



## 2021 FIVE YEAR MOVING AVERAGE STATUSREPORT

### September, 2021 - FINAL

MEMBER	Fractional Share of the Contribution ("Percent Share")						5 Year Moving Average	
	MEASURING YEAR (Oct-Sep)						Current Average (2)	Previous Average (3)
	2016	2017	2018	2019	2020	2021 (1)		
Clark	6.02%	7.44%	10.17%	8.33%	8.02%	7.49%	8.29%	8.00%
Cranford	5.98%	6.69%	7.25%	9.95%	11.08%	11.79%	9.35%	8.19%
Garwood	1.89%	3.31%	2.74%	2.33%	2.22%	2.23%	2.57%	2.50%
Kenilworth	5.33%	5.61%	4.09%	5.30%	3.62%	3.59%	4.44%	4.79%
Mountainside	3.89%	3.88%	3.68%	2.90%	2.44%	2.35%	3.05%	3.36%
Rahway	18.87%	13.71%	14.04%	18.01%	22.27%	21.64%	17.93%	17.37%
Roselle Park	1.62%	1.04%	0.84%	1.61%	2.08%	1.73%	1.46%	1.44%
Scotch Plains	4.62%	5.15%	5.88%	4.56%	4.23%	3.86%	4.74%	4.89%
Springfield	9.97%	9.18%	9.28%	9.28%	9.25%	9.20%	9.24%	9.39%
Westfield	18.87%	16.26%	14.79%	15.64%	14.32%	14.46%	15.09%	15.98%
Woodbridge	22.94%	27.73%	27.24%	22.09%	20.47%	21.66%	23.84%	24.09%
	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%	100.00%

Notes:

- (1) Figures computed based on Flow, BOD and TSS data received as of reporting month.
- (2) Five year moving average consisting of 2017, 2018, 2019, 2020, and month to date for 2021
- (3) Five year moving average consisting of 2016, 2017, 2018, 2019, and 2020



2021 Town Annual Percent Share  
September, 2021

Member	Average Daily Flow (MGD)		Biochemical Oxygen Demand (Tons/Day)		Total Suspended Solids (Tons/Day)		Annual Percent Share	
	2020	2021	2020	2021	2020	2021	2020	2021
Clark	1.50	1.70	1.67	1.78	1.45	1.56	8.02%	7.49%
Cranford	2.99	3.54	1.85	2.09	2.37	2.61	11.08%	11.79%
Garwood	0.59	0.66	0.36	0.40	0.46	0.50	2.22%	2.23%
Kenilworth	0.93	1.04	0.58	0.65	0.74	0.81	3.62%	3.59%
Mountainside	0.67	0.72	0.42	0.41	0.53	0.52	2.44%	2.35%
Rahway	5.66	6.20	3.59	3.97	4.58	4.87	22.27%	21.64%
Roselle Park	0.52	0.49	0.35	0.32	0.43	0.39	2.08%	1.73%
Scotch Plains	1.15	1.17	0.71	0.68	0.91	0.85	4.23%	3.86%
Springfield	2.42	2.69	1.49	1.66	1.92	2.06	9.25%	9.20%
Westfield	3.50	3.98	2.16	2.72	2.78	3.30	14.32%	14.46%
Woodbridge (1)(2)	5.13	6.11	3.48	4.16	4.47	4.72	20.47%	21.66%
<b>Totals:</b>	<b>25.06</b>	<b>28.28</b>	<b>16.66</b>	<b>18.84</b>	<b>20.64</b>	<b>22.19</b>	<b>100.00%</b>	<b>100.00%</b>

Equations:

Assumptions: 200 gpd flow per unit at 200 mg/L BOD and TSS concentrations

- (a) Flow Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD)
- (b) BOD Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD) x (200 mg/L) x (8.34 lbs/g) / (2000 lbs/ton)
- (c) TSS Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD) x (200 mg/L) x (8.34 lbs/g) / (2000 lbs/ton)

Notes:

- (1) Woodbridge MGD Adjustment includes a 0.50 MGD flow credit, per section 11.5 of the 1995 Agreement
- (2) Woodbridge TSS Adjustment includes a 833 lbs/day credit, per section 11.5 of the 1995 Agreement



