



STATE OF MAINE
DEPARTMENT OF AGRICULTURE, CONSERVATION & FORESTRY
BUREAU OF RESOURCE INFORMATION & LAND USE PLANNING
93 STATE HOUSE STATION
AUGUSTA, MAINE 04333

JANET T. MILLS
GOVERNOR

AMANDA E. BEAL
COMMISSIONER

September 18, 2024

Anthony Ward, Town Manager
635 Meadow Road
Casco, ME 04015

Dear Mr. Ward,

The Department of Agriculture, Conservation & Forestry thanks the Town of Casco for submitting its Comprehensive Plan for review for consistency with the Growth Management Law in accordance with our Comprehensive Plan Review Criteria Rule (the Rule).

As soon as the plan was accepted for review, we invited other state agencies, neighboring municipalities, and your regional planning organization to review it and submit written comments. By the end of the comment period, we received written comments from the Maine Department of Transportation, the Maine Drinking Water Program, the Maine Department of Environmental Protection, and the Beginning with Habitat Program. Those written comments are attached to this letter. The comments contain suggestions for improving and strengthening the plan. We urge the Comprehensive Planning Committee to consider how the plan might be revised to incorporate the suggestions found in the comments.

We are happy to report that we find the 2024 Casco Comprehensive Plan to be complete and consistent. This means that we have found all sections of the plan, including the future land use section, to be consistent with the Growth Management Law.

Our finding of consistency is not conditional; however, we urge the Committee to consider amending the plan to incorporate the attached agency comments. Per Chapter 208 the town may incorporate the agency comments without resubmitting the Plan to the state.

We appreciate the efforts of community members and municipal staff who contributed to this plan. All involved clearly dedicated a lot of time and discussion to draft this very complete plan. Thanks to the skill and hard work of all involved, this plan will provide important guidance to the community's decision-makers for years to come. Please don't hesitate to contact me at (207) 458-8860 or abe.dailey@maine.gov if you have any questions.

MUNICIPAL PLANNING ASSISTANCE PROGRAM
22 STATE HOUSE STATION
18 ELKINS LANE, HARLOW BUILDING
AUGUSTA, ME 04333



PHONE: (207) 446-4509
WWW.MAINE.GOV/DACF/MUNICIPALPLANNING

Sincere Best Wishes,

Abe Dailey

Abe Dailey, Senior Planner
Municipal Planning Assistance Program

Attachments:

- Public comments (4)

cc: Vanessa Farr, Consultant
Christian Roadman, GPCOG



STATE OF MAINE
DEPARTMENT OF TRANSPORTATION
16 STATE HOUSE STATION
AUGUSTA, MAINE 04333-0016

Janet T. Mills
GOVERNOR

Bruce A. Van Note
COMMISSIONER

August 9, 2024
Abe Dailey, Senior Planner
Municipal Planning Assistance Program
Department of Agriculture, Conservation and Forestry
22 State House Station
Augusta, ME 04333-0022

Dear Abe,

MaineDOT has reviewed the 2024 Town of Casco Comprehensive Plan and find it consistent with the Department's mobility/transportation policies and goals. The Plan's implementation strategies in the areas of land use and transportation are ambitious and will require sustained technical assistance from a regional planning agency or consultant, given the limited number and capacity of Casco's municipal staff and resident volunteers.

We are aware that Casco is undertaking several demonstration projects aimed at traffic calming and pedestrian safety—one of the Plan's early action steps. A second early action step in coordination with MaineDOT is possible. Our Village Partnership Initiative (VPI) matching grants use planning and engineering expertise to advance safe, pedestrian-friendly improvements in downtowns and villages. More information is available at <https://www.maine.gov/pgc/cbi> and by contacting the regional planner listed below. Joining with MaineDOT in a transportation & planning project is also a good way to advance conversations on local speed limits, road geometry adjustments and Complete Streets measures.

Finally, the Plan notes under Strategies "Prioritize funding for expanding the bicycle and pedestrian network." MaineDOT offers a competitive annual grant program which funds design and construction of municipal bicycle and pedestrian infrastructure. Learn more at: <http://www.maine.gov/mdot/pgc/funding/>

Thank you for the opportunity to review Casco's 2024 Comprehensive Plan.

Sincerely,

Stephen Cole
Regional Planner, Southern & Midcoast Maine

Janet T. Mills
Governor



Maine Department of Health and Human Services
Maine Center for Disease Control and Prevention
11 State House Station
286 Water Street
Augusta, Maine 04333-0011
Tel: (207) 287-8016; Fax (207) 287-2887
TTY: Dial 711 (Maine Relay)

Sara Gagné-Holmes
Acting Commissioner

To: Abe Dailey, Senior Planner, DACF
From: Ashley Hodge, Source Water Protection Coord., Maine CDC Drinking Water Program
Re: Review of 2024 Town of Casco Comprehensive Plan
Date: September 3, 2024

On behalf of the Maine CDC, Drinking Water Program (MEDWP), I have reviewed the Town of Casco's 2024 Comprehensive Plan and have provided the following comments.

As you are aware, The Drinking Water Program works to ensure safe drinking water in Maine, to protect public health, by administering and enforcing drinking water and subsurface wastewater regulations, providing education and technical and financial assistance. The comments submitted below are based on the Maine State Planning Office's (SPO) instructions for agency commentors.

