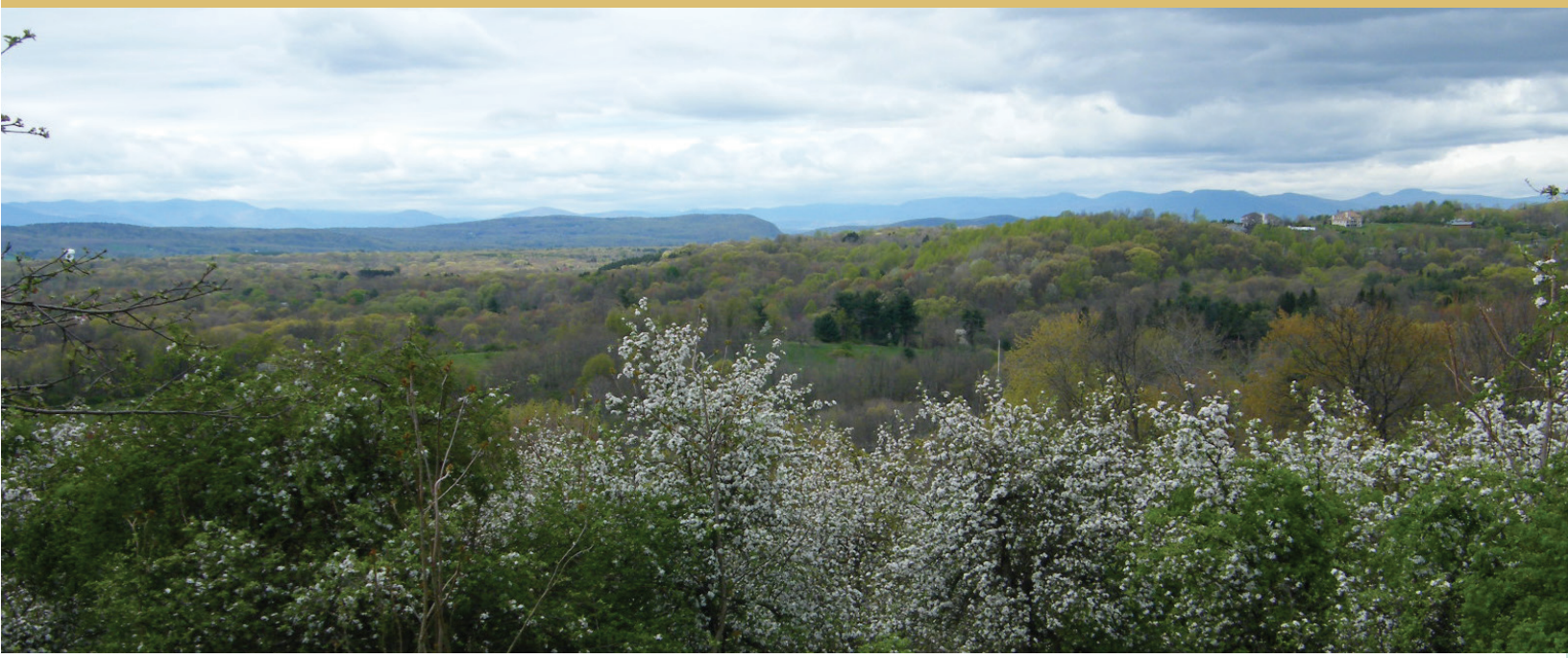
TOWN OF POUGHKEEPSIE

Natural Resources Inventory

December 2022



ADOPTED APRIL 12, 2023

NEW YORK STATE | Department of Environmental Conservation | Hudson River Estuary Program

ACKNOWLEDGEMENTS

The Natural Resources Inventory (NRI) was developed in collaboration with the NRI/Open Space Plan Steering Committee, Town Staff, and Consultant Team. The NRI was guided by Nate Nardi-Cyrus and Ingrid Haeckel of the Hudson River Estuary Program (HREP).

NRI/Open Space Plan Steering Committee

The NRI/Open Space Plan Steering Committee was appointed by the Town Board to undertake this process. The Steering Committee is made up of members from the Conservation Advisory Commission (CAC), Town Board, and Planning Board, and is supported by Town staff:

- Pam Kingsley, CAC Chair
- Susan Karnes Hecht, CAC
- Lorraine Mirabella, CAC
- Margaret Slomin, CAC
- Caroline Fenner, CAC
- Maribeth Rubenstein, CAC
- Jessica Lopez, Town Board
- Bob Nasser, Planning Board

Town Staff

- Michael Welti, AICP, Director of Municipal Development
- Kristen E. Taylor, AICP, Town Planning

Consultant Team

- MJ Engineering and Land Surveying
- Shumaker Engineering and Land Surveying

This project is funded, in part, through a grant from the New York State Environmental Protection Fund through the Hudson River Estuary Program of the New York State Department of Environmental Conservation (NYSDEC).

RESOLUTION 4:12 - # 7 OF 2023

WHEREAS, the Town Board of the Town of Poughkeepsie adopted the Comprehensive Plan Update on October 6, 2021, and a priority implementation action in the Comprehensive Plan Update was to complete a town-wide Natural Resource Inventory (NRI) and Open Space Plan, and

WHEREAS, the Town received grant funding in 2020 through the DEC's Hudson River Estuary Program for the preparation of a Natural Resources Inventory (NRI) and Open Space Plan; and

WHEREAS, by Resolution 11:18 - #3A of 2020, the Town Board authorized the hiring of MJ Engineering and Land Surveying as the Town's planning consultant for preparation of the NRI and Open Space Plan; and

WHEREAS, by Resolution 11:18 - #3B of 2020, the Town Board appointed a temporary "Steering Committee" consisting of the membership of the Town's Conservation Advisory Commission (CAC), plus a member of the Town Board and a member of the Planning Board; and

WHEREAS, the NRI/Open Space Plan Steering Committee along with town staff and consultants held three public workshops, convened several stakeholder meetings, and conducted a community survey which received over 600 responses, while preparing the NRI and Open Space Plan; and

WHEREAS, the NRI/Open Space Plan Steering Committee along with town staff and consultants completed a draft version of the NRI and Open Space Plan in December 2022 and presented the documents (2 volumes) to the Town Board at a Committee of the

Whole on February 8, 2023, and the documents were made available for review on the project website and town website immediately following this presentation; and

WHEREAS, no additional comments have been received;

NOW THEREFORE BE IT RESOLVED THAT, because it is the only Involved Agency, the Town Board hereby declares that it is the Lead Agency for purposes of the environmental review of this matter pursuant to Article 8 of the Environmental Conservation Law; and

BE IT FURTHER RESOLVED THAT, the Town Board, as Lead Agency, notes that adoption of the NRI and Open Space Plan is a Type 1 Action under the New York State Environmental Quality Review Act; and

BE IT FURTHER RESOLVED THAT, that the Town Board has reviewed the Long Environmental Assessment Form (EAF) prepared by the Director of Municipal Development and hereby determines that: 1) adoption of the NRI and Open Space Plan would not have a significant adverse effect on the environment and; 2) the Supervisor is authorized to execute Parts 2 and 3 of the EAF as drafted and; 3) a draft environmental impact statement will not be required and; 4) a Negative Declaration is hereby issued; and

BE IT FURTHER RESOLVED THAT, the Town Board hereby adopts the NRI and Open Space Plan, a copy of which can be found on the Town's website at https://www.townofpoughkeepsieopenspace.com/documents, and directs that it be used as a policy guide by the Town Board, Planning Board, CAC, staff and the public in evaluating the effects of proposed land-use and zoning changes, for informing the

environmental review of development proposals, and for identifying land conservation and stewardship opportunities in the Town of Poughkeepsie; and

BE IT FURTHER RESOLVED THAT, the Town Board thanks the NRI/Open Space Plan Steering Committee, the DEC's Hudson River Estuary Program, town staff, consultants, and the many members of the community who provided input and contributed to the preparation of this important document over the last three years.

Dated: April 12, 2023

Moved: Jon Jay Baisley

Seconded: Stephan Krakower

Motion passes/ fails: Ayes 6 Nays 0

JEN/mem
t-4/3/2023
m-4/12/2023

		AYE	NAY	ABSTAIN
PRESENT/ABSENT	Councilman Renihan	absent		
PRESENT/ABSENT	Councilman Carlos	✓		
PRESENT/ABSENT	Councilwoman Burger	✓		
PRESENT/ABSENT	Councilman Cifone	✓		
PRESENT/ABSENT	Councilman Krakower	✓		
PRESENT/ABSENT	Councilwoman Shershin	✓		
PRESENT/ABSENT	Supervisor Baisley	✓		

Table of Contents

1.0 INTRODUCTION

1.1 Overview of a Natural Resources Inventory

The purpose of this Natural Resources Inventory (NRI) is to compile and describe important, naturally occurring resources within the Town. Cultural resources, such as historic, scenic, and recreational, are included as well. The inventory has two basic purposes: 1) to provide the building blocks for comprehensive land-use and conservation planning, and 2) to allow natural resource information to be included in local planning and zoning decisions. The NRI is comprised of a series of 23 maps as well as an accompanying report with narrative descriptions, supporting data tables, and recommendations.

1.2 Data and Methodology

Mapping for the Town of Poughkeepsie NRI was completed in 2021 by MJ Engineering and Land Surveying, P.C. The maps display data sourced from federal, state, and county agencies; non-profit organizations including Hudsonia and Scenic Hudson; and from prior planning efforts by the Town of Poughkeepsie.

All maps were produced using ESRI ArcGIS Geographic Information Systems (GIS) software and data in the NAD 1983 State Plane New York East FIPS 3101 Feet coordinate system. Information on the maps comes from different sources, produced at different times, at different scales, and for different purposes. Most of the GIS data were collected or developed from remote sensing data (i.e., aerial photographs, satellite imagery) or derived from paper maps. For these reasons, GIS data often contains inaccuracies present in the original data, plus any errors from converting it. Therefore, maps created in GIS are approximate and best used for planning purposes. The maps should not be substituted for onsite surveys. Any resource shown on a map should be verified for legal purposes, including environmental review. Information provided by the maps can be enhanced by local knowledge, and the NRI should be updated over time as new data becomes available.

1.3 How to Use this Inventory

The NRI is a valuable tool for planning and developing land use policies. The goal of the NRI is to provide a comprehensive inventory of all the Town's land, water, and cultural resources.

The maps and report provide detailed information about the various considerations involved in developing a plan for land use and zoning. The Town of Poughkeepsie NRI is a resource that helps developers and property owners identify potential impacts to Town of Poughkeepsie's natural resources, and accordingly, helps them to make informed decisions regarding changes to their properties. This resource can be utilized for planning and designing projects that involve the management of natural

resources. It can also be used by landowners to inform stewardship. The NRI is a screening tool that can be used as part of a site assessment to identify potential issues or concerns. It is also commonly used as a screening tool for municipal scale planning. The maps included are intended to provide a general overview of land use classifications and are not intended to provide site specific accuracy.

1.4 Community Overview

The Town of Poughkeepsie is located in Dutchess County, within the Hudson River Valley of New York State. According to the U.S. Census, the Town has a total land area of 28.5 square miles and a population of 45,471, as of 2020.[1] The Hudson River forms the Town's western border, while Wappinger Creek forms the eastern boundary. The City of Poughkeepsie, a separate municipal jurisdiction, is surrounded on three sides by the Town. Other adjacent municipalities include the Towns of Hyde Park (to the north), Pleasant Valley (to the northeast), LaGrange (to the east), and Wappinger (to the southeast). In addition to numerous hamlets and Census designated places, the western portion of the Village of Wappingers Falls – the Village is bisected by Wappinger Creek – lies within the Town boundaries. Major roadways passing through the Town include U.S. Route 9, U.S. Route 44 and State Route 55.

