

Water Supply Update

Board of Directors

March 23, 2021

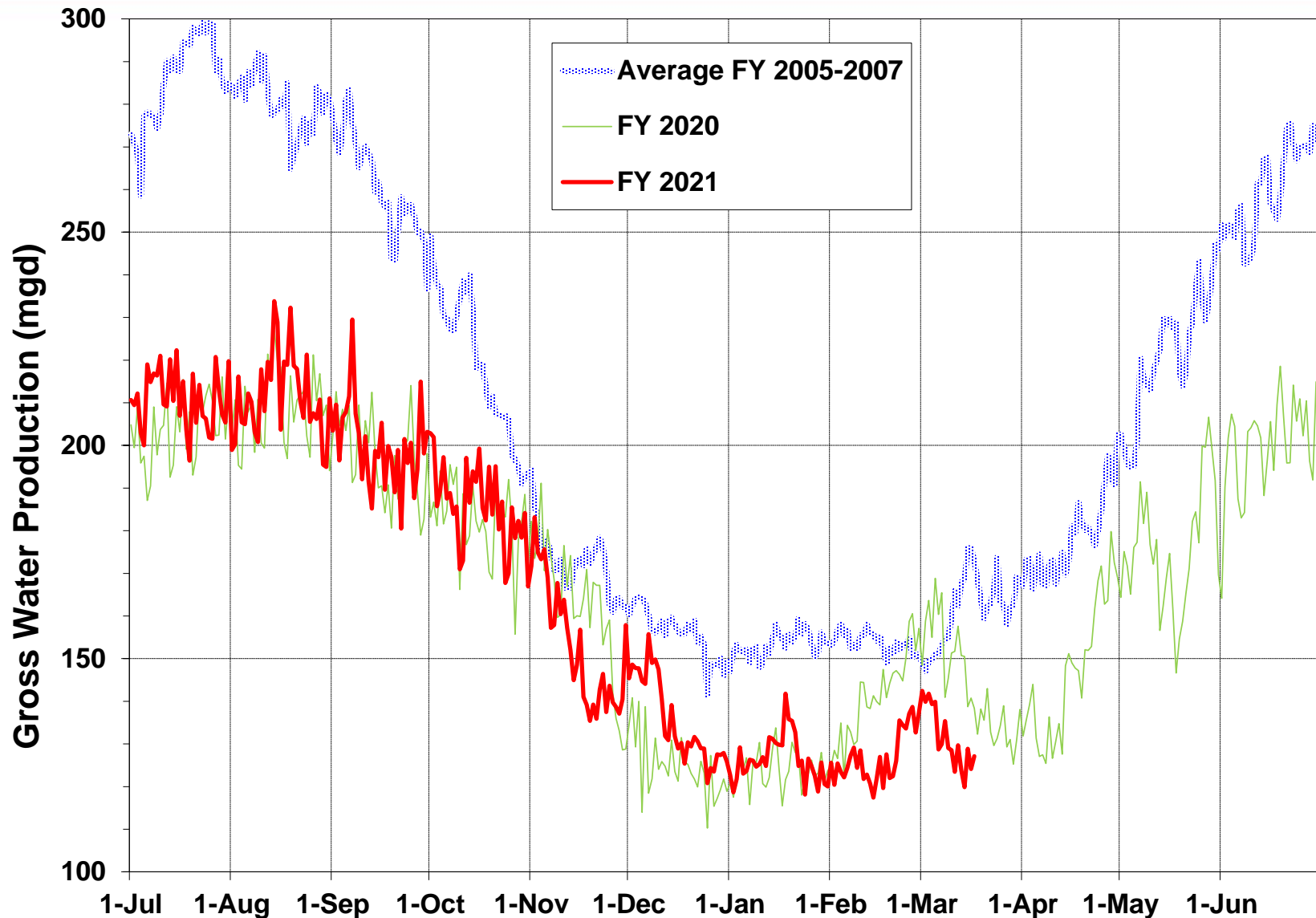
Presentation Outline

- Current Water Supply
- California Water Supply
- Water Supply Projections



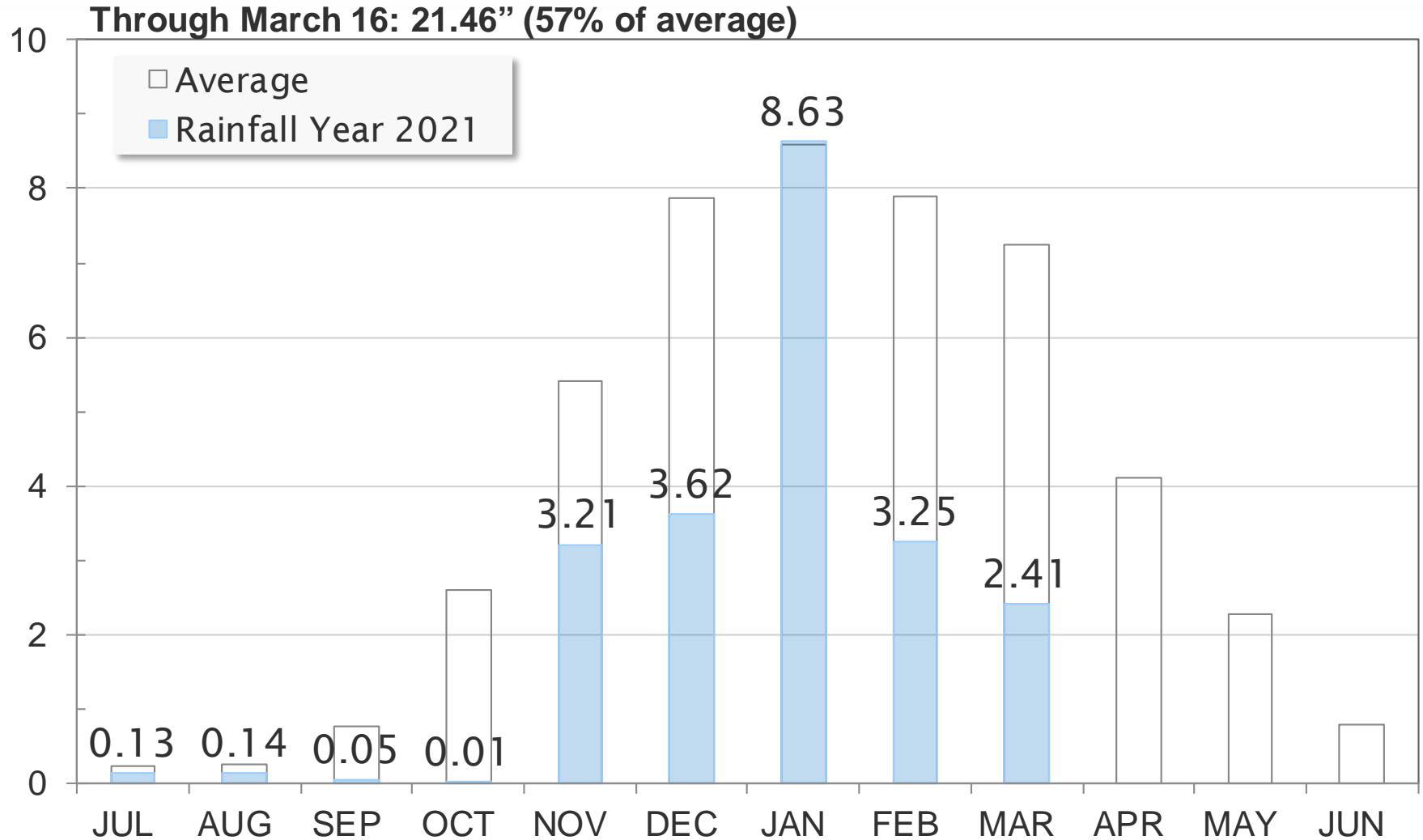
