



**Mongaup River Watershed
(0204010401)**

Water Index Number

- D-10 (portion 1)
- D-10 (portion 2)/P79a
- D-10 (portion 3)
- D-10 (portion 4)/P96a
- D-10 (portion 5)/P108a
- D-10 (portion 6)
- D-10 (portion 7)
- D-10- 5
- D-10- 5-5-P78
- D-10- 5-P79
- D-10- 8-P81
- D-10-10-P82

Waterbody Segment

- Mongaup River, Lower, and minor tribs (1401-0003)
- Rio Reservoir (1401-0074)
- Mongaup River, Middle, and minor tribs(1401-0025)
- Mongaup Falls Reservoir (1401-0075)
- Swinging Bridge Reservoir (1401-0002)
- Mongaup River, Upper, and tribs (1401-0026)
- East Branch Mongaup River (1401-0142)
- Bush Kill and tribs (1401-0027)
- Echo Lake (1401-0028)
- Hemlock Lake (1401-0029)
- Lake Metauque (1401-0030)
- Burnt Lake (1401-0031)

Category

- MinorImpacts
- UnAssessed
- MinorImpacts
- UnAssessed
- MinorImpacts
- MinorImpacts
- NoKnownImpact
- UnAssessed
- UnAssessed
- UnAssessed
- UnAssessed
- UnAssessed

D-10-11	Black Brook and minor tribs (1401-0032)	NoKnownImpct
D-10-11- 1-P83,P84	Forestburg, Trout Ponds (1401-0033)	UnAssessed
D-10-11- 2-P89,P89a,P90	Forest Glen, McAuleys, Shilling Lakes (1401-0035)	UnAssessed
D-10-11- 2-P92	Ruddick Pond (1401-0036)	UnAssessed
D-10-11- 2-P92-1-P??	Wildwood Lake (1401-0037)	UnAssessed
D-10-11- 3-P94	Merriewold Lake (1401-0038)	UnAssessed
D-10-11-P96	Saint Josephs Lake (1401-0039)	Need Verific
D-10-14-P98	Lebanon Lake (1401-0041)	UnAssessed
D-10-14-P98-	Lebanon Lake Tributaries (1401-0042)	UnAssessed
D-10-14-P98-4-P99	Hull Pond (1401-0043)	UnAssessed
D-10-15	Black Lake Creek (1401-0044)	UnAssessed
D-10-15-P100	Cliff Lake (1401-0045)	UnAssessed
D-10-15-P100a	Toronto Reservoir (1401-0046)	UnAssessed
D-10-15-P100a-	Toronto Reservoir Tributaries (1401-0047)	UnAssessed
D-10-15-P100a-4-P101	Toronto/Iroquois Lake (1401-0048)	UnAssessed
D-10-15-P100a-5-P102	Indian Field Pond (1401-0049)	UnAssessed
D-10-15-P103,P103a	Black/Little Black Lakes (1401-0050)	UnAssessed
D-10-15-P103-1-P104	Lake Superior (1401-0051)	Need Verific
D-10-15-P103-1-P104-1-P105	Mallory Pond (1401-0052)	UnAssessed
D-10-15-P103-1-P104-2-P106	Chestnut Ridge Pond (1401-0053)	UnAssessed
D-10-15-P103-2-2-P107a	Filippini Pond (1401-0054)	UnAssessed
D-10-15-P103-2-P108	Silver/Pleasant Lake (1401-0055)	UnAssessed
D-10-16 thru 19 (selected)	Swinging Bridge Reservoir Tributaries (1401-0073)	UnAssessed
D-10-16-P111/P109	Sackett/Birchwood Lakes (1401-0056)	UnAssessed
D-10-18	White Lake Brook and tribs (1401-0057)	MinorImpacts
D-10-18-P114	Mountain Lake (1401-0058)	UnAssessed
D-10-18-P115,P116	Bishops/Horseshoe Lakes (1401-0059)	UnAssessed
D-10-18-P117,P118	White/Amber Lakes (1401-0018)	Need Verific
D-10-20	Kinne Brook and tribs (1401-0060)	NoKnownImpct
D-10-22	West Branch Mongaup and tribs (1401-0061)	NoKnownImpct
D-10-22-P127a,P127b	Woods/Pauls Ponds (1401-0062)	UnAssessed
D-10-22-P128	Swan Lake (1401-0063)	Need Verific
D-10-22-P128-	Tribs to Swan Lake (1401-0064)	UnAssessed
D-10-22-P133	Lake Marie (1401-0065)	UnAssessed
D-10-25	Middle Branch Mongaup, Lower, and tribs(1401-0066)	NoKnownImpct
D-10-25	Middle Branch Mongaup, Upper, and tribs (1401-0067)	UnAssessed
D-10-29	Hurleyville Creek and tribs (1401-0143)	UnAssessed
D-10-29-P154a	Luzon Lake (1401-0069)	UnAssessed
D-10-29-P155	Hilldale Pond (1401-0070)	UnAssessed
D-10-29-P156 thru P160	Minor Lake Tribs to Middle Branch (1401-0071)	UnAssessed
D-10-29-P158-	Trout Brook/Tribs to Grossingers Lake (1401-0072)	UnAssessed