Photo Credit: Pam Kingsley

[1] https://www.census.gov/quickfacts/poughkeepsietowndutchesscountynewyork

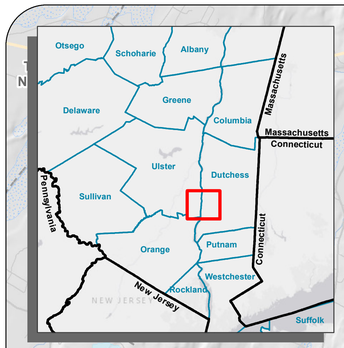
2.0 BACKGROUND MAPPING

Base Map

The Town of Poughkeepsie Base Map is the template for the full NRI map series. It presents general geographic context, upon which additional map information is layered in subsequent maps. The Base Map includes roads, hydrology, and municipal boundaries. N.Y./U.S. highways, local streets, and railroads are shown. Open water areas, wetlands, and streams are illustrated under hydrology. The Town of Poughkeepsie municipal boundaries are shown by a thick gray line. Data sources are provided in the lower right corner of the map and in all subsequent maps in the NRI.

The Base Map is oriented to true north and has a scale of 1:2,500. This scale is a ratio that refers to the relationship of distance on the map to distance on the ground.

Photo Credit: Pam Kingsley



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Base Map

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Dutchess County Rail Trail
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water

Sources:
Esri, NYS ITS, Dutchess County, NYSDEC, Hudsonia, Town of Poughkeepsie

Engineering and Land Surveying, P.C.
1533 Crescent Road - Clifton Park, NY 12065

SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

N

0 0.5 1 Mile

This map was prepared for illustrative purposes only and is not suitable for engineering, surveying, or legal purposes.

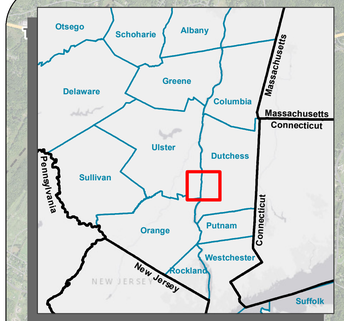
Aerial Map

The Aerial View Map gives a bird's-eye view of the Town, showing 1-ft resolution 4-band digital orthoimagery taken in natural color in 2019 by the NYS Digital Orthoimagery Program. Orthoimagery is aerial imagery that has been georeferenced and digitally corrected to remove geometric distortion due to ground relief and camera position[2]. The resulting imagery is proportionally accurate and can be overlaid onto maps. The aerial imagery was taken in early spring prior to the leaf out of deciduous trees, resulting in a detailed view of vegetation types, land uses, and development. It can serve as a reference for comparison with features shown on other maps in the NRI.

The panel to the right demonstrates how the change in development patterns can be seen through aerial imagery. This example shows the change in development on Cherry Hill Drive between 1980 and 2019.

Cherry Hill Drive - 1980 to 2019
Dutchess County GIS Aerial Access

[2] https://orthos.dhses.ny.gov/



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Aerial Imagery

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads

Sources:
Esri, NYS ITS, NAIP 2019
Imagery, Dutchess County, Town of Poughkeepsie

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Elevation and Steep Slopes Map

The elevation map displays approximate height above sea level and steep slopes in the area derived from digital elevation models from the U.S. Geological Survey. Land in the Town of Poughkeepsie rises from sea level to a high elevation of 485 feet at Peach Hill.

Steep Slopes are defined by the percentage of vertical change over horizontal distance. For example, a 10% slope is one that rises 10 feet over a horizontal distance of 100 feet. The steep slopes shown on the map are derived from 10-meter resolution digital elevation models from the U.S. Geological Survey and should only be considered an approximate depiction of steeply sloped areas in the Town. Purple shaded areas on the map indicate the steepest slopes.

In general, slopes greater than 15% pose significant limitations to development and are among the most sensitive environmental features in the landscape. Poughkeepsie Town Code describes the parameters for steep slopes in sections pertaining to subdivision regulations, erosion and sediment control, and zoning. Development of steeply sloped landscapes can increase the danger of erosion, landslides, and excessive polluted runoff.[3] Steep slope disturbance can introduce sediment to streams and water bodies, affecting downstream water quality. Grading and construction on steep slopes can also be prohibitively expensive, and such sites may not be able to support a properly functioning public or private sewer system. Steep slopes or escarpments may also have scenic value that may be impacted by development. Table 2-1 shows the steep slope percentages in the study area.

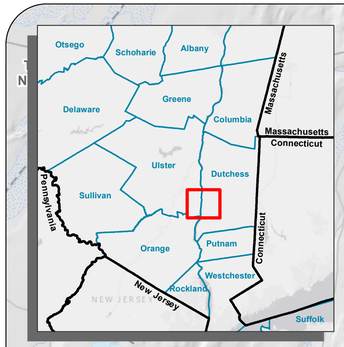
Table 2-1 Steep Slopes

Steep Slopes	Acres	Percentage
15-24.9%	1982	10%
>25%	783	4%

Several significant habitats are associated with steep slopes, as well. Thinly soiled steep slopes may support rocky ledges and talus, which are used for denning, shelter, foraging, and basking by various wildlife species.[4]

[3] https://wri.cals.cornell.edu/sites/wri.cals.cornell.edu/files/shared/documents/2014_Richards_Final.pdf

[4] Kiviat, E. and G. Stevens. *Biodiversity Assessment Manual for the Hudson River Estuary Corridor.* New York State Department of Environmental Conservation, 2001.



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Elevation & Steep Slopes

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- High Point Elevation
- Slopes 15-24.9%
- Slopes > 25%

Elevation (ft)

- <50 ft
- 50 - 100 ft
- 100 - 150 ft
- 150 - 200 ft
- 200 - 250 ft
- 250 - 300 ft
- 300 - 350 ft
- 350 - 400 ft
- 400 - 450 ft
- 450 - 500 ft

Sources:
Esri, NYS ITS, USGS, NYSDEC, Hudsonia, Dutchess County, Town of Poughkeepsie

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SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

N

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3.0 LAND RESOURCES

3.1 Geology

The geology of the Hudson Valley is diverse and has helped to shape the character of both its natural and human communities; for example, cement industries line the Hudson River as a result of the area's large supply of limestone and gypsum. Geological characteristics have an effect on topography, groundwater resources, migration of pollutants, and mineral resources. The properties of bedrock geology and surficial geology (loose deposits above bedrock) also strongly influence soil properties, as well as groundwater and surface water chemistry, which in turn influence the type of ecological communities that can thrive. For example, alkaline environments and the calcium rich or calcareous condition that is often associated with limestone bedrock often support more unique or rare plants and biodiversity than other areas[5]. A significant geological feature can also be economically valuable, for instance, having a scenic value that attracts tourism.

Bedrock Geology Map

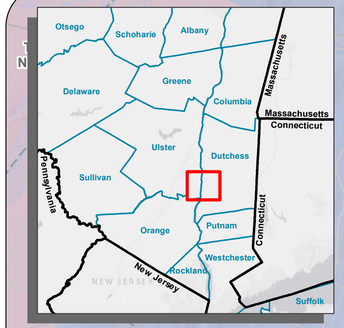
The Bedrock Geology Map displays bedrock information from statewide maps produced by the New York State Museum At a scale of 1:250,000, the data are highly generalized and cannot be relied on to describe the precise geology at any specific area on the ground. The map is nevertheless still useful for describing the general geology of an area. Table 3 – 1 contains additional description of the bedrock geology units from the New York State Museum.

Table 3 - 1 Bedrock Geology Units

Bedrock Geology Unit	Primary Materials	Geologic Age	Acreage	Percentage*
On- Normanskill Shale	Shale, Argillite	Paleozoic, Middle Ordovician	8745	44%
OCw- Wappinger Group	limestone, dolostone	Paleozoic, Cambrian	4788	24%
Oag- Austin Glen Formation	graywacke, shale	Paleozoic, Cambrian	2946	15%
h2o- Water	water	N/A	2401	12%
Otm- Taconic Melange	mixed materials	Paleozoic, Middle Ordovician	451	2%
Osf- Stuyvesant Falls Formation	shale, chert, limestone	Paleozoic, Cambrian	369	2%
Oba- Balmville Limestone	limestone	Paleozoic, Middle Ordovician	199	1%
Omi- Mount Merino Formation	shale, slate, argillite	Paleozoic, Cambrian	126	1%

*Due to numerical rounding of percentages, percentage total may be less/greater than 100%

[5] Creating a Natural Resources Inventory a Guide for Communities in the Hudson River Estuary Watershed 2014



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Bedrock Geology

April 2021

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- Intermittent Streams
- NYSDEC Wetland

Bedrock Geology Unit - Primary Materials

- Cev - Everett Schist - schist, meta-graywacke, quartzite *
- Cg - Germantown Formation - shale, conglomerate, limestone *
- Cn - Nassau Formation - shale, argillite quartzite, sandstone *
- OCw - Wappinger Group - Limestone, dolostone
- Oag - Austin Glen Formation - graywacke, shale
- Oba - Balmville Limestone - limestone
- Omi - Mount Merino Formation - shale, slate, argillite
- On - Normanskill Shale - shale, argillite
- Oqu - Quassaic Quartzite - quartzite, sandstone, shale, limestone*
- Osf - Stuyvesant Falls Formation - shale, chert, limestone
- Otm - Taconic Melange - mixed materials
- Owl - Walloomsac Formation - slate, phyllite, schist*
- h2o - Water

*None present within the Town

Sources:
Esri, NYS ITS, NYS Museum, NYSDEC, Hudsonia, Dutchess County, Town of Poughkeepsie

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Surficial Geology Map

Surficial geology refers to unconsolidated sediments lying above the bedrock. The weathering of both bedrock and surficial geology deposits along with organic matter, water, and air is responsible for the slow process of soil formation and the properties of these "parent materials" strongly influence resulting soil chemistry, nutrients, and texture. The surficial geology of Poughkeepsie largely reflects the retreat of glaciers following the last ice age. A giant ice sheet blanketed the area during the Wisconsin Stage of the Pleistocene Epoch, about 21,000 years ago. Glacial ice, as much as 5,000 feet thick, scoured the landscape and deposited boulders, sand, and gravel in its path. Glacial meltwater turned the Hudson Valley into vast Lake Albany, and left behind beaches, deltas, and deposits of silt and clay.[6]

The Surficial Geology Map displays information from statewide maps produced by the New York State Museum. As for bedrock geology, the map was developed at a scale of 1:250,000 and is best used as a general reference. These are the types of surficial materials mapped in Poughkeepsie, defined as follows:

- Recent Alluvium: Modern stream deposits.
- Kame Deposit: Mound-like hill of poorly sorted drift, mostly sand and gravel, deposited at or near the terminus of a glacier.
- Lacustrine Delta: Sand and gravel deposits often underlain by finer-grained sand and silt/clay.
- Lacustrine Silt and Clay: Fine-grained deposits deposited in glacial lakes.
- Lacustrine Sand: Fine to medium sand often underlain by silt or clay deposits.
- Outwash Sand and Gravel: Sand and gravel deposits from glacial meltwater streams.
- Till: Dense, unsorted clay, silt, sand, gravel, boulders.
- Bedrock: Exposed bedrock, typically within one meter of the soil surface.
- Swamp Deposits: Areas were deposits of fine silts and clays settle after flooding, often poorly drained.

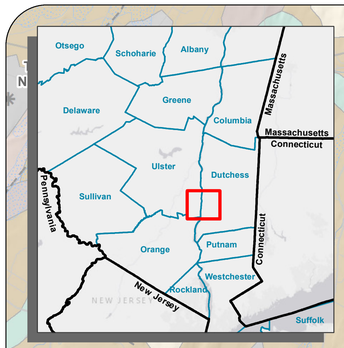
Much of Poughkeepsie is blanketed in till deposits. Bedrock exposures occur at higher elevations and on steep slopes south of the City of Poughkeepsie along the Hudson River. The eastern side of Town is made up of mostly Till and Outwash Sand and Gravel as seen in Table 3 – 2.