## 2021 Intermunicipal Adjustments Report September, 2021

Member	Dwelling Unit Quantity			Average Daily Flow (MGD)			Average BOD (Tons/Day)			Average TSS (Tons/Day)		
	Bill To	Credit To	Total Adjustment	Average Flow	Adjustment (a)	Final Flow	Average BOD	Adjustment (b)	Final BOD	Average TSS	Adjustment (c)	Final TSS
Clark	479	0	479	1.60	0.0958	1.70	1.70	0.0799	1.78	1.48	0.0799	1.56
Cranford	242	1,092	-850	3.71	-0.1700	3.54	2.23	-0.1418	2.09	2.75	-0.1418	2.61
Garwood	54	110	-56	0.67	-0.0112	0.66	0.41	-0.0093	0.40	0.51	-0.0093	0.50
Kenilworth	62	38	24	1.03	0.0048	1.04	0.65	0.0040	0.65	0.81	0.0040	0.81
Mountainside	106	339	-233	0.76	-0.0466	0.72	0.45	-0.0389	0.41	0.56	-0.0389	0.52
Rahway	13	15	-2	6.20	-0.0004	6.20	3.97	-0.0003	3.97	4.87	-0.0003	4.87
Roselle Park	38	117	-79	0.50	-0.0158	0.49	0.33	-0.0132	0.32	0.40	-0.0132	0.39
Scotch Plains	66	413	-347	1.24	-0.0694	1.17	0.74	-0.0579	0.68	0.91	-0.0579	0.85
Springfield	0	187	-187	2.72	-0.0374	2.69	1.69	-0.0312	1.66	2.09	-0.0312	2.06
Westfield	1,425	175	1,250	3.73	0.2500	3.98	2.51	0.2085	2.72	3.09	0.2085	3.30
Woodbridge (1)(2)	10	9	1	6.61	-0.4998	6.11	4.16	0.0002	4.16	5.14	-0.4163	4.72
<b>Totals:</b>	2,495	2,495	0	28.78	-0.5000	28.28	18.84	0.0000	18.84	22.61	-0.4165	22.19

**Equations:**

Assumptions: 200 gpd flow per unit at 200 mg/L BOD and TSS concentrations

- (a) Flow Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD)
- (b) BOD Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD) x (200 mg/L) x (8.34 lbs/g) / (2000 lbs/ton)
- (c) TSS Adj: [Total Adjusted Dwelling Units] x (0.0002 MGD) x (200 mg/L) x (8.34 lbs/g) / (2000 lbs/ton)

**Notes:**

- (1) Woodbridge MGD Adjustment includes a 0.50 MGD flow credit, per section 11.5 of the 1995 Agreement
- (2) Woodbridge TSS Adjustment includes a 833 lbs/day credit, per section 11.5 of the 1995 Agreement



## Member BOD and TSS Loading Contribution September, 2021

Member	Average Daily Industrial Loading (1)		Average Daily Flow (MGD)	Inter-Mun Adj (2) (MGD)	Adj. Avg. Daily Flow (MGD)	Member Contribution			
	BOD (Tons/Day)	TSS (Tons/Day)				Domestic Loading		Total Loading	
						BOD (Tons/Day)	TSS (Tons/Day)	BOD (Tons/Day)	TSS (Tons/Day)
Clark	0.63	0.16	1.60	0.0958	1.70	1.07	1.32	1.70	1.48
Cranford	0.00	0.00	3.71	-0.1700	3.54	2.23	2.75	2.23	2.75
Garwood	0.00	0.00	0.67	-0.0112	0.66	0.41	0.51	0.41	0.51
Kenilworth	0.00	0.00	1.03	0.0048	1.04	0.65	0.81	0.65	0.81
Mountainside	0.00	0.00	0.76	-0.0466	0.72	0.45	0.56	0.45	0.56
Rahway	0.07	0.06	6.20	-0.0004	6.20	3.90	4.81	3.97	4.87
Roselle Park	0.02	0.02	0.50	-0.0158	0.49	0.31	0.38	0.33	0.40
Scotch Plains	0.00	0.00	1.24	-0.0694	1.17	0.74	0.91	0.74	0.91
Springfield	0.00	0.00	2.72	-0.0374	2.69	1.69	2.09	1.69	2.09
Westfield	0.00	0.00	3.73	0.2500	3.98	2.51	3.09	2.51	3.09
Woodbridge	0.00	0.00	6.61	0.0002	6.61	4.16	5.14	4.16	5.14
<b>Totals:</b>	<b>0.72</b>	<b>0.24</b>	<b>28.78</b>	<b>0.00</b>	<b>28.78</b>	<b>18.12</b>	<b>22.36</b>	<b>18.84</b>	<b>22.61</b>

