## University of California

**Agriculture and Natural Resources** 

Making a Difference for California



UCCE/DWR Weekly Crop Water Use Report

#### WEEKLY SOIL MOISTURE LOSS IN INCHES

(Estimated Crop Evapotranspiration or  $ET_C$ )

09/11/20 through 09/17/20

Crops (Leafout Date)	#	#148 Merce	d	#39 Parlier			#25	8 I
	9/11 - 9/17	Accum'd	9/18 - 9/24	9/11 - 9/17	Accum'd	9/18 - 9/24	9/11 - 9/17	A
	Water	Seasonal	Estimated	Water	Seasonal	Estimated	Water	S
	Use	Water Use	ETc	Use	Water Use	ETc	Use	W
Almonds (3/5) *	0.99	40.33	1.28	0.92	41.34	1.21	0.92	
Pistachio (4/13) * **	1.01	33.45	1.26	0.96	34.53	1.19	0.94	
Citrus (2/1)	0.71	31.40	0.82	0.67	31.64	0.75	0.66	
Raisin Grapes (3/16) (11 ft. row spacing)	0.79	27.40	1.01	0.73	28.19	0.94	0.72	
Winegrapes (3/16) (10 ft. spacing on California Sprawl Trellis) ***	0.87	30.18	1.15	0.83	31.11	1.08	0.83	
Walnuts (4/8)	1.00	33.53	1.23	0.94	34.60	1.19	0.93	
Stone Fruit (3/10)	1.01	33.90	1.36	0.96	34.96	1.29	0.94	
Past 7 days precipitation (inches)		0.00			0.00			
Accumulated precipitation (inches) (1/1/2020)		5.05			4.80			

Dates in parentheses above, indicate leaf out or starting date for ET accumulation for the specific crop

\* Estimates are for orchard floor conditions where vegetation is managed by some combination of strip applications of herbicides, frequent mowing or tillage, and by mid and late season shading and water stres loss can be as much as 25 percent higher in orchards where cover crops are planted and managed more intensively for maximum growth.

\*\* Very vigorous, non-salt affected peak season pistachio Kc can be as high as 1.19 – resulting in about 8% greater water use than shown in these tables.

PAST WEEKLY APPLIED WATER IN INCHES, ADJUSTED FOR EFFICIENCY <sup>1</sup>										
Crops	#148 Mer					#39 Parlier	•			#2
System Efficiency >>	65%	75%	85%	95%	65%	75%	85%	95%	65%	
Almonds (3/5)	1.5	1.3	1.2	1.0	1.4	1.2	1.1	1.0	1.4	
Pistachio (4/13)	1.6	1.3	1.2	1.1	1.5	1.3	1.1	1.0	1.4	
Citrus (2/1)	1.1	0.9	0.8	0.7	1.0	0.9	0.8	0.7	1.0	
Raisin Grapes (3/16) (11 ft. row spacing)***	1.2	1.1	0.9	0.8	1.1	1.0	0.9	0.8	1.1	
Winegrapes (3/16) (10 ft. spacing on California Sprawl Trellis) ***	1.3	1.2	1.0	0.9	1.3	1.1	1.0	0.9	1.3	
Walnuts (4/8)	1.5	1.3	1.2	1.1	1.4	1.3	1.1	1.0	1.4	
Stone Fruit (3/10)	1.6	1.3	1.2	1.1	1.5	1.3	1.1	1.0	1.4	

1 The amount of water required by a specific irrigation system to satisfy evapotranspiration. Typical ranges in irrigation system efficiency are: Drip, 80%-95%; Micro-sprinkler, 80%-90%; Sprinkler, 70%-85%; and Border-furrow, 50%-75%.

	PAST W	EEKLY A	PPLIED W	ATER IN G	<b>FALLON P</b>	ER TREE (	OR VINE					
Crops		#148 Merce	ed			#39 Parlier	•			#258 Lemo	n Cove	
Almonds 115 Trees/A	354	307	283	236	331	283	260	236	331	283	260	236
Pistachio 106 Trees/A	399	324	299	274	374	324	274	249	349	324	274	249
Citrus 110 Trees/A	272	222	197	173	247	222	197	173	247	222	197	173
Raisin Grapes 566 Vines/A	58	53	43	38	53	48	43	38	53	48	38	38
Winegrapes 622 Vines/A	57	52	44	39	57	48	44	39	57	48	44	39
Walnuts 76 Trees/A	536	464	429	393	500	464	393	357	500	429	393	357
Stonefruit 172 Trees/A	253	205	189	174	237	205	174	158	221	205	174	158
For further information concerning all counties receiving this report, contac	t the Fresno	Co. Farm Ad	lvisor's offic	e at (559) 24	41-7526.				•			

Lemon C	OVe	
Accum'd	9/18 - 9/24	
Seasonal	Estimated	
Water Use	ETc	
38.76	1.21	
32.63	1.19	
29.79	0.75	
26.71	0.94	
29.34	1.08	
32.63	1.19	
32.85	1.29	
0.00		
5.61		
ess. Weekly	estimates of	soil moisture
258 Lemo	n Cove	
75%	85%	95%
1.2	1.1	1.0
1.3	1.1	1.0
0.9	0.8	0.7
1.0	0.8	0.8
1.1	1.0	0.9
1.2	1.1	1.0
1.3	1.1	1.0