Mongaup River, Lower, and minor tribs (1401-0003)

MinorImpacts

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10 (portion 1)	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B(T)
Waterbody Type:	River	Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	13.9 Miles (Low Flow)	Quad Map:	POND EDDY (P-21-2)
Seg Description:	stream and selected tribs from mouth to Rio Reservoir		

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Stressed	Known
Habitat/Hydrology	Stressed	Known

Type of Pollutant(s)

Known: WATER LEVEL/FLOW
 Suspected: Thermal Changes
 Possible: - - -

Source(s) of Pollutant(s)

Known: HYDRO MODIFICATION, Power Generation
 Suspected: - - -
 Possible: - - -

Resolution/Management Information

Issue Resolvability:	3 (Strategy Being Implemented)	
Verification Status:	5 (Management Strategy has been Developed)	
Lead Agency/Office:	DEC/FERC	Resolution Potential: Medium
TMDL/303d Status:	(TMDL Not Required (No Impairment))	

Further Details

Aquatic life support and habitat in this portion of the Mongaup River is considered stressed due to fluctuating water levels and temperatures resulting from upstream reservoir releases.

Low flows in the river had been a previous cited problem. However releases to maintain a minimum flow rate was the subject of negotiations between DEC and FERC and an agreement was reached in 19???. Monitoring of flow rates, water temperature and dissolved oxygen to evaluate the effectiveness of the plan is continuing. (DEC/FWWR, Region 3, April 2001)

A biological (macroinvertebrate) assessment of the Mongaup River in Mongaup was conducted in 1999, however the results were spurious and indeterminate. Due to high flow releases from the Mongaup Reservoir at the time of this sampling, the kick sample was only 1 meter from the streambank. The resulting sample was heavily dominated by worms, indicating severe impact. However these results are considered spurious, and not representative of actual water quality. Previous sampling on the river (under more suitable conditions) has indicated non-impacted water quality conditions; although the fluctuating water levels, flows and temperatures have obvious effect on the aquatic life. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the portion of the Mongaup River and selected/smaller tribs from the mouth to Rio Reservoir.

The waters of this portion of the river are Class B(T). Tribs to this reach are primarily Class C(T) with some waters designated and D. Bush Kill (-5) is listed separately. (December 2000)

Mongaup River, Middle, and minor tribs (1401-0025)

MinorImpacts

Waterbody Location Information

Revised: 07/08/02

Water Index No: D-10 (portion 3) **Drain Basin:** Delaware River
Hydro Unit Code: 02040104/030 **Str Class:** B(T) **Reg/County:** Mid Delaware-Mongaup
Waterbody Type: River **Reg/County:** 3/Sullivan Co. (53)
Waterbody Size: 20.5 Miles (Low Flow) **Quad Map:** HIGHLAND LAKE (O-21-3)
Seg Description: stream and selected tribs btw Rio and Swinging Br Res.