I. Specific Comments:

- a. On PDF page 193, under "Sebago Lake": consider adding to this section that Sebago Lake is the Drinking Water Source for Portland Water District (PWD). The town should continue to work with PWD to protect this source.

II. General Comments:

- a. Currently, there are a total of 15 Public Water Systems (PWSs) in the Town of Casco (please see below for a screenshot of all currently active PWSs for Casco). This includes: 9 Non-Community (NC) Water Systems, 1 Community (C) Water System, and 5 Non-Transient, Non-Community (NTNC) Water Systems. These PWSs should also be included within the comprehensive plan.

Water System No.	Water System Name	Type	Status	Pri. Cnty/City Served	Pri. Src. Water Type
ME0000753	CAMP CEDAR <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0025097	CAMP SUNSHINE <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0092707	CASCO COMMUNITY CENTER <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0092338	CASCO INN RESIDENTIAL CARE <small>CEI FI</small>	C	A	CUMBERLAND	GW
ME0018563	CROOKED RIVER CAMPGROUND INC <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0008202	EASTERN HARVEST CHUTES CAFE & CATERING <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0094037	HANCOCK LUMBER - RYEFIELD MILL <small>CEI FI</small>	NTNC	A	CUMBERLAND	GW
ME0092540	MAYBERRY HILL PRESCHOOL <small>CEI FI</small>	NTNC	A	CUMBERLAND	GW
ME0393925	MDOC STATE PARK-SEBAGO LAKE-CASCO <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0002512	MIGIS LODGE <small>CEI FI</small>	NC	A	CUMBERLAND	SW
ME0092705	MILESTONES PRESCHOOL & CHILDCARE <small>CEI FI</small>	NTNC	A	CUMBERLAND	GW
ME0016686	MSAD 61 CROOKED RIVER SCHOOL <small>CEI FI</small>	NTNC	A	CUMBERLAND	GW
ME0002514	POINT SEBAGO OUTDOOR RESORT <small>CEI FI</small>	NC	A	CUMBERLAND	GW
ME0094318	SABRE CORPORATION <small>CEI FI</small>	NTNC	A	CUMBERLAND	GW
ME0092478	TOP OF THE HILL GRILLE <small>CEI FI</small>	NC	A	CUMBERLAND	GW

- b. The town should continue to maintain, enact, and/or amend protections for all public wellheads, groundwater, and aquifer recharge areas in the Town of Casco. Taking proactive measures to protect Casco's wellheads, aquifers, and groundwater will continue to support safe drinking water now and in the future.

Please feel free to contact me should you have any questions regarding this information.

Comprehensive Plan Surface Water Resources Checklist
Watershed Management Unit
Division of Environmental Assessment, Department of Environmental Protection
May 2023

To: Abe Dailey, Senior Planner, Municipal Planning Assistance Program, Department of Agriculture, Conservation and Forestry

From: Alex Wong, NPS Program Coordinator, Watershed Management Unit, Division of Environmental Assessment, Department of Environmental Protection

Re: Casco Comprehensive Plan Review

Date: 8/2/24

Thank you for the opportunity to review Casco's Comprehensive Plan (Plan) as it relates to surface waters. I have developed the following comments and suggestions for your consideration.

Appropriate use of data provided by the DEP Division of Environmental Assessment

- The Plan includes waterbody and watershed identification and description, water quality information for Coffee Pond, Crescent Lake, Dumpling Pond, Hog Meadow Pond, Owl Pond, Parker Pond, Pleasant Lake, Sebago Lake, Thomas Pond, Thompson Lake, Panther & Nubble Ponds, Mill Brook, Robinson Brook, Edwards Brook, Meadow Brook, Lord Brook, Lily Brook, Decker Brook, Songo River, Crooked River, Rolfe Brook and Dingley Brook. *This information is used appropriately.*
- It does not appear all available data were incorporated into the plan (see comment #2 on the attached Checklist). While this is a minor omission, and most probably intentional, I believe the plan would be more useful if the watersheds referred to in the text of the plan were adequately represented on a resource map.

How the Plan's policies and implementation strategies promote the State goals relating to DEP's principal objectives and directives

- See attached checklist

Consistency of Plan with DEP's programs and policies.

- Overall, the Plan is consistent with the DEP Watershed Management Units programs

Measures DEP recommends the town take to ensure its plan addresses and identifies deficiencies and inconsistencies

- See attached checklist for comments.

Please feel free to contact me directly at alex.wong@maine.gov or 207-694-9533 if you have additional questions or would like more information.

Maine DEP, Division of Environmental Assessment
 Comp Plan Review Checklist (rev.5/24/23) for Casco Comp Plan 2024