Current Water Supply

Gross Water Production



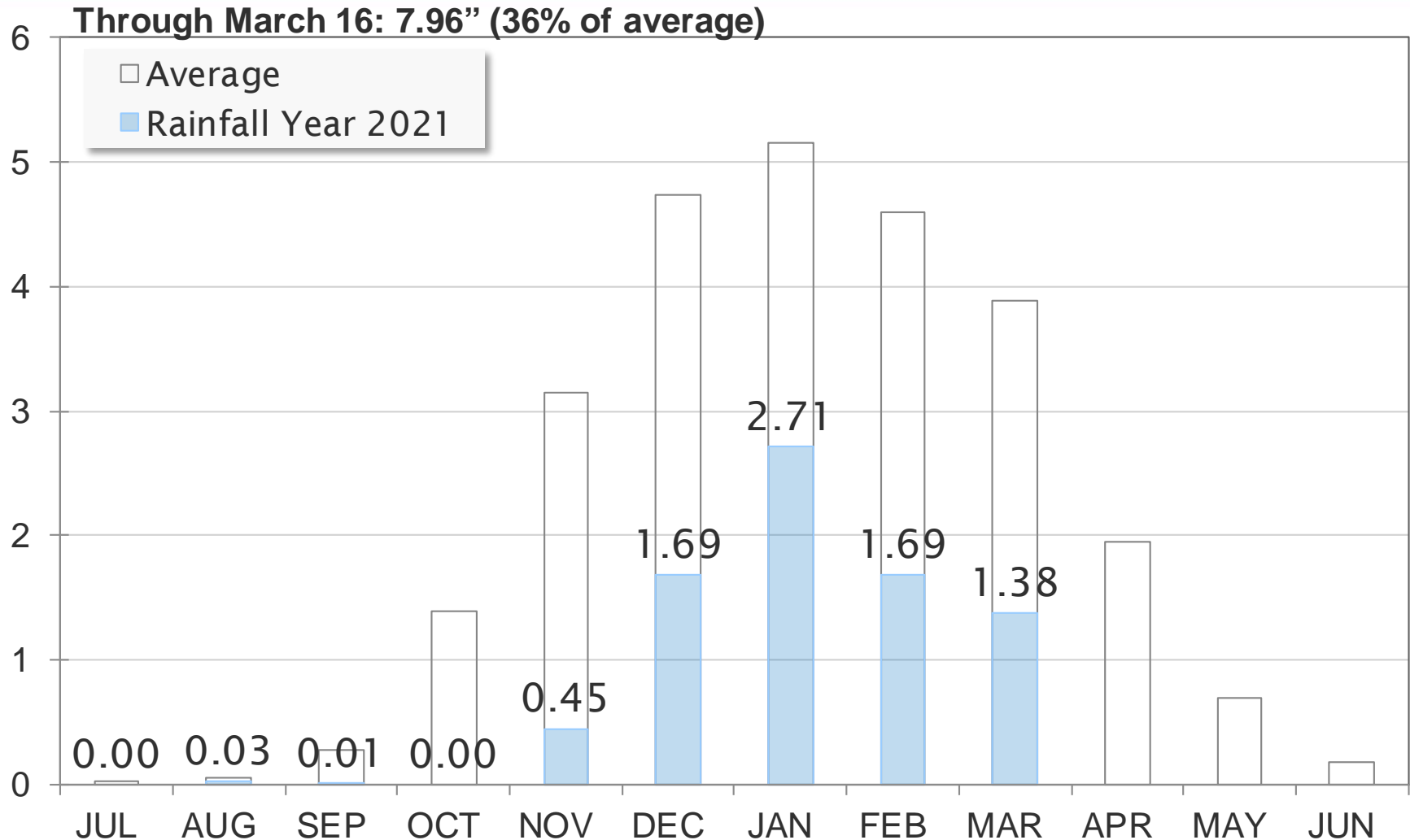
Current Water Supply

Mokelumne Precipitation



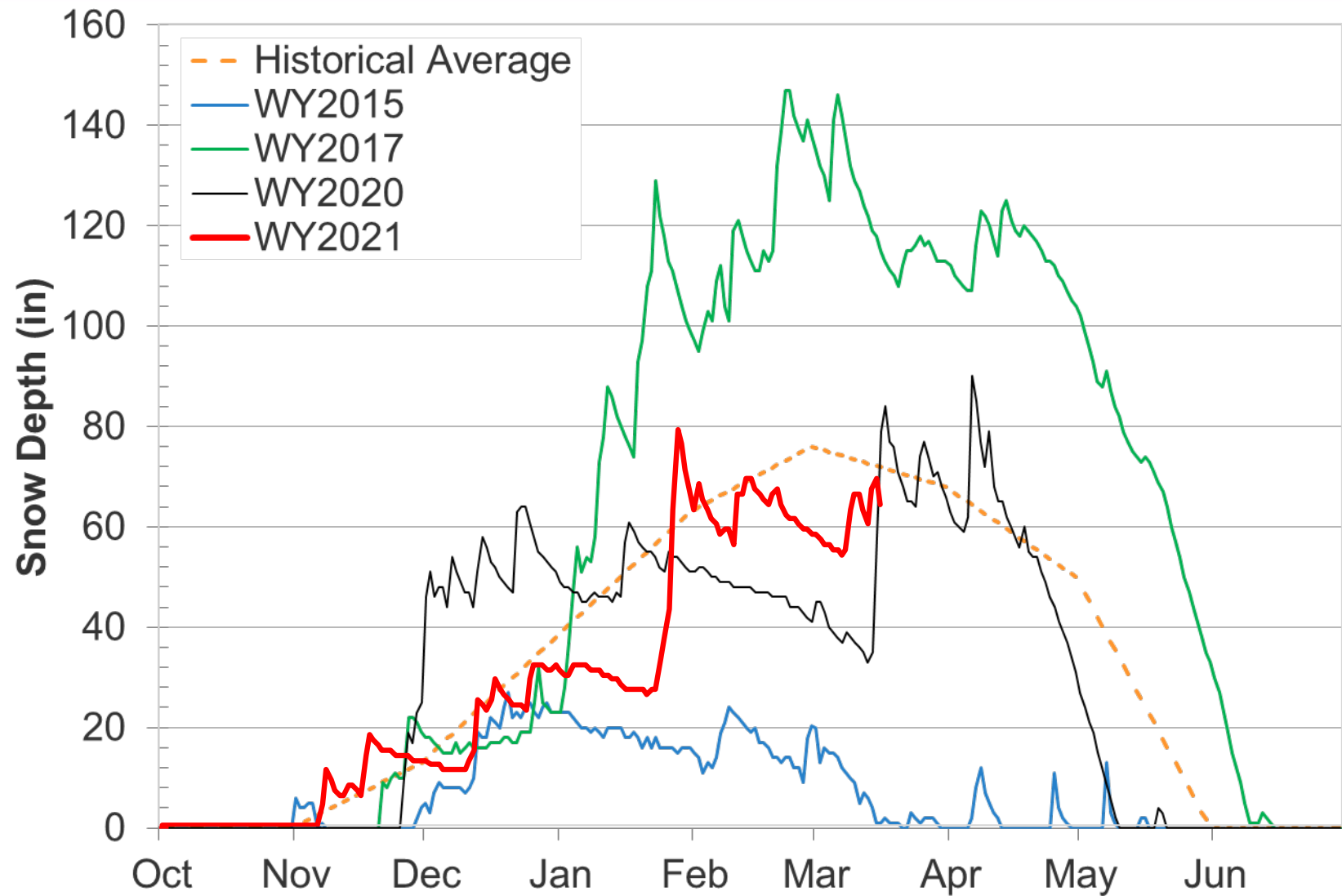
Current Water Supply

East Bay Precipitation



Current Water Supply