Table 3 – 2 Bedrock Types

	Acres	Percentage
Till	9424	47%
Outwash Sand and Gravel	2988	15%
Bedrock	2349	12%
Lacustrine Silt and Clay	1411	7%
Recent Alluvium	1208	6%
Lacustrine Sand	826	4%

[6] Fisher, Donald W., and Stephen L. Nightingale. The Rise and Fall of the Taconic Mountains: A Geological History of Eastern New York. Black Dome Press, 2006

Lacustrine Delta	733	4%
Kame Deposits	426	2%
Swamp Deposits	15	0%



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Surficial Geology

April 2021

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- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Active or Reclaimed Mine

Surficial Geology

- Recent Alluvium
- Kame Deposits
- Lacustrine Delta
- Lacustrine Sand
- Lacustrine Silt and Clay
- Outwash Sand and Gravel
- Swamp Deposits
- Bedrock
- Till

Sources:
Esri, NYS ITS, NYS Museum, NYSDEC, Hudsonia, Dutchess County, Town of Poughkeepsie

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3.2 Soils and Agricultural Resources

Soils Map

To understand the natural processes of the land, and to plan land use accordingly, there is no more fundamental place to start than soil. Soil controls decomposition of organic matter and biogeochemical cycles; regulates water flow; influences the vegetation, habitat type, and agricultural potential of locations; and supports human habitation and structures. Soil acts as a natural filter to help protect the quality of water and air, regulates rates of aquifer recharge versus runoff, and supports food production and growth of forests and biological communities that society depends on.

Soil information is critical for land-use planning as it helps to determine where it is appropriate or feasible to build. Each soil type has a certain set of characteristics defined by (but not limited to) properties such as permeability, drainage, available water capacity, pH, depth to bedrock, and risk of erosion. Consideration of soil properties is important for planning and designing drainage systems; siting of structures; evaluating the potential for septic systems; assessing the need for specially designed foundations, basements, and roads; determining the feasibility of excavation; and so forth.

The Soil Survey for Dutchess County includes a detailed soil map for the county along with descriptions of soil types and tables of chemical, hydrologic, and structural characteristics of the soils for various human uses. It is important to note that county soil maps are only approximate; any soil unit may contain "inclusions" of up to two acres of soil types different from the mapped unit. In a county soil survey (such as the USDA 2005 Dutchess County survey), soils are classified on the basis of their texture, parent material, depth of soil development, and water-holding characteristics such as permeability and drainage. For a more thorough discussion of soil physical properties, see http://soils.usda.gov/education/. Table 3 – 3 shows the makeup of soils found in the area; Table 3 – 4 shows the drainage class for the Town.

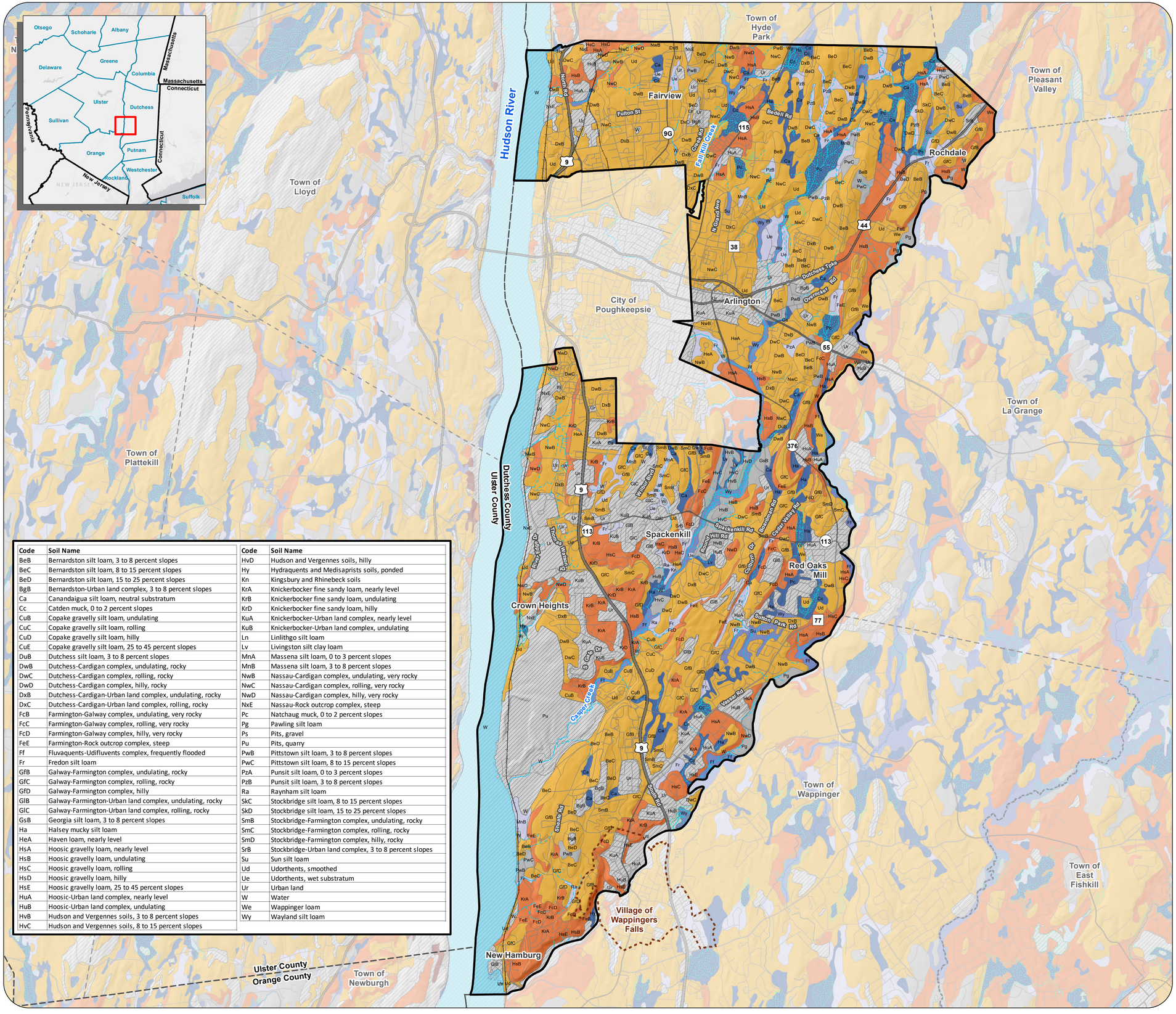
Table 3 – 3 Soil Makeup

Code	Soil Name	Acres	Percentage
BeB	Bernardston silt loam, 3 to 8 percent slopes	314	2%
BeC	Bernardston silt loam, 8 to 15 percent slopes	484	2%
BeD	Bernardston silt loam, 15 to 25 percent slopes	302	2%
BgB	Bernardston-Urban land complex, 3 to 8 percent slopes	76	<1%
Ca	Canandaigua silt loam, neutral substratum	533	3%
Cc	Catden muck, 0 to 2 percent slopes	134	1%
CuB	Copake gravelly silt loam, undulating	116	1%
CuC	Copake gravelly silt loam, rolling	29	<1%
CuD	Copake gravelly silt loam, hilly	16	<1%
CuE	Copake gravelly silt loam, 25 to 45 percent slopes	7	<1%
DuB	Dutchess silt loam, 3 to 8 percent slopes	8	<1%
DwB	Dutchess-Cardigan complex, undulating, rocky	1501	7%

DwC	Dutchess-Cardigan complex, rolling, rocky	739	4%
DwD	Dutchess-Cardigan complex, hilly, rocky	25	<1%
DxB	Dutchess-Cardigan-Urban land complex, undulating, rocky	940	5%
DxC	Dutchess-Cardigan-Urban land complex, rolling, rocky	432	2%
FcB	Farmington-Galway complex, undulating, very rocky	4	<1%
FcC	Farmington-Galway complex, rolling, very rocky	44	<1%
FcD	Farmington-Galway complex, hilly, very rocky	141	1%
FeE	Farmington-Rock outcrop complex, steep	299	1%
Ff	Fluvaquents-Udifluvents complex, frequently flooded	160	1%
Fr	Fredon silt loam	359	2%
GfB	Galway-Farmington complex, undulating, rocky	1089	5%
GfC	Galway-Farmington complex, rolling, rocky	734	4%
GfD	Galway-Farmington complex, hilly	107	1%
GlB	Galway-Farmington-Urban land complex, undulating, rocky	208	1%
GlC	Galway-Farmington-Urban land complex, rolling, rocky	154	1%
GsB	Georgia silt loam, 3 to 8 percent slopes	39	<1%
Ha	Halsey mucky silt loam	182	1%
HeA	Haven loam, nearly level	266	1%
HsA	Hoosic gravelly loam, nearly level	435	2%
HsB	Hoosic gravelly loam, undulating	688	3%
HsC	Hoosic gravelly loam, rolling	151	1%
HsD	Hoosic gravelly loam, hilly	<1	<1%
HsE	Hoosic gravelly loam, 25 to 45 percent slopes	113	1%
HuA	Hoosic-Urban land complex, nearly level	381	2%
HuB	Hoosic-Urban land complex, undulating	183	1%
HvB	Hudson and Vergennes soils, 3 to 8 percent slopes	135	1%
HvC	Hudson and Vergennes soils, 8 to 15 percent slopes	81	<1%
HvD	Hudson and Vergennes soils, hilly	9	<1%
Hy	Hydraquents and Medisaprists soils, ponded	12	<1%
Kn	Kingsbury and Rhinebeck soils	7	<1%
KrA	Knickerbocker fine sandy loam, nearly level	316	2%
KrB	Knickerbocker fine sandy loam, undulating	171	1%
KrD	Knickerbocker fine sandy loam, hilly	112	1%
KuA	Knickerbocker-Urban land complex, nearly level	404	2%
KuB	Knickerbocker-Urban land complex, undulating	134	1%
Ln	Linlithgo silt loam	26	<1%
Lv	Livingston silt clay loam	34	<1%
MnA	Massena silt loam, 0 to 3 percent slopes	29	<1%

MnB	Massena silt loam, 3 to 8 percent slopes	73	<1%
NwB	Nassau-Cardigan complex, undulating, very rocky	370	2%
NwC	Nassau-Cardigan complex, rolling, very rocky	619	3%
NwD	Nassau-Cardigan complex, hilly, very rocky	162	1%
NxE	Nassau-Rock outcrop complex, steep	230	1%
Pc	Natchaug muck, 0 to 2 percent slopes	180	1%
Pg	Pawling silt loam	110	1%
Ps	Pits, gravel	5	<1%
Pu	Pits, quarry	805	4%
PwB	PittsTown silt loam, 3 to 8 percent slopes	128	1%
PwC	PittsTown silt loam, 8 to 15 percent slopes	72	<1%
PzA	Punsit silt loam, 0 to 3 percent slopes	16	<1%
PzB	Punsit silt loam, 3 to 8 percent slopes	95	<1%
Ra	Raynham silt loam	29	<1%
SkC	Stockbridge silt loam, 8 to 15 percent slopes	38	<1%
SkD	Stockbridge silt loam, 15 to 25 percent slopes	9	<1%
SmB	Stockbridge-Farmington complex, undulating, rocky	213	1%
SmC	Stockbridge-Farmington complex, rolling, rocky	129	1%
SmD	Stockbridge-Farmington complex, hilly, rocky	18	<1%
SrB	Stockbridge-Urban land complex, 3 to 8 percent slopes	82	<1%
Su	Sun silt loam	107	1%
Ud	Udorthents, smoothed	604	3%
Ue	Udorthents, wet substratum	102	1%
Ur	Urban land	877	4%
W	Water	1755	9%
We	Wappinger loam	84	<1%
Wy	Wayland silt loam	254	1%

Table 3 – 3 Drainage Class		
Drainage Class	**Acres**	**Percentage**
Well drained	9190	46%
Unclassified	5294	26%
Somewhat excessively drained	2637	13%
Very poorly drained	1074	5%
Somewhat poorly drained	736	4%
Moderately well drained	573	3%
Poorly drained	521	3%