This checklist was developed to ease the preparation of comprehensive plans. Its contents are taken directly from the Comprehensive Plan Review Criteria Rule (07 105 Chapter 208). There are no requirements to submit this checklist for review as it is intended only for the plan preparers.		
Water Resources	✓	Page
Analyses		
Are there point sources (direct discharges) of pollution in the community? If so, is the community taking steps to eliminate them?	x	2-10
Are there non-point sources of pollution? If so, is the community taking steps to eliminate them?	x	2-10
How are groundwater and surface water supplies and their recharge areas protected?	Defer to DWP	
Do public works crews and contractors use best management practices to protect water resources in their daily operations (e.g. salt/sand pile maintenance, culvert replacement street sweeping, public works garage operations)?	x	2-10
Are there opportunities to partner with local or regional advocacy groups that promote water resource protection?	x	2-11
Condition and Trends		
The community's Comprehensive Planning Water Resources Data Set prepared and provided to the community by the Department of Inland Fisheries and Wildlife, the Department of Environmental Protection and the Office, or their designees.	Does not appear to have been used; water resource map only shows incomplete HUC 12 level.	
A description of each great pond, river, surface drinking water supply, and other water bodies of local interest including: a. ecological value; b. threats to water quality or quantity; c. documented water quality and/or invasive species problems.	x	2-3 thru 2-7
A summary of past and present activities to monitor, assess, and/or improve water quality, mitigate sources of pollution, and control or prevent the spread of invasive species.	x	2-12
A description of the location and nature of significant threats to aquifer drinking water supplies.	Defer to DWP	
A summary of existing lake, pond, river, stream, and drinking water protection and preservation measures, including local ordinances.	x	2-12 thru 213
Policies		
To protect current and potential drinking water sources.	Defer to DWP	
To protect significant surface water resources from pollution and improve water quality where needed.		2
To protect water resources in growth areas while promoting more intensive development in those areas.	x	169, 176
To minimize pollution discharges through the upgrade of existing public sewer systems and wastewater treatment facilities.	n/a	
To cooperate with neighboring communities and regional/local advocacy groups to protect water resources.	x	83, 110

Maine DEP, Division of Environmental Assessment
 Comp Plan Review Checklist (rev.5/24/23) for Casco Comp Plan 2024

Strategies		
Adopt or amend local land use ordinances as applicable to incorporate stormwater runoff performance standards consistent with: a. Maine Stormwater Management Law and Maine Stormwater regulations (Title 38 M.R.S.A. §420-D and 06-096 CMR 500 and 502). b. Maine Department of Environmental Protection's allocations for allowable levels of phosphorus in lake/pond watersheds. c. Maine Pollution Discharge Elimination System Stormwater Program	x	2-14 thru 2-15
Consider amending local land use ordinances, as applicable, to incorporate low impact development standards.		112, 113
Where applicable, develop an urban impaired stream watershed management or mitigation plan that will promote continued development or redevelopment without further stream degradation.		n/a
Maintain, enact or amend public wellhead and aquifer recharge area protection mechanisms, as necessary.		Defer to DWP
Encourage landowners to protect water quality. Provide local contact information at the municipal office for water quality best management practices from resources such as the Natural Resource Conservation Service, University of Maine Cooperative Extension, Soil and Water Conservation District, Maine Forest Service, and/or Small Woodlot Association of Maine.	x	166
Adopt water quality protection practices and standards for construction and maintenance of public and private roads and public properties and require their implementation by contractors, owners, and community officials and employees.	x	169
Participate in local and regional efforts to monitor, protect and, where warranted, improve water quality.	x	83, 113, 166
Provide educational materials at appropriate locations regarding aquatic invasive species.	x	83
Comments: 1) Resources made available by DEP don't seem to have been utilized. The plan may benefit from having the immediate watersheds of the lakes represented in some manner. These can be obtained at https://www.maine.gov/dacf/municipalplanning/comp_plans/planning_data.shtml 2) Caution should be exercised with increased public access to Coffee Pond. It is an NPS Threatened Lake because of its sensitivity to increasing phosphorus loading. Will improved access result in greater P loading (development, shoreline erosion, etc.)?		



STATE OF MAINE
BEGINNING WITH HABITAT
DEPARTMENT OF INLAND FISHERIES & WILDLIFE
41 STATE HOUSE STATION
AUGUSTA, ME 04333-0041



Date: September 3, 2024

To: Abe Dailey, Municipal Planning Assistance

From: Greg LeClair, MDIFW and Lisa St. Hilaire, MNAP

Re: Casco Comprehensive Plan Review

On behalf of Beginning with Habitat (BwH), the Maine Department of Inland Fisheries and Wildlife (MDIFW) and the Maine Natural Areas Program (MNAP), we have reviewed the town of Casco's 2024 Comprehensive Plan.

Beginning with Habitat equips Maine communities, landowners, and conservation partners with tools to protect, restore, and connect important habitats and ecosystems in a changing climate. Housed within the Maine Department of Inland Fisheries and Wildlife, Beginning with Habitat staff work with species experts, ecologists, and conservation partners to translate biodiversity information into conservation action at both a local and statewide scale.

Comments provided below represent two BwH public agency partners (MDIFW and MNAP) but are guided by the overall conservation principles of the BwH program. Feedback and recommendations included in this memo are based on the Maine Municipal Planning Assistance Program at the Department of Agriculture, Conservation and Forestry (DACF) instructions for agency comments.

Appropriate Use of Data Provided by BwH

MDIFW and MNAP data were appropriately used in the Casco Comprehensive Plan. We provide suggestions below for updating and expanding upon the town's discussion of natural resources. BwH provides natural resource data to all Maine municipalities on behalf of MNAP and MDIFW. Information regarding rare plants and natural communities is provided by MNAP within DACF. MDIFW data depict high-value animal occurrences, wildlife habitats, and Critical Natural Resources.

