

WATER QUALITY CHARACTERISTICS OF BHELLA RIVER U/S KASHIPUR, US NAGAR

Month	pH	BOD mg/L	COD mg/L	Conductivity μ mhos/cm	Temp $^{\circ}$ C	DO mg/L	TDS mg/L
2024							
Jan	7.50	2.0	12.0	175	16	7.0	117
Feb	7.41	2.4	15.0	252	14	6.8	165
Mar	7.65	2.8	18.0	259	18	6.2	172
Apr	7.73	2.5	16.0	244	27	6.4	148
May	River Dry						
June							
July	7.01	2.1	12	264	27	6.4	162
Aug	7.11	2	12	306	28	6.5	186
Sept	7.19	1.8	13.6	327	27	7	195
Oct	7.26	2.2	12.8	369	25	6.4	221
Nov							
2023							
Jan	7.80	2.0	12.0	195	13	2.0	155
Feb	7.50	2.6	16	262	15	7.6	174
Mar	7.50	2.8	16.0	316	24	7.4	208
Apr	7.80	3.0	20.0	247	21	7.1	168
May	River Dry						
June	7.30	2.4	16.0	182	30	5.6	126
July	7.60	2.2	16.0	185	27	6.2	114
Aug	7.20	2.8	16.0	246	27	6.0	143
Sept	7.30	2.6	16.0	242	26	6.2	147
Oct	7.30	2.8	16.0	214	23	6.0	138
Nov	7.70	2.6	16.0	181	24	6.2	107
Dec							
2022							
Jan	7.7	3.2	12	190	8	5.3	127
Feb	7.70	3.4	16	200	22	5.2	134
Mar	7.60	3.9	14	280	25	5.1	182
Apr	7.50	3.4	12	286	28	5.3	190
May	7.60	3.1	11.4	208	28	5.4	140
June	River Dry						
July	River Dry						
Aug	River Dry						
Sept	7.50	3.0	17.2	155	26	6.5	102
Oct	7.50	3.0	13	215	24	6.4	140
Nov	7.70	3.4	13	197	12	5.6	131
Dec	7.50	2.8	13.0	182	16	5.7	120
2021							
Jan	7.90	8.0	30	540	12	3.0	348
Feb	8.0	3.0	10	240	17	7.50	172
Mar	7.90	3.20	16	280	23	7.0	186
Apr	River Dry						
May	7.20	23	108	612	21	1.4	434
June	7.40	18	94	628	24.20	1.80	420
July	7.40	12	40	300	27	2.60	205
Aug	7.30	11.10	39.50	304	31	2.90	203
Sep	7.6	12.4	37.2	298		3.0	199

Oct	7.4	12.5	39	310		3.2	205
Nov	7.3	13.8	41	320		3.5	214.4
Dec	7.20	11.4	34.20	300	27.5	3.8	201
2020							
Jan	7.3	4.0	30	290	8.0	8.4	188
Feb	7.41	5.0	40	330	31	6.0	177
Mar	8.1	4.6	40	270	31	3.2	270
Apr	7.2	3	8	290	33	7	190
May	7.3	3.2	36	158	39	5.2	104
June	7.7	5.2	28	260	35	3.8	175
July	7.6	5	27	440	28	3.2	295
Aug	7.92	5.0	15	326	29	6.9	166
Sep	7.30	4.0	10	180	29	5.8	160
Oct	7.10	7.2	22	260	26	4.6	166
Nov	7.0	7.3	25	286	18	4.3	188
Dec	7.2	7.9	27	265	12	4.1	198
Average	7.43	5.12	25.67	279.58	26.58	5.21	189.75
Min-Max	(7-8.1)	(3-7.9)	(8-40)	(158-440)	(8-39)	(3.2-8.4)	(104-295)
2019							
Jan	7.10	2.0	6.20	240	12	7.20	158
Feb	7.4	1.5	5.8	251	14	6.2	136
Mar	7.8	1.8	30	430	20	3.2	320
Apr	7.3	2.0	6.2	212	28	4.8	159
May	River Dry						
June	7.5	3	28	540	38	4	177
July	River Dry						
Aug	7.3	6.6	30	260	30	4.4	129
Sep	6.9	4.2	40	156	30	5.2	102
Oct	7.30	5.0	30.0	227	32	5.2	148
Nov	7.30	4.0	40	173	24	3.8	116
Dec	7.2	6.0	20	189	12	4.6	173
Average	7.31	3.61	23.62	267.80	24.00	4.86	161.80
Min-Max	(6.9-7.8)	(1.5-6.6)	(5.8-40)	(156-540)	(12-38)	(3.2-7.2)	(102-320)
2018							
Jan	7.2	6	20	240	18	6.2	162
Feb	7.2	4	14	280	20.8	5.8	187
Mar	7.2	4.2	16	320	25	6.2	210
Apr	7.3	6	20	240	28.3	7	168
May	River Dry						
June	River Dry						
July	7.2	3.4	10	220	28	6	140
Aug	7.2	4	16	210	26	7.2	138
Sep	7.1	6	18	220	26	7.2	152
Oct	7.3	4	8.2	210	25	6.6	139
Nov	7.3	6.2	16	240	22	5.8	166
Dec	7.1	3.2	8	220	17	6.8	146
Average	7.21	4.7	14.62	240	23.61	6.48	160.8
Min-Max	(7.1-7.3)	(4-6.2)	(8-20)	(210-320)	(17-28.3)	(5.8-7.2)	(139-210)