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Stressed	Known
Habitat/Hydrology	Stressed	Known

Type of Pollutant(s)

Known: WATER LEVEL/FLOW
Suspected: D.O./Oxygen Demand, Thermal Changes
Possible: - - -

Source(s) of Pollutant(s)

Known: HYDRO MODIFICATION, Power Generation
Suspected: - - -
Possible: - - -

Resolution/Management Information

Issue Resolvability: 1 (Needs Verification/Study (see STATUS))
Verification Status: 4 (Source Identified, Strategy Needed)
Lead Agency/Office: DEC/FERC
TMDL/303d Status: (TMDL Not Required (No Impairment))

Resolution Potential: Medium

Further Details

Aquatic life support and habitat in this portion of the Mongaup River is considered stressed due to fluctuating water levels, the result of upstream hydropower reservoir releases. These releases affect dissolved oxygen and water temperatures in the river.

Monitoring reveals periods of low dissolved oxygen in hydro discharges to the river due to the withdrawals from stratified, oxygen-poor upstream Swinging Bridge and Mongaup Falls Reservoirs. These discharges impact water quality and hydrologic conditions in the river segments and negatively affect aquatic life. (DEC/FWMR, April 2001)

The reach of the river below Swinging Bridge Reservoir is a wintering and nesting area for bald eagles, and has been a NYS DEC priority for land acquisition. Potential water quality and habitat threats from proposed development of 500 lots and a golf course are also an issue. (DEC/DOW, Region 3, April 2001)

This segment includes the portion of the river and selected/smaller tribs from the Rio Reservoir to Swinging Bridge Reservoir. The waters of this portion of the river are Class B(T). Tribs to this reach, including Lake Metauque Outlet (-8), Burnt Lake Outlet (-10), Long Falls Brook (-12) and Lebanon Lake Outlet (-14), are primarily Class B, B(T) with some waters designated Class C(T). Black Brook (-11), Rio Reservoir, Mongaup Falls Reservoir and Swinging Bridge Reservoir, as well as larger lakes are listed separately. (December 2000)

Swinging Bridge Reservoir (1401-0002)

Minor Impacts

Waterbody Location Information

Revised: 11/07/02

Water Index No:	D-10 (portion 5)/P108a	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	Lake(R)	Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	857.7 Acres ()	Quad Map:	HIGHLAND LAKE (O-21-3)
Seg Description:	entire lake		

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Recreation	Stressed	Known

Type of Pollutant(s)

Known: ---
Suspected: NUTRIENTS (phosphorus)
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: AGRICULTURE
Possible: Municipal

Resolution/Management Information

Issue Resolvability:	1 (Needs Verification/Study (see STATUS))	
Verification Status:	4 (Source Identified, Strategy Needed)	
Lead Agency/Office:	ext/WQCC	Resolution Potential: Medium
TMDL/303d Status:	3 (Waters Requiring Re-Assessment Based on New Methodology)	

Further Details

Recreational uses in Swinging Bridge Reservoir are considered to be stressed due to slightly elevated nutrient levels, algal growth and decreased water clarity. Hydrologic impacts, the result of hydropower generation, are also an issue.

