

2018 Water Quality Re-Classification Proposals

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MAINE DEPARTMENT OF ENVIRONMENTAL PROTECTION

Protecting Maine's Air, Land and Water

Presentation

- Overview of re-classification process
- Proposals



Webb Lake, Weld Photo weld-maine.org

Process to Date

- Received proposals in fall 2017
- Internally reviewed proposals
- Developed draft proposal package

East Branch Wesserunsett Stream, Athens



Public Input Phase

- Public meetings
 - Augusta 5/22
 - Millinocket 5/24
- Public comment period until June 5



Next Steps

- Review and respond to comments
- Evaluate DEP draft recommendations
- Present final DEP proposals to Board of Environmental Protection

Back Brook, Limington



Next Steps

- Board of Environmental Protection
 - Conducts public hearing and work session on proposals

Develops final list of proposals to recommend to Legislature

Salmon Brook, Perham



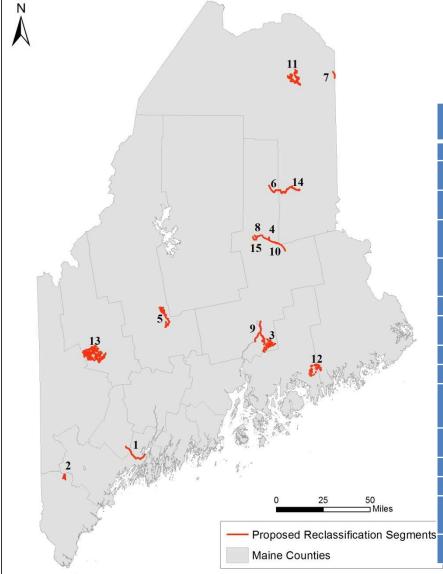
Next Steps

- Legislature
 - Conducts public hearing on proposals
 - Makes final state determination
- EPA must approve re-classifications before become effective



Schedule

Summer - Fall 2017	Received re-classification proposals	
Fall 2017 – Winter 2018	Prepared DEP draft re-classification	
Fall 2017 - Willer 2016	package	
Spring 2018	Public review of proposed changes at	
	Public Meetings in Augusta and Millinocket	
Summer - Fall 2018	Board of Environmental Protection (BEP)	
Summer - Fall 2016	Public Hearing and Work Session	
Fall 2018	BEP final vote on re-classification proposal	
Winter 2018/2019	Submit statutory changes for Legislative	
VVIIILEI 2010/2019	approval	
Winter/Spring 2019	Legislative vote on re-classification bill	



Proposals

	Vov	Sogment	Class	
	Key	Segment	Current	Proposed
	1	Androscoggin River (Lower)	С	В
	2	Back Brook and Tributaries (Limington)	В	Α
	3	Blackman Stream and Tributaries	В	Α
	4	East Branch Penobscot River (Mattaceunk impoundment)	AA	В
	5	East Branch Wesserunsett Stream and Tributaries	В	Α
	6	Fish Stream	В	Α
	7	Limestone Stream below Long Road	С	В
	8	Millinocket Stream (Millinocket)	С	В
	9	Penobscot River (Lower)	В	В
	10	Penobscot River from confluence to Mattawamkeag River	С	В
	11	Salmon Brook and Tributaries (Portions)	В	Α
	12	Tunk Stream and Tributaries	В	Α
nts	13	Webb Lake Tributaries	В	Α
	14	West Branch Mattawamkeag River (Island Falls)	В	Α
	15	West Branch Penobscot River (Lower)	С	В



Proposals

- Recommend for upgrade: 10
- Amend statutory language: 1
- Correct classification error: 1
- Not recommend for upgrade: 3