**Notes:**

- (1) As measured and reported by the RVSA SIU IPP Industrial Loading
- (2) Does not include the 0.50 MGD Woodbridge Credit



## 2021 Plant Influent Loading September, 2021

2020			2021										Average T/D
Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep		

**Plant Influent Flow and Sample Data**

Avg. Daily Flow (MGD) (1)	23.71	25.12	30.74	28.4	34.15	33.31	28.81	25.78	26.67	28.35	30.44	30.98	28.87
Avg. BOD (mg/L) (2)	159	178	218	149	141	145	162	167	161	142	144	120	157
Avg. TSS (mg/L) (2)	214	182	215	159	146	164	187	234	228	211	184	154	190

**Total Influent Loading (a)(b)**

BOD (Tons/Day)	15.72	18.65	27.94	17.65	20.08	20.14	19.46	17.92	17.91	16.79	18.28	15.50	18.84
TSS (Tons/Day)	21.16	19.06	27.56	18.83	20.79	22.78	22.47	25.16	25.36	24.94	23.36	19.89	22.61

**Total Industrial Contribution (3)**

IPP BOD (Tons/Day)	0.73
IPP TSS (Tons/Day)	0.25

**Total Domestic Influent Loading**

BOD (Tons/Day)	18.12
TSS (Tons/Day)	22.36

**Equations:**

- (a) BOD Loading (Tons/Day) = Average Daily Flow (MGD) x Avg BOD (mg/L) x (8.34 lbs/gal) / (2000 lbs/ton)
- (b) TSS Loading (Tons/Day) = Average Daily Flow (MGD) x Avg TSS (mg/L) x (8.34 lbs/gal) / (2000 lbs/ton)

**Notes:**

- (1) Average Daily Flow = RV12 + RV14 + RV31
- (2) BOD and TSS Concentrations measured at the RVSA Raw Influent Sampler as reported to the NJDEP
- (3) As measured and reported by the RVSA SIU IPP Industrial Loading