Beginning with Habitat recommends updating maps on an annual basis to ensure that land use decisions are based on the best available information. The Town may request updated paper and digital BwH maps from MDIFW as often as needed during Plan completion and implementation at the following link:

<https://www.maine.gov/ifw/fish-wildlife/wildlife/beginning-with-habitat/request-form.html>

Additional mapped information on stream habitats and barriers is available on the Maine Stream Connectivity Workgroup's Maine Stream Habitat Viewer:

<https://webapps2.cgis-solutions.com/mainstreamviewer/>



JUDITH CAMUSO
COMMISSIONER

AMANDA E. BEAL
COMMISSIONER



Consistency of Plan with BwH Programs and Policies

The policies and implementation strategies proposed are consistent with BwH programs and policies. Beginning with Habitat staff would be happy to provide further assistance as the Town works to implement the Plan, such as providing updated maps, education about natural resources, technical assistance with ordinance revisions, or open space planning. We have included suggestions below that are intended to help improve the policies and strategies outlined within this Plan.

Critical and Important Natural Resources

Critical and Important Natural Resources were labeled on relevant Beginning with Habitat maps, but several natural features were missing from the narrative. Additionally, discussion about some critical natural resources, especially significant wildlife habitat, was largely missing. There are additional non-regulatory features that would be deserving of attention, including wild brook trout habitat throughout Casco, the likely presence of unmapped significant vernal pools, and the Jugtown Plains Focus Area that could benefit from regional conservation actions in cooperation with Naples, Otisfield, and Harrison. Addressing these items would greatly strengthen the plan and link land use and conservation measures to important at-risk species and habitats in Casco. Casco stands in a unique position as a potential steward for some of the best coldwater fisheries and relatively large blocks of undeveloped land in the southern region of the state. Beginning with Habitat is available to work with the town to plan and implement conservation strategies for these species.

A full inventory of Critical and Important Natural Resources is included in Appendix A.

Supplemental fisheries comments are provided in Appendix B.

Required Natural Resource Plan Elements

We offer the following comments on required elements:

Required Element	
Natural Resources	✓
Analyses	
Are any of the community's critical natural resources threatened by development, overuse, or other activities?	
Comment: Since the Plan does not include analysis of specific Critical Natural Resources, the above criteria is not addressed in the Plan.	
Is there current regional cooperation or planning underway to protect shared critical natural resources? Are there opportunities to partner with local or regional groups?	
Comment: The plan does indicate strong connection to neighboring towns, but discussion around cooperation to conserve regional lands is missing. Jugtown Plains, a Focus Area of Statewide Ecological Significance, is one such opportunity.	
Condition and Trends	
The community's Comprehensive Planning Natural Resources Data Set prepared and provided to the community by the Department of Inland Fisheries and Wildlife, Department of Environmental Protection and the Office, or their designees.	

Comment: The Plan does not include a complete inventory of critical natural resources in the narrative. We have attached a current natural resources inventory to this letter, and BwH staff would be happy to provide additional information on any mapped resources.

Detailed comments:

Specific Plan comments and recommendations below are provided by the following staff:

- *Maine Department of Inland Fisheries and Wildlife: Gregory LeClair (Beginning with Habitat Municipal Planning Biologist), Nick Kalejs (Region A Fisheries Biologist), Beth Swartz (Invertebrate Specialist)*
- *Maine Natural Areas Program: Lisa St. Hilaire (Information Manager)*

Page/ Section #	Relevant Comp Plan Requirement	Topic or Plan element	Suggested Improvement or New Language for Plan;	Reviewer
14		Environmental Systems Map	There should perhaps be two maps-one reflecting the BwH Map 2 for High Value Plant & Animal habitats, and a second for protection overlays, tree growth, etc. It's a little cluttered. Also the page isn't numbered. There are no rare plants or rare or exemplary natural communities showing on this map, and there should be. The bulk of these are Rattlesnake Mountain, though there is one rare plant along Route 11 near the Poland line.	Lisa St. Hilaire
83	Natural Resources	Water Protection Strategy	Town ordinances governing commercial water extraction should be developed in accordance with existing MDEP regulations and in consultation with state resource agencies, particularly when water extraction provides a public benefit.	Nick Kalejs
95	Public Access	Public Access Inventory	The Connectivity Map provides a high-level overview of some water access sites; however, additional detail should be provided. For existing water access sites (including those not owned by the Town), information such as access type (trailer/carry-in/shore), capacity, amenities, and other facilities should be provided. For waters where the Town has a stated desire for water access, note that some locations (Coffee Pond, Thompson Lake) do have some existing forms of public access. The Town should work in consultation with MDIFW/MDACF to develop/enhance additional desired water access sites.	Nick Kalejs
146		Protect Woods, Waters, & Open Space	Strategy 4-laudable, be careful of seed sources for this.	Lisa St. Hilaire

