

Part I: General Conditions

General Information

Name of Municipality or Organization: State:

EPA NPDES Permit Number (if applicable):

Primary MS4 Program Manager Contact Information

Name: Title:

Street Address Line 1:

Street Address Line 2:

City: State: Zip Code:

Email: Phone Number:

Fax Number:

Other Information

Stormwater Management Program (SWMP) Location (web address or physical location, if already completed):

Eligibility Determination

Endangered Species Act (ESA) Determination Complete?

Eligibility Criteria (check all that apply): ☐ A ☐ B ☒ C

National Historic Preservation Act (NHPA) Determination Complete?

Eligibility Criteria (check all that apply): ☒ A ☐ B ☐ C ☐ D

☒ Check the box if your municipality or organization was covered under the 2003 MS4 General Permit

MS4 Infrastructure (if covered under the 2003 permit)

Estimated Percent of Outfall Map Complete? If 100% of 2003 requirements not met, enter an estimated date of completion (MM/DD/YY):

Web address where MS4 map is published:
If outfall map is unavailable on the internet an electronic or paper copy of the outfall map must be included with NOI submission (see section V for submission options)

Regulatory Authorities (if covered under the 2003 permit)

Illicit Discharge Detection and Elimination (IDDE) Authority Adopted? Effective Date or Estimated Date of Adoption (MM/DD/YY):

Construction/Erosion and Sediment Control (ESC) Authority Adopted? Effective Date or Estimated Date of Adoption (MM/DD/YY):

Post-Construction Stormwater Management Adopted? Effective Date or Estimated Date of Adoption (MM/DD/YY):

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Notice of Intent (NOI) for coverage under Small MS4 General Permit

Part II: Summary of Receiving Waters

Please list the waterbody segments to which your MS4 discharges. For each waterbody segment, please report the number of outfalls discharging into it and, if applicable, any impairments.

New Hampshire list of impaired waters: <http://des.nh.gov/organization/divisions/water/wmb/swqa/>

Check off relevant pollutants for discharges to impaired waterbodies (see above 303(d) lists) without an approved TMDL in accordance with part 2.2.2 of the permit. List any other pollutants in the last column, if applicable.

Waterbody segment that receives flow from the MS4	Number of outfalls into receiving water segment	Chloride	Chlorophyll-a	Dissolved Oxygen/ DO Saturation	Nitrogen	Oil & Grease/ PAH	Phosphorus	Solids/ TSS/ Turbidity	E. coli	Enterococcus	Other pollutant(s) causing impairments
Chase Brook Recreation Pond - NHIMP700061002-02	2	☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Chase Brook - NHRIV70061002-07	1	☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Chase Brook Unamed - NHRIV70061002-08	1	☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Chase Brook - NHRIV70061002-09	2	☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Colby Brook - NHRIV70060804-10	4	☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Merrimack River - NHRIV70060804-11	1	☐	☐	☐	☐	☐	☐	☐	☒	☐	Mercury
Nesenkeag Brook - NHRIV70061002-05	3	☐	☐	☒	☐	☐	☐	☐	☐	☐	Mercury, Benthic-Macroinvertebrate Bio Assessments, pH
Darrah Pond - NHLAK700061002-01-02	1	☐	☒	☐	☐	☐	☒	☐	☐	☐	Mercury, Cyanobacteria Hepatotoxic Microcystins
Unnamed Brook - NHIMP700060804-06		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Half Moon Pond - NHLAK70061002-07		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Nesenkeag Brook - NHIMP700061002-01		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Unnamed Brook to Merrimack - NHRIV700060804-09		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Unnamed Brook to Merrimack - NHRIV700061002-03		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Unnamed Brook to Nesenkeag - NHRIV700061002-06		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Unnamed Brook to Merrimack - NHRIV700061002-10		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Unnamed Brook - NHRIV700061002-15		☐	☐	☐	☐	☐	☐	☐	☐	☐	Mercury
Darrah Pond - NHLAK700061002-01-01		☐	☐	☐	☐	☒	☐	☐	☐	☐	Mercury
		☐	☐	☐	☐	☐	☐	☐	☐	☐	

Part III: Stormwater Management Program Summary

Identify the Best Management Practices (BMPs) that will be employed to address each of the six Minimum Control Measures (MCMs).

For each MCM, list each existing or proposed BMP by category and provide a brief description, responsible parties/departments, measurable goals, and the year the BMP will be employed (public education and outreach BMPs also requires a target audience.) **Use the drop- down menus in each table or enter your own to text to override the drop down menu.**

MCM 1: Public Education and Outreach

BMP Media/Category	BMP Description	Targeted Audience	Responsible Department/Parties	Measurable Goal	Beginning Year of BMP Implementation
Web Page and other promotional materials	Use NH Stormwater Coalition outreach materials and guidance -implementing outreach for relevant impairments city wide.	Residents	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	1) Increased awareness of how fertilizer works. 2) Increased awareness of pet waste impacts to water quality. 3) Increased awareness of yard waste impacts to water quality.	Yearly
Promotional Material	Use NH Stormwater Coalition outreach materials and guidance -implementing outreach for relevant impairments city wide.	Businesses, Institutions and Commercial Facilities	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	See Residents	2019
Promotional Materials	Use NH Stormwater Coalition outreach materials and guidance for developers audience.	Developers (construction)	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	Local developers aware of federal SW regulations	2019
Promotional Materials	Use NH Stormwater Coalition outreach materials and guidance for	Industrial Facilities	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	Increased awareness of Industrial facilities permit	2020

	developers audience.		ms4/?page_id=54		
Promotional Materials	Use NH Stormwater Coalition outreach materials and guidance for developers audience.	Developers (construction)	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	Local developers aware of local SW regulations	2022
	NA- see previous page. Doing every year starting in 2019.	Businesses, Institutions and Commercial Facilities	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54		
	NA- See previous	Developers (construction)	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54		
Promotional Materials	No industrial facilities located in MS4, OR: use NH Stormwater Coalition outreach materials and guidance for industrial facilities.	Industrial Facilities	NH Regional Stormwater Coalition See: https://www4des.state.nh.us/nh-ms4/?page_id=54	Attendees to webinar.	2023