Code	Soil Name
BeB	Bernardston silt loam, 3 to 8 percent slopes
BeC	Bernardston silt loam, 8 to 15 percent slopes
BeD	Bernardston silt loam, 15 to 25 percent slopes
BgB	Bernardston-Urban land complex, 3 to 8 percent slopes
Ca	Canandaigua silt loam, neutral substratum
Cc	Catden muck, 0 to 2 percent slopes
CuB	Copake gravelly silt loam, undulating
CuC	Copake gravelly silt loam, rolling
CuD	Copake gravelly silt loam, hilly
CuE	Copake gravelly silt loam, 25 to 45 percent slopes
DuB	Dutchess silt loam, 3 to 8 percent slopes
DwB	Dutchess-Cardigan complex, undulating, rocky
DwC	Dutchess-Cardigan complex, rolling, rocky
DwD	Dutchess-Cardigan complex, hilly, rocky
DxB	Dutchess-Cardigan-Urban land complex, undulating, rocky
DxC	Dutchess-Cardigan-Urban land complex, rolling, rocky
FcB	Farmington-Galway complex, undulating, very rocky
FcC	Farmington-Galway complex, rolling, very rocky
FcD	Farmington-Galway complex, hilly, very rocky
FeE	Farmington-Rock outcrop complex, steep
Ff	Fluvaquents-Udifluvents complex, frequently flooded
Fr	Fredon silt loam
GfB	Galway-Farmington complex, undulating, rocky
GfC	Galway-Farmington complex, rolling, rocky
GfD	Galway-Farmington complex, hilly
GlB	Galway-Farmington-Urban land complex, undulating, rocky
GlC	Galway-Farmington-Urban land complex, rolling, rocky
GsB	Georgia silt loam, 3 to 8 percent slopes
Ha	Halsey mucky silt loam
HeA	Haven loam, nearly level
HsA	Hoosic gravelly loam, nearly level
HsB	Hoosic gravelly loam, undulating
HsC	Hoosic gravelly loam, rolling
HsD	Hoosic gravelly loam, hilly
HsE	Hoosic gravelly loam, 25 to 45 percent slopes
HuA	Hoosic-Urban land complex, nearly level
HuB	Hoosic-Urban land complex, undulating
HvB	Hudson and Vergennes soils, 3 to 8 percent slopes
HvC	Hudson and Vergennes soils, 8 to 15 percent slopes
HvD	Hudson and Vergennes soils, hilly
Hy	Hydraquents and Medisaprists soils, ponded
Kn	Kingsbury and Rhinebeck soils
KrA	Knickerbocker fine sandy loam, nearly level
KrB	Knickerbocker fine sandy loam, undulating
KrD	Knickerbocker fine sandy loam, hilly
KuA	Knickerbocker-Urban land complex, nearly level
KuB	Knickerbocker-Urban land complex, undulating
Ln	Linlithgo silt loam
Lv	Livingston silt clay loam
MnA	Massena silt loam, 0 to 3 percent slopes
MnB	Massena silt loam, 3 to 8 percent slopes
NwB	Nassau-Cardigan complex, undulating, very rocky
NwC	Nassau-Cardigan complex, rolling, very rocky
NwD	Nassau-Cardigan complex, hilly, very rocky
NxE	Nassau-Rock outcrop complex, steep
Pc	Natchaug muck, 0 to 2 percent slopes
Pg	Pawling silt loam
Ps	Pits, gravel
Pu	Pits, quarry
PwB	Pittstown silt loam, 3 to 8 percent slopes
PwC	Pittstown silt loam, 8 to 15 percent slopes
PzA	Punsit silt loam, 0 to 3 percent slopes
PzB	Punsit silt loam, 3 to 8 percent slopes
Ra	Raynham silt loam
SkC	Stockbridge silt loam, 8 to 15 percent slopes
SkD	Stockbridge silt loam, 15 to 25 percent slopes
SmB	Stockbridge-Farmington complex, undulating, rocky
SmC	Stockbridge-Farmington complex, rolling, rocky
SmD	Stockbridge-Farmington complex, hilly, rocky
SrB	Stockbridge-Urban land complex, 3 to 8 percent slopes
Su	Sun silt loam
Ud	Udorthents, smoothed
Ue	Udorthents, wet substratum
Ur	Urban land
W	Water
We	Wappinger loam
Wy	Wayland silt loam

TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Soils

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Hudson River

Soil Drainage Class

- Excessively drained*
- Somewhat excessively drained
- Well drained
- Moderately well drained
- Somewhat poorly drained
- Poorly drained
- Very poorly drained
- Unclassified

*None present within the Town

Sources:
Esri, NYS ITS, USDA, Dutchess County, NYSDEC, Hudsonia, Town of Poughkeepsie

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SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

N

0 0.5 1 Mile

This map was prepared for illustrative purposes only and is not suitable for engineering, surveying, or legal purposes.

Agricultural Resources Map

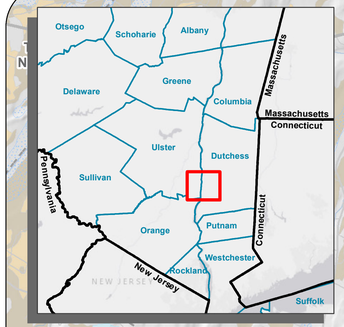
The Agricultural Resources map includes three classifications of soils, including: Prime Farmland Soils, Prime Farmland Soils if Drained, and Farmland Soils of Statewide Importance. Areas of the Town that receive an Agricultural Exemption for taxation purposes and areas designated within the County Agricultural District are also illustrated on the map. Within the Town of Poughkeepsie, 400 acres have an agricultural exemption and another 860 acres are within a County Agricultural District.

In addition to food production, New York's primarily forested landscape, fields and other agricultural lands provide habitat for a variety of wildlife species and are important components of rural community character and scenic views. Farmlands also provide an important historic link with the past. Conserved farm properties safeguard wildlife habitat and environmentally sensitive areas such as meadows, woodlands, wetlands, and streams. They also ensure that the best farmland is retained for food production. According to the American Farmland Trust, over the last 25 years New York has lost almost half a million acres of farmland to subdivisions, strip malls, and scattered development, threatening food security and local economies. Understanding the distribution of these agricultural resources should be an important consideration in Town planning and development management processes. Actively farmed lands within Poughkeepsie can include tree farms, dairy, pasture, vegetable, and community gardens, among other uses. The vast majority of these lands are clustered in the northeastern section of the Town – between Salt Point Turnpike and Dutchess Turnpike. Important agricultural soils such as Prime Farmland Soils and Farmland Soils of Statewide Importance are liberally distributed throughout many areas of the Town.

Grassland or meadow habitat can support a variety of life, including rare plants, butterflies, reptiles, and birds, in addition to providing agricultural uses and scenic values. The quantity and quality of grasslands for wildlife have rapidly decreased in the Northeast during the last century due to increased human population, changes in agricultural technology, and abandonment of family farms. This continuing trend threatens populations of grassland birds that have adapted to the agricultural landscape. Poughkeepsie has modest amounts of available grassland and meadow habitat and the 2000-2005 NYS Breeding Bird Atlas documented American kestrel and savannah sparrow, grassland-dependent species of conservation concern, as likely breeders in Poughkeepsie. Seven other grassland-depended bird species were documented by the Waterman Bird Club at Vassar College but are unlikely to breed or utilize the available habitats on a consistent basis (see Table 3-5). Audubon New York offers guidance on managing habitat for grassland birds.

Shrublands and young forests are transitional habitats characterized by few or no mature trees, with a diverse mix of shrubs and/or tree saplings, along with openings where grasses and wildflowers grow. They can occur in recently cleared areas and abandoned farmland and are sometimes maintained along utility corridors by cutting or herbicides. These habitats are important for many wildlife species declining throughout the region because former agricultural areas have grown into forests, and natural forest

disturbances that trigger young forest growth, such as fires, have been suppressed. Records from the NYS Breeding Bird Atlas support the presence of 11 species of conservation concern in Poughkeepsie that prefer young forest and shrubland habitat, including prairie warbler, brown thrasher, and blue-winged warbler (see Table 3-5). The Waterman Bird Club identified an additional 6 species, including Special Concern species such as golden-winged warbler and yellow-breasted chat. For more information, see Audubon's guidance on managing habitat for shrubland birds.



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Agricultural Resources

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Agricultural Exemption
- County Agricultural District
- Prime Farmland Soils
- Prime Farmland Soils if Drained
- Farmland Soils of Statewide Importance

Sources:
Esri, NYS ITS, Dutchess County, NYSDEC, Hudsonia, Town of Poughkeepsie, USDA

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3.3 Habitats and Wildlife

Forest Map

The Forest Map shows important forests in Poughkeepsie classified by type including a Limestone Woodland Forest Community, Floodplain Forests, and Forest Habitat. The map also includes the Forest Index – produced through a partnership between the New York State Department of Environmental Conservation and the New York Natural Heritage Program – is a spatial data set that identifies forest patches greater than 100 acres using 2016 land cover data and reflects the condition of each forest patch relative to other patches in the Hudson River estuary watershed, from lower value to higher value. Metrics for analyzing the conditions of forest areas include size, fragmentation, connectivity, stressors, habitat and ecosystem values, and carbon sequestration value.[7] Areas within the Town with the highest forest index include lands in the vicinity of Crown Heights on the northeastern boundary of the Tilcon mineral quarry. Additionally, an overlay of Core Forests within the Town is depicted on the map. These are interior forested areas that are surrounded by at least a 100-meter-wide buffer of edge forest habitat.

Conserving and managing large, forested areas is necessary to provide wildlife habitat, clean water, and climate moderation. In general, larger forests provide greater ecological value than smaller, fragmented patches. However, the value of each forest is relative to the values of other forests in the community, watershed, or natural landscape. Even small patches of forest can be extremely valuable. The Town of Poughkeepsie protects its trees through a local Tree Preservation Law, which affirms the many ecosystem services that trees provide and requires a permit to cut or remove trees.

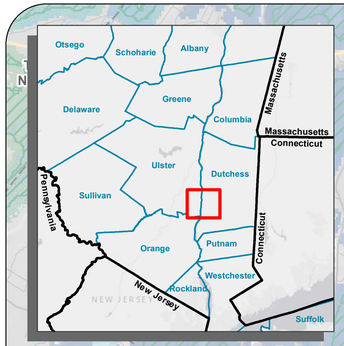
Photo Credit: www.farmproject.org

Available wildlife records confirm the presence of high-quality forest habitat in Poughkeepsie. The 2000-2005 NYS Breeding Bird Atlas documented numerous forest-interior bird species of conservation concern, including many NY-Species of Greatest Conservation Need such as Kentucky warbler, worm-eating warbler, and wood thrush.

[7] https://www.nynhp.org/projects/hudson-valley-forest-patches/

Poughkeepsie's forests also provide important summer foraging habitat for NY-Species of Greatest Conservation Need; silver-haired bat, little brown bat and the Federally-Endangered Indiana bat. Rare forest and open woodland plants have been documented in Poughkeepsie including the NY-Threatened goldenseal and southern lady fern; see Table 2-5 for a complete list.[8]

[8] Hudson River Estuary Program, Natural Areas and Wildlife in Your Community: A Habitat Summary Prepared for Poughkeepsie, NY, 2019



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Forests

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Core Forests**
- Limestone Woodland Forest Community
- Floodplain Forests (Dutchess County)
- Forest Habitat (Hudsonia)

Forest Index

- 27 - 64.5
- 64.5 - 76
- 76 - 85
- 85 - 93.5*
- 93.5 - 102*
- 102 - 110.5*
- 110.5 - 118.7*
- 118.7 - 129.5*
- 129.5 - 145*
- 145 - 157*
- 157 - 176*
- 176 - 191.5*

*None present within the Town

**Interior forests areas surrounded by at least a 100-meter wide buffer of edge forest habitat

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, Hudsonia, The Nature Conservancy, Hawthorne Valley Farmscape Ecology Program

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Ecologically Significant Habitats Map

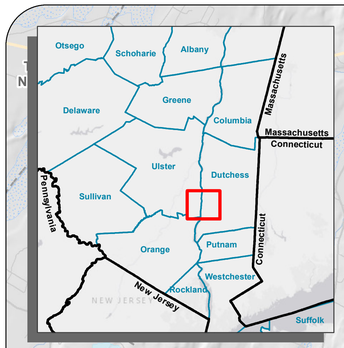
The Ecologically Significant Habitats Map highlights the known habitat types in Poughkeepsie based on in-depth local mapping and analysis. The map was developed with data provided by Hudsonia, a non-profit environmental research institute and involved extensive field verification by trained biologists. The data incorporates information from several existing sources that provide approximate locations and extent of habitat types within the Town, from wetlands, meadows, and forests to developed and cultural areas. Based on this data, approximately 47% of the Town is developed. Forested and shrubland habitat types including hardwood, conifer, mixed and cedar woodlands, account for over 5,000 acres or 25% of the Town. Other key habitats include the Hudson River, open water/ponds, and wetland habitats which together account for 14% of the Town. The full list of mapped habitats include:

- Cultural: Areas that are significantly altered and intensively managed (e.g., mowed), but are not otherwise developed with pavement or structures.
- Waste Ground: Areas that are severely altered by previous or current human activity; often stripped of vegetation and topsoil or filled with soil or debris but remaining substantially unvegetated.
- Estuarine Rocky Shore: Beaches of gravel, cobble, and natural rock rubble, as well as rock outcrops, ledges, and cliffs in and above the intertidal zone of the Hudson River.
- Crest/Ledge/Talus: Crest and ledge habitats occur where soils are very shallow and bedrock is partially exposed at the ground surface, either at the summit of a hill or a low-elevation knoll (crest) or elsewhere (ledge). Talus refers to the fields of rock fragments that often accumulate at the bases of steep ledges and cliffs.
- Supratidal Railroad Causeway: Elevated railroad tracks which rest on a foundation of fill material composed of coal cinder and crushed stone over larger blocks of rock.
- Crop Land/Orchard/Plantation: Land areas that are actively maintained (or recently abandoned) for the cultivation of crops, fruit, or Christmas trees.
- Red Cedar Woodland: Areas featuring an overstory dominated by widely spaced eastern red cedar trees with grassy meadow remnants between them.
- Upland Shrubland: Non-forested uplands with significant (>20%) shrub cover.
- Upland Meadow: Areas dominated by grasses with less than 20% shrub cover, including hayfields and pastures.
- Upland Hardwood Forest: Areas containing different types of deciduous forest communities at all elevations. Common trees of upland hardwood forests in Poughkeepsie include maples (sugar, red, Norway), oaks (black, red, white), hickories (shagbark, pignut), white ash, and black locust.
- Upland Mixed Forest: Areas on non-wetland forest with both hardwood and conifer species, where conifer cover is 25-75% of the canopy.[9]

[9] Tabak, Nava & Stevens, Gretchen. *Significant Habitats in the Town of Poughkeepsie, Dutchess County, New York*. Hudsonia, Ltd. 2008

- Upland Conifer Forest: Areas of pole-sized (approximately 5”-10” diameter at breast height) to mature conifer plantations and naturally occurring upland forests with more than 75% cover of conifer trees.
- Open Water/Pond: Naturally formed ponds and lakes, large pools within tidal and non-tidal marshes and swamps that lack floating or emergent vegetation. Also includes ponds that were apparently constructed by humans but have since reverted to a more natural state.
- Wetland Habitats: Areas of swamp, marsh, wet meadow, and/or pools

A prairie warbler in Peach Hill Park. Photo Credit: David Chernack



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Ecologically Significant Habitats

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland

Habitat Type

- Cultural
- Developed
- Waste Ground
- Estuarine Rocky Shore
- Crest/ Ledge/Talus
- Gravel Bar
- Riprap & Native Rock Shore
- Supratidal Railroad Causeway
- Crop land/ Orchard/ Plantation
- Red Cedar Woodland
- Upland Shrubland
- Upland Meadow
- Upland Hardwood Forest
- Upland Mixed Forest
- Upland Conifer Forest
- Open Water/ Pond
- Hudson River
- Wetland Habitat

Sources:
Esri, NYS ITS, NYSDEC, Dutchess County, Town of Poughkeepsie, Hudsonia

N

0 0.5 1 Mile

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Consulting Engineering & Land Surveying, D.P.C.

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The following table lists species of conservation concern that have been recorded in Poughkeepsie, NY. The information comes from the New York Natural Heritage Program (NYNHP) biodiversity databases, the Atlas of Inland Fishes of New York,[10] the 1990-1999 New York Amphibian and Reptile Atlas (NYARA),[11] and the 2000-2005 New York State Breeding Bird Atlas (NYBBA).[12] Species from the NYBBA are included in the table if the species were documented in Atlas blocks that encompass more than 50% in Town. The table only includes species listed in New York (NY) or federally (US) as endangered, threatened, special concern, rare, a Species of Greatest Conservation Need (SGCN), or a Hudson River Valley Priority Bird species recognized by Audubon New York. Generalized primary habitat types are provided for each species, but for conservation and planning purposes, it is important to recognize that many species utilize more than one kind of habitat. More information on rare animals, plants, and ecological communities can be found at www.guides.nynhp.org. Note: Additional rare species and habitats may occur in Poughkeepsie.

Table 3 – 5 Species of Greatest Conservation Need

			NYS Conservation Status						
Common Name	**Scientific Name**	**Primary Habitat**	Species of Greatest Conservation Need XX = high priority	**Rare**	Special Concern	Threatened	Endangered	Hudson Valley Priority Bird	**Data Source**
Mammals									
Eastern small-footed bat	*Myotis leibii*	forest, caves	**X**		**X**				NYNHP
Indiana bat	*Myotis sodalis*	forest, caves	**XX**				**US NY**		NYNHP
Northern long-eared bat	*Myotis septentrionalis*	forest, caves	**XX**			**US NY**			NYNHP
Birds									
American black duck	*Anas rubripes*	wetland	**XX**					**X**	NYBBA
American goldfinch	*Spinus tristis*	young forest, shrubland						**X**	NYBBA
American kestrel	*Falco sparverius*	grassland	**X**					**X**	NYBBA
American redstart	*Setophaga ruticilla*	forest						**X**	NYBBA
American woodcock	*Scolopax minor*	young forest, shrubland	**X**					**X**	NYBBA

[10] Carlson, D., R. Daniels, and J. Wright, Atlas of Inland Fishes of New York (Albany, NY: New York State Museum). http://www.nysm.nysed.gov/staff-publications/atlas-inland-fishes-new-york

[11] DEC, *New York Amphibian and Reptile Atlas 1990-1999.* http://www.dec.ny.gov/animals/7140.html

[12] DEC, New York State Breeding Bird Atlas 2000. 2000 – 2005 (Albany, NY, 2007 update). http://www.dec.ny.gov/animals/7312.html

Table 3 – 5 Species of Greatest Conservation Need

				NYS Conservation Status					
Common Name	**Scientific Name**	**Primary Habitat**	Species of Greatest Conservation Need XX = high priority	**Rare**	Special Concern	Threatened	Endangered	Hudson Valley Priority Bird	**Data Source**
Bald eagle	*Haliaeetus leucocephalus*	forest/ openwater	**X**			**X**		**X**	NYBBA
Baltimore oriole	*Icterus galbula*	forest						**X**	NYBBA
Belted kingfisher	*Megaceryle alcyon*	open water						**X**	NYBBA
Black-and-white warbler	*Mniotilta varia*	forest						**X**	NYBBA
Black-billed cuckoo	*Coccyzus erythropthalmus*	young forest, shrubland	**X**					**X**	NYBBA
Blackburnian warbler	*Dendroica fusca*	forest						**X**	NYBBA
Black-throated bluewarbler	*Dendroica caerulescens*	forest	**X**					**X**	NYBBA
Black-throated green warbler	*Dendroica virens*	forest						**X**	NYBBA
Blue-winged warbler	*Vermivora pinus*	young forest, shrubland	**X**					**X**	NYBBA
Bobolink	*Dolichonyx oryzivorus*	grassland	**XX**					**X**	NYBBA
Broad-winged hawk	*Buteo platypterus*	forest						**X**	NYBBA
Brown thrasher	*Toxostoma rufum*	young forest, shrubland	**XX**					**X**	NYBBA
Cerulean warbler	*Dendroica cerulea*	forest	**X**		**X**			**X**	NYBBA
Chestnut-sided warbler	*Setophaga pensylvanica*	young forest, shrubland						**X**	NYBBA
Chimney swift	*Chaetura pelagica*	urban						**X**	NYBBA
Cooper's hawk	*Accipiter cooperii*	forest	**X**		**X**			**X**	NYBBA
Downy woodpecker	*Picoides pubescens*	forest						**X**	NYBBA
Eastern kingbird	*Tyrannus tyrannus*	young forest, shrubland						**X**	NYBBA
Eastern meadowlark	*Sturnella magna*	grassland	**XX**					**X**	NYBBA
Eastern towhee	*Pipilo erythrophthalmus*	young forest, shrubland						**X**	NYBBA
Eastern wood-pewee	*Contopus virens*	forest						**X**	NYBBA
Field sparrow	*Spizella pusilla*	young forest, shrubland						**X**	NYBBA
Kentucky warbler	*Oporornis formosus*	forest	**XX**					**X**	NYBBA

Table 3 – 5 Species of Greatest Conservation Need

			NYS Conservation Status						
Common Name	**Scientific Name**	**Primary Habitat**	Species of Greatest Conservation Need XX = high priority	**Rare**	Special Concern	Threatened	Endangered	Hudson Valley Priority Bird	**Data Source**
Least flycatcher	*Empidonax minimus*	forest						**X**	NYBBA
Louisiana waterthrush	*Seiurus motacilla*	forest	**X**					**X**	NYBBA
Marsh wren	*Cistothorus palustris*	wetland						**X**	NYBBA
Northern flicker	*Colaptes auratus*	forest						**X**	NYBBA
Northern harrier	*Circus cyaneus*	grassland	**X**			**NY**		**X**	NYBBA
Peregrine falcon	*Falco peregrinus*	cliffs	**X**				**NY**	**X**	NYBBA
Prairie warbler	*Dendroica discolor*	young forest, shrubland	**X**					**X**	NYBBA
Purple finch	*Carpodacus purpureus*	forest						**X**	NYBBA
Red-shouldered hawk	*Buteo lineatus*	forest	**X**		**X**			**X**	NYBBA
Rose-breasted grosbeak	*Pheucticus ludovicianus*	forest						**X**	NYBBA
Ruffed grouse	*Bonasa umbellus*	young forest, shrubland	**X**					**X**	NYBBA
Savannah sparrow	*Passerculus sandwichensis*	grassland						**X**	NYBBA
Scarlet tanager	*Piranga olivacea*	forest	**X**					**X**	NYBBA
Sedge wren	*Cistothorus platensis*	grassland	**XX**			**NY**		**X**	NYBBA
Sharp-shinned hawk	*Accipter striatus*	forest	**X**		**X**			**X**	NYBBA
Veery	*Catharus fuscescens*	forest						**X**	NYBBA
Vesper sparrow	*Pooecetes graminues*	grassland	**XX**		**X**			**X**	NYBBA
Whip-poor-will	*Caprimulgus vociferus*	young forest, shrubland	**XX**		**X**			**X**	NYBBA
Willow flycatcher	*Empidonax trailli*	young forest, shrubland	**X**					**X**	NYBBA
Wood thrush	*Hylocichla mustelina*	forest	**X**					**X**	NYBBA
Worm-eating warbler	*Helmitheros vermivorum*	forest	**X**					**X**	NYBBA
Yellow-billed cuckoo	*Coccyzus americanus*	young forest, shrubland						**X**	NYBBA
Yellow-throated vireo	*Vireo flavifrons*	forest						**X**	NYBBA

Table 3 – 5 Species of Greatest Conservation Need

				NYS Conservation Status					
Common Name	**Scientific Name**	**Primary Habitat**	Species of Greatest Conservation Need XX = high priority	**Rare**	Special Concern	Threatened	Endangered	Hudson Valley Priority Bird	**Data Source**
Reptiles									
Common snapping turtle	*Chelydra serpentina*	wetland	**X**						NYARA
Northern map turtle	*Graptemys geographica*	coastal	**X**						NYARA
Wood turtle	*Clemmys insculpta*	forest, riparian, grassland	**XX**		**X**				NYARA
Blanding's Turtle	*Emydoidea blandingii*	wetland	**XX**			**X**			NYDEC
Amphibians									
Fowler's toad	*Bufo fowleri*	forest, wetland	**X**						NYARA
Jefferson-blue spotted salamander hybrid	*Ambystoma jeffersonianum x laterale*	forest, vernal pool	**X**		**X**				NYARA
Fish									
Shortnose sturgeon	*Acipenser brevirostrum*	coastal					**NY US**		NYNHP
American eel	*Anguilla rostrata*	stream	**XX**						NYNHP
Invertebrates									
Russet-tipped clubtail	*Stylurus plagiatus*	coastal	**X**						NYNHP
Plants									
Back's sedge	*Carex backii*	forest, rocky areas				**NY**			NYNHP
Davis' sedge	*Carex davisii*	forest, riparian				**NY**			NYNHP
Delmarva beggar-ticks	*Bidens bidentoides*	coastal		**X**					NYNHP
Estuary beggar-ticks	*Bidens hyperborea var. hyperborea*	coastal					**NY**		NYNHP
Golden-seal	*Hydrastis canadensis*	forest				**NY**			NYNHP
Green rock-cress	*Boechera missouriensis*	forest, rocky areas				**NY**			NYNHP
Heartleaf plantain	*Plantago cordata*	coastal		**X**					NYNHP
Hudson River water-nymph	*Najas guadalupensis* ssp. *muenscheri*	coastal					**NY**		NYNHP
James' sedge	*Carex jamesii*	forest, riparian				**NY**			NYNHP