Caples Lake Snow Depth



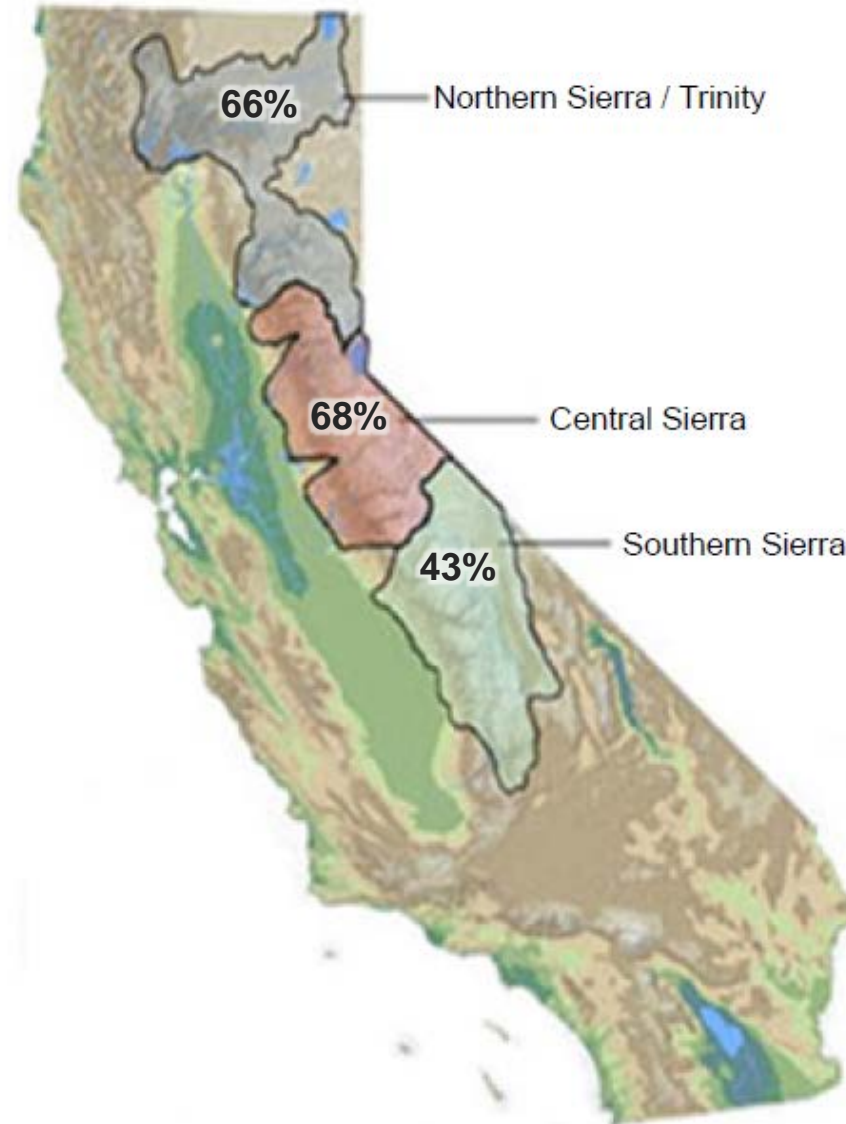
Water Supply Projections

Automated Sensor Snow Water Equivalents



Data for: 16-March-2021

% Normal for this Date



Statewide Average: 61%

Current Water Supply

