

# **CITY OF ST. JOSEPH WATER FILTRATION PLANT**

## **OPERATIONAL REPORT**

**MARCH 2022**



### **Mission Statement**

**WSJOB- The City and Authority working together to provide safe drinking water of the highest quality to all of our customers at the lowest possible price.**

## **WATER PLANT/DISTRIBUTION REPORT- MARCH 2022**

Water demand in March was down by 9,845,829 gallons representing a 10.7% decrease from 2021. This year 82,154,723 gallons were delivered which compares to 92,000,552 gallons in 2021. The March 2022 pumpage ranks 30<sup>th</sup> in the thirty-year tabulation dating back to 1993.

### **GENERAL ACTIVITIES**

#### *Corrosion Control Study*

Staff issued a request for proposal for a corrosion control study. The due date is May 12<sup>th</sup>. Staff is seeking a consultant to assist in the development of a pipe loop study, conduct a table top study and analyze lead and cast iron pipe samples.

#### *Cross Connection Control Ordinance*

The City Commission approved amendments to the cross connection control ordinance in March. The changes were made based on recommendations received from Fleis & Vandenbrink. The draft document was reviewed by EGLE and city legal counsel. This action is part of the City's effort to expand cross connection control to residential customers. The City has maintained a commercial cross connection control inspection program since 1972.

#### *Lead Service Line Replacement-Ongoing*

Staff continues to meet weekly with the lead service line replacement team to discuss lead service line identification, replacement, water sampling and planning.

#### *TTHM Plant Tap Sampling*

Bi-weekly sampling at the WTP tap resumed. Monitoring from this location is not required but is useful in tracking Trihalomethane formation. Staff is seeking to better understand TTHM formation in order to optimize treatment at the plant and inform future capital improvement decisions.

#### *SRF ITA*

Staff continues to meet and assist in the loan application process under the SRF program. The project plan draft document is nearly complete. The SCIP (Strategic Capital Improvement Project) Phase II projects will be funded through this program. The project plan will be presented to the City Commission on May 9<sup>th</sup>.

#### *Travel & Training*

Distribution system staff attended cross connection control training. Greg met with Saginaw Utilities Director Paul Reinsch to work on the Michigan Section AWWA fall conference program and to tour the Saginaw Water Plant.

**ST. JOSEPH WATER FILTRATION PLANT  
1701 LIONS PARK DRIVE  
SAINT JOSEPH, MI. 49085**

**By: Greg Alimenti  
St. Joseph Water Plant  
700 Broad St.  
Saint Joseph, MI. 49085-1276  
(269) 983-1240**

**MARCH 2022**

DISTRIBUTION:	
Total Gallons	82,154,723
Average Day	2,650,152
Maximum Day	2,889,481
Minimum Day	2,315,444

TREATMENT:	
Total Low Service	85,959,935
Wash Water Gals.	502,969
Wash Water %	0.58%
Plant Use Gals.	15,440
Plant Use %	0.02%

FILTRATION:		
Ave. Filter Run	264.8	hours
Ave. Filter Rate	1.47	g/sqft/min
Filter Eff. Index	494.4	
Ave. Loss of Head	0.9	feet
Plant Sewer Usage		

LABORATORY REPORT		
Average of	Raw	Tap
Chlorides mg/L	18.1	21.5
Fluoride mg/L	0.15	0.77
Alkalinity mg/L	121	110
Hardness mg/L	150	147
pH	8.1	7.4
Calcium mg/L	43	41
Magnesium mg/L	10	10
Turbidity NTU	0.79	0.04
Temperature °F	41	
Total Coliform		0.0
Chlorine Residual		
		mg/L Free
Mixing Basin		0.87
Applied		0.79
Tap		1.32
Distribution		1.26

TREATMENT CHEMICAL SUMMARY:					
	Applied mg/L	Total Lbs.	Cost	Inventory lbs.	Days Supply
		CHEMICAL			
Alum (Al <sup>+3</sup> )	21.91	15,717	\$5,126.16	65,137	63
Chlorine (Cl <sub>2</sub> )	2.45	1,762	\$1,315.37	7,201	127
Fluoride (F <sub>2</sub> )	0.62	443	\$775.66	17,795	237