Swinging Bridge Reservoir was included in the 2000 Lake Classification and Inventory monitoring effort. Results revealed slightly elevated nutrient and algae levels, seasonally decreasing water clarity (though never reduced to a point where bathing is impaired). Phosphorus levels slightly exceeded state guidance values for recreational uses. Aquatic plant/weed growth does not appear to restrict lake usage. (DEC/DOW, BWM/Lake Services, August 2001)

Impacts from municipal discharges and chicken and duck farms were known to be a problem in the 1970s. The USEPA National Eutrophication Survey classified the reservoir as hypereutrophic back then. Municipal facilities have since been upgraded to secondary treatment with additional phosphorus removal. (DEC/DOW, Region 3, April 2001)

Based on previous history regarding water quality problems in the reservoir, regional staff recommend regular evaluation of the lake to determine if long-term trends indicate subsiding of problems or if improved conditions are artifacts of weather, other temporary conditions. (DEC/DOW, Region 3, October 2002)

The reservoir is included on the NYS 2002 Section 303(d) List of Impaired Waters. The reservoir was included on Part 3 of the List as a Water Requiring Verification of Problems; its listing based on historic water quality problems and a

lack of more current data. Waters of the Delaware River Basin are scheduled to be re-assessed before the 2006 Section 303(d) List is published. This will allow an opportunity to better evaluate the appropriateness of the continued listing of the reservoir. (DEC/DOW, BWAR and BWM, October 2002)

Fluctuating water levels in the reservoir to support hydropower generation have also become an issue. Water level changes of up to 20 feet can occur. Complaints from the public regarding balancing these conflicting uses have been heard recently.

Mongaup River, Upper, and tribs (1401-0026)

MinorImpacts

Waterbody Location Information

Revised: 09/17/02

Water Index No: D-10 (portion 6) **Drain Basin:** Delaware River
Hydro Unit Code: 02040104/030 **Str Class:** B **Reg/County:** Mid Delaware-Mongaup
Waterbody Type: River **Quad Map:** WHITE LAKE (O-21-2)
Waterbody Size: 15.0 Miles (Low Flow)
Seg Description: stream and selected tribs abv Swinging Bridge Reservoir

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Stressed	Suspected

Type of Pollutant(s)

Known: ---
Suspected: ACID/BASE (PH)
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ATMOSPH. DEPOSITION
Possible: ---

Resolution/Management Information

Issue Resolvability: 1 (Needs Verification/Study (see STATUS))
Verification Status: 4 (Source Identified, Strategy Needed)
Lead Agency/Office: ext/EPA
TMDL/303d Status: n/a ()

Resolution Potential: Low

Further Details

Aquatic life support in this reach of the Mongaup River is considered stressed due to occurrences of low pH. Atmospheric deposition (acid rain) is the likely source.

Biological (macroinvertebrate) assessments of the Mongaup River in Mongaup Valley were conducted in 1999 and 2000. Sampling results for both years indicated non-impacted water quality conditions. Impact Source Determination showed high similarities to natural communities and to communities affected by nonpoint source nutrient enrichment. A biological assessment of the river was also conducted below Harris. Field sampling at this site indicated non-impacted water quality conditions. The sample satisfied field screening criteria and was returned to the stream. (DEC/DOW, BWAR/SBU, June 2002)

NYSDEC Rotating Intensive Basin Studies (RIBS) Intensive Network monitoring of the Mongaup River in Mongaup Valley (at Route 17B) was conducted in 2000. Chemical sampling of the river identified some occurrences of low pH. Overall water quality at this site is considered to be fully supporting of uses. (DEC/DOW, BWAR/RIBS, January 2001)

This segment includes the portion of the river and selected/smaller tribs from Swinging Bridge Reservoir near Mongaup Valley to near Harris/Bushville at the confluence of the Middle Branch (-25) and East Mongaup River. The waters of this portion of the river are Class B. Tribs to this reach, including Creamery Brook (-21) and Frasers Brook (-23) are

primarily Class C(T) with some waters designated Class C(TS) and D. West Branch Mongaup River (-22), Middle Branch Mongaup River (-25) and East Branch Mongaup River, as well as larger lakes in the watershed are listed separately. (December 2000)

East Branch Mongaup River (1401-0142)

