



## **PRAIRIE RESEARCH INSTITUTE**

Illinois State Water Survey  
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# OPERATION OF THE IMPERIAL VALLEY WATER AUTHORITY (IVWA) PRECIPITATION NETWORK

Monthly Progress Report for September 2019  
October 11, 2019

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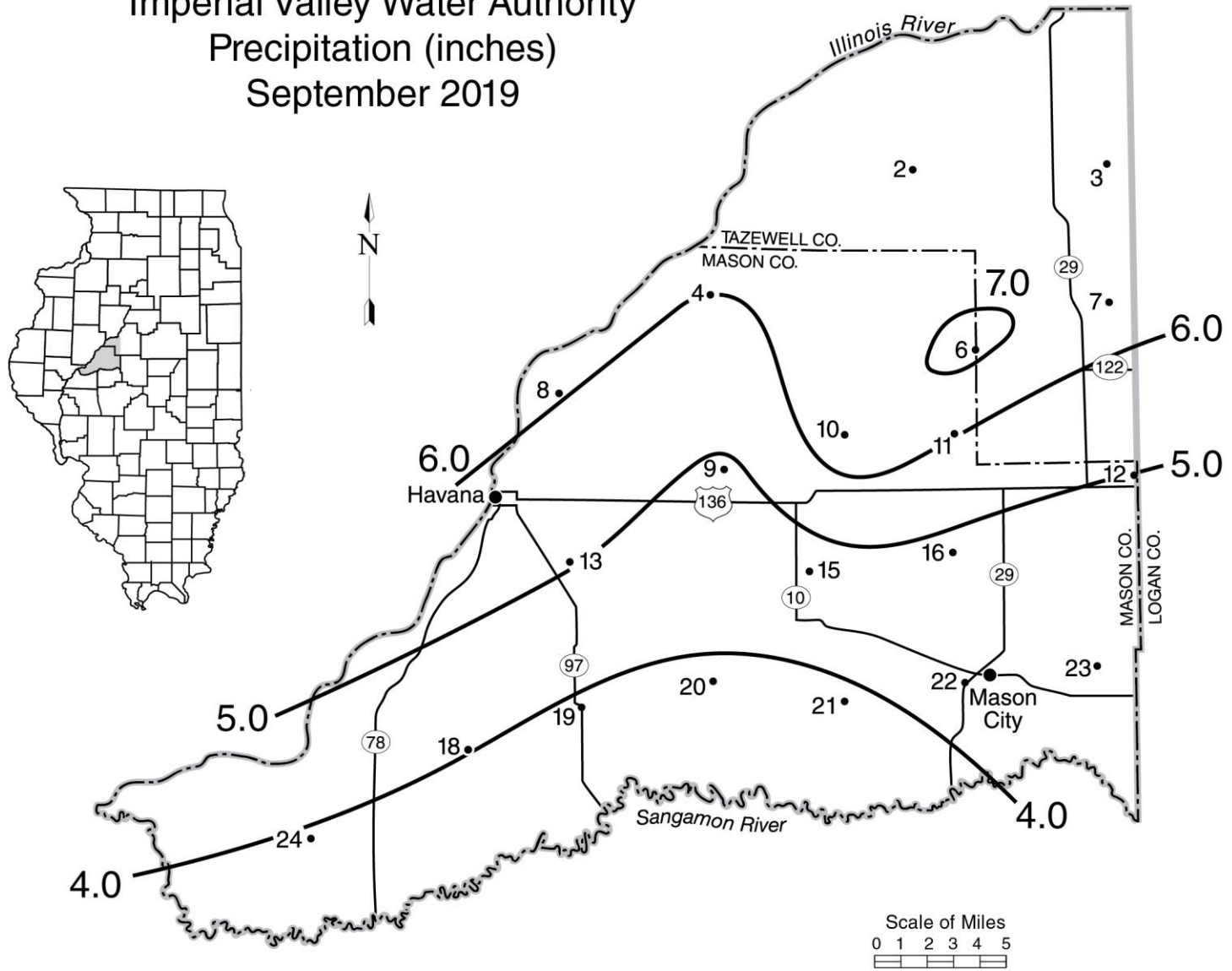
### Raingage Network Operations

On October 1, Hayden Wennerdahl serviced all non-telemetered gages and downloaded the data. All buckets were weighed and emptied. On October 4, Erin obtained the September precipitation data for Sites #9 and #12 from the ISWS server. These data are downloaded via telemetry each hour and stored at ISWS. All gages operated properly during the month.