HEALTHY FOOD SYSTEMS . HEALTHY ENVIRONMENTS . HEALTHY COMMUNITIES . HEALTH

## University of California

**Agriculture and Natural Resources** 

Making a Difference for California

# E

UCCE/DWR Weekly Crop Water Use Report

#### WEEKLY SOIL MOISTURE LOSS IN INCHES (Estimated Crop Evapotranspiration or ET<sub>C</sub>) 09/11/20 through 09/17/20

								-	
Crops (Leafout Date)	#	#124 Panoch	ne	#2 Five Points				#	<b>†15</b>
	9/11-9/17	Accum'd	9/18 - 9/24	9/11-9/17	Accum'd	9/18-9/24		9/11-9/17	А
	Water	Seasonal	Estimated	Water	Seasonal	Estimated		Water	S
	Use	Water Use	ETc	Use	Water Use	ETc		Use	W
Almonds (3/5) *	1.06	43.87	1.31	1.21	44.95	1.44		1.20	4
Pistachio (4/13) * **	1.11	36.74	1.29	1.26	37.24	1.42		1.25	
Citrus (2/1)	0.74	33.63	0.83	0.83	34.75	0.91		0.83	í
Raisin Grapes (3/16) (11 ft. row spacing)	0.82	29.49	1.04	0.95	29.93	1.17		0.94	,
Winegrapes (3/16) (10 ft. spacing on California Sprawl Trellis)	0.95	32.61	1.18	1.07	33.08	1.31		1.06	í
Walnuts (4/8)	1.07	36.79	1.26	1.23	37.53	1.43		1.20	, -
Stone Fruit (3/10)	1.11	37.27	1.39	1.26	37.95	1.52		1.25	
Past 7 days precipitation (inches)		0.00			0.00				
Accumulated precipitation (inches) (1/1/2020)		2.68			4.05				
				-			-	•	

Dates in parentheses above, indicate leaf out or starting date for ET accumulation for the specific crop

\* Estimates are for orchard floor conditions where vegetation is managed by some combination of strip applications of herbicides, frequent mowing or tillage, and by mid and late season shading and water stre loss can be as much as 25 percent higher in orchards where cover crops are planted and managed more intensively for maximum growth.

\*\* Very vigorous, non-salt affected peak season pistachio Kc can be as high as 1.19 – resulting in about 8% greater water use than shown in these tables.

PAST WEEKLY APPLIED WATER IN INCHES, ADJUSTED FOR EFFICIENCY <sup>1</sup>											
Crops	#124 Panoche					#2 Five Poi			#1		
System Efficiency >>	65%	75%	85%	95%	65%	75%	85%	95%	65%		
Almonds (3/5)	1.6	1.4	1.2	1.1	1.9	1.6	1.4	1.3	1.8		
Pistachio (4/13)	1.7	1.5	1.3	1.2	1.9	1.7	1.5	1.3	1.9		
Citrus (2/1)	1.1	1.0	0.9	0.8	1.3	1.1	1.0	0.9	1.3		
Raisin Grapes (3/16) (11 ft. row spacing)	1.3	1.1	1.0	0.9	1.5	1.3	1.1	1.0	1.4		
Winegrapes (3/16) (10 ft. spacing on California Sprawl Trellis)	1.5	1.3	1.1	1.0	1.6	1.4	1.3	1.1	1.6		
Walnuts (4/8)	1.6	1.4	1.3	1.1	1.9	1.6	1.4	1.3	1.8		
Stone Fruit (3/10)	1.7	1.5	1.3	1.2	1.9	1.7	1.5	1.3	1.9		

1 The amount of water required by a specific irrigation system to satisfy evapotranspiration. Typical ranges in irrigation system efficiency are: Drip, 80%-95%; Micro-sprinkler, 80%-90%; Sprinkler, 70%-85%

	PAST V	VEEKLY A	PPLIED W	ATER IN C	GALLON P	ER TREE (	OR VINE			
Crops		#124 Panoche				#2 Five Points				
Almonds 115 Trees/A	378	331	283	260	449	378	331	307	425	
Pistachio 106 Trees/A	424	374	324	299	473	424	374	324	473	
Citrus 110 Trees/A	272	247	222	197	321	272	247	222	321	
Raisin Grapes 566 Vines/A	62	53	48	43	72	62	53	48	67	
Winegrapes 622 Vines/A	65	57	48	44	70	61	57	48	70	
Walnuts 76 Trees/A	572	500	464	393	679	572	500	464	643	
Stonefruit 172 Trees/A	268	237	205	189	300	268	237	205	300	
For further information concerning all counties receiving this report, con	tact the Fresno	Co. Farm Ac	lvisor's offic	e at (559) 2-	41-7526.				÷	

er Use		
5 Stratfor	d	
Accum'd	9/18-9/24	
Seasonal Watar Usa	Estimated	
Water Use 45.68	ETc 1.39	
37.85	1.37	
35.10	0.86	
30.49	1.12	
33.57	1.26	
38.10	1.38	
38.56	1.47	
0.00		
3.13		
ess. Weekly	estimates of	soil moisture
#15 Stratfo	rd	
75%	85%	95%
1.6	1.4	1.3
1.7	1.5	1.3
1.1	1.0	0.9
1.3	1.1	1.0
1.4	1.2	1.1
1.6	1.4	1.3
1.7	1.5	1.3
%; and Borde	er-furrow, 50	%-75%.
#15 Stratfo	rd	
378	331	307
424	374	324
272	247	222
62	53	48
61	52	48
572	500	161
		464
268	237	205