Part III: Stormwater Management Program Summary (continued)

MCM 2: Public Involvement and Participation

BMP Categorization	Brief BMP Description	Responsible Department/Parties	Additional Description/Measurable Goal	Beginning Year of BMP Implementation
Public Review	SWMP Review: SWMP will be posted on the town/city website for public review. The SWMP will be reviewed annually and updated/revised as necessary.	Department of Public Works	Allow annual review of stormwater management plan and posting of stormwater management plan on website	Year 2
Public Participation	The SWMP will be presented or communicated by a "memo" annually to the public with opportunity for comment. Meeting minutes will record public comments.	Department of Public Works	Allow public to comment on stormwater management plan annually	Year 2



Part III: Stormwater Management Program Summary (continued)

MCM 3: Illicit Discharge Detection and Elimination (IDDE)

BMP Categorization	BMP Description	Responsible Department/Parties	Measurable Goal
Sanitary Sewer Overflow (SSO) inventory	Develop SSO inventory in accordance of permit conditions	Department of Public Works	Complete within 1 year of effective date of permit
Storm sewer system map	Create map and update during IDDE program completion	Department of Public Works	Update map within 2 years of effective date of permit and complete full system map 10 years after effective date of permit
Written IDDE program development	Create written IDDE program	Department of Public Works	Complete within 1 year of the effective date of permit and update as required
Implement IDDE program	Implement catchment investigations according to program and permit conditions	Department of Public Works	Complete 10 years after effective date of permit
Employee training	Train employees in IDDE implementation	Department of Public Works	Train annually
Conduct dry weather screening	Conduct in accordance with outfall screening procedure and permit conditions	Department of Public Works	Complete 3 years after effective date of permit
Conduct wet weather screening	Conduct in accordance with outfall screening procedure	Department of Public Works	Complete 10 years after effective date of permit
Ongoing screening	Conduct dry weather and wet weather screening (as necessary)	Department of Public Works	Complete ongoing outfall screening on completion of IDDE program

Part III: Stormwater Management Program Summary (continued)

MCM 4: Construction Site Stormwater Runoff Control

BMP Categorization	BMP Description	Responsible Department/Parties	Measurable Goal
Site inspection and enforcement of Erosion and Sediment Control (ESC) measures	Complete written procedures of site inspections and enforcement procedures	Planning Department	Complete within 1 year of the effective date of permit
Site Plan Review	Complete written procedures of site plan review and begin implementation	Planning Department	Complete within 1 year of the effective date of permit
Erosion and sediment Control	Adoption of requirements for construction operators to implement a sediment and erosion control program	Planning Department	Complete within 1 year of the effective date of permit
Waste Control	Adoption of requirements to control wastes, including but not limited to, discarded building materials, concrete truck wash out, chemicals, litter, and sanitary wastes	Planning Department	Complete within 1 year of the effective date of permit

Part III: Stormwater Management Program Summary (continued)

MCM 5: Post-Construction Stormwater Management in New Development and Redevelopment

BMP Categorization	BMP Description	Responsible Department/ Parties	Measurable Goal
As-built plans for on-site stormwater control	The procedures to require submission of as-built drawings and ensure long term operation and maintenance will be a part of the SWMP	Planning Department	Require submission of as-built plans for completed projects
Target properties to reduce impervious areas	Complete an inventory and priority ranking of permittee-owned property and existing infrastructure that could be retrofitted with BMPs designed to reduce the frequency, volume and pollutant loads of stormwater discharges to its MS4 through the mitigation of impervious area	Planning Department	Complete 4 years after effective date of permit and report annually on retrofitted properties
Allow green infrastructure	Develop a report assessing existing local regulations to determine the feasibility of making green infrastructure practices allowable when appropriate site conditions exist	Planning Department	Complete 4 years after effective date of permit and implement recommendations of report
Street design and parking lot guidelines	Develop a report assessing requirements that affect the creation of impervious cover. The assessment will help determine if changes to design standards for streets and parking lots can be modified to support low impact design options.	Planning Department	Complete 4 years after effective date of permit and implement recommendations of report
Ensure any stormwater controls or management practices for new development and redevelopment meet the retention or treatment requirements of the permit and consistent with the Southeast Watershed Alliance's Model Stormwater Standards for Coastal	Adoption, amendment, or modification of a regulatory mechanism to meet permit requirements	Planning Department	Complete 2 years after effective date of permit

Watershed Communities			
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Part III: Stormwater Management Program Summary (continued)

MCM 6: Municipal Good Housekeeping and Pollution Prevention

BMP Categorization	BMP Description	Responsible Department/Parties	Measurable Goal	Beginning Year of BMP Implementation
O&M procedures	Create written O&M procedures including all requirements contained in 2.3.7.1 for parks and open spaces, buildings and facilities, and vehicles and equipment	Department of Public Works	Complete and implement 2 years after effective date of permit	2020
Inventory all permittee-owned parks and open spaces, buildings and facilities, and vehicles and equipment	Create inventory	Department of Public Works	Complete 2 years after effective date of permit and implement annually	2020
Infrastructure O&M	Establish and implement program for repair and rehabilitation of MS4 infrastructure	Department of Public Works	Complete 2 years after effective date of permit	2020
Stormwater Pollution Prevention Plan (SWPPP)	Create SWPPPs for maintenance garages, transfer stations, and other waste-handling facilities	Department of Public Works	Complete 2 years after effective date of permit	2020
Catch basin cleaning	Establish schedule for catch basin cleaning such	Department of Public Works	Clean catch basins on established schedule and	2019



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	that each catch basin is no more than 50% full and clean catch basins on that schedule		report number of catch basins cleaned and volume of material moved annually	
Street sweeping program	Sweep all streets and permittee-owned parking lots in accordance with permit conditions	Department of Public Works	Sweep all streets and permittee-owned parking lots once per year in the spring	2019
Road salt use optimization program	Establish and implement a program to minimize the use of road salt	Department of Public Works	Implement salt use optimization during deicing season	2020
Inspections and maintenance of stormwater treatment structures	Establish and implement inspection and maintenance procedures and frequencies	Department of Public Works	Inspect and maintain treatment structures at least annually	2020

Notice of Intent (NOI) for coverage under Small MS4 General Permit

Part III: Stormwater Management Program Summary (continued)

Actions for Meeting Total Maximum Daily Load (TMDL) Requirements

Use the drop-down menus to select the applicable TMDL, action description to meet the TMDL requirements, and the responsible department/parties. If no options are applicable, or more than one, **enter your own text to override drop-down menus.** If submitting a NHDES approved alternative reduction plan, attach and submit it with the NOI.

