
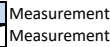


New Hampshire Volunteer River Assessment Program
2020 Ashuelot River Watershed Data



NEW HAMPSHIRE DEPARTMENT OF ENVIRONMENTAL SERVICES

 Measurements not meeting New Hampshire surface water quality standards
 Measurements not meeting NHDES quality assurance/quality control standards

^A Specific conductance > 835 µS/cm indicate exceedance of chronic chloride standard of 230 mg/L

^B Chronic water quality standard

^C Calculated using 1/2 of the 0.25 mg/L detectin limit of Total Kjeldahl Nitrogen (0.125 mg/L)

28-ASH: Ashuelot River, Washington (Route 31)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (µS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E.coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 µS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:30	5.98	71.0	5.20	0.75	35.2	24.3	6		4	
07/21/2020	09:15	6.95	82.3	5.42	0.65	30.5	23.8	16		5	0.013
08/18/2020	09:40	6.50	72.5	5.40	0.51	36.8	20.7	17	12	6	0.013
09/15/2020	09:20	8.80	86.3	5.47	0.36	32.6	14.4	6	12	6	

27-ASH: Ashuelot River, Lempster (Mountain Road)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (µS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E.coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 µS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:00	6.83	78.0	5.37	1.40	44.3	21.4	20		5	
07/21/2020	08:54	7.64	87.1	5.45	1.02	47.3	21.4	4		11	0.022
08/18/2020	09:06	7.98	86.8	5.44	0.48	46.8	19.4	15	11	9	0.011
09/15/2020	08:52	9.40	87.7	5.63	0.22	43.1	12.1	<1	8	9	

24A-ASH: Ashuelot River, Marlow (Route 10)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (µS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E.coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 µS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	10:10	6.79	85.2	5.55	1.27	41.6	26.9	86		6	
07/21/2020	08:20	6.43	78.0	5.66	0.49	63.2	24.4	21		14	0.011
08/18/2020	08:27	7.39	85.1	5.59	0.58	69.5	22.3	19	32	14	0.011
09/15/2020	08:25	7.78	80.2	5.81	0.38	64.2	16.5	24	21	13	

23-ASH: Ashuelot River, Gilsum (Route 10)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (µS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E.coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 µS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	07:50	8.08	92.7	6.02	0.21	83.0	22.0	22		18	
07/21/2020	07:45	7.64	86.2	6.12	0.44	83.9	20.6	21		18	0.012
08/18/2020	07:58	8.39	92.4	6.23	0.52	95.9	20.0	11	17	18	0.012
09/15/2020	07:55	10.50	97.2	6.18	0.10	107.9	11.9	10	13	21	

20A-ASH: Ashuelot River, Keene (Stone Arch Bridge)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	08:19	6.22	73.6	5.80	1.02	97.5	23.8	276		15	
07/21/2020	08:10	6.53	76.9	5.88	0.88	87.4	23.5	194		17	0.021
08/18/2020	07:35	7.24	82.1	5.81	0.83	88.4	21.5	47	136	20	0.023
09/15/2020	08:07	8.26	81.6	5.97	0.61	98.6	15.1	61	82	18	

18-ASH: Ashuelot River, Keene (Route 101)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:00	6.43	75.5	5.84	1.85	245.9	24.4	62		56	
07/21/2020	08:38	6.23	77.8	5.89	2.09	239.2	23.7	613		62	0.013
08/18/2020	08:17	6.31	72.2	5.85	2.04	320.2	22.0	115	163	74	0.026
09/15/2020	08:38	7.91	78.2	6.00	1.72	331.3	15.9	179	233	86	

16D-ASH: Ashuelot River, Swanzey (40 Feet Upstream of Keene WWTF)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:30	6.34	74.0	6.39	2.15	255.8	23.1	291		55	
07/21/2020	09:17	6.51	75.6	6.47	2.08	245.9	22.8	225		61	0.013
08/18/2020	09:39	7.09	79.2	6.53	2.46	300.8	20.9	152	215	69	0.021
09/15/2020	09:26	7.99	79.2	6.75	2.18	306.7	14.9	248	204	77	

16A-ASH: Ashuelot River, Swanzey (Mouth of South Branch Ashuelot River)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:11	7.16	82.9	6.62	1.72	147.7	22.6	132		21	
07/21/2020	08:44	6.86	78.9	6.63	2.06	139.5	22.2	172		26	0.016
08/18/2020	09:07	7.55	82.7	6.72	1.49	150.4	19.8	488	223	25	0.016
09/15/2020	08:48	8.42	83.1	6.76	1.78	153.9	14.8	248	275	30	