Limestone Stream, Limestone

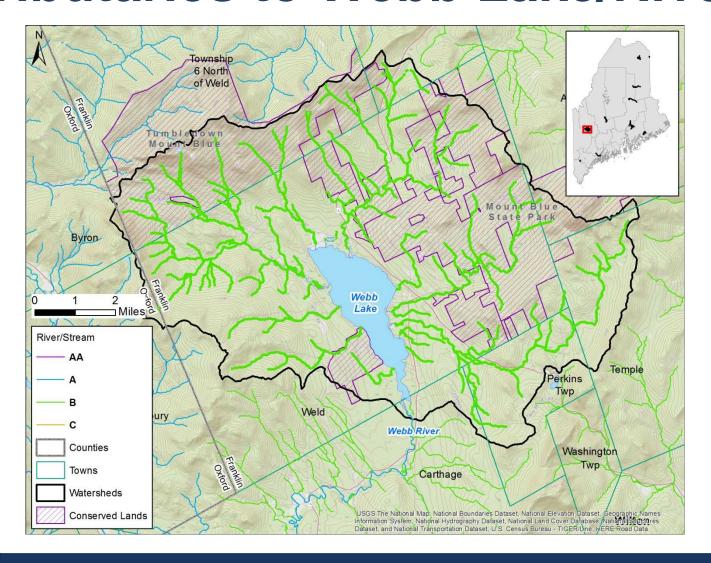


Tributaries to Webb Lake/River

- Location: Weld and surrounding towns
- Proposal: upgrade from Class B to Class A
- Proposed by: DEP
- Basis for proposal:
 - Class A aquatic life criteria are attained
 - Very good salmonid spawning, nursery, and adult habitat
 - Watershed is ~90% forested and significant portion protected as conservation land



Tributaries to Webb Lake/River



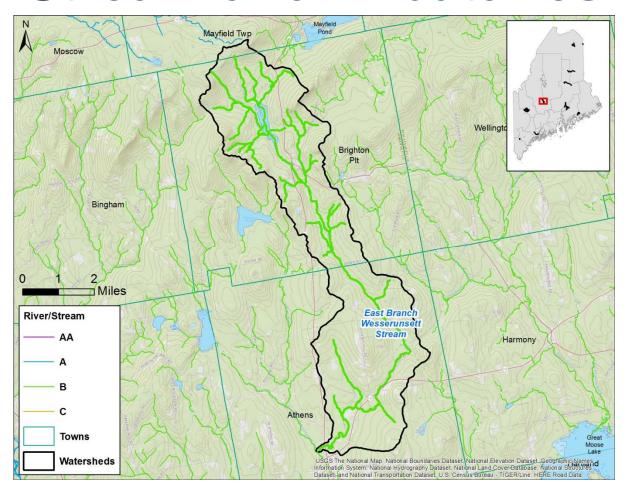


East Branch Wesserunsett Stream and Tributaries

- Location: Athens and upstream towns
- Proposal: upgrade from Class B to Class A
- Proposed by: DEP
- Basis for proposal:
 - East Branch Wesserunsett Stream attains Class A aquatic life criteria
 - Watershed is ~85% forested



East Branch Wesserunsett Stream and Tributaries





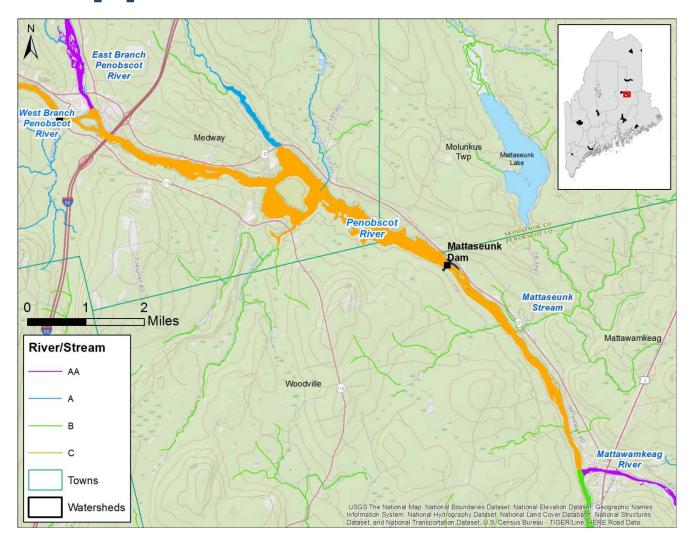
Upper Penobscot River

- Location: Mattawamkeag and upstream towns (confluence of East and West Branches to confluence with Mattawamkeag River)
- Proposal: upgrade from Class C to Class B
- Proposed by: Penobscot Indian Nation and The Nature Conservancy

Upper Penobscot River

- Basis for proposal:
 - Closure of two upstream mills has significantly improved water quality
 - Class B criteria are attained (including in Mattaceunk impoundment)
 - Segment is critical for restoration of Atlantic salmon and other diadromous fish species