[illegible]

Notice of Intent (NOI) for coverage under Small MS4 General Permit

Part III: Stormwater Management Program Summary (continued)

Actions for Meeting Requirements Related to Water Quality Limited Waters

CRIMINAL

Use the drop-down menus to select the pollutant causing the water quality limitation and enter the waterbody ID(s) experiencing excursions above water quality standards for that pollutant. Choose the action description from the dropdown menu and indicate the responsible party. If no options are applicable, or more than one, **enter your own text to override drop-down menus.**

[illegible]

Part IV: Notes and additional information

Use the space below to indicate the part(s) of 2.2.2 that you have identified as not applicable to your MS4 and provide all supporting documentation below or attach additional documents if necessary.

Provide any additional information about your MS4 program below.

The Town of Litchfield obtained an official species list for threatened and endangered species via the IPaC system within the regulated urbanized area. Per the IPaC system, one species exists within the MS4 regulated area: the Northern Long-eared Bat (*Myotis septentrionalis*). Based on the habitat of this species, it is our opinion that the current stormwater discharges will have "no effect" on the listed species because no construction is being conducted, there will be no disturbances to terrestrial habitats of the Long-eared Bat. On September 6, 2018, the town consulted with EPA and was informed that a print out of the area (attached) would acceptable documentation. The Town will be certifying for criterion C.

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Notice of Intent (NOI) for coverage under Small MS4 General Permit (continued)**Part V: Certification**

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, I certify that the information submitted is, to the best of my knowledge and belief, true, accurate and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name:

BRENT T. LEMIRE

Title:

SELECT BOARD CHAIR

Signature Field

Brent T. Lemire

Date:

10-1-18

NOI Submission

Please submit the form electronically via email using the "submit by Email" button below or send in a CD with your completed NOI. You may also print and submit via mail at the address below if you choose not to submit electronically. Outfall map required in Part I of the NOI (if applicable) can be submitted electronically as an email attachment OR as a paper copy.

Permittees that choose to submit their NOI electronically by email or by mailing a CD with the completed NOI form to EPA, will be able to download a partially filled Year 1 Annual Report at a later date from EPA.

Submit by Email

Submit by email using this button. Or, send an email with attachments to: stormwater.reports@epa.gov

Save

Save NOI for your records

EPA Submittal Address:

United States Environmental Protection Agency
5 Post Office Square - Suite 100
Mail Code - OEP06-1
Boston, Massachusetts 02109-3912
ATTN: Newton Tedder

State Submittal Address

Massachusetts Department of Environmental Protection
One Winter Street - 5th Floor
Boston, MA 02108
ATTN: Fred Civian

A blue ink stamp consisting of a square box with the word "ORIGINAL" written in capital letters to its right.

NRPC
NANJING REGIONAL
PLANNING COMMISSION
4 East Nanjing Road
Box 4324
Nanjing, Jiangsu 210008
P.R. China
Tel: 86-25-8442388
Fax: 86-25-8442389



- ▲ Outfall
- ▲ Catch Basin
- ▲ Dry Well
- ▲ Miscellaneous Drainage Feature

4A-P: Water quality impairment with approved TMDL
5-M: Marginal water quality impairment with no TMDL
5-P: Significant water quality impairment with no TMDL

 HUC 12 Watershed Boundary (USGS)
 Sub Watershed Specific to Impaired Feature (NH DES)
 Urbanized Area (US Census)

 Numbered Route
 Other State Road
 Local Road
 Private Road
 Class VI Road

 Open Water
 Wetlands
 Streams
 Index Grid

Maps prepared by the Natchez Regional Planning Commission are for planning purposes only. NRPC uses data gathered from a wide variety of sources in various states of accuracy. No warranties, expressed or implied, are made for the data herein, in part, or in its interpretation.

Digital Data Sources

NH Dept. of Environmental Services sub watershed specific to impaired features, impaired water features

