**  
**Pasatiempo 8**

Location: Behind 3650 Graham Hill Rd.  
Elevation: 775'  
Installed: 11-20-2019  
State Well #: 4410014-041  
Completed Depth: 805'

Pump Set    STATIC    DYNAMIC



SAN LORENZO VALLEY WATER DISTRICT  
BULK WATER SALES  
GALLONS  
January 2020



Month	2013	2014	2015	2016	2017	2018	2019	2020
January	26,928	76,296	109,965	63,850	16,456	41,888	74,800	17,952
February			144,364	72,556	18,700	61,366	37,400	
March	5,984	78,540	142,868	66,572	32,164	40,392	39,644	
April			152,592	93,500	29,920	63,580	41,140	
May	21,692	119,680	166,804	100,232	112,948	81,532	29,172	
June		103,972	240,983	415,140	203,179	118,184	92,004	
July	35,904	178,772	239,360	497,420	357,544	210,188	50,116	
August		435,336	688,160	746,504	433,092	279,004	70,312	
September	81,352	1,026,256	787,644	672,183	336,570	166,804	115,192	
October		725,560	893,112	246,840	195,976	215,424	112,948	
November	134,640	466,752	579,700	71,060	56,848	110,704	86,020	
December		183,260	203,456	47,124	42,636	44,132	62,084	
Totals	306,500	3,394,424	4,349,008	3,092,981	1,836,033	1,433,198	810,832	17,952