164		Protect Woods, Waters, & Open Space	Strategy 2-utilize resources published by MNAP and DACF Horticulture Program. Contact MNAP to see what data we have RE terrestrial invasive plants in Casco- there are many records in iMapInvasives. See links: https://www.maine.gov/dacf/mnap/features/invasive_plants/invasives.htm https://www.maine.gov/dacf/php/horticulture/invasiveplants.shtml	Lisa St. Hilaire
176		Supplemental State Policies & Strategies	BwH maps are for planning, applicants should consult the agencies when they are ready for permitting.	Lisa St. Hilaire
Ch 2 p3-6	Natural Resources	Water Inventory	The lake and pond inventory covers all Great Ponds in Casco and includes some basic fisheries information. However, more detail could be provided where stocked fisheries of interest are present; see the attached list of stocked waters in Casco in the memo included with fisheries comments.	Nick Kalejs
Ch 2 p3	Natural Resources	Water Inventory	Dumpling Pond contains warmwater fisheries, primarily for largemouth and smallmouth bass.	Nick Kalejs
Ch 2 p3	Natural Resources	Water Inventory	Units of area for Hog Meadow Pond should be acres.	Nick Kalejs
Ch 2 p5	Natural Resources	Water Inventory	Parker Pond contains coldwater fisheries (stocked brook trout) as well as warmwater.	Nick Kalejs
Ch2 p7	Natural Resources	Water Inventory	While DEP doesn't list any impaired or threatened streams, there are multiple streams/brooks in Casco that are impaired in terms of wildlife passage. There are other areas where this could potentially be mentioned, but recognition that Casco has two dams and many culverts that do not meet fish passage recommendations is important, and goals to improve them are even better. See the Maine Stream Viewer tool on BwH's website as well as the fisheries memo in appendix B for more info.	Greg LeClair

Ch2 p9	High value plant and animal habitat (Water & Natural Resources)	Casco has 3 significant wildlife habitats that are depicted in the Environmental Systems map but aren't necessarily addressed elsewhere – this would be a good place to do so. These include significant vernal pools, inland waterfowl/wading bird habitat, and deer wintering areas. Additionally, habitats that are worth mentioning include both unknown and non-significant vernal pools as well as the BwH focus area, Jugtown Plains.	Greg LeClair
Ch2 p9	Fisheries Habitat	While not represented through mapped areas of concern, Casco contains fisheries habitat for both brook trout (species of special conservation importance in Maine) and landlocked salmon (Sebago Lake/Crooked River represents one of the few native salmon drainages in the state). Habitats for both species are worth highlighting and should be deemed of high value. There is also lake trout habitat (The Heath, Sebago, and Pleasant Lake) in Casco.	Nick Kalejs/Greg LeClair
Ch2 p9	Water & Natural Resources	The first bulleted item needs to be corrected: BOTH Scarlet Bluet and New England Bluet are listed as Special Concern by MDIFW. They might also mention there are a number of Significant Vernal Pools identified in the town.	Beth Swartz
Ch2 p9	Water & Natural Resources	The 2nd to last bullet-MNAP mapped populations of rare species and the two natural communities. The Plan doesn't specify which agency determined locations for the other bullets, it shouldn't be included here either. These species are at Rattlesnake Mountain vs east of Coffee Pond. Rewrite this bullet: At Rattlesnake Mountain, Summer Grape is identified as a threatened species. Rattlesnake Mountain also supports three species of special concern-Purple Clematis, Fern-leaved False Foxglove, and Dry Land Sedge; a rare Enriched Northern Hardwood Forest and an exemplary Oak - Pine Woodland.	Lisa St. Hilaire
Ch2 p9	Water & Natural Resources	The text below the bullets indicates that the Environmental Systems map shows locations for high value plant and animal habitats, however this map does not show the rare plants or rare/exemplary natural communities. As noted above, it may be prudent to use two maps vs one here. It would be helpful to have the map showing high value plant and animal habitats in close proximity to the discussion vs nearly 200 pages prior.	Lisa St. Hilaire
Ch7 p6	Public Access Inventory	The plan states that boat launch numbers are "adequate" in Casco. Without further information on type, capacity, amenities, other facilities, etc., it is difficult to determine if access needs are in fact adequately met. Additionally, the Town identified multiple waters on the Connectivity Map where establishment or improvement of water access was desired.	Nick Kalejs

We appreciate the opportunity to comment on Casco's 2024 Comprehensive Plan and hope that these suggestions are helpful. Please reach out to Beginning with Habitat Municipal Planning Biologist by email at Gregory.leclair@maine.gov, or by phone at (207) 441-4167 should you have any questions. Additional staff contact information is included below.

MDIFW Regional Contact Information

Region A - Gray [Directions](#)

15 Game Farm Road
Gray, ME 04039
(207) 287-2345

Fisheries - press 2

James Pellerin, Regional Biologist - press 1; email: James.Pellerin@maine.gov
Nicholas Kalejs Asst. Regional Biologist - press 2; email Nicholas.Kalejs@maine.gov
Brian Lewis, Biology Specialist- press 3; email: Brian.Lewis@maine.gov

Wildlife - press 1

Scott Lindsay, Regional Biologist - press 3; email: Scott.Lindsay@maine.gov
Joshua Matijas, Asst. Regional Biologist; email: Josh.Matijas@maine.gov

MNAP Contact Information

Lisa St. Hilaire, Information Manager – 207-287-8044; email lisa.st.hilaire@maine.gov
Kristen Puryear, Ecologist – 207-287-8043; email: kristen.puryear@maine.gov

Appendix A – Natural Resource Inventory

Critical Natural Resources

Natural Communities

Common Name	Technical Name	Global Rank	State Rank	State Status
Oak-Pine Woodlands	Oak-Pine Woodlands	G3G5	S4	Apparently Secure
Enriched Northern Hardwoods Forest	Maple-Basswood-Ash Forest	-	S3	Vulnerable