			REMARKS:			
Total Cost all Chemicals		\$7,217.19				
Chemical Cost per Mil. Gallon Treated		\$103.48				
Chemical Cost per Mil. Gallon Delivered		\$7.757				
PLANT UTILITIES SUMMARY						
Electric:						
Total KWH		187,200	***includes measure of melted snow			
Total Power Cost		\$ 13,104.00	visit the City of Saint Joseph's Home page at <a href="http://www.sjcity.com">www.sjcity.com</a>			
Power Cost per Million Gallon Treated		\$ 152.44	e-mail comments to either: <a href="mailto:operator@sjcity.com">operator@sjcity.com</a> or <a href="mailto:galimenti@sjcity.com">galimenti@sjcity.com</a>			
Power Cost per Million Gallon Delivered		\$ 182.39	WEATHER CONDITIONS AT THE PLANT		Air Temp. °F	
Gallons Pumped per KWH		774	SJWW Weather Computer		Avg.	39.2
			Rain Guage, Inches	2.13	Max.	70.7
			days it rained***	12	Min.	17.2
Natural Gas:			Wind Speed, Avg	9.7	Lake Temp. °F	
Metered Cubic Feet			Wind Speed, Max	45	Avg.	41.0
Natural Gas Cost		\$5,222.35	Prevailing Wind Dir.	North	Max	46.8
Emergency Power Diesel Fuel Inv., Gals.	North	1500	Lake Level (USACE)	579.49	Min	36.9
	South	500				

# Monthly Maintenance Notes

March 2022

Normal PM Maint. done Monthly	Check all High Service and Low Service Pumps, BPS pumps, Service BPS Chlorinators, Change out air filters on VFD Drives and Air Handlers. Grounds work at Plant, Booster Stations and Water Towers
03/08/22	Final plumbing and wiring for new TOC Machine
03/10/22	Clarifier # 2 Yearly Maintenance Installed New Thrust Bearings for the wing arms and pivot block, new bushing and bolt for wheel.
3/15 & 3/16/22	Painted Clarifier # 1 perimeter walkway
03/16/22	Installed new sump pump in 5-8 filter galley
03/30/22	Oudbier Instrument - Updated the Tank Level sensors for all Bulk Storage Tanks per the latest release from Siemens.

# DISTRIBUTION REPORT

For the Month of March 2022

Activity	Number/Description
Water Main Breaks	2
MISS DIGS	501
Delinquent Shut Off	0
Hydrants (Repaired/Replaced)	0 2720 Lake Shore Dr (repair).
Valve Turning	0
Valves	0
Taps (1")	6 2815 Washington Ave (SJCT). New tap in preexisting development
	536 Manitou (SJCT), New house on empty lot.
	7125 Holden Rd (LCT) Failed well
	5236 Notre Dame (LCT) New house on empty lot.
	2100 Fairplain Ave (SJCT) Failed well. Fairplain
	2294 Colfax (SJCT) Failed well. Fairplain
Cross Connection Control	
Service Retirement	
Service Replacement (Lead)	325 Bluff Court (SJCTE). Galvanized/copper. May have been prev conn to lead
Service Repair	0
Repair of Curb box/Shut-Off Valves	6 Various; froze up, bent curb box, rod broken, adjust.
Replace Curb box	2 Red Arrow (LCT), Longhorn (LCT) damaged by contractor
Meter pit/service replacement	0
Water Quality complaints	6 Water quality/pressure. 3244 Washington (SJCT) air.
Hydrant flushing to maintain water quality	0
Service line complaints (customer side)	6 leaks, high water use, misreported stormwater, snowbirds, low pressure
Private Service break	0
Staff Education/Training	53.5 OSHA, Cityworks, Cross Connection Control
Overtime-Total	133.3
Turn Off	Defective meter
Turn On	Sensors bad
Finals	Downsize meter
<b>Meter Repair/Replacement</b>	TRT missing
Meter Repair	Audit Meter
Per detail	Verify Read
Meter leaking	Move Mxu Box
Stopped Meter	New Installation
Faulty Register	
Frozen Meter	Replaced/various reasons (e.g.,downsize, defective)
Move Meter Inside	Rockwell Replacement
Hard to read	Mxu Replaced
Replace/Adding Sprinkler Meter	Sprinkler meter removed/line capped
Damage to Meter/TRT/wire damaged	Removals/demo
New Plumbing	Curb box location
New siding	Broken Remote
Lead services	Noisy Meter
	Upgrade 5/8" to 3/4" (upgrade to 1")

## CITY OF ST. JOSEPH WATER MAIN BREAK REPORT- March 2022

Date	Location	Main Size	Gallons Lost	Break Type	Valves Turned	City Twp	Labor	Remarks
3/1/2022	6018 Clearbrook Dr.	6	111,845	Circumfential	2	LCT	43.25	Crack, 6' deep, sand
3/18/2022	2816 Evergreen	6	63,812	Circumfential	1	City	16.25	5' deep, clay. Chronic breaks on main, 20-30 ft pipe installed to date.
TOTALS			175,657				60	