Reservoir Storage



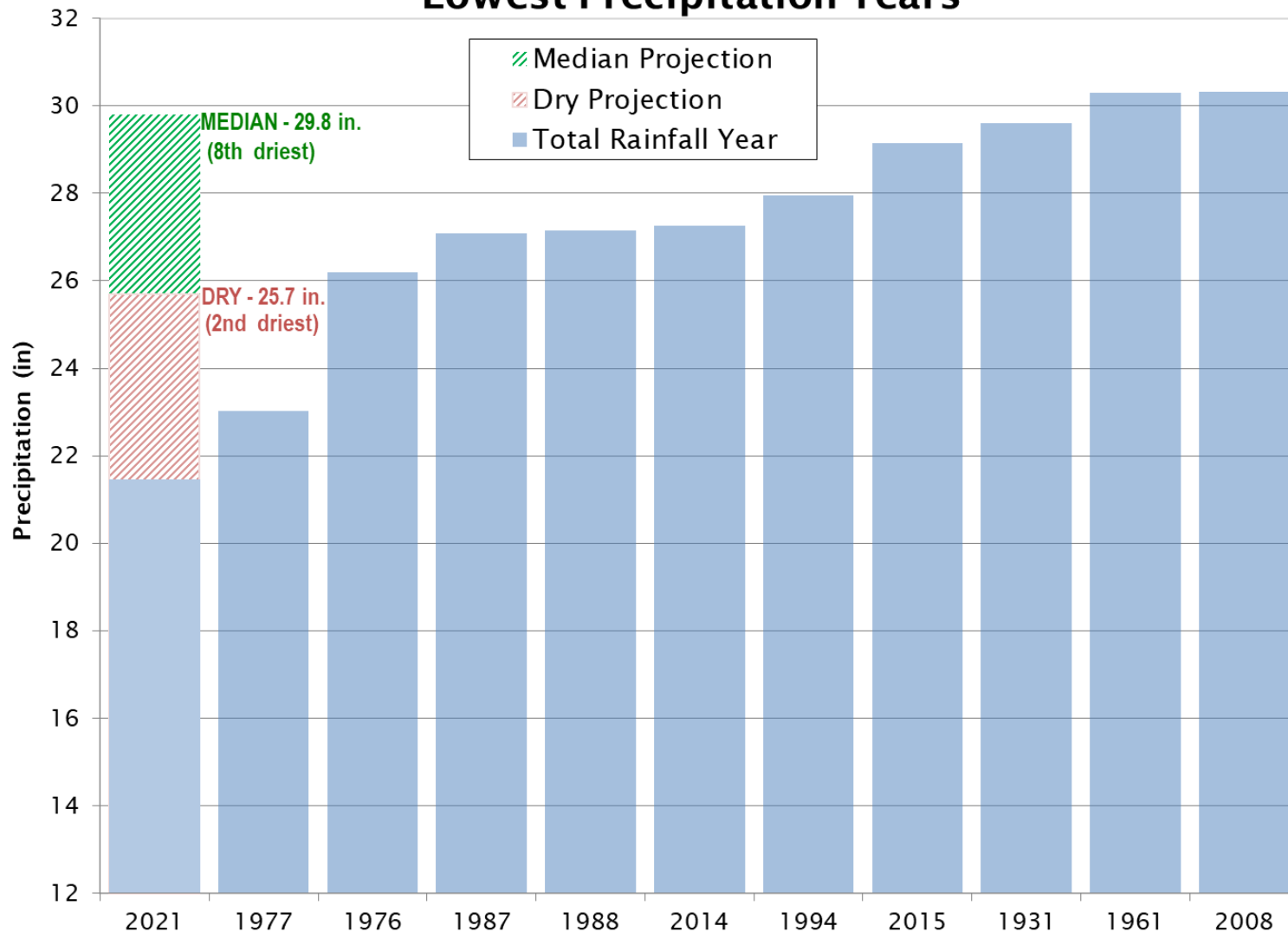
As of 3/16/2021	Current Storage	Percent of Average	Percent of Capacity
Pardee	189,950 AF	103%	93%
Camanche	245,560 AF	86%	59%
East Bay	116,050 AF	85%	77%
Total System	551,560 AF	91%	72%