## 2021 Average Daily Flow Report September, 2021

Meter #	2020			2021									Average To Date
	Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	
RV01	2.14	2.27	2.75	2.86	3.08	3.16	2.80	2.57	2.57	2.67	2.79	3.08	2.73
RV02	3.10	3.23	3.73	3.88	4.06	4.26	3.80	3.44	3.53	3.68	3.97	4.48	3.76
RV03	1.61	1.69	1.75	1.58	1.68	1.51	1.44	1.28	1.32	1.41	1.69	2.36	1.61
RV04	0.25	0.25	0.31	0.30	0.33	0.32	0.26	0.24	0.21	0.23	0.27	0.29	0.27
RV05	0.36	0.37	0.46	0.45	0.49	0.51	0.44	0.43	0.42	0.40	0.32	0.35	0.42
RV06	0.47	0.48	0.16	0.14	0.16	0.17	0.13	0.12	0.13	0.14	0.28	0.60	0.25
RV07	0.59	0.61	0.75	0.75	0.86	0.91	0.80	0.70	0.77	0.82	0.81	0.87	0.77
RV09	2.95	3.22	4.49	4.42	5.05	4.97	4.06	3.56	3.67	3.70	4.31	4.16	4.05
RV10	7.82	8.40	9.91	10.07	11.00	11.18	9.69	8.47	8.72	9.64	9.48	10.61	9.58
RV11	11.69	12.51	15.51	15.53	17.43	17.35	14.80	13.01	13.36	14.43	15.51	16.26	14.78
RV12	4.76	5.03	5.84	5.24	6.30	6.30	5.50	5.20	5.61	5.29	6.18	6.33	5.63
RV13	0.59	0.67	0.81	0.78	0.85	0.87	0.76	0.68	0.69	0.82	0.84	0.83	0.77
RV14	18.86	20.05	24.82	23.15	27.65	26.85	23.30	20.57	21.04	23.00	23.61	23.65	23.05
RV15	0.86	0.87	1.18	1.03	1.42	1.18	0.86	0.78	0.80	0.85	1.34	1.07	1.02
RV16A	24.62	25.61	30.53	28.78	33.20	32.95	29.05	25.73	26.23	28.36	30.66	31.75	28.95
RV17	0.46	0.47	0.50	0.48	0.54	0.48	0.45	0.41	0.41	0.45	0.51	0.47	0.47
RV18	0.76	0.81	0.94	0.84	0.96	0.91	0.85	0.63	0.81	0.81	0.83	0.93	0.84
RV19	0.35	0.38	0.42	0.38	0.42	0.41	0.38	0.38	0.39	0.41	0.40	0.45	0.40
RV20	0.68	0.71	0.78	0.77	0.81	0.83	0.80	0.71	0.75	0.78	0.80	0.76	0.77
RV22	14.07	15.07	18.12	18.08	19.82	19.83	17.35	15.48	16.02	17.22			17.11
RV27	0.42	0.26	1.33	0.51	2.13	1.39	0.02	0.02	0.07	0.41	1.98	2.50	0.92
RV28	0.24	0.13	0.45	0.16	0.99	0.56	0.04	0.00	0.01	0.11	0.55	0.47	0.31
RV29	1.19	1.28	1.49	1.53	1.66	1.74	1.54	1.39	1.49	1.68	1.59	1.68	1.52
RV30	0.20	0.21	0.23	0.22	0.32	0.34	0.25	0.19	0.19	0.22	0.26	0.35	0.25
RV31	0.10	0.04	0.08	0.01	0.20	0.16	0.00	0.01	0.02	0.06	0.65	1.00	0.19
RV32												6.83	6.83



## 2021 Average Industrial TSS Loading Report September, 2021

Town	SIU Name	Average Daily TSS Loading (Tons/Day)												Average
		Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	T/D
Clark	Kerry 1	0.000	0.001	0.001	0.005		0.006	0.005	0.002	0.009	0.004	0.004	0.011	0.0044
	Kerry 2	0.006		0.011	0.006	0.005	0.003	0.006	0.006	0.028	0.005	0.001	0.007	0.0076
	Kerry 3		0.030	0.044	0.013	0.020	0.017	0.039	0.009	0.019	0.037	0.015	0.028	0.0246
	Kerry 4	0.129		0.094	0.143	0.115	0.382	0.064	0.097	0.098	0.115	0.060	0.064	0.1237
<b>Clark Total:</b>													<b>0.160</b>	
Kenilworth	B&M Finishers		0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.001	0.000	0.000	0.0001
	Kenilworth Anodizing	0.000		0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.0000
<b>Kenilworth Total:</b>													<b>0.000</b>	
Mountainside	American Aluminum	0.001		0.002	0.000	0.001	0.000	0.000	0.000	0.000	0.001	0.001	0.005	0.0010
<b>Mountainside Total:</b>													<b>0.001</b>	
Rahway	Clean Haven			0.000										0.0000
	Guest Packaging 02			0.004	0.004	0.003	0.001	0.004	0.013	0.002	0.004	0.005	0.001	0.0041
	Guest Packaging 03	0.000	0.000	0.000	0.001	0.002	0.001	0.003	0.001	0.002	0.002	0.002	0.002	0.0013
	Merck 007	0.005	0.001	0.008	0.004	0.004	0.004	0.007	0.008	0.024	0.007	0.006	0.051	0.0108
	Merck 012	0.037	0.025	0.041	0.018	0.031	0.015	0.030	0.022	0.024	0.033	0.033	0.029	0.0282
	Quala Systems	0.013	0.005	0.009	0.011	0.006	0.020	0.023	0.012	0.017	0.049	0.024	0.015	0.0170
	Suez Water Rahway	0.004	0.003	0.001	0.000	0.000	0.002	0.001	0.009	0.001	0.006	0.003	0.003	0.0028
<b>Rahway Total:</b>													<b>0.064</b>	
Roselle Park	Crossfield Products	0.004		0.000					0.010		0.007			0.0053
	Merck Kenilworth	0.008	0.006	0.008	0.011	0.011	0.010	0.010	0.012	0.016	0.019	0.023	0.009	0.0119
<b>Roselle Park Total:</b>													<b>0.017</b>	
Springfield	Valcor Engineering	0.003	0.001	0.003	0.000	0.000	0.000	0.003	0.001	0.006	0.002	0.003	0.004	0.0022
<b>Springfield Total:</b>													<b>0.002</b>	
Woodbridge	BASF 1	0.002		0.000	0.001	0.002	0.002	0.003	0.001	0.001	0.001	0.004	0.002	0.0017
	BASF 2			0.001	0.001	0.000	0.001	0.000	0.000	0.000	0.002	0.002	0.001	0.0008
	Gentek Building Products	0.001		0.000	0.000	0.000		0.000	0.000	0.000	0.000	0.000	0.000	0.0001
<b>Woodbridge Total:</b>													<b>0.003</b>	