March

2022

SOUTHWEST MICHIGAN REGIONAL SANITARY SEWER & WATER AUTHORITY

WSSN 3726

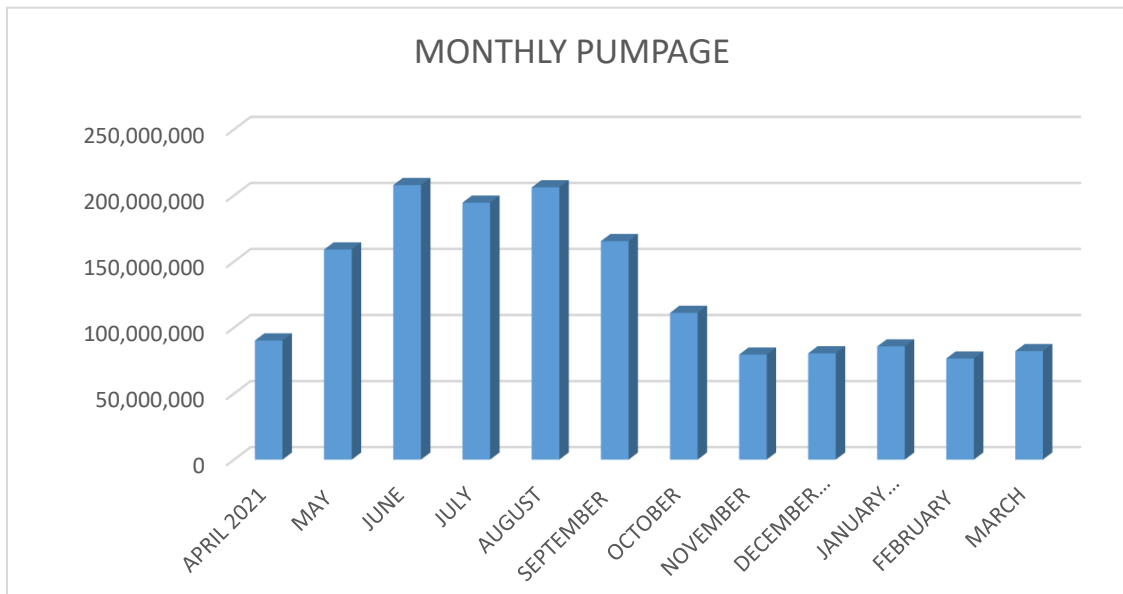
CLEVELAND BOOSTER STATION

HILLTOP BOOSTER STATION

DATE	FLOW MGD	FEED GAL	CHL LBS/DAY	CHLORINE APPLIED mg/l	Cl <sub>2</sub> PRE mg/l	Cl <sub>2</sub> POST mg/l	Cl <sub>2</sub> MON mg/l	FLOW MGD	FEED GAL	CHL LBS/DAY	CHLORINE APPLIED mg/l	Cl <sub>2</sub> PRE mg/l	Cl <sub>2</sub> POST mg/l	Cl <sub>2</sub> MON mg/l	BOOSTER MGD	
1-Mar	1.939	260	36.86	2.28	1.32	1.71	1.30	0.013	0	0.00	0.00	0.91	1.60	1.56	1.952	
2-Mar	1.883	260	36.86	2.35	1.51	1.11	1.30	0.010	0	0.00	0.00	1.63	2.18	1.38	1.893	
3-Mar	0.003	0	0.00	0.00	1.26	1.21	1.20	1.931	0	0.00	0.00	1.29	1.30	1.24	1.934	
4-Mar	1.822	263	37.29	2.45	1.30	1.86	1.46	0.004	1	0.14	4.15	1.32	1.42	1.38	1.826	
5-Mar	0.638	98	13.89	2.61				1.302	75	10.63	0.98				1.940	
6-Mar	0.638	98	13.89	2.61				1.302	75	10.63	0.98				1.940	
7-Mar	0.638	98	13.89	2.61	0.90	1.41	1.41	1.302	75	10.63	0.98	1.54	1.75	1.28	1.940	
8-Mar	1.791	230	32.61	2.18	1.20	1.23	1.23	0.008	0	0.00	0.00	1.82	1.74	1.69	1.798	
9-Mar	0.001	0	0.00	0.00	1.06	1.11	1.12	1.914	100	14.18	0.89	1.36	1.28	1.30	1.915	
10-Mar	1.768	236	33.46	2.27	1.37	1.34	1.24	0.002	0	0.00	0.00	1.30	1.24	1.34	1.771	
11-Mar	0.004	0	0.00	0.00	1.16	1.08	1.14	1.933	100	14.18	0.88	1.99	1.75	1.82	1.938	
12-Mar	1.235	169	23.96	2.33				0.640	31	4.40	0.82				1.876	
13-Mar	1.235	169	23.96	2.33				0.640	31	4.40	0.82				1.876	
14-Mar	1.235	169	23.96	2.33	2.20	2.20	2.50	0.640	31	4.40	0.82	1.34	1.11	1.21	1.876	
15-Mar	0.000	0	0.00	0.00	2.20	2.20	2.37	1.871	97	13.75	0.88	2.20	2.20	2.41	1.871	
16-Mar	1.862	249	35.30	2.27	1.36	1.28	1.21	0.002	0	0.00	0.00	1.96	1.85	1.89	1.864	
17-Mar	0.004	0	0.00	0.00	1.18	1.18	1.13	1.909	96	13.61	0.85	1.41	1.33	1.37	1.913	
18-Mar	1.690	209	29.63	2.10	1.31	1.25	1.25	0.003	0	0.00	0.00	1.19	1.15	1.19	1.693	
19-Mar	0.585	77	10.92	2.24				1.246	61	8.65	0.83				1.831	
20-Mar	0.585	77	10.92	2.24				1.246	61	8.65	0.83				1.831	
21-Mar	0.585	77	10.92	2.24	1.40	1.10	1.03	1.246	61	8.65	0.83	1.29	1.41	1.23	1.831	