Wetland Habitats Map

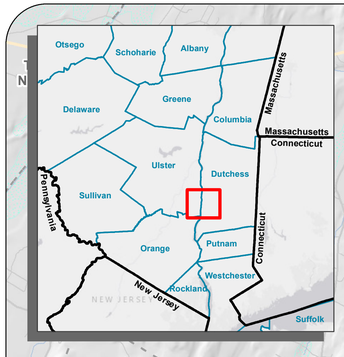
The Wetlands Habitats Map was developed by M.J. Engineering and Land Surveying, P.C. with data provided by Hudsonia, a non-profit environmental research institute. in Poughkeepsie based on in-depth local mapping and analysis. The map was developed with data provided by Hudsonia, a non-profit environmental research institute and involved extensive field verification by trained biologists. The data incorporates information from several existing sources that provide approximate locations and extent of wetland habitat types within the Town. The map identifies Hardwood & Shrub Swamp, Marsh, Calcareous Wet Meadow, Wet Meadow, Tidal Tributary Mouth, Tidal Mudflat, Tidal Marsh, Tidal Swamp, Subtidal Shallows, Pools, Intermittent Woodland Pool, and Open Water/Pond. State and federal wetlands mapping is also included in section 4.3 Wetlands. Table 3 – 6 shows the percentage and acres of each of the grouped habitats shown on the map. Mapped wetland types are described as follows:[13]

- Intermittent Woodland Pool: Small wetland partially or entirely surrounded by forest, typically with no surface water inlet or outlet.
- Marsh: A wetland that has standing water for most or all of the growing season and is dominated by non-woody vegetation.
- Wet Meadow: A wetland dominated by herbaceous (non-woody) vegetation and lacking standing water for most of the year.
- Calcareous Wet Meadow: A type of wet meadow (see above) that is strongly influenced by calcium-rich groundwater or soils.
- Open Water: Naturally formed ponds and lakes, large pools within tidal and non-tidal marshes, swamps that lack floating or emergent vegetation, and human-constructed ponds that have reverted to a more natural state.
- Tidal Swamp: A forested or shrub-dominated wetland that occurs in the tidal zone
- Tidal Mudflat: A sparsely vegetated wetland that occurs in the shallow bays, tributary mouths, and other shallow zones in the tidal portion of the Hudson River
- Tidal Tributary Mouth: Tidal reaches of Hudson River tributaries – habitat occurs no farther upstream than the first topographic contour line (10 feet of elevation) or the first dam, whichever is lower.
- Tidal Marsh: A non-forested wetland that occurs in the shallow bays and tributary mouths along the freshwater tidal portion of the Hudson River.
- Pools: Seasonally or permanently flooded depressions with standing water, typically isolated from streams.

The most dominant wetland habitat within the Town of Poughkeepsie is hardwood and shrub swamp habitat types. The largest concentration of these habitats are located along Casper Creek and amount to nearly 703 acres within the Town (see Table 3 – 6).

[13] *Significant Habitats in the Town of Poughkeepsie, Dutchess County, New York*. Hudsonia Ltd. 2008.

Table 3 – 6 Wetland Habitat Type		
Wetland Habitat	**Acres**	**Percentage**
Hardwood & shrub swamp	703	4%
Open water/pond	176	1%
Wet meadow	151	1%
Tidal tributary mouth	92	<1%
Marsh	67	<1%
Tidal marsh	38	<1%
Calcareous wet meadow	17	<1%
Tidal swamp	7	<1%
Pools	6	<1%
Intermittent woodland pool	3	<1%
Tidal mudflat	2	<1%
Subtidal shallows	0	0%



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Wetland Habitats

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Hudson River

Wetland Habitat Type

- Hardwood & Shrub Swamp
- Marsh
- Calcareous Wet Meadow
- Wet Meadow
- Tidal Tributary Mouth
- Tidal Mudflat
- Tidal Marsh
- Tidal Swamp
- Subtidal Shallows
- Pools
- Intermittent Woodland Pool
- Open Water/ Pond

Sources:
Esri, NYS ITS, Dutchess County, NYSDEC, Town of Poughkeepsie, Hudsonia

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Important Biodiversity Areas Map

Biodiversity encompasses the variety of life in all its forms, from genes to species, and communities to ecosystems, and the interactions between living organisms and their environment. Important Biodiversity Areas are landscape areas in the Hudson River estuary watershed that contain high concentrations of biological diversity or unusual ecological features that contribute to and serve as a framework for conservation partnerships and voluntary protection efforts.

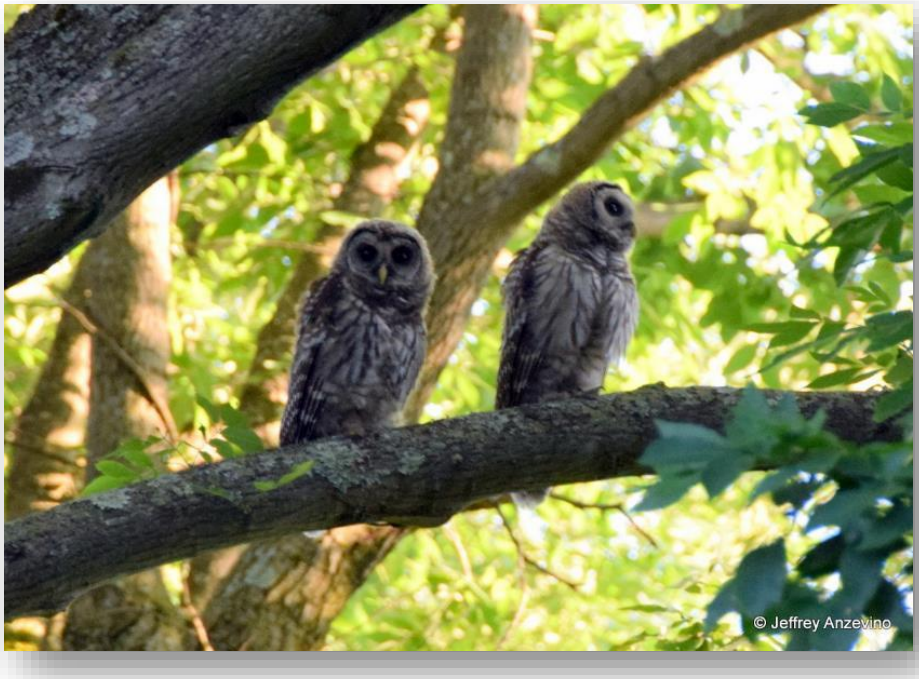
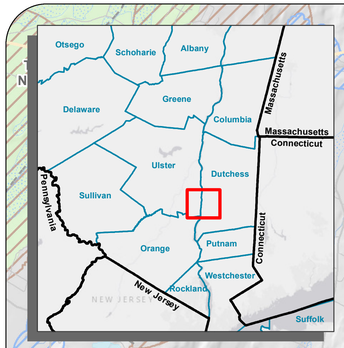


Photo Credit: Jeffrey Anzevino

Important Areas include the land and water habitats necessary to support the presence of a known population of rare animals or plants, the known location of rare ecological communities and/or high-quality examples of a particular ecological community [14] . These habitats may include areas important to the breeding, nesting, feeding, roosting, or over-wintering of rare animals. Mapped important areas include Aquatic Animals, Migratory Fish, Terrestrial Animals, Plants, Wetland Animals, and Bat Foraging areas. The most predominant important areas within the Town are those areas used for Bat Foraging, which account for approximately 8,900 acres, or over 50% of the Town. The next largest important area is Wetland Animals, covering over 3,000 acres. Natural Heritage Important Areas for the Hudson River Valley can also be viewed on the Hudson Valley Natural Resource Mapper.

The map also depicts the Blanding's Turtle Potential Core Habitat. The areas were mapped by Hudsonia through analysis, aerial photograph interpretation, and field observations and published within a 2009 Blanding's Turtle Habitat Report for Southern Dutchess County[15]. Blanding's turtles occur in isolated populations within the Northeast and are considered rare. Core habitats for the Blanding's turtle are shown in deep green on the map. The largest areas are located near Fall Kill Creek, west of the Salt Point Turnpike, as well as areas along Casper Creek, and isolated areas North of Manchester Road.

[14] https://www.nynhp.org/documents/9/nynhpiafs.pdf
[15] https://www.hudsonia.org/programs/conservation-ecology/blandings-turtle/



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Important Biodiversity Areas

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Important Areas: Aquatic Animals
- Important Areas: Migratory Fish
- Important Areas: Terrestrial Animals
- Important Areas: Plants
- Important Areas: Wetland Animals
- Important Areas: Bat Foraging
- Blanding's Turtle Potential Core Habitat

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, Hudsonia

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4.0 WATER RESOURCES

4.1 Drinking Water

Drinking Water Resources Map

Both groundwater and surface water in the Town contribute to the drinking water supply. Groundwater is found within the soils and bedrock, recharged by precipitation. Surface water is water draining the land above ground and is primarily found in streams, wetlands, ponds, lakes, and reservoirs. Within the Town of Poughkeepsie, water is supplied to residents principally through the public water system as well as through private wells.

Municipal water within the Town of Poughkeepsie is supplied by the Town of Poughkeepsie Water Department through a jointly owned Town and City treatment plant. The source of public drinking water within Poughkeepsie is the surface water of the Hudson River. The intake location for the water supply is approximately 1000 feet offshore in the northwestern portion of Town, as shown within the Drinking Water Resources Map.

The Poughkeepsie Water Treatment Facility on 3431 North Rd treats this water before it is supplied to residents. Approximately five (5) million gallons are pumped on a daily basis, providing service to over 10,000 customers[16] within the Town boundaries. The treatment facility also supplies water to portions of the City of Poughkeepsie, the Village of Wappingers Falls, and the Town of Hyde Park.

Since the Hudson River is an important resource for drinking water within the Town, it is crucial to examine and manage the land uses within the watershed area. Human activities and land use in these areas have the potential to impact the quality of the water supply. Urban development, land clearing, agriculture, application of chemicals, and the use of septic systems all can contribute to the condition of water. The Hudson River watershed and sub watersheds are shown within the Watersheds map.

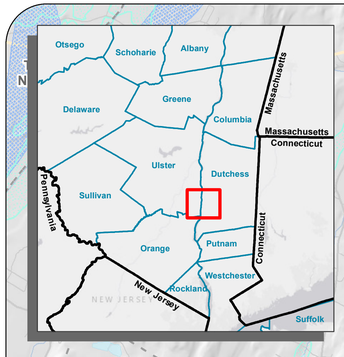
In addition to the public water supply, there are many private wells within the Town of Poughkeepsie. Two NYSDEC documented drinking water wells are shown within the Drinking Water Resources Map. A number of previously offline wells are being brought back online to provide supplementary water supply for emergency purposes.

Also shown within the Drinking Water Resources map are unconsolidated aquifers. Nine (9) unconsolidated aquifers are present within the Town and are primarily concentrated around Wappinger Creek, Casper Creek and Fall Kill Creek and represent nearly 28% of the land area within the Town, accounting for 5,690 acres. The unconsolidated aquifers within the Town range in yields from more than 100 gallons per minute to below 10 gallons per minute.