US Geological Survey HUC 12 watershed boundary, water features

US Fish and Wildlife Service, wetlands

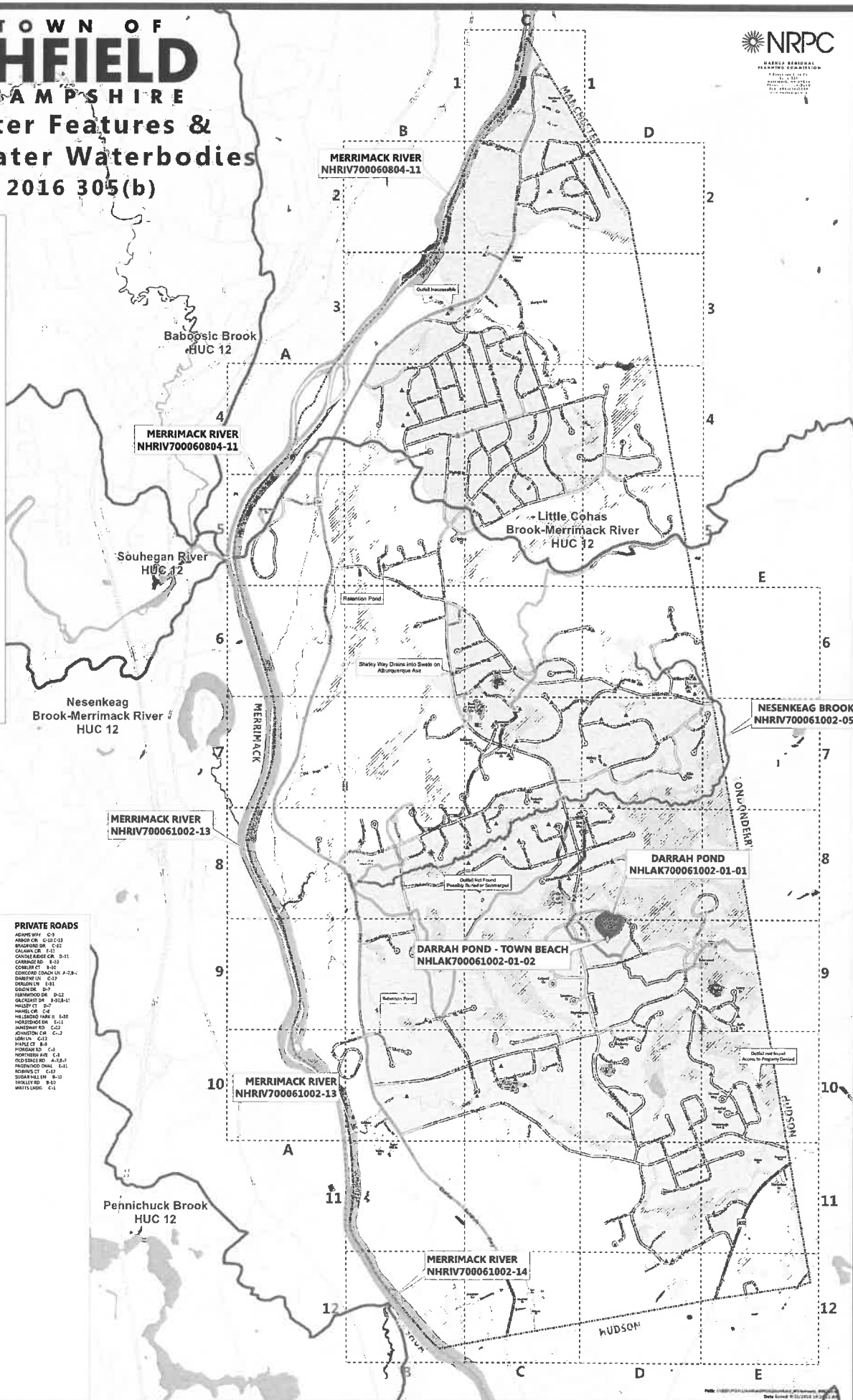
US Census Bureau released area 72023 and 73110 in 2000

National Regional Mapping Commission, roads, town boundaries

[illegible]

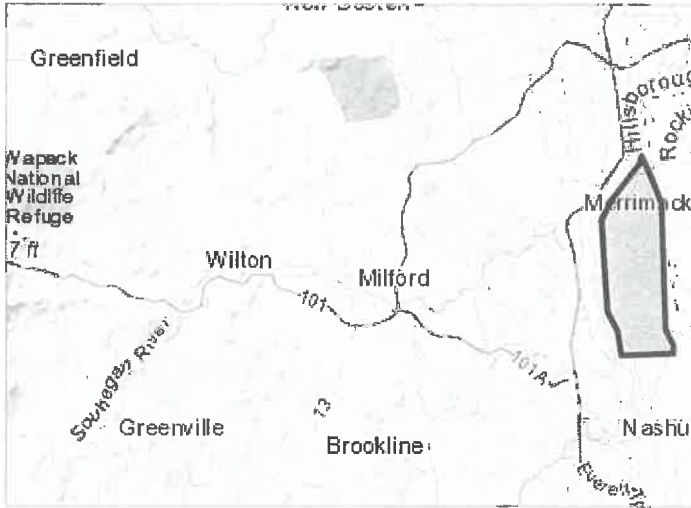
PRIVATE ROADS

ADAMS WAY C-3
ARBOR CR C-10-C12
BRADFORD DR C-32
CALAWA CR T-121
CANDLERIDGE CR D-11
CANNAGE RD E-10
COBBLE CT E-30
CONCORD COACH LN A-7,B-3
DARGENT LN C-27
DERLON LN E-31
DIXON DR D-7
HILWOOD DR D-32
HOLLYST DR B-30-E-31
HUNTER CT E-30
HAMEL CR C-6
HILLSIDE PARK II E-30
HOLSTED RD E-11
JAMESWAY RD C-52
JOHNSTON CR C-27
LORIAN C-12
MALE CT B-8
MORGAN DR C-3
NORTHERN AVE C-3
OLD STAGE RD A-7,B-7
PAGewood OVAL E-31
RDWYN CT C-37
SUGAR HILL EN B-10
TROLLEY RD B-10
WILSON RD E-30



Town of Litchfield, NH

MS-4 Permit



LOCATION Hillsborough and Rockingham counties, New Hampshire

CREATED October 1, 2018

Resources

This project potentially impacts 13 resources managed or regulated by the U.S. Fish and Wildlife Service.

- 1 endangered species
- 11 migratory birds
- Refuge and fish hatchery information is not available at this time
- Known wetlands

What's next?

ENDANGERED SPECIES REVIEW

Review this project's effect on listed species¹ pursuant to the Endangered Species Act, as part of the overall regulatory review.

1. Species listed under the Endangered Species Act are threatened or endangered; IPaC also shows species that are candidates, or proposed, for listing. See the [listing status page](#) for more information.

SPECIES LIST

Requesting an official species list is now part of IPaC's endangered species review.