22-Mar	1.679	202	28.64	2.05	1.31	1.23	1.16	0.002	0	0.00	0.00	1.61	1.39	1.54	1.681	
23-Mar	0.000	0	0.00	0.00	1.26	1.28	1.10	1.754	90	12.76	0.87	1.33	1.41	1.26	1.754	
24-Mar	1.676	222	31.48	2.25	1.47	1.40	1.18	0.000	0	0.00	0.00	1.26	1.98	1.61	1.676	
25-Mar	0.000	0	0.00	0.00	1.28	1.23	1.16	1.776	87	12.33	0.83	1.35	1.31	1.26	1.776	
26-Mar	1.215	164	23.25	2.30				0.646	33	4.68	0.87				1.860	
27-Mar	1.215	164	23.25	2.30				0.646	33	4.68	0.87				1.860	
28-Mar	1.215	164	23.25	2.30	1.53	1.17	1.20	0.646	33	4.68	0.87	1.38	1.24	1.20	1.860	
29-Mar	0.002	0	0.00	0.00	1.06	1.36	1.13	1.976	106	15.03	0.91	1.49	1.38	1.32	1.978	
30-Mar	1.814	233	33.03	2.18	1.20	1.24	1.08	0.004	0	0.00	0.00	1.23	1.25	1.15	1.818	
31-Mar	0.000	0	0.00	0.00	0.70	1.02	0.95	1.871	105	14.89	0.95	1.22	1.28	1.12	1.871	
TOTAL	28.955	3,888	551.2					28.486	1,382	195.94					57.441	
AVE DAY	0.934		17.8	1.64	1.3	1.4	1.3	0.9189		6.3	0.70	1.45	1.50	1.42	1.853	
MAX	1.939		37.3	2.61	2.2	2.2	2.5	1.9758		15.0	4.15	2.2	2.2	2.41	1.978	
MIN	0.000		0.0	0.00	0.7	1.0	1.0	0.0001		0.0	0.00	0.91	1.11	1.12	1.676	
MONTHLY TOTALS: Cleveland Total MG				SJCT EAST				Hilltop Total MG				Cleveland Pump Station:				28.955
Average Day		1.853	Chl Add	28.941		Average Day		0.146		Chl Add		24.640		Hilltop Pump Station:		28.486
Max Day (Est)		2.134	No Chl Add	0.015		Max Day (Est)		0.156		No Chl Add		3.846		TOTAL AUTHORITY (Trted.)		57.441
Total Authority Flow:		57.443				Month Total		4.539								

**ST. JOSEPH WATER PLANT-YEAR TO DATE PUMPAGE**  
**MARCH 2022**

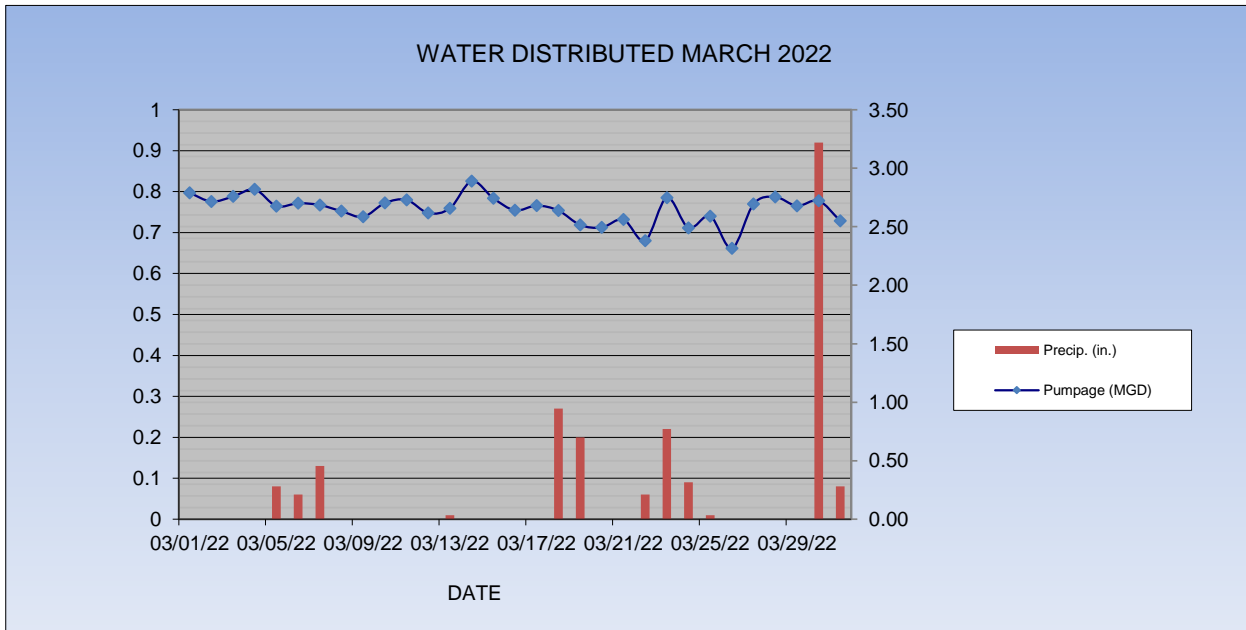
	Pumpage Month	Pumpage FISCAL YTD	By Quarter
APRIL 2021	90,196,764	90,196,764	
MAY	159,086,815	249,283,579	
JUNE	207,863,490	457,147,069	457,147,069
JULY	194,516,481	194,516,481	
AUGUST	206,106,524	400,623,005	
SEPTEMBER	165,413,457	566,036,462	566,036,462
OCTOBER	111,150,956	677,187,418	
NOVEMBER	79,512,900	756,700,318	
DECEMBER 2021	80,497,727	837,198,045	271,161,583
JANUARY 2022	85,696,372	922,894,416	
FEBRUARY	76,518,702	999,413,119	
MARCH	82,154,723	1,081,567,842	244,369,797
TOTAL	1,538,714,910		