NoKnownImpct

Waterbody Location Information

Revised: 11/05/02

Water Index No: D-10 (portion 7) **Drain Basin:** Delaware River
Hydro Unit Code: 02040104/030 **Str Class:** B **Reg/County:** 3/Sullivan Co. (53)
Waterbody Type: River **Quad Map:** MONTICELLO (O-22-1) ...
Waterbody Size: 25.0 Miles (Low Flow)
Seg Description: stream and selected tribs Middle Branch Mongaup River

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted
NO USE IMPAIRMENT

Severity

Problem Documentation

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Resolution/Management Information

Issue Resolvability: 8 (No Known Use Impairment)
Verification Status: (Not Applicable for Selected RESOLVABILITY)
Lead Agency/Office: n/a
TMDL/303d Status: n/a ()

Resolution Potential:

Further Details

A biological (macroinvertebrate) assessment of the Mongaup River below Harris/Bushville just below this reach in was conducted in 1999. Field sampling at this site indicated non-impacted water quality conditions. The sample satisfied field screening criteria and was returned to the stream. Although this site was located just below the described reach, the sampling results are considered reflective of conditions in this segment. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the entire stream and selected/smaller tribs above its mouth at the Middle Branch Mongaup River (-25) near Harris/Bushville. The waters of this portion of the river are Class B. Tribs to this reach, including Spring Brook (-27), are primarily Class C(T) with some waters designated Class C(TS) and D. Middle Branch Mongaup River (-25) and Hurleyville Creek (-29), as well as larger lakes in the watershed are listed separately. (December 2000)

Black Brook and minor tribs (1401-0032)

NoKnownImpct

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10-11	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B(T)
Waterbody Type:	River	Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	30.5 Miles (Low Flow)	Quad Map:	HIGHLAND LAKE (O-21-3)
Seg Description:	entire stream and selected/smaller tribs		

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted
NO USE IMPAIRMENT

Severity

Problem Documentation

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Resolution/Management Information

Issue Resolvability: 8 (No Known Use Impairment)
Verification Status: (Not Applicable for Selected RESOLVABILITY)
Lead Agency/Office: n/a
TMDL/303d Status: n/a ()

Resolution Potential:

Further Details

A biological (macroinvertebrate) assessment of Black Brook below Fowlerville at the mouth was conducted in 1999. Field sampling results indicated non-impacted water quality conditions. The sample satisfied field screening criteria and was returned to the stream. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the entire stream and selected/smaller tribs. The waters of the stream are Class B(T). Tribs to this reach, including Ruddick Brook (-2), are primarily Class B, B(T) with some waters designated Class C. (December 2000)

Saint Josephs Lake (1401-0039)

Need Verific

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10-11-P96	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	Lake	Reg/County:	Mid Delaware-Mongaup
Waterbody Size:	236.7 Acres (Unknown Trophic)	Quad Map:	3/Sullivan Co. (53)
Seg Description:	entire lake		HARTWOOD (O-22-4)

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Recreation	Stressed	Possible

Type of Pollutant(s)

Known: ---
Suspected: NUTRIENTS (phosphorus), Algal/Weed Growth
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: FAILING ON-SITE SYST

Resolution/Management Information

Issue Resolvability:	1 (Needs Verification/Study (see STATUS))	
Verification Status:	1 (Waterbody Nominated, Problem Not Verified)	
Lead Agency/Office:	DEC/BWM	Resolution Potential: Medium
TMDL/303d Status:	n/a ()	

Further Details

Recreational uses of Saint Josephs Lake may be impacted by elevated nutrient levels and algal growth.