Local office

New England
Ecological Services



U.S. Fish & Wildlife Service

ECOS**ORIGINAL**ECOS / Species Profile for Northern long-eared Bat (*Myotis septentrionalis*)

Northern Long-Eared Bat

(*Myotis septentrionalis*)

[Range Information](#) | [Federal Register](#) | [Recovery](#) | [Critical Habitat](#) | [Conservation Plans](#) | [Petitions](#) | [Life History](#)

Taxonomy: [View taxonomy in ITIS](#)

Listing Status: Threatened

Where Listed: WHEREVER FOUND

General Information

The northern long-eared bat is a medium-sized bat about 3 to 3.7 inches in length but with a wingspan of 9 to 10 inches. As its name suggests, this bat is distinguished by its long ears, particularly as compared to other bats in its genus, *Myotis*, which are actually bats noted for their small ears (*Myotis* means mouse-eared). The northern long-eared bat is found across much of the eastern and north central United States and all Canadian provinces from the Atlantic coast west to the southern Northwest Territories and eastern British Columbia. The species' range includes 37 states. White-nose syndrome, a fungal disease known to affect bats, is currently the predominant threat to this bat, especially throughout the Northeast where the species has declined by up to 99 percent from pre-white-nose syndrome levels at many hibernation sites. Although the disease has not yet spread throughout the northern long-eared bat's entire range (white-nose syndrome is currently found in at least 25 of 37 states where the northern long-eared bat occurs), it continues to spread. Experts expect that where it spreads, it will have the same impact as seen in the Northeast.

The species historical range included Alabama, Arkansas, Connecticut, Delaware, District of Columbia, Florida, Georgia, Illinois, Indiana, Iowa, Kansas, Kentucky, Louisiana, Maine, Maryland, Massachusetts, Michigan, Minnesota, Mississippi, Missouri, Montana, Nebraska, New Hampshire, New Jersey, New York, North Carolina, North Dakota, Ohio, Oklahoma, Pennsylvania, Rhode Island, South Carolina, South Dakota, Tennessee, Vermont, Virginia, West Virginia, Wisconsin, Wyoming. See below for information about where the species is known or believed to occur.



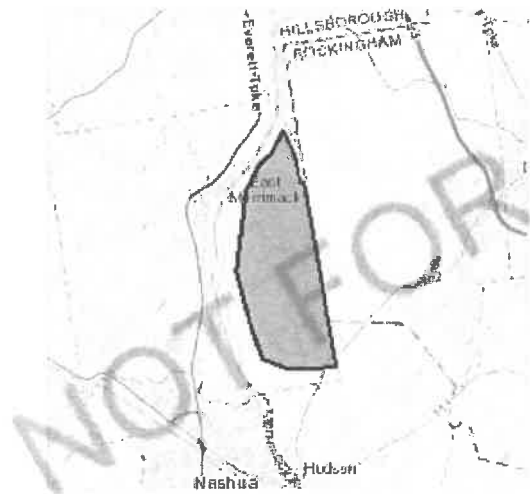
IPaC resource list

This report is an automatically generated list of species and other resources such as critical habitat (collectively referred to as *trust resources*) under the U.S. Fish and Wildlife Service's (USFWS) jurisdiction that are known or expected to be on or near the project area referenced below. The list may also include trust resources that occur outside of the project area, but that could potentially be directly or indirectly affected by activities in the project area. However, determining the likelihood and extent of effects a project may have on trust resources typically requires gathering additional site-specific (e.g., vegetation/species surveys) and project-specific (e.g., magnitude and timing of proposed activities) information.

Below is a summary of the project information you provided and contact information for the USFWS office(s) with jurisdiction in the defined project area. Please read the introduction to each section that follows (Endangered Species, Migratory Birds, USFWS Facilities, and NWI Wetlands) for additional information applicable to the trust resources addressed in that section.

Location

Hillsborough County, New Hampshire



Local office

New England Ecological Services Field Office

☎ (603) 223-2541

🏢 (603) 223-0104

70 Commercial Street, Suite 300
Concord, NH 03301-5094

<http://www.fws.gov/newengland>

Endangered species

This resource list is for informational purposes only and does not constitute an analysis of project level impacts.

The primary information used to generate this list is the known or expected range of each species. Additional areas of influence (AOI) for species are also considered. An AOI includes areas outside of the species range if the species could be indirectly affected by activities in that area (e.g., placing a dam upstream of a fish population, even if that fish does not occur at the dam site, may indirectly impact the species by reducing or eliminating water flow downstream). Because species can move, and site conditions can change, the species on this list are not guaranteed to be found on or near the project area. To fully determine any potential effects to species, additional site-specific and project-specific information is often required.

Section 7 of the Endangered Species Act requires Federal agencies to "request of the Secretary information whether any species which is listed or proposed to be listed may be present in the area of such proposed action" for any project that is conducted, permitted, funded, or licensed by any Federal agency. A letter from the local office and a species list which fulfills this requirement can **only** be obtained by requesting an official species list from either the Regulatory Review section in IPaC (see directions below) or from the local field office directly.

For project evaluations that require USFWS concurrence/review, please return to the IPaC website and request an official species list by doing the following:

1. Draw the project location and click CONTINUE.
2. Click DEFINE PROJECT.
3. Log in (if directed to do so).
4. Provide a name and description for your project.
5. Click REQUEST SPECIES LIST.

Listed species¹ and their critical habitats are managed by the Ecological Services Program of the U.S. Fish and Wildlife Service (USFWS) and the fisheries division of the National Oceanic and Atmospheric Administration (NOAA Fisheries²).

Species and critical habitats under the sole responsibility of NOAA Fisheries are **not** shown on this list. Please contact NOAA Fisheries for species under their jurisdiction.

1. Species listed under the Endangered Species Act are threatened or endangered; IPaC also shows species that are candidates, or proposed, for listing. See the listing status page for more information.
2. NOAA Fisheries, also known as the National Marine Fisheries Service (NMFS), is an office of the National Oceanic and Atmospheric Administration within the Department of Commerce.

The following species are potentially affected by activities in this location:

Mammals

NAME

STATUS

Northern Long-eared Bat *Myotis septentrionalis*
No critical habitat has been designated for this species.
<https://ecos.fws.gov/ecp/species/9045>

Threatened

Critical habitats

Potential effects to critical habitat(s) in this location must be analyzed along with the endangered species themselves.

THERE ARE NO CRITICAL HABITATS AT THIS LOCATION.