**ST JOSEPH WATER PLANT PUMPAGE-WATER DELIVERED/RAINFALL  
MARCH 2022**

DATE	PUMPAGE (gallons)	PUMPAGE (MGD)	Rainfall (in)	Day to Day Comparison 2022/2021	
				2022	2021
03/01/22	2,789,341	2.79	0	2,789,341	3,076,541
03/02/22	2,715,945	2.72	0	2,715,945	3,139,986
03/03/22	2,758,056	2.76	0	2,758,056	2,934,470
03/04/22	2,818,543	2.82	0	2,818,543	3,149,724
03/05/22	2,676,081	2.68	0.08	2,676,081	3,003,217
03/06/22	2,701,112	2.70	0.06	2,701,112	3,149,742
03/07/22	2,685,618	2.69	0.13	2,685,618	3,082,389
03/08/22	2,632,476	2.63	0	2,632,476	2,922,651
03/09/22	2,585,039	2.59	0	2,585,039	3,058,022
03/10/22	2,702,329	2.70	0	2,702,329	2,947,026
03/11/22	2,729,620	2.73	0	2,729,620	2,979,149
03/12/22	2,616,916	2.62	0	2,616,916	3,028,540
03/13/22	2,657,257	2.66	0.01	2,657,257	3,035,398
03/14/22	2,889,481	2.89	0	2,889,481	2,917,048
03/15/22	2,743,608	2.74	0	2,743,608	3,154,649
03/16/22	2,640,010	2.64	0	2,640,010	3,055,084
03/17/22	2,680,511	2.68	0	2,680,511	2,762,046
03/18/22	2,638,805	2.64	0.27	2,638,805	2,885,493
03/19/22	2,515,757	2.52	0.2	2,515,757	2,889,728
03/20/22	2,493,845	2.49	0	2,493,845	2,837,383
03/21/22	2,561,010	2.56	0	2,561,010	3,029,337
03/22/22	2,380,472	2.38	0.06	2,380,472	2,921,417
03/23/22	2,748,493	2.75	0.22	2,748,493	2,916,875
03/24/22	2,489,781	2.49	0.09	2,489,781	2,768,578
03/25/22	2,590,500	2.59	0.01	2,590,500	2,891,785
03/26/22	2,315,444	2.32	0	2,315,444	2,932,255
03/27/22	2,694,957	2.69	0	2,694,957	2,932,361
03/28/22	2,754,380	2.75	0	2,754,380	2,701,536
03/29/22	2,678,060	2.68	0	2,678,060	2,917,403
03/30/22	2,721,630	2.72	0.92	2,721,630	3,013,726
03/31/22	2,549,647	2.55	0.08	2,549,647	2,966,991
<b>TOTAL</b>	<b>82,154,723</b>	<b>82.15</b>	<b>2.13</b>	<b>82,154,723</b>	<b>92,000,552</b>

<b>Average Day</b>	<b>2,650,152</b>
<b>Maximum Day</b>	<b>2,889,481</b>
<b>Minimum Day</b>	<b>2,315,444</b>