USEPA data from the EMAP Program includes a single data point collected on the lake in 1992. This result shows elevated nutrient and algal levels. The phosphorus value was well above the state guidance value for recreational use. Additional data is necessary to assess the representativeness of this single sample. (DEC/DOW, Lakes Services, June 2001)

Lake Superior (1401-0051)

Need Verific

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10-15-P103-1-P104	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	Lake	Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	179.1 Acres (Eutrophic)	Quad Map:	WHITE LAKE (O-21-2)
Seg Description:	entire lake		

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Recreation	Stressed	Possible

Type of Pollutant(s)

Known: ---
Suspected: NUTRIENTS (phosphorus)
Possible: Algal/Weed Growth

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: FAILING ON-SITE SYST

Resolution/Management Information

Issue Resolvability:	1 (Needs Verification/Study (see STATUS))	
Verification Status:	1 (Waterbody Nominated, Problem Not Verified)	
Lead Agency/Office:	DEC/BWM	Resolution Potential: Medium
TMDL/303d Status:	n/a ()	

Further Details

Recreational uses of Lake Superior may be affected by elevated nutrient levels and reduced water clarity.

Historical (1988) Lake Classification and Inventory monitoring data show elevated phosphorus and chlorophyll a levels and reduced water clarity. Phosphorus levels exceeded the state guidance value for recreational uses during each of the four sampling events conducted in 1988. Due to the lack of any more recent data, water quality conditions in the lake should be verified. (DEC/DOW, BWM/Lake Services, August 2000)

White Lake Brook and tribs (1401-0057)

MinorImpacts

Waterbody Location Information

Revised: 11/04/02

Water Index No:	D-10-18	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	River	Reg/County:	Mid Delaware-Mongaup
Waterbody Size:	23.4 Miles (Low Flow)	Quad Map:	3/Sullivan Co. (53)
Seg Description:	entire stream and tribs		WHITE LAKE (O-21-2)

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Stressed	Suspected

Type of Pollutant(s)

Known: ---
Suspected: NUTRIENTS (phosphorus)
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: URBAN RUNOFF
Possible: Failing On-Site Syst (Smallwood)

Resolution/Management Information

Issue Resolvability:	1 (Needs Verification/Study (see STATUS))	
Verification Status:	2 (Problem Verified, Cause Unknown)	
Lead Agency/Office:	DOW/Reg3	Resolution Potential: Medium
TMDL/303d Status:	(TMDL Not Required (No Impairment))	

Further Details

Aquatic Life support in White Lake Brook is thought to be stressed due to water quality impacts noted during biological sampling of the stream and tributaries. Various nonpoint sources are the most likely cause of the impacts.

A biological (macroinvertebrate) assessment of White Lake Brook below Smallwood was conducted in 1999. Sampling results indicated slightly impacted water quality conditions. Caddisflies dominated the sample. A biological assessment of Judson Brook, a trib to White Lake Brook was also conducted in 1999 and assessed as moderately impacted. Facultative and tolerant midges dominated the fauna, and clean-water mayflies were absent. Impact Source Determination denoted toxicity as the primary factor affecting the stream. The combination of these two separate sampling results in an assessment of stressed use. (DEC/DOW, BWAR/SBU, June 2000)

Regional staff have expressed some concerns regarding the impact of on-site septic systems in Smallwood. (DEC/DOW, Region 3, October 2002)

This segment includes the entire stream and all tribs. The waters of the entire stream are Class B. Tribs to this reach, including Lybolt/Phillips Brook (-1) and Judson Brook (-4), are primarily Class B, B(T) with some waters designated Class B(TS). White Lake, as well as other larger lakes in the watershed are listed separately. (December 2000)

White/Amber Lakes (1401-0018)

Need Verific

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10-18-P117,P118	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	Lake	Reg/County:	Mid Delaware-Mongaup
Waterbody Size:	281.6 Acres ()	Quad Map:	3/Sullivan Co. (53)
Seg Description:	total area of both lakes		WHITE LAKE (O-21-2)

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Threatened	Suspected
Recreation	Threatened	Suspected

Type of Pollutant(s)

Known: ---
Suspected: D.O./OXYGEN DEMAND
Possible: Problem Species (Eurasian milfoil)