## 2021 Average Industrial BOD Loading Report

### September, 2021

Town	SIU Name	Average Daily BOD Loading (Tons/Day)												Average T/D
		Oct	Nov	Dec	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	
Clark	Kerry 1	0.000	0.000	0.001	0.002		0.002	0.001	0.001	0.003	0.002	0.001	0.002	0.0014
	Kerry 2	0.018		0.015	0.060	0.018	0.048	0.077	0.033	0.045	0.103	0.033	0.088	0.0489
	Kerry 3		0.280	0.265	0.127	0.111	0.085	0.469	0.170	0.079	0.357	0.076	0.304	0.2112
	Kerry 4	0.579		0.146	0.295	0.474	0.557	0.271	0.327	0.277	0.510	0.177	0.445	0.3689
<b>Clark Total:</b>													<b>0.630</b>	
Kenilworth	B&M Finishers		0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.0000
	Kenilworth Anodizing	0.000		0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.0000
<b>Kenilworth Total:</b>													<b>0.000</b>	
Mountainside	American Aluminum	0.000		0.000	0.000	0.001	0.001	0.000	0.001	0.001	0.001	0.000	0.001	0.0005
<b>Mountainside Total:</b>													<b>0.001</b>	
Rahway	Clean Haven													0.0000
	Guest Packaging 02			0.004	0.005	0.007	0.002	0.009	0.018	0.028	0.008	0.010	0.001	0.0092
	Guest Packaging 03	0.001	0.000	0.001	0.001	0.007	0.000	0.001	0.002	0.002	0.002	0.002	0.002	0.0018
	Merck 007	0.003	0.001	0.003	0.001	0.002	0.002	0.003	0.003	0.005	0.003	0.003	0.017	0.0038
	Merck 012	0.021	0.011	0.011	0.006	0.012	0.007	0.012	0.014	0.010	0.014	0.017	0.006	0.0118
	Quala Systems	0.040	0.031	0.038	0.015	0.007	0.075	0.039	0.038	0.058	0.063	0.053	0.061	0.0432
	Suez Water Rahway	0.000	0.000	0.001	0.001	0.000	0.000	0.004	0.000	0.000	0.003	0.001	0.001	0.0009
<b>Rahway Total:</b>													<b>0.071</b>	
Roselle Park	Crossfield Products	0.002							0.013		0.002			0.0057
	Merck Kenilworth	0.008	0.006	0.006	0.006	0.010	0.014	0.009	0.021	0.010	0.006	0.027	0.010	0.0111
<b>Roselle Park Total:</b>													<b>0.017</b>	
Springfield	Valcor Engineering	0.002	0.002	0.004	0.001	0.001	0.001	0.036	0.001	0.003	0.002	0.003	0.003	0.0049
<b>Springfield Total:</b>													<b>0.005</b>	
Woodbridge	BASF 1	0.001		0.002	0.001	0.002	0.001	0.001	0.001	0.001	0.001	0.001	0.002	0.0013
	BASF 2			0.001	0.001	0.000	0.000	0.000	0.000	0.000	0.001	0.001	0.000	0.0004
	Gentek Building Products	0.000		0.000	0.000	0.000		0.000	0.000	0.000	0.000	0.000	0.000	0.0000
<b>Woodbridge Total:</b>													<b>0.002</b>	