SAN LORENZO VALLEY WATER DISTRICT  
MONTHLY LEAK REPORT  
January 2020

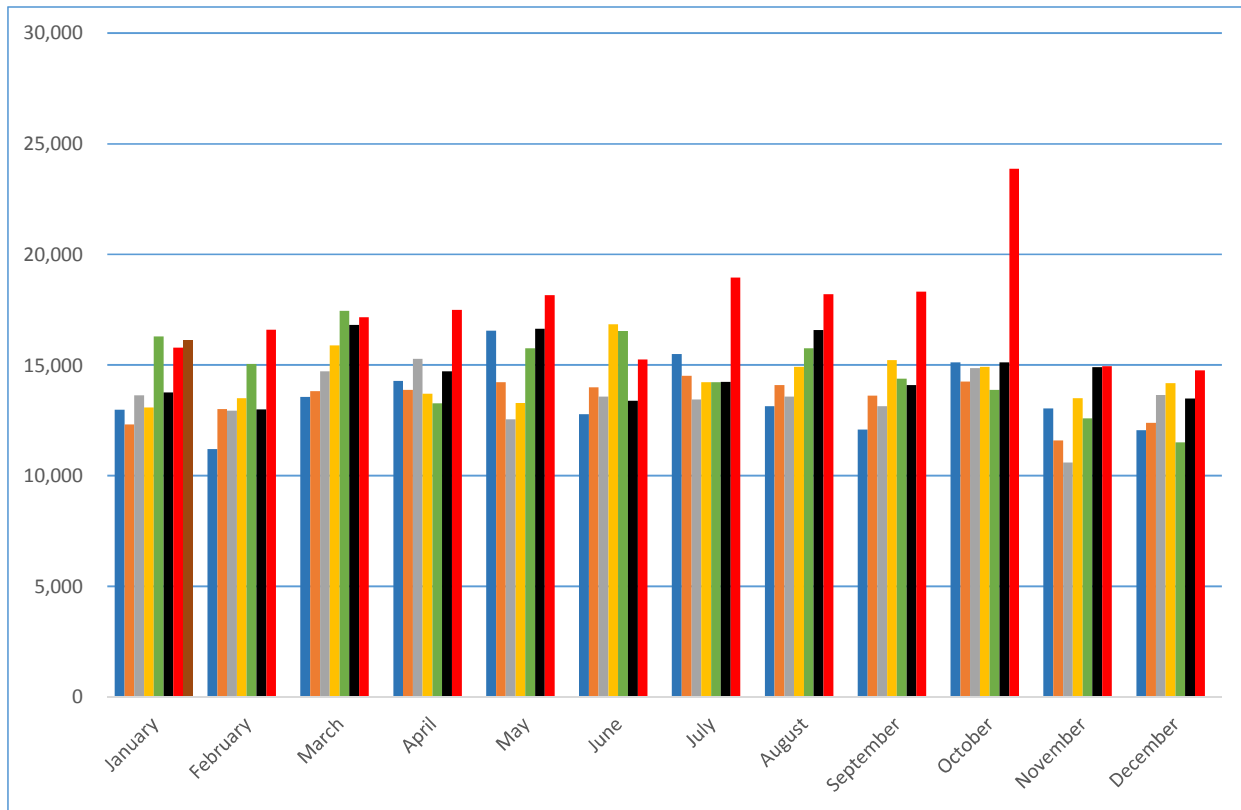
Leak Type	Location - NORTH SYSTEM	Town	Gallons Lost
400 MAIN LEAKING	250 MCPHERSON	BEN LOMOND	8,640
400 MAIN LEAKING	120 SWEET PEA LANE	BEN LOMOND	720
400 MAIN LEAKING	222 MAIN ST BEN LOMOND	BEN LOMOND	1,800
400 MAIN LEAKING	SYLVAN WAY	BOULDER CREEK	1,800
400 MAIN LEAKING	440 ORMAN	BOULDER CREEK	4,320
400 MAIN LEAKING	HARMON ST	BOULDER CREEK	1200
400 MAIN LEAKING	14940 BEAR CREEK RD	BOULDER CREEK	2,160
400 MAIN LEAKING	12734 Irwin way	BOULDER CREEK	12,960
400 MAIN LEAKING	184 Lorenzo Lane	BOULDER CREEK	28,800
401 MAIN RELOCATION	15177 BEAR CREEK RD	BOULDER CREEK	45,000
400 MAIN LEAKING	126 MOONRIDGE DRIVE	BROOKDALE	21,600
400 MAIN LEAKING	11585 & NEW HOME CONSTRUCTION ALTA VIA	BROOKDALE	194,400
Total North			323,400
FELTON SYSTEM			
400 MAIN LEAKING	819 Hillcrest dr	FELTON	21600
420 HYDRANT LEAK/REPAIRS	7940 E Zayante Rd (Zayante Creek Equestrian Center)	FELTON	2,160
Total Felton			23,760
LOMPICO			
Total Lompico			-
SCOTTS VALLEY			
400 MAIN LEAKING	117 BLUEBERRY DR.	SCOTTS VALLEY	14400
400 MAIN LEAKING	309 SPREADING OAK	SCOTTS VALLEY	60,480
Total Scotts Valley			74,880
Total All Systems			422,040

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# SAN LORENZO VALLEY WATER DISTRICT