16-ASH: Ashuelot River, Swanzey (Cresson Bridge)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	08:45	6.39	74.3	6.53	2.12	232.3	22.8	201		46	
07/21/2020	09:44	6.89	90.0	6.62	2.05	235.5	22.7	172		53	0.044
08/18/2020	10:27	7.28	81.4	6.69	1.52	277.6	20.8	210	194	54	0.019
09/15/2020	09:53	7.97	79.4	6.81	2.53	274.7	15.1	291	219	61	

02B-SBA: South Branch Ashuelot River, Swanzey (Upstream of Monadnock Regional High School)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:54	6.68	79.2	6.10	1.40	127.8	23.9	127		23	
07/21/2020	09:45	7.59	87.2	6.16	2.29	125.5	22.8	172		25	0.028
08/18/2020	09:30	8.18	90.7	6.02	1.37	130.3	20.4	108	133	21	0.012
09/15/2020	09:42	9.08	89.1	6.30	1.31	135.8	14.3	73	111	26	

02-SBA: South Branch Ashuelot River, Swanzey (Route 32 Bridge)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:25	6.76	79.7	5.99	1.67	131.3	23.6	187		21	
07/21/2020	09:17	7.22	84.6	6.12	2.07	129.5	22.8	112		24	0.018
08/18/2020	08:47	8.05	88.6	6.10	1.58	136.1	20.1	260	176	21	0.009
09/15/2020	09:06	8.54	83.1	6.11	1.07	142.1	14.4	131	156	26	

15A-ASH: Ashuelot River, West Swanzey (Thompson Covered Bridge)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:44	7.39	90.6	6.17	1.33	234.2	25.7	80		49	
07/21/2020	09:50	6.90	84.1	6.13	1.71	231.1	25.1	35		53	0.015
08/18/2020	09:24	8.20	91.7	6.46	1.14	277.8	21.2	35	46	57	0.016
09/15/2020	09:38	8.84	89.8	6.66	1.92	280.4	16.0	60	42	68	

07-ASH: Ashuelot River, Winchester (Route 119)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (MPN/100mL)	E. coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	09:08	7.04	86.0	6.07	1.04	196.1	25.5	157		41	
07/21/2020	09:04	5.20	62.3	6.22	1.45	194.8	24.5	66		44	0.015
08/18/2020	08:48	7.36	84.7	6.40	0.98	217.0	22.2	83	95	42	0.011
09/15/2020	09:03	8.75	89.4	6.49	0.91	205.4	16.6	91	79	57	

02-ASH: Ashuelot River, Hinsdale (Route 63) - NHDES Trend Station

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	Chloride (mg/L)
Standard		>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	230 ^B
02/10/2020	12:30	15.85	111.0	6.77	0.79	115.0	0.8	18
06/16/2020	11:45	8.61	95.3	7.29	1.17	150.4	20.3	37
07/14/2020	11:45	7.94	97.3	7.14	1.46	136.6	25.7	32
08/11/2020	11:45	7.38	91.3	7.25	0.28	185.1	26.2	48
09/17/2020	09:30							48
10/13/2020	12:00	10.19	94.2	7.29	1.75	168.1	11.8	33
11/17/2020	12:40	13.32	106.4	7.10	1.29	119.3	5.8	25
12/14/2020	11:15	13.04	96.7	6.72	1.15	104.2	2.8	21

Date	Time of Sample	Total Phosphorus (mg/L)	Total Kjeldahl Nitrogen (mg/L)	Nitrite (NO2) + Nitrate(NO3) (mg/L)	Total Nitrogen (mg/L)
Standard		Narrative	Narrative	Narrative	Narrative
02/10/2020	12:30	0.010	ND	0.15	0.28 ^C
06/16/2020	11:45	0.017	0.33	0.28	0.61 ^C
07/14/2020	11:45	0.025	0.31	0.14	0.45 ^C
08/11/2020	11:45	0.019	ND	0.15	0.28 ^C

01-ASH: Ashuelot River, Hinsdale (147 River Street)

Date	Time of Sample	DO (mg/L)	DO (% sat.)	pH	Turbidity (NTUs)	Specific Conductance (uS/cm)	Water Temp. (°C)	E. coli (CTS/100mL)	E.coli Geometric Mean	Chloride (mg/L)	Total Phosphorus (mg/L)
Standard	NA	>5.0	>75% Daily Average	6.5-8.0	<10 NTU above background	835 uS/cm ^A	NA	<406	<126	230 ^B	Narrative
06/23/2020	08:17	8.03	97.4	6.20	1.76	191.3	25.2	133		38	
07/21/2020	08:27	6.88	82.1	6.78	1.01	189.1	24.5	33		43	0.024
08/18/2020	08:15	8.04	91.3	6.91	0.75	210.6	22.1	30	51	43	0.020
09/15/2020	08:21	9.05	90.8	6.73	0.61	225.0	15.3	43	35	52	