Upper Penobscot River





West Branch Penobscot River

- Location: Medway and upstream towns (outlet of Quakish Lake to confluence with East Br. Penobscot R.)
- Proposal: upgrade from Class C to Class B
- Proposed by: Penobscot Indian Nation
- Basis for proposal:
 - Class B criteria are attained below Millinocket Stream
 - Closure of upstream mill has led to significant improvement in water quality

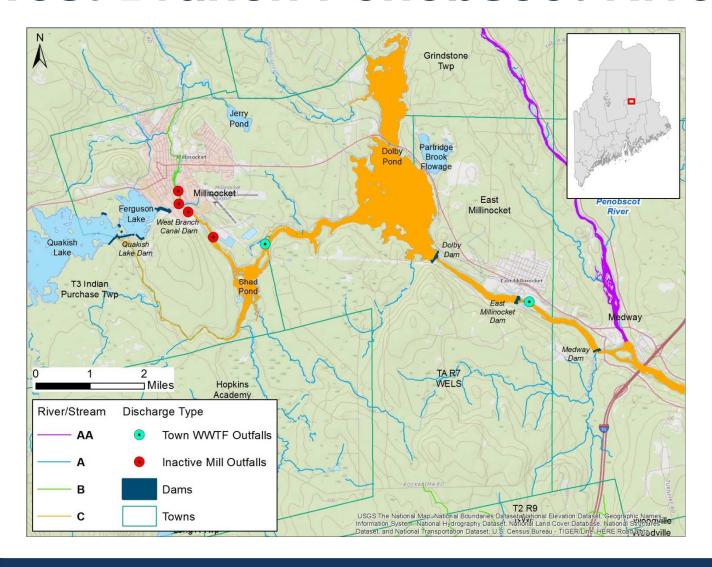


West Branch Penobscot River

Issues:

- Two municipal dischargers
- Re-development efforts at former mill site may result in new discharges and new license
- No current water quality data above Millinocket Stream
- Diversion of water flow from Quakish Lake to
 Millinocket Stream West Branch Penobscot River
 below Lake not meeting aquatic life criteria

West Branch Penobscot River





Millinocket Stream

- Location: Millinocket (confluence of West Branch Canal to confluence with West Branch Penobscot River)
- Proposal: upgrade from Class C to Class B
- Proposed by: DEP
- Basis for proposal:
 - Closure of mill has led to significant improvement in water quality
 - Class B criteria are attained

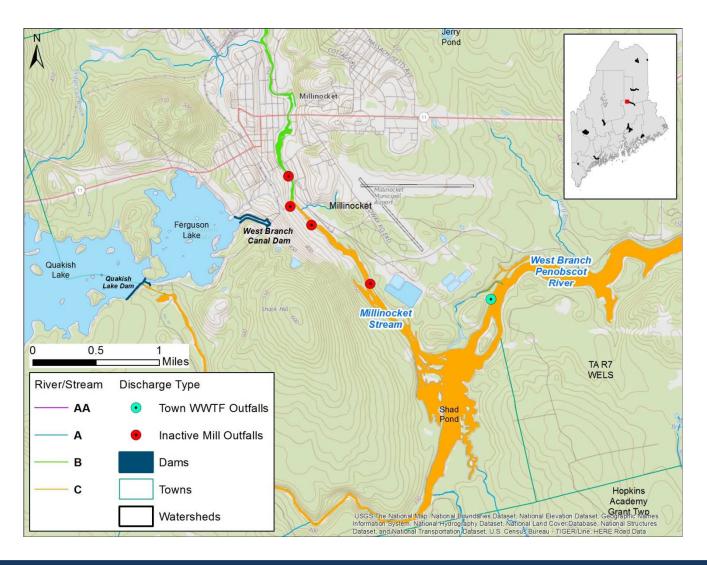


Millinocket Stream

Issues:

- Re-development efforts at former mill site may result in new discharges and new license
- Diversion of water flow from Quakish Lake to Millinocket Stream
 - West Branch Penobscot R. not meeting aquatic life criteria