[16] https://www.townofpoughkeepsie.com/238/Water

It is important to avoid the siting of potentially contaminating land uses near local wells. Understanding the boundaries of these drainage areas is important in order to identify potential sources of contamination and estimate pollutant travel times. Wells may be contaminated by naturally occurring sources or human activities, including residential, commercial, agricultural, or industrial sources. The US Geological Survey publication *Groundwater and the Rural Homeowner* [17] discusses common well contamination problems and some remedies.

[17] *Groundwater and the Rural Homeowner*. US Geological Survey, 1994. https://pubs.usgs.gov/gip/gw_ruralhomeowner/index.html



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Drinking Water Resources

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Poughkeepsie Water Intake
- NYSDEC Drinking Water Wells
- Unconsolidated Aquifers

Sources:
Esri, NYS ITS, Dutchess County, Hudsonia, Town of Poughkeepsie, NYSDEC

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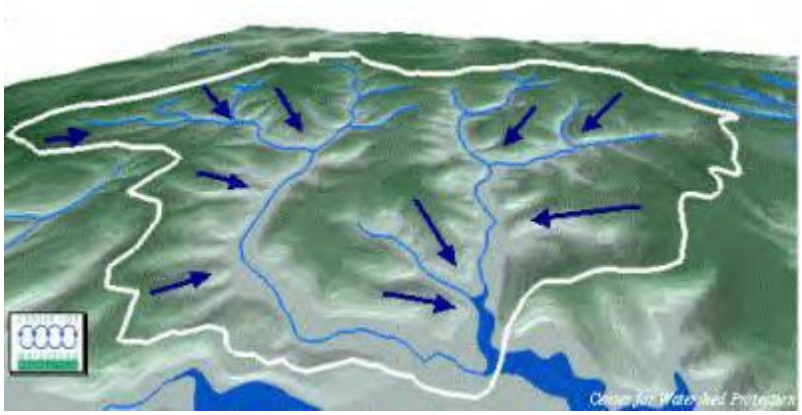
4.2 Streams and Watersheds

Watersheds Map

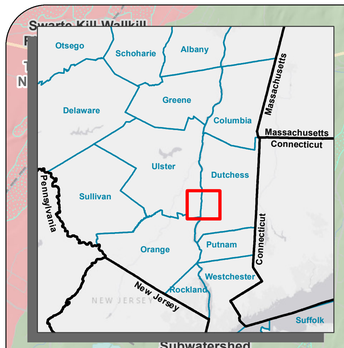
A watershed is the area of land from which water drains into a river, lake or other waterbody. Watersheds are divided by high points on the land such as ridges, mountains and hills. There is a very strong relationship between land use in a watershed and water quality in streams, wetlands, and other waterbodies. Land and water are connected through the interactions of water, soil, organisms, and chemical components. Healthy watersheds can recharge groundwater, limit erosion and flooding impacts, minimize the need for public infrastructure, and be more resilient to climate change—all ecosystem services that directly benefit the Town and cost less than the alternatives.[18]



A watershed is the area of land that drains into a stream, river, lake, or other water body. Source: Center for Watershed Protection

All the land in the Town of Poughkeepsie ultimately drains into the Hudson River Estuary via tributary streams. These major drainage areas are shown on the Watersheds Map. Streams and waterbodies on this and other maps in the inventory are from the USGS National Hydrography Dataset (NHD). The subwatersheds shown on the map include Breakneck Brook–Hudson River, Fall Kill Fallsburg Creek–Hudson River, Great Spring Creek Creek–Wappinger, Twaalfskill Creek–Hudson River, and Wappinger Lake–Wappinger Creek.

[18] U.S. EPA. The Economic Benefits of Protecting Healthy Watersheds. U.S. Environmental Protection Agency, Washington, DC, 2015, https://www.epa.gov/sites/production/files/2015-10/documents/economic_benefits_factsheet3.pdf



Subwatershed

TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Watersheds

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water

Subwatershed

- Black Creek*
- Breakneck Brook-Hudson River
- Fall Kill
- Fallsburg Creek-Hudson River
- Great Spring Creek-Wappinger Creek
- Lattintown Creek*
- Quassaic Creek*
- Sprout Creek*
- Swarte Kill-Wallkill River*
- Twaalfskill Creek-Hudson River
- Wappinger Lake-Wappinger Creek
- Whortlekill Creek-Fishkill Creek*

*Not present within the Town

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, Hudsonia USDA

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SHUMAKER Consulting Engineering & Land Surveying, D.P.C.

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Stream Habitats Map

From cold, medium gradient, headwater streams to the large, warm Hudson River Estuary, Poughkeepsie supports a variety of streams and rivers illustrated in the Stream Habitats Map. The Town's streams store freshwater and support diverse aquatic life, as well as recreational activities like fishing and boating.

The mapped stream habitats across the region are shown and identified as Perennial Streams, Intermittent Streams, Trout Streams, Important Areas for Migratory Fish, Floodplain Forests (Farmscape Ecology Program), Riparian Buffers (New York Natural Heritage Program), as well as culvert locations.

Perennial and Intermittent Streams

Perennial and intermittent Streams are mapped through the Hudsonia Habitat Assessment. Perennial streams flow continuously throughout years with a normal amount of precipitation. Perennial streams within Poughkeepsie include Wappinger Creek, Casper Creek and Fall Kill Creek. Intermittent streams flow only during certain times of the year after heavy rains. These streams area water source to wetlands and many smaller water bodies such as ponds and vernal pools. Intermittent streams within the Town are often tributaries to the larger, perennial streams. These intermittent streams are shown in a dashed blue line on all maps.

Trout Streams

Trout Streams are identified through the NYSDEC Waterbody Classification. These streams have attributes that would support trout or trout spawning. These streams are referred to as protected streams and are subject to additional regulations and require a New York State permit for disturbance to the bed or banks. Streams designated as capable of supporting trout are shown in orange on the Stream Habitats Map. There are no trout spawning streams in the Town of Poughkeepsie.

Important Areas for Migratory Fish

Important Areas, designation by the New York Natural Heritage Program, include the land and water habitats necessary to support the presence of a known population of rare animals or plants, the known location of rare ecological communities and/or high-quality examples of a particular ecological community. Important areas for Migratory Fish are shown in blue hash on the map and include the Hudson River as well as Wappinger Creek.

Floodplain Forests

Floodplain Forests were mapped for Dutchess and Columbia County through the Hawthorne Valley Farmscape Ecology Program in cooperation with Hudsonia. Floodplain forests within the region are considered a rare habitat and occur along bottomlands of larger streams and tributaries. These unique habitats are home to a wide diversity of plants and animals. These areas are shown in yellow stipple on the accompanying map. Key areas within the Town include areas along Wappinger Creek in Rochdale and

MacDonnell Heights, and east of Vassar road, as well as isolated areas along Casper Creek and Fall Kill Creek.

Riparian Buffers

The term *riparian buffer* refers to a vegetated area along a waterway that can offer some measure of protection from adjacent land uses. Data for this layer was provided by the New York Natural Heritage Program. These areas are shown in light green along Wappinger Creek, Casper Creek and Fish Kill Creek

Dams and Culverts

Dams and culverts are identified on the map. Culverts within the Town are identified as either passable or not passable using methodology developed by the North Atlantic Aquatic Connectivity Collaborative. Passable culverts allow passage for fish and aquatic organisms. The majority of culverts mapped within the Town of Poughkeepsie are listed as passable.

Additional Classification

The area's streams can be further classified using The Nature Conservancy (TNC) Northeast Aquatic Habitat Classification System.[19] This data is not displayed on the Stream Habitat Map but is important to the understanding of the stream environments within the Town. The four attributes include: size (the area drained by the stream; the primary classification variable), gradient (the steepness of the stream channel), geology (influence on water pH), and temperature (the mean summer water temperature).[20] The following stream habitat descriptions are based on TNC's accompanying aquatic habitat guides. (Note: The stream habitat classification system was developed based on remote assessment at a regional scale and has not been field verified. Nevertheless, the general habitat information can provide a starting point for understanding the diversity of stream conditions and associated aquatic communities in the Town.)

Medium gradient, cold, headwaters and creeks

These small streams of northern regions or high elevations occur on hills and slopes at moderate to high elevations in small watersheds (< 39 sq mi). The creeks have cold moderately fast-moving waters water with good oxygenation. Instream habitats are dominated by riffle-pool development. Permanent cold-water temperatures in these streams harbor cold-water fish species, such as Brook Trout and Slimy Sculpin, likely representing over half of the fish community.

[19] Olivero, A. and M. Anderson, Northeast Aquatic Habitat Classification System (Boston, MA: The Nature Conservancy, Eastern Regional Office, 2008). http://easterndivision.s3.amazonaws.com/Freshwater/nahcs_report_20080930rev1NE_AquaticHabitatClassificationSystem2008.pdf

[20] Anderson et al., Northeast Habitat Guides, 2013.

Medium gradient, cool, headwaters and creeks

Similar to medium gradient, cold, headwaters and creeks, but with a higher proportion of cool and warm water species such as Smallmouth Bass and White Sucker relative to cold-water species. Examples in Poughkeepsie include the majority of Casper Creek and Fall Kill Creek.

Low gradient, cool, headwaters and creeks

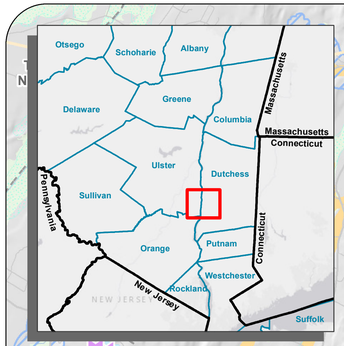
These small streams of moderate to low elevations occur on flats or very gentle slopes in small watersheds. The cool slow-moving waters may have high turbidity and be somewhat poorly oxygenated. Instream habitats are dominated by glide-pool and ripple-dune systems with runs interspersed by pools and a few short or no distinct riffles. Bed materials are predominantly sand, silt, and only isolated amounts of gravel. Cool and warm water species predominate. Examples in Poughkeepsie include the majority of Wappinger Creek and portions of Casper Creek.

Tidal, low gradient, cool, headwaters and creeks

These tidal creeks and streams connect directly to the ocean or to large tidal rivers estuaries and have small watersheds. The water flow and level in these streams is tidally influenced. Most tidal streams have moderately firm, sandy channel bottoms and vertical banks that are regularly eroded and slump into the creek bottom. These streams and their associated estuaries support a rich diversity of plants and animals and serve as the primary nursery area for many marine fish species. The ecological importance of small tidal streams has historically been undervalued, but ongoing research shows their collective influence on estuarine ecosystem function may equal or exceed that of larger tidal rivers. Southern Wappinger Creek is an example of this type of stream habitat.

Tidal, low gradient, warm, large river

These very large rivers, such as the Hudson, connect directly to the ocean or to large estuaries and their water flow and level fluctuates with the tides. The rivers have large upstream watersheds (>1000 sq mi) and are often over 300 feet wide. In the river there is a vertical salinity gradient (but note that the Upper Hudson River Estuary is entirely freshwater). Plant and wildlife communities found in and along the river are determined by both depth and salinity. These rivers and their associated estuaries support a rich diversity of plant and animals and serve as the primary nursery area for many marine, estuarine, and anadromous fish.



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Stream Habitats

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Dams

Culverts

- Passable
- Not Passable
- Trout Stream
- Important Area for Migratory Fish
- Floodplain Forests (Dutchess County)
- Riparian Buffer (NYNHP)

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, Hudsonia, Hawthorne Valley Farmscape Ecology Program

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Stream Classifications Map

Freshwater streams are NYSDEC classified by the letters A, B, C, or D. The letter classifications and their best uses are described in NYS regulation 6 NYCRR Part 701. For more information about classifications, see the NYSDEC's webpage on Water Quality Standards and Classifications.[21] It is important to note that the DEC waterbody classification does not relate directly to water quality; rather, it reflects the quality expected of a waterbody. For each class, the designated best uses are defined as follows:

- Class A, AA: water supply, primary and secondary contact recreation and fishing
- Class B: primary and secondary contact recreation and fishing
- Class C: fishing, suitable for fish propagation and survival
- Class D: fishing

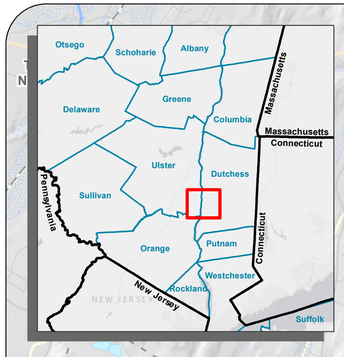
Within the Town of Poughkeepsie, only Class A, B and C streams are present. The Hudson River is considered a Class A stream. Wappinger Creek, which flows along the easter boarder of the Town is Classified as a Class B Stream. All other classified streams within the Town are Class C streams and include Casper Creek, Fall Kill Creek and their respective tributaries.