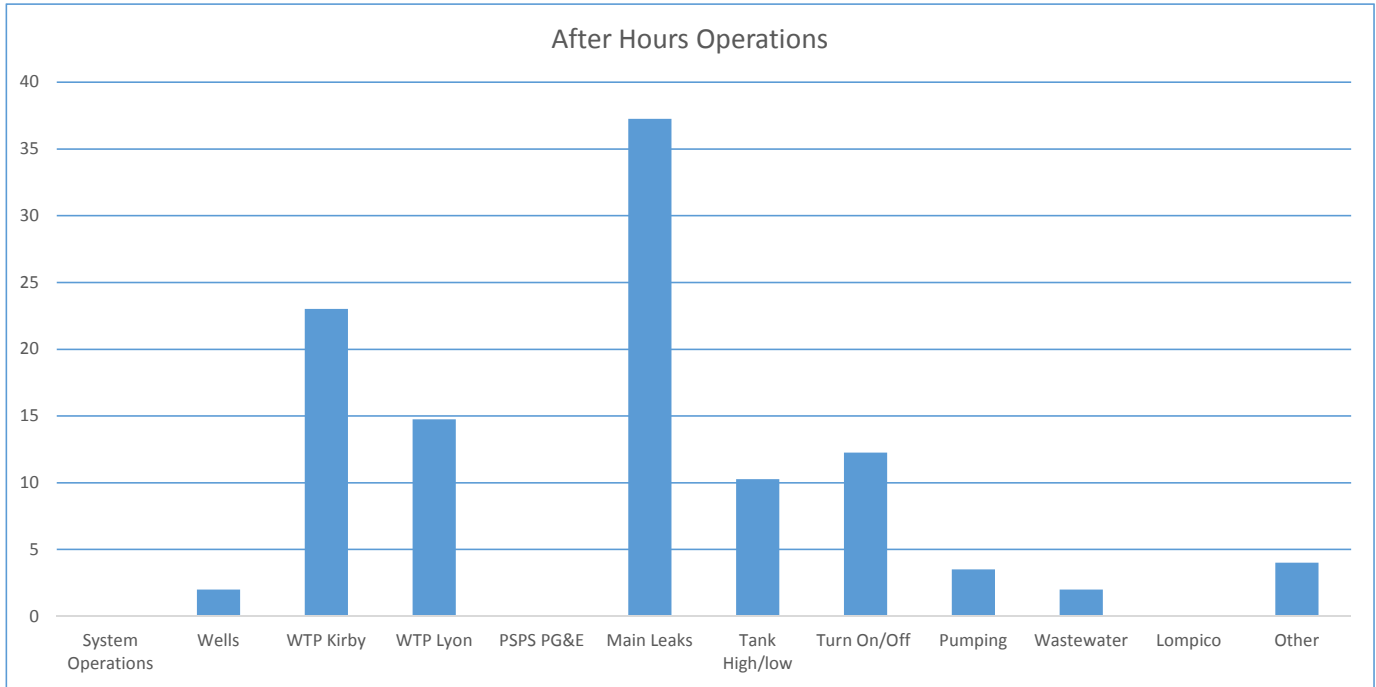
## VEHICLE MILEAGE

### January 2020



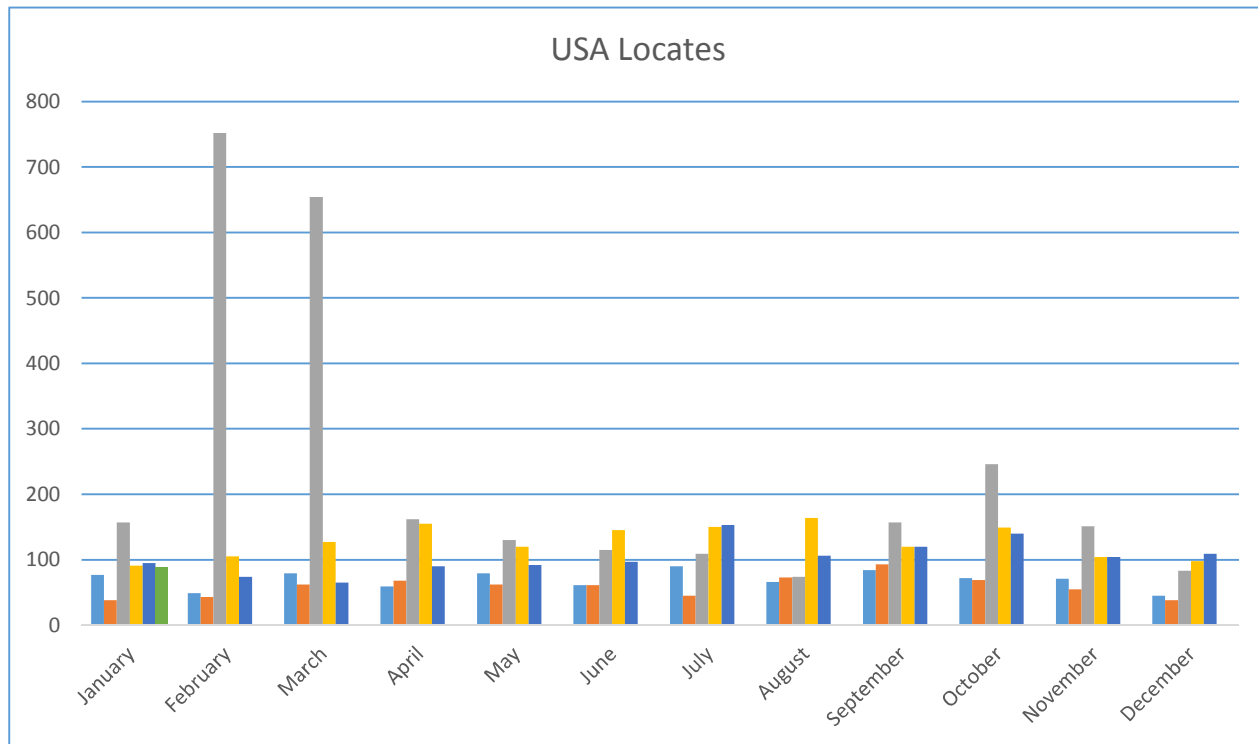
<u>Month</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	<u>2017</u>	<u>2018</u>	<u>2019</u>	<u>2020</u>
January	12,976	12,317	13,633	13,082	16,286	13,763	15,790	16088
February	11,201	13,015	12,934	13,505	15,045	13,003	16,599	
March	13,558	13,817	14,714	15,882	17,451	16,809	17,167	
April	14,283	13,883	15,279	13,704	13,270	14,711	17,488	
May	16,560	14,228	12,550	13,290	15,757	16,646	18,156	
June	12,780	14,000	13,582	16,841	16,534	13,390	15,249	
July	15,497	14,519	13,441	14,228	14,229	14,242	18,955	
August	13,136	14,096	13,569	14,923	15,761	16,576	18,194	
September	12,087	13,622	13,137	15,229	14,388	14,094	18,321	
October	15,120	14,261	14,868	14,924	13,880	15,126	23,864	
November	13,046	11,594	10,591	13,510	12,598	14,908	14,942	
December	12,060	12,394	13,648	14,187	11,512	13,492	14,763	
Totals	162,304	161,746	161,946	173,305	176,711	176,760	209,488	16,088

**SAN LORENZO VALLEY WATER DISTRICT**  
**OPERATIONS DEPARTMENT**  
 January 2020



Description	Hours		2015	2016	2017	2018	2019	2020