Millinocket Stream



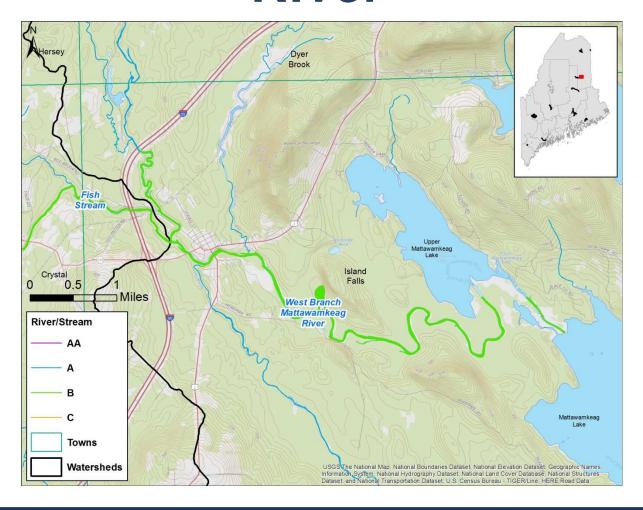


West Branch Mattawamkeag River

- Location: Island Falls (I-95 to confluence with Mattawamkeag Lake)
- Proposal: upgrade from Class B to Class A
- Proposed by: DEP
- Basis for proposal:
 - Former discharge was discontinued
 - Class A criteria are attained



West Branch Mattawamkeag River



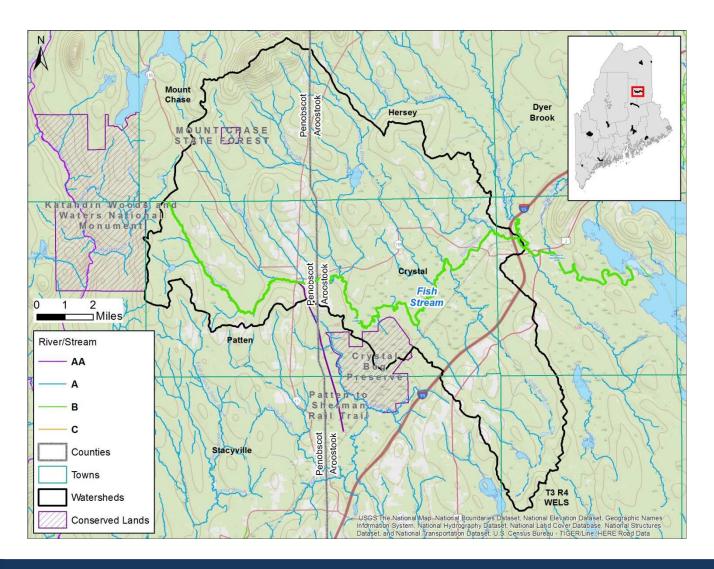


Fish Stream

- Location: Island Falls and upstream towns
- Proposal: upgrade from Class B to Class A
- Proposed by: The Nature Conservancy
- Basis for proposal:
 - Former discharge was discontinued
 - Class A aquatic life criteria are attained
 - Drains Crystal Bog Preserve
 - Watershed is largely forested



Fish Stream



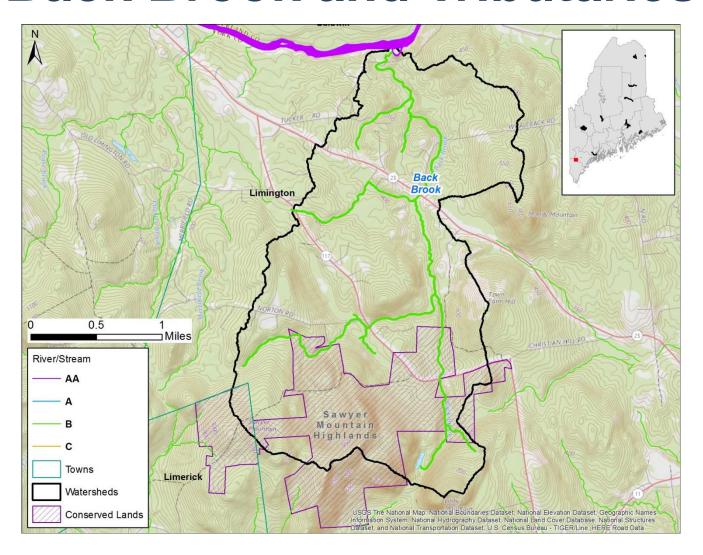


Back Brook and Tributaries

- Location: Limington
- Proposal: upgrade from Class B to Class A
- Proposed by: DEP
- Basis for proposal:
 - Class A aquatic life criteria are attained
 - Watershed is ~90% forested and significant portion protected as conservation land
 - Wild brook trout population