Water Supply Projections

Dry Year Precipitation Comparison



Lowest Precipitation Years

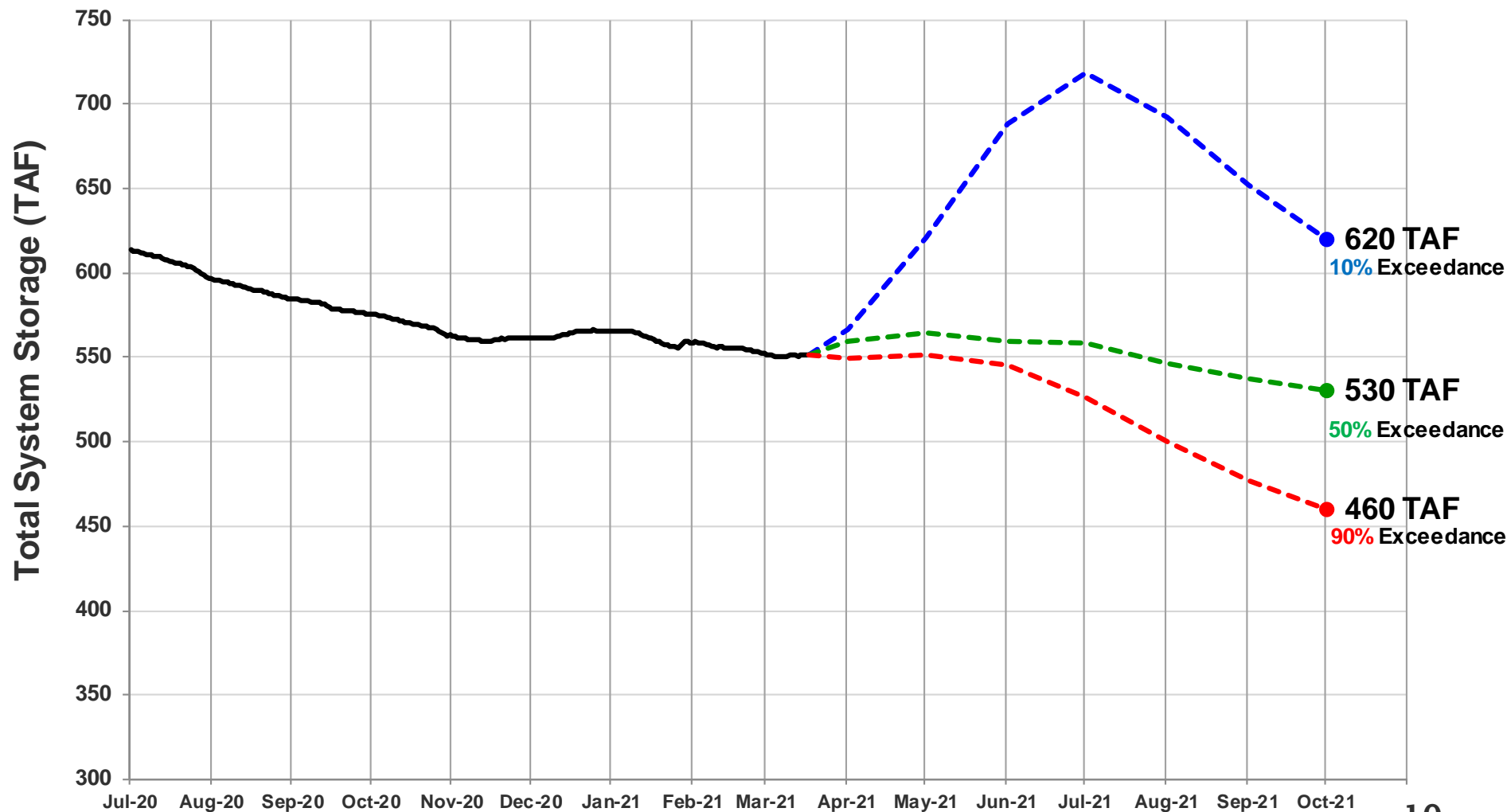


Water Supply Projections