**WATER QUALITY CHARACTERISTICS OF BHELLA RIVER AT LOHIA BRIDGE D/S
KASHIPUR, US NAGAR**

Month	pH	BOD mg/L	COD mg/L	Conductivity µmhos/cm	Temp °C	DO mg/L	TDS mg/L
2024							
Jan	7.20	16.0	120.0	270	16	2.8	164
Feb	6.85	17.0	104.0	324	19	2.8	215
Mar	6.93	16.0	96.0	456	21	3.0	305
Apr	6.37	18.0	104.0	522	30	2.2	315
May	6.52	24.0	160.0	948	32	1.4	634
June	6.61	28.0	192.0	828	36	1.2	498
July	6.95	22	128	642	33	2.2	385
Aug	6.3	24	140	668	31	2.1	397
Sep	6.78	22	120	644	31	2.2	384
Oct	6.56	24	136	622	30	1.5	375
Nov							
2023							
Jan	7.70	18.0	128.0	350	13	3.0	260
Feb	6.80	28.0	224.0	469	18	1.8	311
Mar	6.70	26.0	176.0	636	23	1.9	431
Apr	7.40	28.0	184.0	598	22	1.7	368
May	7.20	26.0	176.0	416	27	1.8	288
June	7.60	24.0	144.0	588	32	1.8	382
July	7.20	14.0	80.0	371	30	4.2	245
Aug	7.20	12.0	76.0	216	29	4.4	131
Sept	7.10	12.0	80.0	269	32	4.2	166
Oct	7.00	14.0	96.0	305	27	3.9	206
Nov	6.80	20.0	128.0	254	24	3.0	166
Dec							
2022							
Jan	7.7	15.5	100	400	8	3.6	263
Feb	7.60	12	105.6	420	22	3.8	281
Mar	7.80	17	120	510	25	2.1	328
Apr	7.60	16	112	504	28	2.4	340
May	7.30	18	120	467	28	2.2	313
June	7.00	22	168	600	28	1.5	402
July	7.20	20	150	586	28	1.8	392
Aug	7.00	60	194	415	31	1.4	275
Sept	7.40	50	136	239	25	1.0	158
Oct	7.50	48	140	302	26	2.8	199
Nov	7.20	23	140	547	20	2.1	363
Dec	7.20	25.0	160.0	437	18	2.6	290
2021							
Jan	6.90	28	160	690	14	0.80	437
Feb	6.90	24	96	630	21	1.40	412
Mar	6.50	26	104	650	24	1.20	434
Apr	6.80	27	119	695	23	1.10	479
May	6.80	29	131	695	21	1.10	467
June	6.60	26	117	682	24	1.40	456
July	6.90	28	210	770	27	1.10	526
Aug	6.80	26.50	202	795	33	1.50	532
Sep	6.9	24	192	803		1.9	538

Oct	6.5	26	210	810		1.9	549
Nov	6.8	25	196	801		2.0	536.67
Dec	6.80	20	176	858	27.5	2.8	574
2020							
Jan	7.6	22	70	576	8.0	1.6	374
Feb	7.5	24	80	580	30	4.0	335
Mar	7.3	28	160	600	30	0.2	356
Apr	6.6	22	140	620	33	0.6	373
May	6.8	22	120	347	39	1.0	246
June	6.2	26	160	570	36	0.4	385
July	7.2	19.5	130	330	29	1.0	225
Aug	7.44	20	80	435	30	2.6	292
Sep	7.32	18	74	430	30	2.5	294
Oct	6.80	19.5	56	690	32	1.8	470
Nov	6.7	20	85	650	19	1.5	472
Dec	6.9	26	86	670	19	1.3	500
Average	7.03	22.25	103.42	541.50	27.92	1.54	360.17
Min-Max	(6.2-7.6)	(18-28)	(56-160)	(330-690)	(8-39)	(0.2-4)	(225-500)
2019							
Jan	6.80	48	120	570	13	0.80	367
Feb	7.3	42	102	556	13	0.4	334
Mar	6.3	5.6	160	750	21	0.2	510
Apr	7.5	42	110	540	28	0	349
May	6.8	44	120	560	36	0.2	398
June	7.3	20	60	660	38	0.2	422
July	7.1	40	130	360	30	0	234
Aug	6.9	48	140	320	30	0.0	155
Sep	6.8	52	190	244	30	0.80	159
Oct	7.30	44	90	489	29	0.60	318
Nov	7.10	20	100	516	27	0.70	346
Dec	7.4	20	60	288	12	3.0	193
Average	7.05	35.47	115.17	487.75	25.58	0.58	315.42
Min-Max	(6.3-7.5)	(5.6-52)	(60-190)	(244-750)	(12-38)	(0-3)	(155-510)
2018							
Jan	7.4	18	48	440	20	1.2	291
Feb	7.4	44	108	460	20.2	2.2	301
Mar	7.5	38	128	580	26.2	1.2	381
Apr	7.68	40	156	690	26	1.2	454
May	7.9	52	168	700	30	0.8	462
June	7.8	48	150	660	32	1.2	428
July	6.8	32	88	590	29	0.8	387
Aug	6.9	34	98	560	29	1.8	362
Sep	6.8	40	140	540	28	1.6	374
Oct	7.5	48	110	510	27	0	332
Nov	7.6	26	88	520	23	2.6	336
Dec	6.8	44	110	370	20	0.4	240
Average	7.32	39.5	117.66	558.33	25.78	1.1	366.66
Min-Max	(6.8-7.9)	(18-52)	(48-168)	(370-700)	(20-32)	(0-2.6)	(240-462)