Back Brook and Tributaries





(West Branch) Salmon Brook and Tributaries

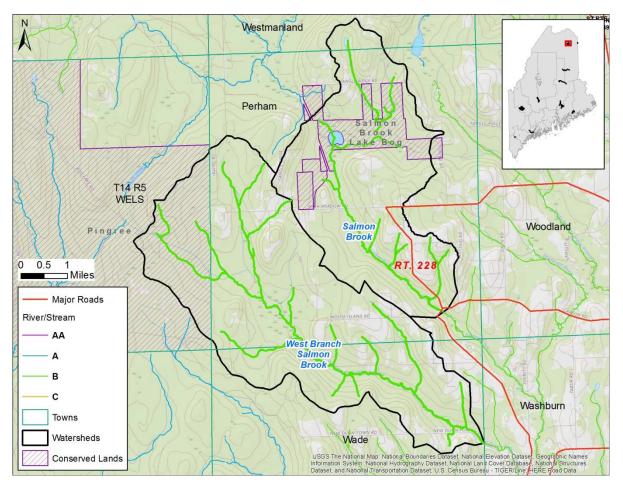
- Location: Wade and upstream towns
 (Salmon Brook and tributaries above Rt. 228 in Perham; West Branch Salmon Brook and tributaries above Washburn/Wade town line)
- Proposal: upgrade from Class B to Class A
- Proposed by: The Nature Conservancy/DEP

(West Branch) Salmon Brook and Tributaries

- Basis for proposal:
 - Salmon Brook headwaters in Salmon Brook Lake
 Public Reserve
 - Very high quality trout stream
 - Dam removal and stream restoration project
- Issues:
 - Extensive agricultural use in watershed
 - Data indicate water quality issues in lower watershed



(West Branch) Salmon Brook and Tributaries





Tunk Stream and Tributaries

- Location: Cherryfield and upstream towns (upstream of Route 1, Steuben)
- Proposal: upgrade from Class B to Class A
- Proposed by: DEP

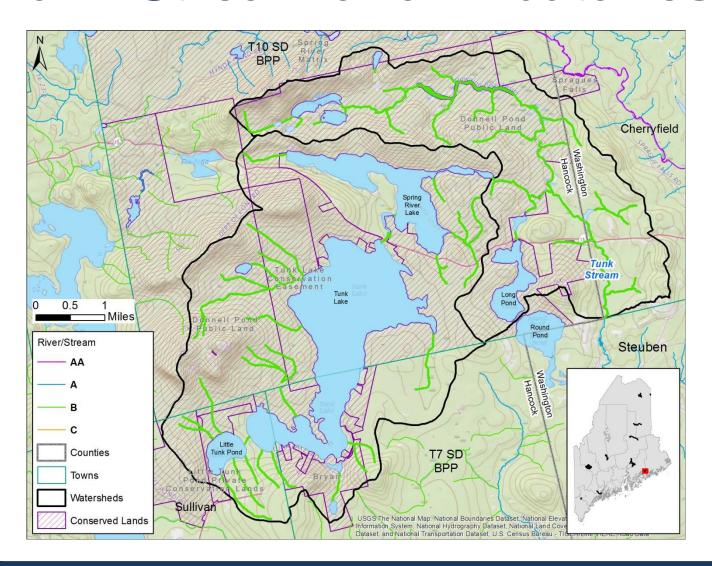
Tunk Stream and Tributaries

Basis for proposal:

- Very high quality water with potential for restoration of Atlantic salmon
- Watershed is ~80% forested and significant portion protected as conservation land
- Waters above Rt. 1 in Steuben inadvertently omitted in
 2003 upgrade of Tunk Stream and tributaries below Rt. 1
- Class A aquatic life criteria are attained



Tunk Stream and Tributaries





Amendment to Statutory Language



Aerial view of Veazie Dam.
Photo by Bridget Besaw

After Veazie Dam removal, view towards Eddington.