Migratory birds

Certain birds are protected under the Migratory Bird Treaty Act¹ and the Bald and Golden Eagle Protection Act².

Any person or organization who plans or conducts activities that may result in impacts to migratory birds, eagles, and their habitats should follow appropriate regulations and consider implementing appropriate conservation measures, as described below.

1. The Migratory Birds Treaty Act of 1918.
2. The Bald and Golden Eagle Protection Act of 1940.

Additional information can be found using the following links:

- Birds of Conservation Concern <http://www.fws.gov/birds/management/managed-species/birds-of-conservation-concern.php>
- Measures for avoiding and minimizing impacts to birds <http://www.fws.gov/birds/management/project-assessment-tools-and-guidance/conservation-measures.php>
- Nationwide conservation measures for birds <http://www.fws.gov/migratorybirds/pdf/management/nationwidestandardconservationmeasures.pdf>

The birds listed below are birds of particular concern either because they occur on the USFWS Birds of Conservation Concern (BCC) list or warrant special attention in your project location. To learn more about the levels of concern for birds on your list and how this list is generated, see the FAQ below. This is not a list of every bird you may find in this location, nor a guarantee that every bird on this list will be found in your project area. To see exact locations of where birders and the general public have sighted birds in and around your project area, visit the E-bird data mapping tool (Tip: enter your location, desired date range and a species on your list). For projects that occur off the Atlantic Coast, additional maps and models detailing the relative occurrence and abundance of bird species on your list are available. Links to additional information about Atlantic Coast birds, and other important information about your migratory bird list, including how to properly interpret and use your migratory bird report, can be found below.

For guidance on when to schedule activities or implement avoidance and minimization measures to reduce impacts to migratory birds on your list, click on the PROBABILITY OF PRESENCE SUMMARY at the top of your list to see when these birds are most likely to be present and breeding in your project area.

NAME

BREEDING SEASON (IF A BREEDING SEASON IS INDICATED FOR A BIRD ON YOUR LIST, THE BIRD MAY BREED IN YOUR PROJECT AREA SOMETIME WITHIN THE TIMEFRAME SPECIFIED, WHICH IS A VERY LIBERAL ESTIMATE OF THE DATES INSIDE WHICH THE BIRD BREEDS ACROSS ITS ENTIRE RANGE. "BREEDS ELSEWHERE" INDICATES THAT THE BIRD DOES NOT LIKELY BREED IN YOUR PROJECT AREA.)

Bald Eagle *Haliaeetus leucocephalus*

This is not a Bird of Conservation Concern (BCC) in this area, but warrants attention because of the Eagle Act or for potential susceptibilities in offshore areas from certain types of development or activities.

<https://ecos.fws.gov/ecp/species/1626>

Breeds Oct 15 to Aug 31

Black-billed Cuckoo *Coccyzus erythrophthalmus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9399>

Breeds May 15 to Oct 10

Bobolink *Dolichonyx oryzivorus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 20 to Jul 31

Canada Warbler *Cardellina canadensis*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 20 to Aug 10

Eastern Whip-poor-will *Antrostomus vociferus*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Breeds May 1 to Aug 20

Lesser Yellowlegs *Tringa flavipes*

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

<https://ecos.fws.gov/ecp/species/9679>

Breeds elsewhere

Prairie Warbler *Dendroica discolor*

Breeds May 1 to Jul 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Rusty Blackbird *Euphagus carolinus*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Semipalmated Sandpiper *Calidris pusilla*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Snowy Owl *Bubo scandiacus*

Breeds elsewhere

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Wood Thrush *Hylocichla mustelina*

Breeds May 10 to Aug 31

This is a Bird of Conservation Concern (BCC) throughout its range in the continental USA and Alaska.

Probability of Presence Summary

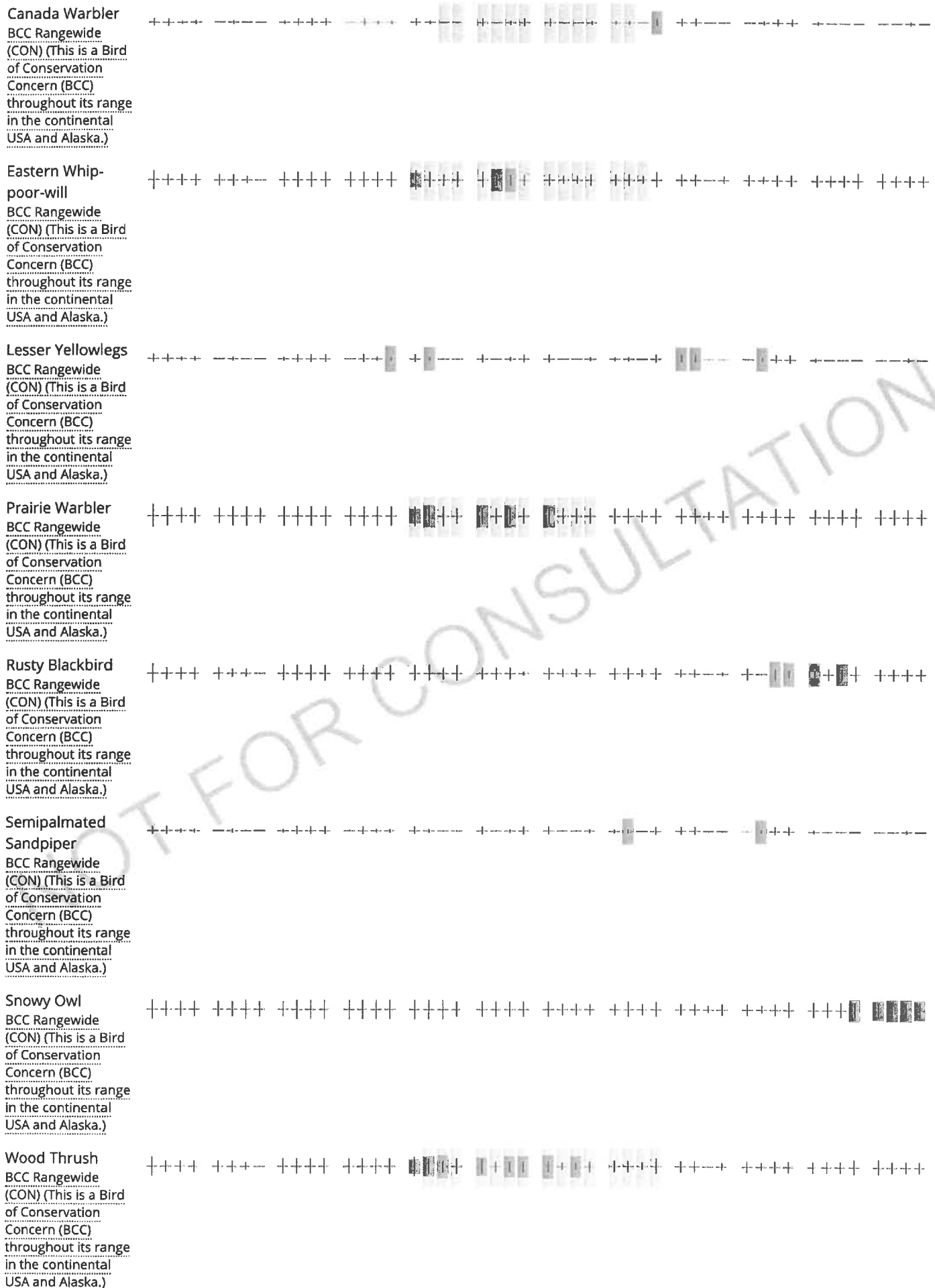
The graphs below provide our best understanding of when birds of concern are most likely to be present in your project area. This information can be used to tailor and schedule your project activities to avoid or minimize impacts to birds. Please make sure you read and understand the FAQ "Proper Interpretation and Use of Your Migratory Bird Report" before using or attempting to interpret this report.