Projected 2021 EBMUD Total System Storage

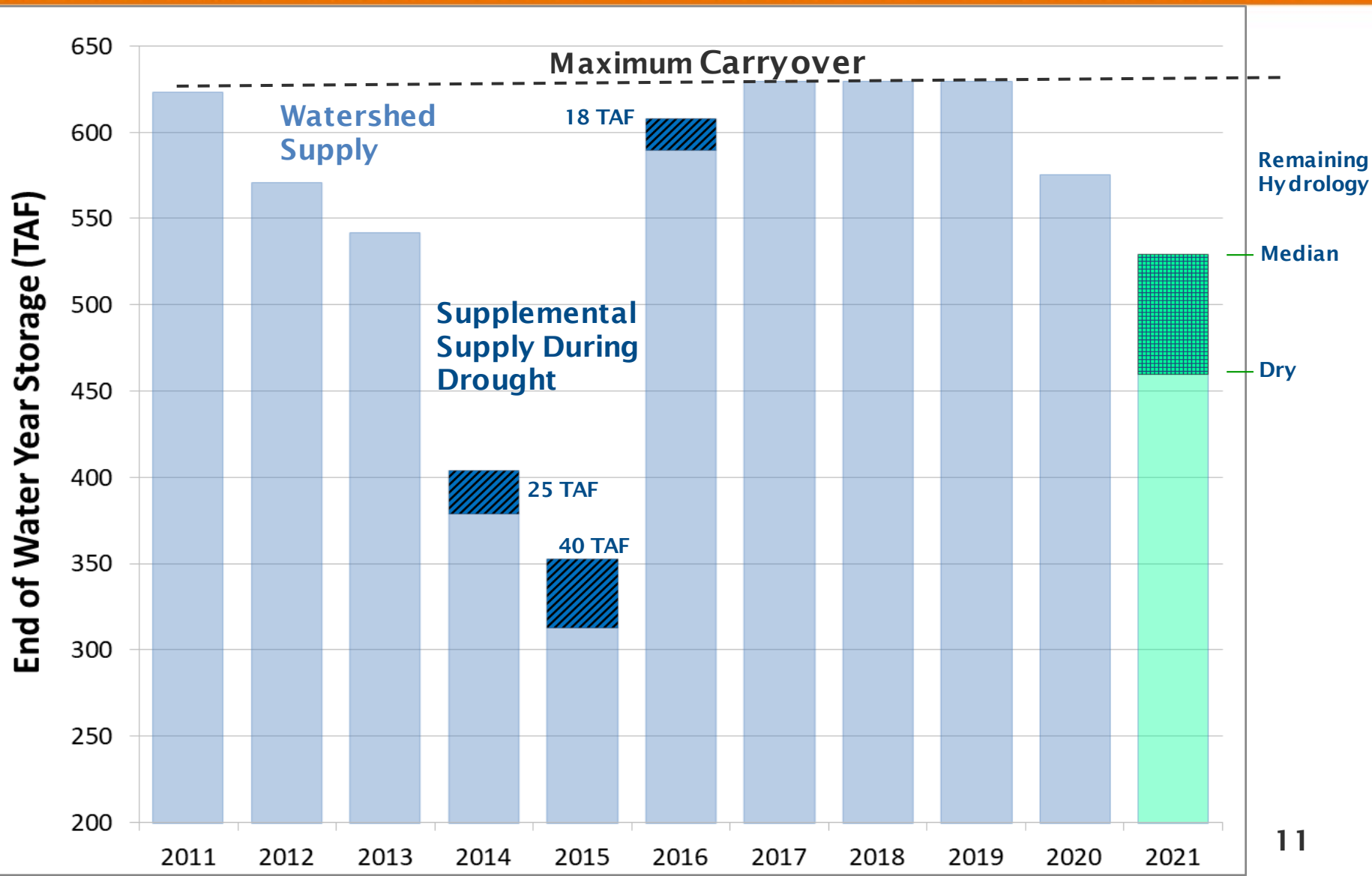


Total System Storage WY2021



Water Supply Projections

Carryover Storage



2014-2015: What did we learn?