Photo PRRT



Lower Penobscot River

- Location: Eddington/Veazie and upstream towns (former Veazie Dam to Milford Dam)
- Proposal: expand 'free-flowing' language
- Proposed by: Penobscot Indian Nation and The Nature Conservancy

Further, the Legislature finds that the free-flowing habitat of this river segment provides irreplaceable social and economic benefits and that this use must be maintained.



Lower Penobscot River

Basis for proposal:

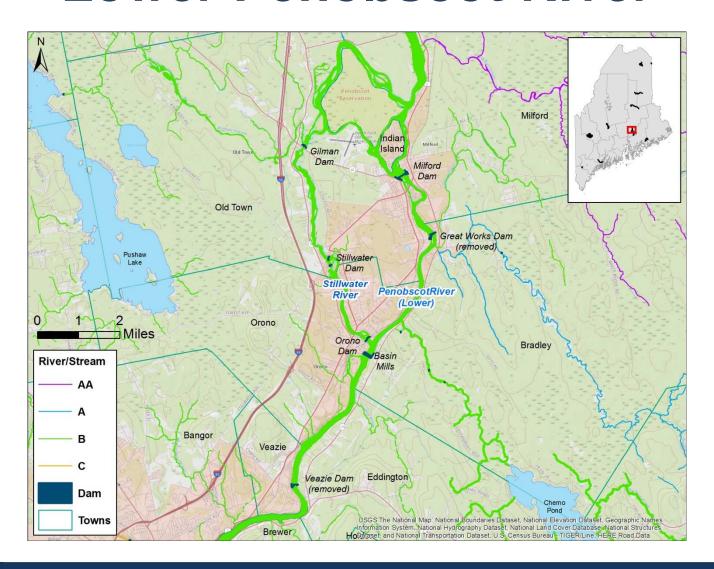
- Recent removal of Great Works and Veazie Dams
- High value habitat for several diadromous fish species
- High restoration potential for several diadromous species

Issues:

 Amendment will not change current Class B designation above/below Milford Dam - only provides protection for free-flowing nature below dam

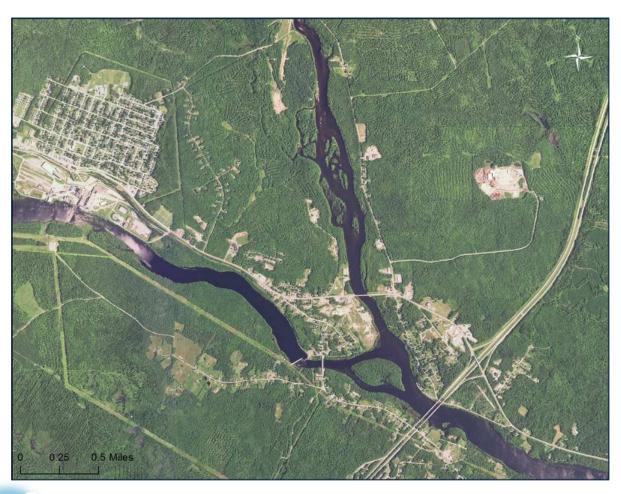


Lower Penobscot River





Correction of Classification Error



Lower East Branch Penobscot River, Medway



East Branch Penobscot River

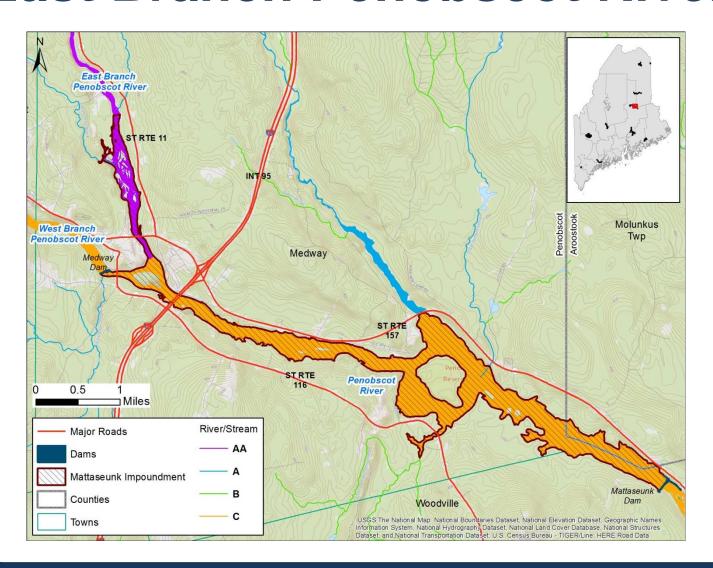
- Location: Medway (confluence with Mattaceunk impoundment to confluence with West Br. Penobscot R.)
- Proposal: correct classification error
- Proposed by: DEP
- Basis for proposal:
 - Error in 1989 re-classification of river below Grand
 Lake Mattagamon from Class B to Class AA was impounded, i.e. not Class AA 'free-flowing and natural'