### Data Analysis

The average network precipitation for September 2019 was 5.15 inches, which is well above the previous 27-year network average. The largest monthly gage total was in the northern third of the network. Monthly gage totals varied 3.56 inches across the network, from 3.62 inches at site #24, southeast of Snicarte, to 7.18 inches at site #6, southeast of Manito. The 1981–2010 30-year average precipitation amounts for September at Havana and Mason City are 3.15 and 3.04 inches, respectively. The September 2019 network average of 5.15 inches is 176 percent of the 27-year (1992–2018) IVWA September network average of 2.93 inches.

# Imperial Valley Water Authority Precipitation (inches) September 2019



**September 2019 Daily and Monthly Precipitation Amounts (inches), Imperial Valley Network**

DAY	G 2	G 3	G 4	G 6	G 7	G 8	G 9	G 10	G 11	G 12	G 13	G 15	G 16	G 18	G 19	G 20	G 21	G 22	G 23	G 24
1	0.43	0.51	0.58	0.24	0.14	1.32	0.31	0.37	0.42	0.26	0.37	0.30	0.50	0.17	0.20	0.14	0.37	0.75	0.38	0.34
2	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
3	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
4	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
5	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
6	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
7	0.04	----	0.06	0.05	0.03	0.01	----	----	0.03	0.07	----	0.04	----	0.07	0.06	----	----	0.01	----	0.04
8	1.03	0.75	0.63	0.85	0.67	0.53	0.47	0.72	0.67	0.60	0.52	0.53	0.66	0.43	0.52	0.50	0.47	0.49	0.56	0.34
9	0.19	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
10	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
11	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
12	----	----	0.01	0.10	----	----	0.05	0.44	0.02	----	0.08	0.02	----	----	----	----	----	----	----	----
13	0.03	0.12	0.08	0.04	----	0.01	0.04	----	0.01	0.02	----	----	0.01	0.03	----	----	----	0.04	----	0.02
14	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
15	0.38	0.39	0.41	0.33	0.35	0.40	0.27	0.36	0.34	0.31	0.36	0.41	0.41	0.42	0.24	0.26	0.30	0.32	0.26	0.16
16	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
17	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
18	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
19	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
20	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
21	0.62	0.49	0.58	0.65	0.52	0.43	0.44	0.40	0.45	0.62	0.54	0.56	0.69	0.48	0.59	0.42	0.61	0.45	0.60	0.37
22	0.14	0.06	0.14	0.23	0.23	0.11	0.09	0.11	0.17	0.60	0.44	0.45	0.38	0.27	0.30	0.20	0.06	0.07	0.05	0.14
23	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
24	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
25	0.07	0.04	0.01	0.19	0.17	0.27	0.08	0.04	----	----	----	0.01	----	----	0.15	0.02	0.03	0.02	----	----
26	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
27	1.21	1.32	0.79	1.05	1.12	1.01	0.72	0.89	0.92	0.42	0.70	0.58	0.45	0.53	0.60	0.68	0.54	0.81	0.56	0.74
28	0.61	0.67	0.92	1.35	1.08	1.32	1.68	1.43	1.21	0.92	1.56	0.77	0.83	0.80	0.73	0.84	0.76	0.84	0.92	0.77
29	1.52	2.03	1.79	2.10	2.06	0.66	0.75	1.75	1.73	1.17	0.45	1.05	0.85	0.87	0.50	0.71	0.65	0.82	0.85	0.70
30	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----	----
Monthly	6.27	6.38	6.00	7.18	6.37	6.07	4.90	6.51	5.97	4.99	5.02	4.72	4.78	4.07	3.89	3.77	3.79	4.62	4.18	3.62
Network Average =	5.15		Imperial Valley Network																	