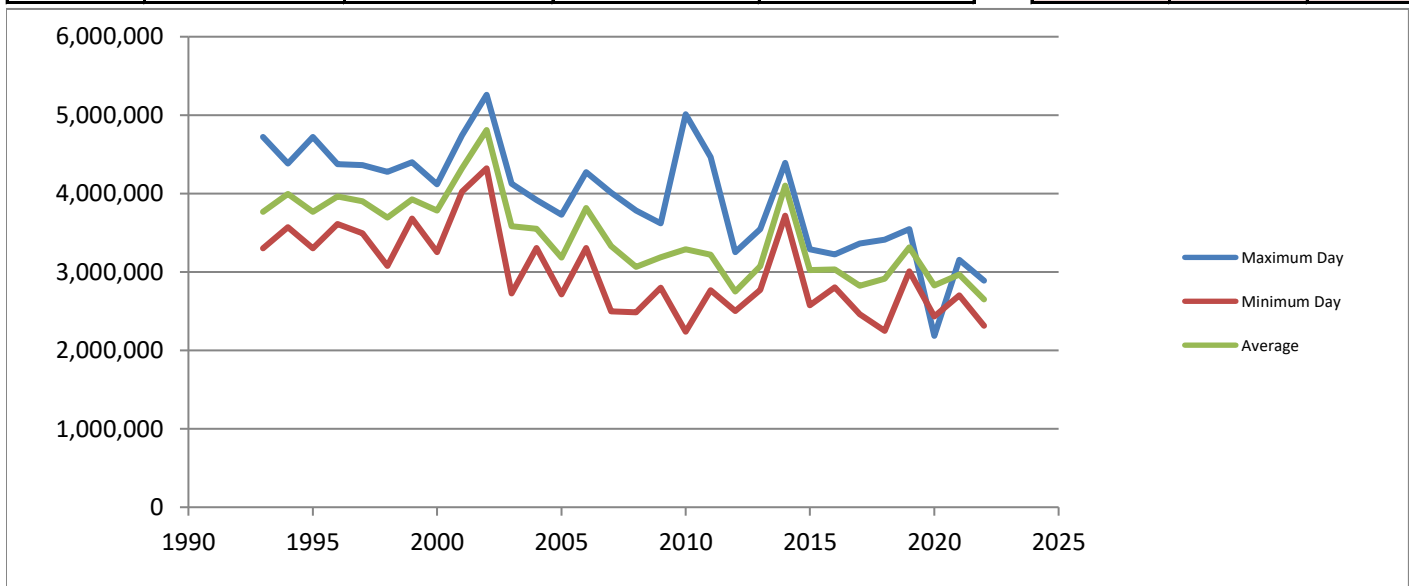


# ST JOSEPH WATER PLANT PUMPAGE-WATER DELIVERED

MARCH 2022

Year	Average	Maximum Day	Minimum Day	Monthly Total
1993	3,767,950	4,721,800	3,303,450	106,411,450
1994	3,996,248	4,384,800	3,571,800	123,883,700
1995	3,767,950	4,721,800	3,303,450	116,806,450
1996	3,964,081	4,375,000	3,613,500	122,886,500
1997	3,903,450	4,361,425	3,495,400	121,006,950
1998	3,693,095	4,275,600	3,076,400	114,485,950
1999	3,927,223	4,401,000	3,679,400	121,743,900
2000	3,785,211	4,118,750	3,251,000	117,341,550
2001	4,322,940	4,742,950	4,023,550	134,011,150
2002	4,810,127	5,259,500	4,322,000	149,113,940
2003	3,582,904	4,124,400	2,727,000	111,070,020
2004	3,549,125	3,917,380	3,304,250	110,022,870
2005	3,184,715	3,728,500	2,713,320	98,726,150
2006	3,817,435	4,273,500	3,304,000	118,340,490
2007	3,329,752	4,013,000	2,498,500	103,222,310
2008	3,065,748	3,783,500	2,486,080	95,038,200
2009	3,188,871	3,621,750	2,800,750	98,855,000
2010	3,290,833	5,010,100	2,238,370	102,015,838
2011	3,218,895	4,463,210	2,767,357	99,785,760
2012	2,748,710	3,254,721	2,500,973	85,210,003
2013	3,074,176	3,547,491	2,769,880	95,299,463
2014	4,102,652	4,391,302	3,719,580	127,182,218
2015	3,024,256	3,289,056	2,576,655	93,751,947
2016	3,031,861	3,222,433	2,801,779	93,987,696
2017	2,822,944	3,362,410	2,460,644	87,511,277
2018	2,915,735	3,411,006	2,249,432	90,387,784
2019	3,313,249	3,545,160	3,009,417	102,710,727
2020	2,827,768	2,185,300	2,432,000	87,660,793
2021	2,967,760	3,154,649	2,701,536	92,000,552
2022	2,650,152	2,889,481	2,315,444	82,154,723