Probability of Presence (■)

Each green bar represents the bird's relative probability of presence in the 10km grid cell(s) your project overlaps during a particular week of the year. (A year is represented as 12 4-week months.) A taller bar indicates a higher probability of species presence. The survey effort (see below) can be used to establish a level of confidence in the presence score. One can have higher confidence in the presence score if the corresponding survey effort is also high.

How is the probability of presence score calculated? The calculation is done in three steps:

1. The probability of presence for each week is calculated as the number of survey events in the week where the species was detected divided by the total number of survey events for that week. For example, if in week 12 there were 20 survey events and the Spotted Towhee was found in 5 of them, the probability of presence of the Spotted Towhee in week 12 is 0.25.
2. To properly present the pattern of presence across the year, the relative probability of presence is calculated. This is the probability of presence divided by the maximum probability of presence across all weeks. For example, imagine the probability of presence in week 20 for the Spotted Towhee is 0.05, and that the probability of presence at week 12 (0.25) is the maximum of any week of the year. The relative probability of presence on week 12 is $0.25/0.25 = 1$; at week 20 it is $0.05/0.25 = 0.2$.



Tell me more about conservation measures I can implement to avoid or minimize impacts to migratory birds.

Nationwide Conservation Measures describes measures that can help avoid and minimize impacts to all birds at any location year round. Implementation of these measures is particularly important when birds are most likely to occur in the project area. When birds may be breeding in the area, identifying the locations of any active nests and avoiding their destruction is a very helpful impact minimization measure. To see when birds are most likely to occur and be breeding in your project area, view the Probability of Presence Summary. Additional measures and/or permits may be advisable depending on the type of activity you are conducting and the type of infrastructure or bird species present on your project site.

What does IPaC use to generate the migratory birds potentially occurring in my specified location?

The Migratory Bird Resource List is comprised of USFWS Birds of Conservation Concern (BCC) and other species that may warrant special attention in your project location.

The migratory bird list generated for your project is derived from data provided by the Avian Knowledge Network (AKN). The AKN data is based on a growing collection of survey, banding, and citizen science datasets and is queried and filtered to return a list of those birds reported as occurring in the 10km grid cell(s) which your project intersects, and that have been identified as warranting special attention because they are a BCC species in that area, an eagle (Eagle Act requirements may apply), or a species that has a particular vulnerability to offshore activities or development.

Again, the Migratory Bird Resource list includes only a subset of birds that may occur in your project area. It is not representative of all birds that may occur in your project area. To get a list of all birds potentially present in your project area, please visit the E-bird Explore Data Tool.

What does IPaC use to generate the probability of presence graphs for the migratory birds potentially occurring in my specified location?

The probability of presence graphs associated with your migratory bird list are based on data provided by the Avian Knowledge Network (AKN). This data is derived from a growing collection of survey, banding, and citizen science datasets.

Probability of presence data is continuously being updated as new and better information becomes available. To learn more about how the probability of presence graphs are produced and how to interpret them, go the Probability of Presence Summary and then click on the "Tell me about these graphs" link.

How do I know if a bird is breeding, wintering, migrating or present year-round in my project area?

To see what part of a particular bird's range your project area falls within (i.e. breeding, wintering, migrating or year-round), you may refer to the following resources: The Cornell Lab of Ornithology All About Birds Bird Guide, or (if you are unsuccessful in locating the bird of interest there), the Cornell Lab of Ornithology Neotropical Birds guide. If a bird on your migratory bird species list has a breeding season associated with it, if that bird does occur in your project area, there may be nests present at some point within the timeframe specified. If "Breeds elsewhere" is indicated, then the bird likely does not breed in your project area.

What are the levels of concern for migratory birds?

Migratory birds delivered through IPaC fall into the following distinct categories of concern:

1. "BCC Rangewide" birds are Birds of Conservation Concern (BCC) that are of concern throughout their range anywhere within the USA (including Hawaii, the Pacific Islands, Puerto Rico, and the Virgin Islands);
2. "BCC - BCR" birds are BCCs that are of concern only in particular Bird Conservation Regions (BCRs) in the continental USA; and
3. "Non-BCC - Vulnerable" birds are not BCC species in your project area, but appear on your list either because of the Eagle Act requirements (for eagles) or (for non-eagles) potential susceptibilities in offshore areas from certain types of development or activities (e.g. offshore energy development or longline fishing).