Rare Plants

Common Name	Technical Name	Global Rank	State Rank	State Status
Dry Land Sedge	Carex siccata	G5	S2	Threatened
Purple Clematis	Clematis occidentalis ssp. Occidentalis	G5T5	S3	Special Concern
Fern-leaved False Foxglove	Aureolaria pedicularia	G5	S3	Special Concern
Summer Grape	Vitis aesivalis var. bicolo	G5T5	S2	Threatened

Rare Animals

Common Name	Technical Name	Global Rank	State Rank	State Status
Great Blue Heron	Ardea herodias	G5	S4B	Special Concern
Scarlet Bluet	Enallagma pictum	G3	S2	Special Concern
New England Bluet	Enallagma laterale	G3	S3	Special Concern
Pygmy Snaketail	Opheogomphus howei	G3	S2	Special Concern

Significant Wildlife Habitat

Significant Vernal Pools
Deer Wintering Areas
Inland Waterfowl/Wading Bird Habitat

Essential Wildlife Habitat

NA

Important Natural Resources

Focus Areas of Statewide Ecological Significance

Jugtown Plains

Appendix B – Fisheries Memo

MEMORANDUM

Region A Fisheries

Maine Department of Inland Fisheries and Wildlife

15 Game Farm Road

Gray, ME 04039

Date: August 26, 2024

To: Corinne Michaud-LeBlanc

From: Nick Kalejs

Re: Casco Comprehensive Plan Review

The Fisheries Division of MDIFW has completed its review of Casco’s comprehensive town growth plan and we offer the following addendum to submitted line-item comments. The comments provided below identify key issues of importance in regard to ensuring consistency with MDIFW fisheries management programs.

I. Protection and Enhancement of Fisheries and Fisheries Habitat

The plan addresses some fisheries habitat protection issues and indicates that protecting natural resources is a priority and guiding principle of future town land use. However, more emphasis should be placed on the importance of inland fisheries habitat, including flowing waters, as a natural resource. Wild brook trout are present in Casco and represent a species of special conservation importance in Maine. Multiple streams in Casco have been inventoried by MDIFW with many flowing waters supporting wild brook trout; a list of these waters has been attached at the end of these comments and should be part of an inventory of important natural resources. The Songo River is also stocked with hatchery-raised salmonids, as are lentic waters such as Sebago Lake, Thompson Lake, Crescent Pond, Coffee Pond, Thomas Pond, Pleasant Lake, and Parker Pond. Stocking represents a significant investment of state resources and should be highlighted in any inventory of Town waters (see included list of stocked waters for details). Additional protection should be considered to protect these waters and other important natural resources when reviewing proposed development projects. Brook trout habitat is particularly vulnerable to a host of land-based activities, which often lead to a concurrent loss of riparian habitat. We typically request 100-foot undisturbed buffers along both sides of any stream, including stream-associated wetlands. Buffers should be measured from the upland wetland edge of stream-associated wetlands; if the natural vegetation has been previously altered then restoration may be warranted¹. Protection of riparian areas diminishes erosion/sedimentation problems, reduces thermal impacts, maintains water quality, and supplies leaf litter/woody debris (energy and habitat) for the system. Protection of these important riparian functions ensures that the overall health of the stream habitat is maintained. In addition, smaller headwater and lower order streams are often affected the greatest by development and these systems benefit the most from adequately sized, vegetated buffers.

Based on MDIFW surveys around the region, many road maintenance and construction projects also often inadvertently impede passage at stream crossings. The Town should consistently adopt stream-crossing practices (i.e., culvert installation/maintenance) which do not impede fish passage as required by the Natural Resources Protection Act². Refer to guidelines attached to this document. In addition, the Army Corps of

Engineers has adopted regulations regarding stream crossings that potentially affect municipal road maintenance programs. Maine Audubon, along with many local and federal partners, has also developed a “Stream Smart” design methodology for road crossings built according to high standards of aquatic organism passage. Such a methodology may be of use to the Town in future development projects.

II. Public Access

There is a public need to provide safe angler access to all Town waters that support recreational and commercial fisheries, as well as other recreational uses. The Town plan should adopt language that reflects State and MDIFW goals^{3,4,5} and access development should be consistent with those goals. For example, public access to public waters must not be limited to Town residents only, as such action would jeopardize existing MDIFW stocking and management programs⁶ and is inconsistent with MDIFW and State public access goals.

Based on this review, formal boat access sites within Town boundaries exist at Sebago Lake, Coffee Pond, Parker Pond, Pleasant Lake, and Thompson Lake. Note that this list does not include waters that are partially within Town boundaries, but whose access sites are within another town.

For all public access sites present, more information should be provided. The town plan should identify and describe the status of public access to all freshwater within the Town’s boundaries, including more detailed enumeration of parking capacity, amenities, facilities, and type of boat launch present, if applicable. Casco encompasses or borders ten Great Ponds: Sebago Lake, Thomas Pond, Crescent Pond, Dumpling Pond, Coffee Pond, Owl Pond, Parker Pond, Pleasant Pond, Hog Meadow Pond, and Thompson Lake. The Town also contains miles of flowing waters. Waters such as the Songo River, the Crooked River, Decker Brook, Tarkiln Brook, Mill Brook, Edwards Brook, and Meadow (Rolfe) Brook may be of special interest to anglers. There is limited discussion regarding formal development of new access sites, though the desire to expand public access to natural resources is stated. The Town should explicitly outline strategies to maintain or expand public access to additional water bodies, including in the form of future development goals. These strategies should help prioritize public access needs based on a variety of factors including existing access, fisheries present, water size, proximity to population centers, land availability and cost, existing waterfront development, and other related factors. Lastly, the Town should consider MDIFW and MDACF as potential partners in future public access projects. By working together Town and State agencies are more likely to be successful in achieving our common goal of improving public access.