Rank	Year	Monthly Total
1	2002	149,113,940
2	2001	134,011,150
3	2014	127,182,218
4	1994	123,883,700
5	1996	122,886,500
6	1999	121,743,900
7	1997	121,006,950
8	2006	118,340,490
9	2000	117,341,550
10	1995	116,806,450
11	1998	114,485,950
12	2003	111,070,020
13	2004	110,022,870
14	1993	106,411,450
15	2007	103,222,310
16	2019	102,710,727
17	2010	102,015,838
18	2011	99,785,760
19	2009	98,855,000
20	2005	98,726,150
21	2013	95,299,463
22	2008	95,038,200
23	2016	93,987,696
24	2015	93,751,947
25	2021	92,000,552
26	2018	90,387,784
27	2020	87,660,793
28	2017	87,511,277
29	2012	85,210,003
30	2022	82,154,723



**MONTHLY CLIMATOLOGICAL SUMMARY**

**March**

**2022**

**NAME: sjwwweather**

**St. Joseph Water Plant - 1701 Lions Park Drive - St. Joseph, MI**

DAY	MEAN TEMP	NORM MEAN TEMP	HIGH TEMP	TIME	NORM HIGH TEMP	REC HIGH TEMP	YEAR	LOW TEMP	TIME	NORM LOW TEMP	REC LOW TEMP	YEAR	HEAT DEG DAYS	COOL DEG DAYS	RAIN	AVG WIND SPEED	HIGH	TIME	DOM DIR
1	37.7	33	<b>40.7</b>	12:30a	53	83	1986	<b>32.7</b>	12:00m	33	17	1984	27.3	0	<b>0</b>	<b>7</b>	<b>19</b>	1:00a	N
2	35.4	31.3	<b>44.8</b>	4:00p	53	79	1963	<b>28.3</b>	6:00a	33	20	1992	29.6	0	<b>0</b>	<b>4.6</b>	<b>27</b>	11:30p	N
3	28.2	31.3	<b>33.9</b>	12:30a	54	80	1956	<b>22.8</b>	8:00a	33	18	1954	36.8	0	<b>0</b>	<b>8.4</b>	<b>28</b>	3:30a	N
4	33.5	35.7	<b>44.4</b>	5:00p	54	75	1956	<b>24</b>	4:30a	34	8	2019	31.5	0	<b>0</b>	<b>3.2</b>	<b>19</b>	12:00m	N
5	55	34	<b>70.7</b>	4:30p	55	82	1988	<b>38.6</b>	12:30a	34	13	2019	11.1	1.2	<b>0.08</b>	<b>10</b>	<b>38</b>	12:00m	N
6	40.8	35.1	<b>61.8</b>	12:30a	55	82	1988	<b>34.8</b>	10:00p	34	14	1982	24.2	0	<b>0.06</b>	<b>14.6</b>	<b>45</b>	6:00a	N
7	34.2	35.9	<b>36.3</b>	1:00a	55	78	1991	<b>32.9</b>	9:30a	35	9	1982	30.8	0	<b>0.13</b>	<b>13</b>	<b>34</b>	3:30p	N
8	33.3	37.1	<b>37.3</b>	5:00p	56	77	1991	<b>31.3</b>	6:00a	35	15	1972	31.7	0	<b>0</b>	<b>9.2</b>	<b>22</b>	12:30a	N
9	35.1	42.3	<b>41.6</b>	2:00p	56	74	1967	<b>29.9</b>	3:00a	35	15	1985	29.9	0	<b>0</b>	<b>7.3</b>	<b>20</b>	10:30a	N
10	28.8	53	<b>34.3</b>	12:30a	57	80	1977	<b>24.2</b>	10:30p	36	15	1997	36.2	0	<b>0</b>	<b>12.1</b>	<b>25</b>	7:00a	N
11	26.4	51.4	<b>31.3</b>	5:00p	57	79	1977	<b>21.8</b>	7:30a	36	18	1952	38.6	0	<b>0</b>	<b>13.7</b>	<b>40</b>	7:30p	N
12	20.6	36.3	<b>24.2</b>	9:30p	57	82	1971	<b>17.2</b>	1:30p	36	17	2022	44.4	0	<b>0</b>	<b>20.7</b>	<b>40</b>	2:30a	N
13	32.7	32.6	<b>43.1</b>	12:00m	58	77	1960	<b>19.4</b>	4:00a	36	18	1950	31	0	<b>0.01</b>	<b>11.7</b>	<b>34</b>	1:30a	SSW
14	46.4	36.2	<b>57.1</b>	7:00p	58	79	1976	<b>39.3</b>	7:00a	37	18.6	2017	18.6	0	<b>0</b>	<b>6</b>	<b>18</b>	10:00a	SSW
15	39.5	38.1	<b>45.2</b>	12:30a	59	83	1976	<b>36.1</b>	8:00a	37	16	1957	25.5	0	<b>0</b>	<b>3.7</b>	<b>15</b>	7:00a	SSW