East Branch Penobscot River

- Mattaceunk Dam impoundment in East Branch cannot meet Class AA 'free-flowing and natural' standard
- Mattaceunk Dam is undergoing re-licensing but cannot receive DEP water quality certification because Class AA standards are not attained in East Branch impoundment
- Class B standards are attained
- Correction is not meant to allow permitting of new licenses or development of new dams

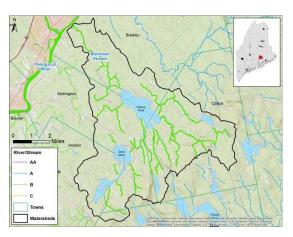


East Branch Penobscot River

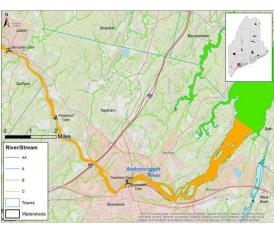




Proposals Not Recommended for Action

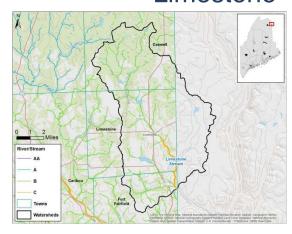


Blackman Stream, Bradley



Lower Androscoggin River

Limestone Stream, Limestone



Lower Androscoggin River

- Location: Topsham/Brunswick and upstream towns (Worumbo Dam, Lisbon Falls to Merrymeeting Bay)
- Proposal: upgrade from Class C to Class B
- Proposed by: Friends of Merrymeeting Bay
- Basis for proposal:
 - Water quality in this section of river meets Class B standards and has largely done so since 2006

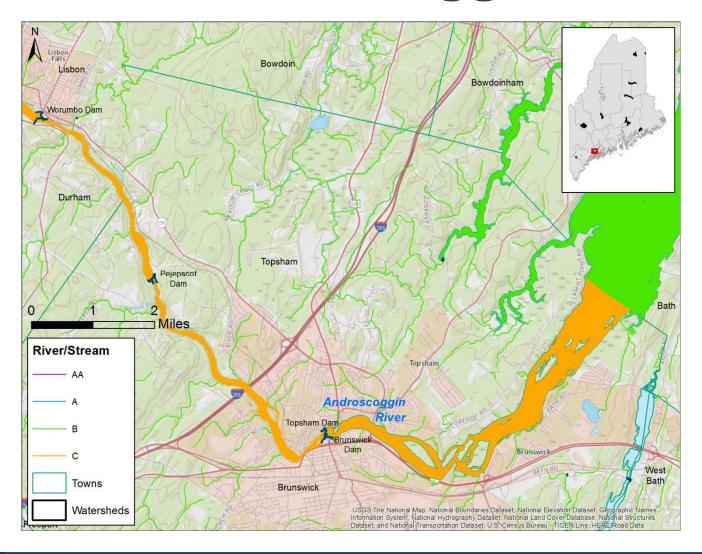


Lower Androscoggin River

- Several pollution sources and stressors in watershed
- Dissolved oxygen, aquatic life and bacteria do not always meet Class B criteria
- 2011 DEP water quality modeling report standards not always met, even without discharges
- Problems due to: upstream sources, non-point source pollution, dams in segment; also incoming tides in lowest section and Sediment Oxygen Demand
- Not recommended for upgrade



Lower Androscoggin River





Blackman Stream and Tributaries

- Location: Bradley and upstream towns
- Proposal: upgrade from Class B to Class A
- Proposed by: The Nature Conservancy
- Basis for proposal:
 - Site of highly successful fish restoration project
 - Watershed largely within the University of Maine Foundation's Penobscot Experimental Forest