Although it is important to try to avoid and minimize impacts to all birds, efforts should be made, in particular, to avoid and minimize impacts to the birds on this list, especially eagles and BCC species of rangewide concern. For more information on conservation measures you can implement to help avoid and minimize migratory bird impacts and requirements for eagles, please see the FAQs for these topics.

Details about birds that are potentially affected by offshore projects

For additional details about the relative occurrence and abundance of both individual bird species and groups of bird species within your project area off the Atlantic Coast, please visit the [Northeast Ocean Data Portal](#). The Portal also offers data and information about other taxa besides birds that may be helpful to you in your project review. Alternately, you may download the bird model results files underlying the portal maps through the [NOAA NCCOS Integrative Statistical Modeling and Predictive Mapping of Marine Bird Distributions and Abundance on the Atlantic Outer Continental Shelf](#) project webpage.

Bird tracking data can also provide additional details about occurrence and habitat use throughout the year, including migration. Models relying on survey data may not include this information. For additional information on marine bird tracking data, see the [Diving Bird Study](#) and the [nanotag studies](#) or contact [Caleb Spiegel](#) or [Pam Loring](#).

What if I have eagles on my list?

If your project has the potential to disturb or kill eagles, you may need to [obtain a permit](#) to avoid violating the Eagle Act should such impacts occur.

Proper Interpretation and Use of Your Migratory Bird Report

The migratory bird list generated is not a list of all birds in your project area, only a subset of birds of priority concern. To learn more about how your list is generated, and see options for identifying what other birds may be in your project area, please see the FAQ "What does IPaC use to generate the migratory birds potentially occurring in my specified location". Please be aware this report provides the "probability of presence" of birds within the 10 km grid cell(s) that overlap your project; not your exact project footprint. On the graphs provided, please also look carefully at the survey effort (indicated by the black vertical bar) and for the existence of the "no data" indicator (a red horizontal bar). A high survey effort is the key component. If the survey effort is high, then the probability of presence score can be viewed as more dependable. In contrast, a low survey effort bar or no data bar means a lack of data and, therefore, a lack of certainty about presence of the species. This list is not perfect; it is simply a starting point for identifying what birds of concern have the potential to be in your project area, when they might be there, and if they might be breeding (which means nests might be present). The list helps you know what to look for to confirm presence, and helps guide you in knowing when to implement conservation measures to avoid or minimize potential impacts from your project activities, should presence be confirmed. To learn more about conservation measures, visit the FAQ "Tell me about conservation measures I can implement to avoid or minimize impacts to migratory birds" at the bottom of your migratory bird trust resources page.

Facilities

Wildlife refuges and fish hatcheries

REFUGE AND FISH HATCHERY INFORMATION IS NOT AVAILABLE AT THIS TIME

Wetlands in the National Wetlands Inventory

Impacts to NWI wetlands and other aquatic habitats may be subject to regulation under Section 404 of the Clean Water Act, or other State/Federal statutes.

For more information please contact the Regulatory Program of the local U.S. Army Corps of Engineers District.

Please note that the NWI data being shown may be out of date. We are currently working to update our NWI data set. We recommend you verify these results with a site visit to determine the actual extent of wetlands on site.

This location overlaps the following wetlands:

FRESHWATER EMERGENT WETLAND

PEM1E

PEM1Eb

PEM1/SS1Eb

PEM1Fb

PEM1/SS1E

PEM1/FO5Fb

PEM1/UBF

PEM1F

FRESHWATER FORESTED/SHRUB WETLAND

PFO4/1E

PFO1/4E

PFO1E

PSS1/EM1E

PSS1E

PSS1Eb

PSS1/4E

PFO4E

PSS1/3E

PFO4/SS1E

PFO1Eb

PFO5Fb

PFO5/EM1Fb

PSS3E

PSS3/1Eb

PSS3/1E

FRESHWATER POND

PUBH

PUBHx

PUBFb

PUB/EM1Fb

PUBHh

PUBFx

PUBF

RIVERINE

R2UBHR5UBHR3UBHR4SBC

A full description for each wetland code can be found at the [National Wetlands Inventory website](#)

Data limitations

The Service's objective of mapping wetlands and deepwater habitats is to produce reconnaissance level information on the location, type and size of these resources. The maps are prepared from the analysis of high altitude imagery. Wetlands are identified based on vegetation, visible hydrology and geography. A margin of error is inherent in the use of imagery; thus, detailed on-the-ground inspection of any particular site may result in revision of the wetland boundaries or classification established through image analysis.

The accuracy of image interpretation depends on the quality of the imagery, the experience of the image analysts, the amount and quality of the collateral data and the amount of ground truth verification work conducted. Metadata should be consulted to determine the date of the source imagery used and any mapping problems.

Wetlands or other mapped features may have changed since the date of the imagery or field work. There may be occasional differences in polygon boundaries or classifications between the information depicted on the map and the actual conditions on site.

Data exclusions

Certain wetland habitats are excluded from the National mapping program because of the limitations of aerial imagery as the primary data source used to detect wetlands. These habitats include seagrasses or submerged aquatic vegetation that are found in the intertidal and subtidal zones of estuaries and nearshore coastal waters. Some deepwater reef communities (coral or tubercid worm reefs) have also been excluded from the inventory. These habitats, because of their depth, go undetected by aerial imagery.

Data precautions

Federal, state, and local regulatory agencies with jurisdiction over wetlands may define and describe wetlands in a different manner than that used in this inventory. There is no attempt, in either the design or products of this inventory, to define the limits of proprietary jurisdiction of any Federal, state, or local government or to establish the geographical scope of the regulatory programs of government agencies. Persons intending to engage in activities involving modifications within or adjacent to wetland areas should seek the advice of appropriate federal, state, or local agencies concerning specified agency regulatory programs and proprietary jurisdictions that may affect such activities.