- In second drought year, CVP allocations were much lower and transfer costs much higher.
- District should consider taking more CVP supplies earlier in the drought when available

Contract year (Mar-Feb)	2014	2015
CVP allocation	66 TAF (50%)	33 TAF (25%)
CVP water cost	\$75 per AF	\$75 per AF
PCWA transfer cost	\$75 per AF	\$500 per AF
Transfer market cost	N/A	\$700 per AF
Freeport diversions (CVP and transfers)	23 TAF	58 TAF

All values are approximate.

2021 Supply Considerations



- CVP M&I allocation 55% (73 TAF)
- Placer County Water Agency (PCWA) transfer may be available at higher price than CVP, approx. 10 TAF
- EBMUD's Freeport capacity is approximately 8.5 TAF per month
- District could divert 73 TAF from June through February
- No prediction on 2022 water availability

Water Supply Plan if Dry Conditions Continue



Demand Reduction

- Voluntary rationing up to 10 or 15 per cent

And

Supplemental Supply Options (using Freeport):

- Purchase CVP water up to 73 TAF
- Purchase water from Placer County Water Agency approx. 10 TAF

Next Steps



- Early April – Results of April 1 DWR snow survey
- April 13 Board meeting – Water supply update, supply alternatives and costs
- April 27 Board meeting – Water Supply Availability and Deficiency Report, consideration of demand reduction and supplemental supply actions



Questions ?



WATER SUPPLY ENGINEERING DAILY REPORT

Sunday, March 21, 2021

RESERVOIR STORAGE AND ELEVATION

	<u>WATER SURFACE</u>		<u>STORAGE</u>		<u>MAXIMUM CAPACITY</u>		Release	Spill
	Elevation	+Gain		+Gain	Elevation	Storage		
<u>MOKELUMNE</u>	Feet	-Loss	Ac-Ft	-Loss	Feet	Ac-Ft	Cfs	Cfs
Pardee	561.7	0.14	190800	300	567.65	203795	92	0
Camanche	209.53	-0.04	244520	-230	235.5	417120	236	0
<u>EAST BAY</u>								
Briones	565.65	0.15	51800	100	576.14	58960	0	0
Chabot	220.39	0	8160	0	227.25	10350	0	0
Lafayette	434.99	-0.01	2620	0	449.16	4250	0	0
San Pablo	302.74	-0.03	29370	-20	313.68	37915	0	0
Upper San Leandro	438.76	0.08	25030	40	459.98	38905	0	0
Total East Bay Res.			116980	120		150380		
TOTAL SYSTEM STORAGE			552300	190		771295		

<u>DISTRIBUTION SYSTEM</u>			<u>MOKELUMNE SYSTEM</u>		
<u>DISTRIBUTION RESERVOIRS</u>			<u>AQUEDUCT DELIVERIES</u>		
	Storage	Operating		<u>MG</u>	<u>Flow Conditions</u>
	<u>MG</u>	<u>Capacity</u>	Line 1	37.1	GRAVITY
Today	368	720	Line 2	48.9	GRAVITY
Total Previous Day	374		Line 3	92.8	THROTTLE
Total Change	-6		TOTAL	178.8	277 Cfs
<u>WATER PRODUCTION</u>	Million	Capacity	<u>FSCC to MOK AQUEDUCTS (Measured at Brandt), MG</u>		
<u>AND DEMAND</u>	<u>Gallons</u>	<u>MGD</u>	Mok 1	0	
Lafayette WTP	6.8	25	Mok 2	0	
Orinda WTP	62	190		0 MG	
San Pablo WTP	0	30	<u>RIVER FLOWS AND RELEASES</u>		<u>Cfs</u>
Sobrante WTP	15.5	50	Mokelumne River Natural Flow		778
Upper San Leandro WTP	14.9	45	Pardee Reservoir Inflow		527
Walnut Creek WTP	24.1	90	Pardee Release to Camanche Res.		92
<u>TOTAL SURFACE PRODUCTION</u>	123.3	430	Pardee Release to JVID		0
Miscellaneous(Estimated)	0.4		Camanche Release to Mokel. River		236
<u>TOTAL WATER PRODUCTION</u>	123.7		<u>PG&E CO. STORAGE (Acre-feet)</u>		
Change in Distribution System	-6			<u>Storage</u>	<u>Maximum</u>
Wash Water from Distribution Sys.	0.8		Old Reservoirs	7374	26560
<u>SYSTEM DEMAND</u>	128.8		Salt Springs Res.	8098	141857
East-of-Hills Demand	30		Lower Bear Res.	6398	52025
West-of-Hills Demand	98.8		Total	21870	220442