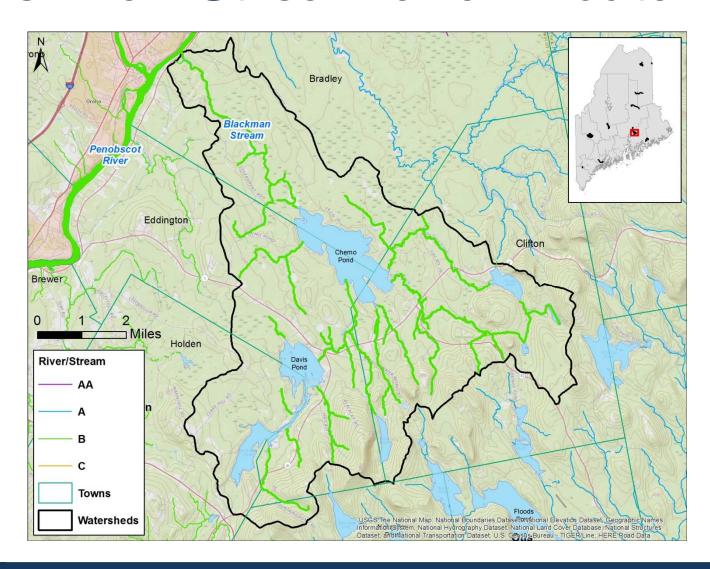


Blackman Stream and Tributaries

- Water quality appears to be affected by logging activities and some agricultural landuse
- Ponds in watershed show some indication of nutrient enrichment
- Biological community only met Class C aquatic life criteria in Davis Pond in 2016
- No in-stream water quality data
- Not recommended for upgrade



Blackman Stream and Tributaries





Limestone Stream

- Location: Limestone and Fort Fairfield (below Long Road crossing)
- Proposal: upgrade from Class C to Class B
- Proposed by: Citizen
- Basis for proposal:
 - Treatment plant was closed in 2010
 - Macroinvertebrate community met Class B aquatic life criteria in 2004 at two locations

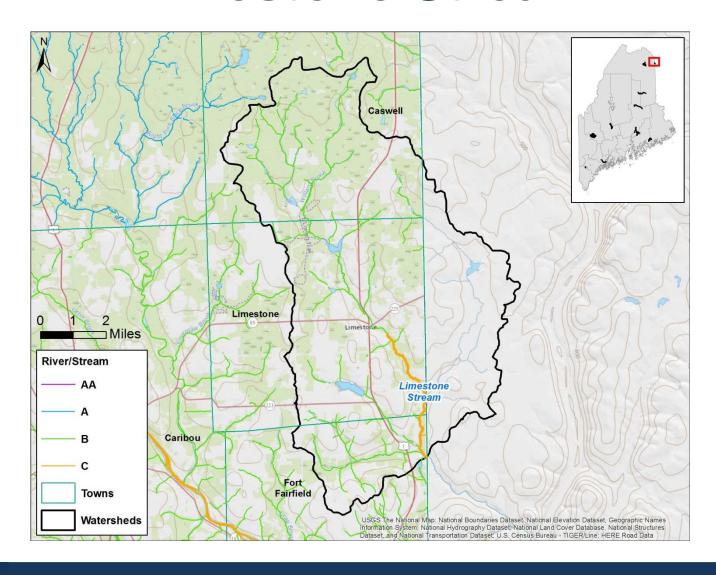


Limestone Stream

- Water quality appears to be affected by widespread agricultural landuse
 - Macroinvertebrates only met Class C aquatic life criteria at one location in 2014
 - Algal communities only met Class C aquatic life criteria at two locations in 2004, at one in 2014
 - In-stream nutrient concentrations are elevated
- Not recommended for upgrade



Limestone Stream





For More Information

Re-Classification Initiative

<u>www.maine.gov/dep/water/monitoring/classification/reclassification.html</u>

Opportunity for Comment

www.maine.gov/dep/comment/index.html

Water Quality Standards

www.maine.gov/dep/water/wqs/index.html

Classification maps (current and historical) www.maine.gov/dep/gis/datamaps/





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