In adopting measures to address land use and development issues, it is imperative that language and measures not be adopted which could preclude efforts by the Town, MDIFW, or other State agencies from developing public access to public waters of the State, which would be inconsistent with State and MDIFW goals^{3,4,5}. Also, land use zoning ordinances and practices designed to protect water quality should not be so strict as to impede the development of public access opportunities. Restrictive measures could limit or eliminate good access prospects on heavily developed waterfront areas. An “exemption” for public access projects should be adopted for projects which are consistent with Town, State, and MDIFW public access goals. This measure will ensure consistency while foregoing the need to undertake a very detailed and comprehensive review of all plan provisions, including their implications.

Open space is being used more and more by Towns to provide recreational opportunities and access. This is a good idea, particularly when public resources (i.e., rivers and streams) are located within or adjacent to the designated open space areas. Additionally, the open space that public water resources provide can greatly expand the total amount of recreational space for town residents and visitors. However, the Town should be sure that such areas are open to and can accommodate use by all Maine citizens and not just Town residents.

III. Significant Habitats and Fisheries

The plan discusses some habitats and values for inland waters within the Town of Casco. More attention should be paid to wild brook trout habitat, including promotion of protections that would allow them to flourish. Presenting trout habitat as an essential part of local environmental systems reinforces the Town’s commitment

to conservation of important fisheries resources. Brook trout are of special conservation importance to the State of Maine, and habitats necessary to sustain wild populations merit additional protections.

Casco also encompasses part of the Presumpscot River watershed, one of only four native landlocked salmon drainages in Maine. Conservation of habitat within the Crooked River drainage is paramount to sustaining landlocked salmon, as this river supports nearly all wild salmon production for Sebago Lake.

As wild brook trout and landlocked salmon habitat is present in Casco, this information may be useful for prioritizing public access needs/improvements, identifying significant fisheries habitats for protection, securing additional partnerships with conservation organizations, and addressing other Town planning needs.

¹ MAINE DEPARTMENT OF INLAND FISHERIES AND WILDLIFE, STANDARD ENVIRONMENTAL REVIEW RECOMMENDATIONS

Riparian Buffers Along Streams

We recommend that 100-foot undisturbed vegetated buffers be maintained along streams. Buffers should be measured from the edge of stream or associated fringe and floodplain wetlands. Maintaining and enhancing buffers along streams that support coldwater fisheries is critical to the protection of water temperatures, water quality, natural inputs of coarse woody debris, and various forms of aquatic life necessary to support conditions required by many fish species. Stream crossings should be avoided, but if a stream crossing is necessary, or an existing crossing needs to be modified, it should be designed to provide full fish passage. Small streams, including intermittent streams, can provide crucial rearing habitat, cold water for thermal refugia, and abundant food for juvenile salmonids on a seasonal basis and undersized crossings may inhibit these functions. Generally, MDIFW recommends that all new, modified, and replacement stream crossings be sized to span at least 1.2 times the bankfull width of the stream. In addition, we generally recommend that stream crossings be open bottomed (i.e. natural bottom), although embedded structures which are backfilled with representative streambed material have been shown to be effective in not only providing habitat connectivity for fish but also for other aquatic organisms. Construction Best Management Practices should be closely followed to avoid erosion, sedimentation, alteration of stream flow, and other impacts as eroding soils from construction activities can travel significant distances as well as transport other pollutants resulting in direct impacts to fish and fisheries habitat. In addition, we recommend that any necessary instream work occur between July 15 and October 1.

MDIFW Fisheries will rely on MDEP to review project applications for the adequacy of wetland functional assessments and the adequacy of proposed stream buffers, which should be reviewed based upon the aforementioned guidance.

² MDEP, Natural Resources Protection Act, 38 M.R.S.A SS.480-A to 480-Z, Statute, revised 4/3/2002

SS. 480-Q. Activities for which a permit is not required... 2. Maintenance and repair... "B. Crossings do not block fish passages in water courses;"

2-A. Existing road culverts..."and that the crossing does not block fish passage in the water course."

³ MSPO, Comprehensive Planning: A manual for Maine's communities.

"State Goal: To promote and protect the availability of outdoor recreation opportunities for all Maine citizens, including access to surface waters.

⁴ Strategic Plan for Providing Public Access to Maine Waters for Boating and Fishing, MDOC & MDIFW, March 1995.

"Boating and Fishing Access Goal – The primary, long term goal of state fishing and boating access programs is to ensure legal, appropriate, adequate, and equitable means of public access to waters where recreational opportunities exist."

5 MDIFW, Administrative Policy Regarding Fisheries Management, 12/2002

"The purpose of the Department's Access Program is to ensure that the public is able to gain access to Maine's public waters and to the fisheries within them. By law, all great ponds belong to the people of Maine. Private land ownership may limit access to great ponds. Fishing opportunity is directly linked to the public's ability to get to the waters to fish, so acquiring publicly-owned private points of access is critical, especially in areas where heavy development or restrictive private access already limits legal access by the public to the lake or pond.