16	50.9	37.6	<b>63.1</b>	6:00p	59	86	1976	<b>36.5</b>	12:30a	37	24	1990	14.1	0	<b>0</b>	<b>5.9</b>	<b>14</b>	9:30a	SE
17	53.6	38.3	<b>60</b>	3:30a	59	84	1976	<b>45.8</b>	6:00p	38	25	1949	11.4	0	<b>0</b>	<b>6.7</b>	<b>18</b>	6:00p	N
18	46.9	35.5	<b>54.7</b>	5:00p	60	86	2002	<b>39.4</b>	4:00a	38	19	1990	18.1	0	<b>0.27</b>	<b>4.4</b>	<b>20</b>	2:00p	ENE
19	39.8	33.2	<b>46.7</b>	3:00a	60	84	1985	<b>37.4</b>	4:30p	38	18	1988	25.2	0	<b>0.2</b>	<b>11.4</b>	<b>28</b>	3:30p	N
20	44.4	30.8	<b>58.2</b>	7:30p	60	84	1985	<b>35.7</b>	6:30a	39	22	1951	20.6	0	<b>0</b>	<b>4.3</b>	<b>18</b>	3:30a	SSW
21	54.8	30.5	<b>67.2</b>	2:00p	61	86	1985	<b>41.7</b>	7:00a	39	23	1953	10.3	0	<b>0</b>	<b>5.8</b>	<b>18</b>	2:00p	N
22	49.4	34.3	<b>58.9</b>	12:30a	61	86	1985	<b>46.5</b>	9:00p	39	21	1993	15.6	0	<b>0.06</b>	<b>5.3</b>	<b>26</b>	11:30p	N
23	51.5	35	<b>64.3</b>	4:00p	62	85	1980	<b>47.5</b>	12:30a	39	18	1986	13.5	0	<b>0.22</b>	<b>5.9</b>	<b>25</b>	5:30p	N
24	42.8	38.5	<b>50.1</b>	12:30a	62	85	1990	<b>36.6</b>	12:00m	40	28	1999	22.2	0	<b>0.09</b>	<b>12.9</b>	<b>30</b>	7:30a	N
25	39	36	<b>42.7</b>	2:30p	62	86	1990	<b>36.4</b>	12:30a	40	24	2018	26	0	<b>0.01</b>	<b>13.1</b>	<b>32</b>	6:00p	N
26	33	36.8	<b>38.4</b>	12:30a	63	88	1986	<b>30.5</b>	7:30p	40	24	1997	32	0	<b>0</b>	<b>22.9</b>	<b>40</b>	11:30a	N
27	27.9	40.6	<b>31.7</b>	1:00a	63	87	1994	<b>25.3</b>	3:30p	41	27	1988	37.1	0	<b>0</b>	<b>19.1</b>	<b>39</b>	1:00a	N
28	28.3	40.9	<b>31.4</b>	2:30a	64	85	1990	<b>25.2</b>	12:00m	41	24	1992	36.7	0	<b>0</b>	<b>13.7</b>	<b>33</b>	6:00a	N
29	33.8	43.1	<b>42.9</b>	5:30p	64	82	1970	<b>24.2</b>	4:30a	41	24	2022	31.2	0	<b>0</b>	<b>3.9</b>	<b>26</b>	12:00m	N
30	51.8	52.8	<b>60.1</b>	7:30p	64	87	1962	<b>41.8</b>	12:30a	42	30	1971	13.2	0	<b>0.92</b>	<b>7.3</b>	<b>31</b>	8:00a	SSE
31	38.7	50.6	<b>56.9</b>	12:30a	64	84	1986	<b>34.1</b>	6:30p	42	18	1954	26.3	0	<b>0.08</b>	<b>12.9</b>	<b>31</b>	4:00a	N
AVE	<b>39.2</b>	<b>38.0</b>											<b>25.8</b>	<b>0.0</b>	<b>0.1</b>	<b>9.7</b>	<b>27.5</b>		N
MAX	<b>55</b>	<b>53</b>	<b>70.7</b>			<b>88</b>		<b>47.5</b>		<b>42</b>	<b>30</b>		<b>44.4</b>	<b>1.2</b>	<b>0.92</b>	<b>22.9</b>	<b>45.0</b>		
MIN	<b>20.6</b>	<b>30.5</b>	<b>24.2</b>					<b>17.2</b>		<b>33</b>	<b>8</b>		<b>10.3</b>	<b>0</b>	<b>0</b>	<b>3.2</b>	<b>14</b>		
TOTAL															<b>2.13</b>				

Attached is the Monthly Weather Report for March 2022.

Max Rain: 0.92 ON 03/30/22  
 Days of Rain: 10 (>.01 in) 5 (>.1 in) 0 (>1 in)

An interesting note, We set two new records for low temperatures.  
 March 12th for 17 degrees beating the previous record of 21 degrees on that day in 1982.  
 March 29th for 24 degrees beating the previous record of 27 degrees on that day in 1979.

Rory Dickey, SJ WTP