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: UNKNOWN SOURCE, Urban Runoff

Resolution/Management Information

Issue Resolvability: 1 (Needs Verification/Study (see STATUS))

Verification Status: 3 (Cause Identified, Source Unknown)

Lead Agency/Office: ext/WQCC

Resolution Potential: Medium

TMDL/303d Status: (TMDL Not Required (No Impairment))

Further Details

Aquatic life support and recreational uses in White Lake are thought to be threatened by low dissolved oxygen in portions of the lake. Invasive/exotic aquatic plants also pose a threat to uses. Amber Lake has not been studied and should be considered unassessed.

White Lake was included in the 2000 Lake Classification and Inventory monitoring effort. Results of this study found low surface and hypolimnetic nutrient levels, low algal growth and moderately high water clarity. However, dissolved oxygen levels were found to be hypoxic by mid-summer below 7 meters, and anoxic below 10 meters. Although these results represent a violation of standards, a small zone of low temperature and high D.O. (between 5 and 8 meters) may be adequate to support salmonids. It is likely, however, that this zone may disappear at times. Aquatic plant growth does not appear to restrict lake usage, although the presence of some Eurasian milfoil was noted. Additional evaluation to determine whether milfoil beds are expanding are recommended. (DEC/DOW, BWM/Lake Services, April 2001)

Kinne Brook and tribs (1401-0060)

NoKnownImpct

Waterbody Location Information

Revised: 07/08/02

Water Index No:	D-10-20	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B
Waterbody Type:	River	Reg/County:	Mid Delaware-Mongaup
Waterbody Size:	25.8 Miles (Low Flow)	Quad Map:	3/Sullivan Co. (53)
Seg Description:	entire stream and tribs		WHITE LAKE (O-21-2)

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
NO USE IMPAIRMENT		

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Resolution/Management Information

Issue Resolvability: 8 (No Known Use Impairment)
Verification Status: (Not Applicable for Selected RESOLVABILITY)
Lead Agency/Office: n/a
TMDL/303d Status: n/a ()

Resolution Potential:

Further Details

A biological (macroinvertebrate) assessment of Kinne Brook at the mouth was conducted in 1999. Field sampling results indicated non-impacted water quality conditions. The sample satisfied field screening criteria and was returned to the stream. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the entire stream and all tribs. The waters of the stream are Class B(T) from the mouth to trib -1 and Class B for the remainder of the reach. All tribs to this reach are Class B. (December 2000)

West Branch Mongaup and tribs (1401-0061)

NoKnownImpct

Waterbody Location Information

Revised: 09/17/02

Water Index No:	D-10-22	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030	Str Class:	B(T)
Waterbody Type:	River	Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	26.7 Miles (Low Flow)	Quad Map:	WHITE LAKE (O-21-2)
Seg Description:	entire stream and tribs		

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
NO USE IMPAIRMENT		

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Resolution/Management Information

Issue Resolvability: 8 (No Known Use Impairment)
Verification Status: (Not Applicable for Selected RESOLVABILITY)
Lead Agency/Office: n/a
TMDL/303d Status: n/a ()

Resolution Potential:

Further Details

A biological (macroinvertebrate) survey of the West Branch Mongaup River at multiple sites along its entire length from the mouth to Swan Lake was conducted in 2000. Water quality at three of five sites was found to be non-impacted. Moderate impacts were found at the most upstream site, but these impacts were influenced in part by natural impoundment effects as the site was located only 0.6 mile below the Swan Lake outflow. Impact Source Determination also suggests possible organic and nutrient contributions from the Town of Liberty/Swan Lake WWTP discharge. Slight water quality impacts were found just below the Bethel Landfill. The influence of the landfill appears to extend no more than 0.5 mile downstream. Below this reach the West Branch was assessed as having excellent water quality. Despite the minor impacts along short portions of the stream noted above, overall water quality of the West Branch Mongaup River is good and is considered to fully support aquatic life and other uses. (West Branch Mongaup River Biological Assessment Report, Bode, et al., DEC/DOW, RIBS/SBU, May 2001)