It is also important to provide legal public access to flowing waters, although there is no parallel legal right to use flowing waters. Such acquisitions must, therefore, include enough land to allow access to stretches of the river or stream."

6 MDIFW, Administrative Policy Regarding Fisheries Management, 12/2002

" The Department will not stock waters without reasonable, legal public access, since stocking programs are to benefit the general fishing public, and not only the people that own land around a lake, pond, river or stream."

7 MSPO, Comprehensive Planning: A manual for Maine's communities.

"Legislative requirement: The act requires that each comprehensive plan include an inventory and analysis of: Significant or critical natural resources, such as wetlands, wildlife and fisheries habitats..."

Stream Crossing Guidelines

A good reference for information on fish passage at stream crossings may be found in the Maine Department of Transportation Fish Passage Policy and Design Guide. The following recommendations reduce the potential for culvert installations to create impediments to fish passage for most resident stream fish typically found in Fisheries Management Region A. These recommendations apply to circular culverts installed in streams.

- Do not install hanging culverts.
- Culvert installation should occur between July 1 and October 1.
- Culvert invert (downstream bottom end of the culvert) should be installed below streambed elevation; 6 inches deep for culverts less than 48 inches in diameter and 12 inches deep for larger culverts.
- Installation should not exceed the existing natural gradient.
- Use corrugated steel/aluminum culverts with the largest available corrugations. Smooth concrete and corrugated plastic culverts should only be used in very low gradient areas where water backs up the entire length of the pipe. In addition, polyethylene slip liners and smooth bore plastic culverts are becoming more popular for new or replacement installations due their longevity and low cost; however, they are creating serious fish passage problems around the State. A review of flow capacity specifications for Snap-Tite, a local distributor of slip liner technology, reveals that in all applications where smaller diameter Snap-Tite Solid liners are installed in existing corrugated metal pipes (CMP) flow capacities are increased, even though effective pipe size is decreased. For example, when a 28-inch (26 inch inside diameter) solid liner is installed in a 30 inch (inside diameter) CMP the new liner provides 187% of the original capacity provided by the metal pipe. The increase in capacity results from the smooth walls and nonwetting characteristic of polyethylene, which reduce friction within the pipe. The increased velocities that result from slip liner and smooth bore polyethylene culverts usually far exceed that which can be negotiated by most fish typically occurring in Maine streams, which typically ranges between 1 and 2 feet per second. Furthermore slip liner projects effectively increase the invert elevation, creating a hydraulic drop at the outlet, which creates an additional obstacle to fish

passage. Increased flow velocities within the pipe also increase downstream scour, which can lead to degradation of the outlet plunge pool, important staging habitat for fish attempting to pass through culverts. Resulting erosion can also create "head cuts" or nick points that cause additional scouring of the stream channel and associated habitat degradation. Impediments and barriers to fish passage will generally be created using slip liners and smooth bore culverts, except under the following conditions:

- 1) In drainage ditches or similar circumstances where water is not being conveyed in a jurisdictional stream channel;
- 2) In streams where there are no fish present and where the presence of natural/artificial barriers prevent seasonal use by fish species lower in the drainage;
- 3) In very low gradient settings where water backs up the entire length of the pipe, and where the water depth at the inlet end of the liner/culvert is at least 4-6 inches deep at low flows.
- 4) Where a permanent, natural barrier is located upstream/downstream within 150 feet of the stream crossing. A permanent/natural barrier is defined as a vertical drop of at least 4 feet over a rock/ledge substrate, as measured during summer low flows. Beaver dams would not be considered a permanent impassable barrier.

- Culverts should be installed so as to provide a minimum water depth of 4-inches within the culvert during critical, seasonal movement/migration periods (spawning, summer refugia, etc.), which will vary by species. This minimum water depth is needed to provide passage opportunities for smaller fish that dominate the streams in Region A. MDOT's Fish Passage Policy and Design Guide provides information on movement periods.

- Flow velocities within the culvert should not exceed 1 and 2 feet per second during critical, seasonal movement/migration periods (spawning, summer refugia, etc.), which will vary by species. These low flows velocities are needed to provide passage opportunities for smaller fish that dominate the streams in Region A. The aforementioned flows should not be exceeded more than 50% of the time during periods of movement. MDOT's Fish Passage Policy and Design Guide provides information on movement periods and how to evaluate this standard.

- Two offset culverts may be used, such that one pipe provides passage conditions during low flow periods and the other is installed to pass design peak flows. An experienced engineer should design multiple culvert installations.

- Efforts to mitigate for fish passage problems (e.g., fish ladder, tailwater control, baffles, etc.) should always be coordinated through MDIFW.

MDIFW Inventory of Casco Wild Brook Trout Streams (2024)

Stream Name:

- Crooked River
- Meadow (Rolfe) Brook
- Decker Brook
- Tarkiln Brook
- Mill Brook
- Edwards Brook
- Unnamed Brook (approx. 43.9 N, -70.5 W)
- Unnamed Brook (approx. 43.9 N, -70.5 W)

MDIFW Inventory of Casco Stocked Waters (2024)

Water Name (Species Stocked):

- Songo River (brook trout)
- Sebago Lake (landlocked salmon)
- Thomas Pond (landlocked salmon, brook trout)
- Crescent Lake (landlocked salmon)
- Coffee Pond (brook trout)
- Parker Pond (brook trout)
- Pleasant Lake (landlocked salmon)
- Thompson Lake (landlocked salmon)