RAW WATER TRANSMISSION			PRECIPITATION (Inches)											
	INPUT	Ac-ft DRAFT		THIS YEAR			AVERAGE YEAR							
Briones Res.	102	0	STATION	Today	This Month	Season to-Date	Season to-Date	Season Total						
San Pablo Res.	29	47												
U. San Leandro Res.	133	48												
TOTAL	264	95												
REMARKS									USL WTP	0	1.88	9.42	21.29	25.33
WID Canal Diversion = 47 cfs									Orinda WTP	0	2.53	11.79	26.98	32.06
Mokelumne River below WID = 111 cfs									Lafayette Reservoir	0	1.58	7.19	23.88	28.18
									Walnut Creek WTP	0	1.94	8.32	19.79	23.02
			Camp Pardee	0	2.13	11.86	17.34	21.56						
			Salt Springs P.H.	0	3.58	21.48	36.24	45.51						
			CAPLES LAKE (7,830 FT) DATA											
PG&E data as of 4:00 pm previous date.				Today		Average								
All other data as of midnight.			Snow Depth	66 Inches		71 Inches								
WTP capacities are sustainable rates.			Water Content	23.1 Inches		27.7 Inches								

EAST BAY MUNICIPAL UTILITY DISTRICT

Coronavirus Update

Board of Directors

March 23, 2021

State Regulations and Guidance

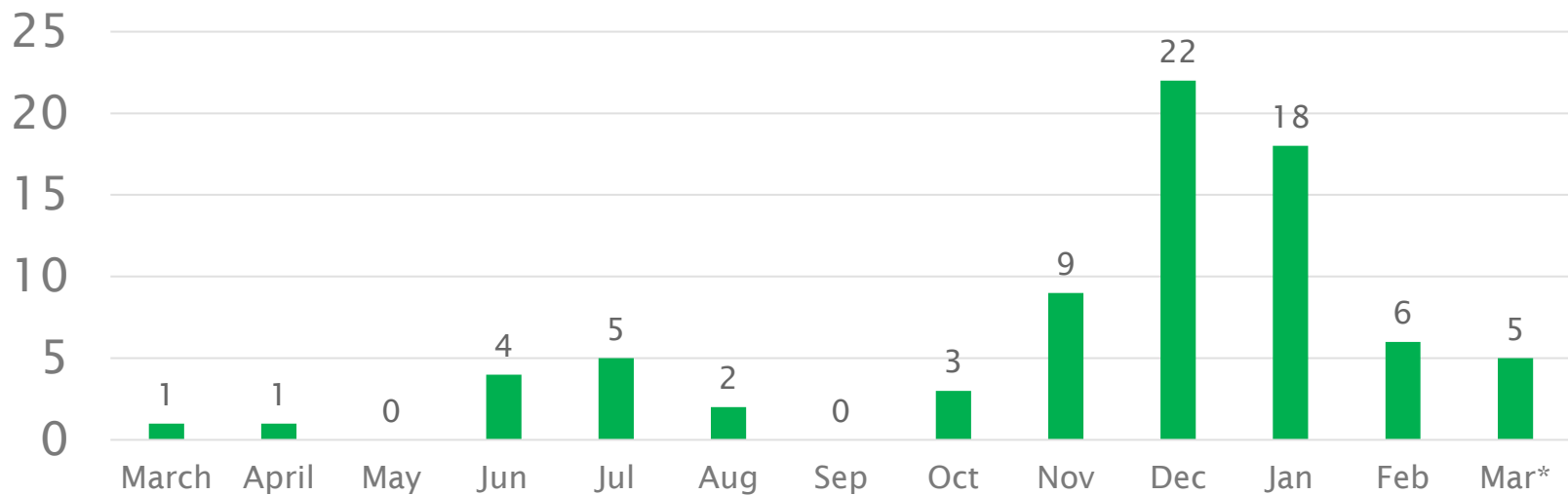


- District counties in Red Tier, Alameda County may reach Orange Tier next week.
- Most pandemic-related health metrics continue to improve, albeit at slower rates.
- No significant impact expected on District operations.

Employee Impacts from COVID-19



- 76 employee and 12 contractor positives to date
 - All employees have returned to work except for two most recent cases.
 - 8 employees quarantining



* through March 19

Vaccination Update



- Utility and disaster service workers added to Phase 1B on March 11
- Employees notified of eligibility on March 12
- 14 million doses administered to date
 - ~2 million/week, increasing
 - Vaccination rates limited by supply
- District will promote and support employee vaccination

Safe Return to Workplace Plan



- Does not change existing safety protocols
 - However, vaccinations will affect future safety protocols
- Allows building occupancy to incrementally increase, including public access
- Transitions telecommuting to long-term plan
 - Employees able to telecommute through June 18
- Includes plan for Board of Directors

Face Covering Compliance at Recreation Sites



Lafayette, San Pablo, Camanche, and Pardee recreation areas audited by staff on the weekend of March 13 and 14.

Per California Department of Public Health, face coverings not required for individuals outdoors and at least 6 feet from other people who aren't in their household, or who are dining.

East Bay Regional Park District recently increased patrols/vigilance at Lafayette Reservoir .

Lafayette Recreation Area:	89%
San Pablo Recreation Area:	95%
Pardee Recreation Area:	95%
Camanche North Shore:	90%
Camanche South Shore:	85%
Camanche Hills Hunting Preserve:	75%
Mokelumne River Day Use Area:	95%

Questions