A biological (macroinvertebrate) assessment of the West Branch Mongaup River near Mongaup Valley was conducted in 1999. Field sampling results indicated non-impacted water quality conditions at the site. The sample satisfied field screening criteria and was returned to the stream. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the entire river and all tribs from the mouth to Swan Lake. The waters of this portion of the river are Class B(T) from the mouth to trib -4 and Class B for the short remainder of the reach. Tribs to this reach, including Beaverdam Brook (-1) and Miller Brook (-3), are primarily Class B(T) with some waters designated Class B

and C,C(TS). Larger lakes in the watershed are listed separately. (December 2000)

Swan Lake (1401-0063)

Need Verific

Waterbody Location Information

Revised: 11/04/02

Water Index No:	D-10-22-P128	Str Class:	B	Drain Basin:	Delaware River
Hydro Unit Code:	02040104/030				Mid Delaware-Mongaup
Waterbody Type:	Lake			Reg/County:	3/Sullivan Co. (53)
Waterbody Size:	332.8 Acres ()			Quad Map:	LIBERTY WEST (N-21-3)
Seg Description:	entire lake				

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted	Severity	Problem Documentation
Aquatic Life	Stressed	Possible
Recreation	Stressed	Possible

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: D.O./OXYGEN DEMAND, NUTRIENTS (phosphorus)

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: MUNICIPAL (Loomis WWTP), Urban Runoff

Resolution/Management Information

Issue Resolvability:	1 (Needs Verification/Study (see STATUS))	
Verification Status:	1 (Waterbody Nominated, Problem Not Verified)	
Lead Agency/Office:	DEC/BWM	Resolution Potential: Medium
TMDL/303d Status:	n/a ()	

Further Details

Aquatic life support and recreational uses of Swan Lake may be restricted by eutrophic conditions. USEPA lake assessments in the 1970s found the lake to be eutrophic. The Loomis WWTP discharges to the lake and is a source of nutrient (phosphorus) load. The plant was originally required to implement phosphorus removal in its permit. But the town requested a waiver and, following a water quality review, this requirement was dropped. (DEC/DOW, Region 3, April 1999)

Middle Branch Mongaup, Lower, and tribs (1401-0066) NoKnownImpct

Waterbody Location Information

Revised: 07/08/02

Water Index No: D-10-25
Hydro Unit Code: 02040104/030 **Str Class:** B(T)
Waterbody Type: River
Waterbody Size: 10.0 Miles (Low Flow)
Seg Description: stream and tribs from mouth to Ferndale

Drain Basin: Delaware River
Reg/County: 3/Sullivan Co. (53)
Quad Map: MONTICELLO (O-22-1)

Water Quality Problem/Issue Information

(CAPS indicate MAJOR Use Impacts/Pollutants/Sources)

Use(s) Impacted
NO USE IMPAIRMENT

Severity

Problem Documentation

Type of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Source(s) of Pollutant(s)

Known: ---
Suspected: ---
Possible: ---

Resolution/Management Information

Issue Resolvability: 8 (No Known Use Impairment)
Verification Status: (Not Applicable for Selected RESOLVABILITY)
Lead Agency/Office: n/a
TMDL/303d Status: n/a ()

Resolution Potential:

Further Details

A biological (macroinvertebrate) assessment of the Mongaup River, Middle Branch near Bushville was conducted in 1999. Field sampling results indicated non-impacted water quality conditions at the site. The sample satisfied field screening criteria and was returned to the stream. (DEC/DOW, BWAR/SBU, June 2002)

This segment includes the portion of the river and all tribs from the mouth to trib -3 near Ferndale. The waters of this portion of the river are Class B(T). Tribs to this reach are Class B. (December 2000)