System Operations	0	January	N/A	145.00	280.75	90.50	96.50	109.00
Wells	2	February	N/A	86.50	192.25	72.00	180.00	
WTP Kirby	23	March	N/A	153.75	105.75	80.25	106.25	
WTP Lyon	14.75	April	82.50	72.00	128.75	156.75	76.25	
PSPS PG&E	0	May					82.50	
Main Leaks	37.25	June	172.50	83.25	112.75	89.00	136.75	
Tank High/low	10.25	July	124.25	80.25	162.00	145.25	158.30	
Turn On/Off	12.25	August	111.75	81.25	141.25	134.5	119.75	
Pumping	3.5	September	230.25	175.00	201.25	155.25	133.00	
Wastewater	2	October	128.25	78.50	104.00	111.5	605.75	
Lompico	0	November	114.25	96.25	122.50	197.5	182.00	
Other	4	December	186.25	130.75	134.00	220.25	195.50	
Total	109.00		1150.00	1182.50	1685.25	1452.75	2072.55	

**SAN LORENZO VALLEY WATER DISTRICT**  
**OPERATIONS DEPARTMENT**  
 January 2020



Month	2015	2016	2017	2018	2019	2020
January	77	38	157	91	95	89
February	49	43	752	105	74	
March	79	62	654	127	65	
April	59	68	162	155	90	
May	79	62	130	120	92	
June	61	61	115	145	97	
July	90	45	109	150	153	
August	66	73	74	164	106	
September	84	93	157	120	120	
October	72	69	246	149	140	
November	71	55	151	104	104	
December	45	38	83	98	109	
Total to Date	832	707	2,790	1528	1245	89