Additional designations of "T" or "TS" can be added to Class A, B, or C streams if a waterbody has attributes that suggest it would support trout (T) and/or trout spawning (TS). Waterbodies that are designated as "C (T)" or higher (e.g., "C (TS)," "B," "A," or "AA") are collectively referred to as protected streams and are subject to additional regulations and require a State permit for disturbance of the bed or banks. Streams designated as capable of supporting trout are shown in orange on the Stream Habitats Map. There are no trout spawning streams in the Town of Poughkeepsie. Table 4 - 1 identifies the overall length of various stream classes found within Town boundaries. Waterbodies can receive more comprehensive protection at the municipal level.

Table 4 - 1 Stream Classifications

Stream Class	Miles	Percentage
Class A (Hudson River)	9	13%
Class B	16	26%
Class C	39	61%
Total	64	100%

[21] Water Quality Standards and Classifications. NYS DEC, https://www.dec.ny.gov/chemical/23853.html



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Water Quality Classifications

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Class B Streams
- Class C Streams
- Other Stream Classes*
- NYSDEC Wetland
- Open Water**

*None present within the Town
**Open water inside the Town with a classification class provided by the NYSDEC has been labeled on the map.

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, USDA

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N

0 0.5 1 Mile

This map was prepared for illustrative purposes only and is not suitable for engineering, surveying, or legal purposes.

4.3 Wetlands

Wetlands Map

Wetlands are areas saturated by surface or groundwater sufficient to support distinctive vegetation adapted for life in saturated soil conditions.[22] There are many types of freshwater wetlands in Poughkeepsie, including wet meadows, emergent marshes, forested and shrub swamps, vernal pools, floating and submerged vegetation, and open water. Wetlands at the mouths of Wappinger Creek and Casper Creek are both freshwater and tidal. In addition to providing critical habitat for many plants and animals, wetlands help to control flooding and reduce damage from storm surge, recharge groundwater, filter and purify surface water, and provide recreation opportunities. The upland area surrounding a wetland is essential to its survival and function; both may diminish when a wetland is surrounded by pavement, buildings, and pollution-generating or other incompatible land uses.[23]

NYS Freshwater Wetlands include only wetlands larger than 12.4 acres, unless designated "of unusual local importance." The U.S. Fish and Wildlife Service's National Wetlands Inventory (NWI) includes wetlands of all sizes. NWI maps offer general information on wetland habitat, distinguishing forested wetlands (e.g., shrub or forest swamp) from emergent wetlands (e.g., marsh or wet meadow). Note that NWI maps often underestimate wetland area and omit smaller and drier wetlands. In particular, vernal pools, wet meadows, and swamps are often under-represented on maps. Many of DEC's wetland maps are outdated and have similar inaccuracies.[24] When assessing and identifying wetlands, there is no substitute for site visits and on-the-ground determination.

County soil maps are also a good source for predicting the location of potential wetlands. Soils classified in the Soil Survey for Dutchess County as very poorly drained or poorly drained are good indicators of probable wetland areas, and soils classified as somewhat poorly drained may indicate possible wetland areas (see Soils section for further discussion of soil properties).[25] Note that the probable and possible wetland areas cover a greater area than NWI and DEC wetland layers. Likewise, note that soil units are only mapped to an approximate area of about two acres, and that soils within the unit may not be homogeneous. Areas shown as supporting probable or possible wetlands warrant verification in the field for the purposes of environmental review.

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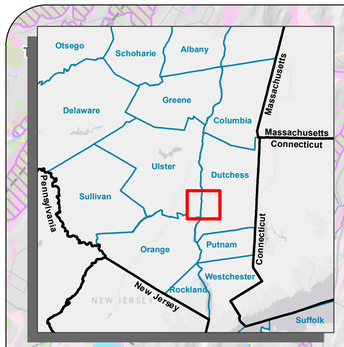
[22] DEC, Wetlands. https://www.dec.ny.gov/lands/305.html

[23] Environmental Law Institute, Planner's Guide to Wetland Buffers for Local Governments (Washington, DC: 2008). www.eli.org/sites/default/files/eli-pubs/d18_01.pdf.

[24] Huffman & Associates, Inc, *Wetlands Status and Trend Analysis of New York State - Mid-1980's to Mid-1990's*, *Prepared for New York State Department of Environmental Conservation* (Larkspur, CA, 2000). https://www.dec.ny.gov/docs/wildlife_pdf/wetstattrend2.pdf

[25] Kiviat, E. and G. Stevens. Biodiversity Assessment Manual for the Hudson River Estuary Corridor. NYS DEC, 2001.



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Wetlands

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Possible Wetland
- Probable Wetland

Federal Wetland Type

- Estuarine and Marine Wetland
- Freshwater Emergent Wetland
- Freshwater Forested/Shrub Wetland
- Freshwater Pond/Lake
- River/Estuary

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, NYNHP, Hudsonia

N

0 0.5 1 Mile

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4.4 Flood Hazard Areas

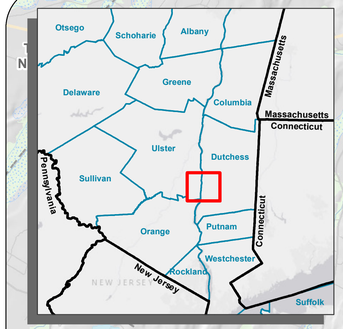
Flood Hazard Areas Map

Floodplains are low-lying areas adjacent to streams and other waterbodies that become inundated during heavy precipitation or snowmelt. By slowing and storing floodwaters, floodplains reduce downstream flood damage and serve as a safety zone between human settlement and the damaging impacts of floods. Naturally, vegetated floodplains help prevent erosion, recharge groundwater, and can serve as travel corridors for wildlife. These highly productive ecosystems are home to a unique suite of plants and animals that tolerate occasional flooding and support the in-stream food web. When left in their natural state, the floodplains provide space for the fluctuations in flow that cause streams to expand, contract, and sometimes change course. Floodplains and other streamside areas are also where land-use change will most easily influence stream quality.

Floodplains have traditionally been delineated by the Federal Emergency Management Agency (FEMA) and the U.S. Department of Housing and Urban Development based on flood frequency according to the extent of land expected to have a 1% or greater chance of being inundated in any given year (often referred to as the "100-year flood"). It is important to note that floodplains and their statistical flooding intervals are estimations based on the best data and technology available at the time of mapping. Due to many variables, such as the often-unpredictable nature of floods, local drainage problems, and the variable intensity of land development in watersheds, some flood-prone areas may not appear on designated floodplain maps, and floodplain designations may change over time as more information becomes available. Table 4 - 2 shows the percentage and acreage of identified FEMA flood zones in the Town of Poughkeepsie.

Table 4 – 2 FEMA Flood Zones

FEMA Flood Zones	Acres	Percentage
1% (100-Year) Flood Zone	3030	15%
0.2% (500-Year) Flood Zone	728	4%



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Flood Hazard Areas

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water

FEMA Flood Hazard Areas

- 1% (100-Year) Flood Zone
- 0.2% (500-Year) Flood Zone
- Riparian Buffer (NYNHP)

Sources:
Esri, NYS ITS, FEMA, Dutchess County, NYNHP, Hudsonia, NYSDEC,Town of Poughkeepsie

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N

0 0.5 1 Mile

SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

This map was prepared for illustrative purposes only and is not suitable for engineering, surveying, or legal purposes.

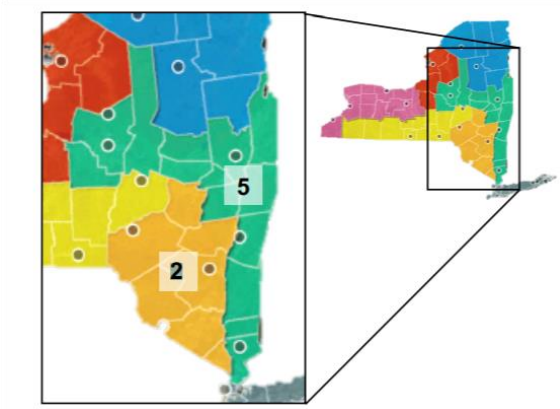
5.0 RESILIENCE

5.1 Climate

Climate (not mapped)

Climate in the Hudson Valley region is temperate and variable, from warm summers bringing occasional heat waves and droughts to cold, snowy winters. Climate change has already affected the normal variability in weather patterns and is projected to continue to significantly alter climate conditions in the future. It is important for municipalities to understand the risks posed by changing climate conditions, and how the climate relates to local natural resources and human health, as well as to the built environment. Increasing temperature, sea level rise, and variability in precipitation are the primary climate change-related hazards in the Northeast region. These hazards may pose significant risks to natural resources and human communities, namely through heat waves, drought, flooding, and poor air quality. Recognizing the value of natural resources as "green infrastructure" in devising climate adaptation strategies is essential.

Responding to Climate Change in New York State (the ClimAID Report), written in 2011 and updated in 2014, is the current authoritative source for climate projections in New York State.[26] ClimAID translated Intergovernmental Panel on Climate Change (IPCC) scenarios into more robust regional-scale predictions, incorporating local data inputs and expert knowledge. The ClimAID report divides the state into seven regions to link climate information with potential impacts, and Poughkeepsie is located within the ClimAID climate region 5. Note that models are inherently uncertain and simply present a range of possible scenarios to assist people and communities plan for the future. Future climate changes in Poughkeepsie could exceed or fall short of these projections.



New York State ClimAID Regions

Looking towards the future there are three prominent climate trends that will affect Poughkeepsie and the region: increasing temperatures, shifting precipitation patterns, and sea level rise (SLR).

Temperature

New York has experienced particularly rapid changes to the regional climate in the last century and this trend is projected to continue through the 21st century. Global average temperature has been rising in unison with increasing concentrations of greenhouse gases in the atmosphere, driving changes to regional and local climate. Warming atmospheric temperature alters the water cycle, leading to more extreme

[26] Zemaitis, Libby. Working Toward Climate Resilience: General Climate Information Prepared for Hudson Valley Communities. NYSDEC Hudson River Estuary Program, 2018.

precipitation, short-term drought and severe storms. Since 1970, Poughkeepsie has seen a 2°F increase in average annual temperature and a 5°F winter temperature increase. These increases are above both the national and global increases in annual temperature for the same period. Current projections see an additional increase of about 4-6°F in the coming decades and up to 11°F by 2100.

Table 5 – 1 Air Temperature Projections for Region 5[27]					
	Baseline 1971-2000	**2020s**	**2050s**	**2080s**	**2100**
Annual average air temperature	50˚F	52.3 - 53.2˚F	54.5 - 56.2˚F	55.6 - 59.7˚F	56.1 - 61.4˚F
Increase in annual average	-	2.3 - 3.2˚F	4.5 - 6.2˚F	5.6 - 9.7˚F	6.1 - 11.4˚F

Increasing annual temperatures will lead to more frequent, intense, and long-lasting heat waves during the summer. Heat waves are a particular concern in more urbanized areas of Poughkeepsie, where the urban heat-island effect can further exacerbate high temperatures. By mid-century, Poughkeepsie could annually experience three to 10 days above 95° and five to seven heat waves that last one to two days longer than average. Increasing temperature not only affects human health and ecosystems but can impact the electrical needs of a community putting strain on both budgets and the grid while creating more challenges in agriculture and other industries. Higher temperatures could also stress cold water stream habitats in Poughkeepsie and surrounding areas.

Table 5 – 2 Heat Wave Projections for Region 5[28]					
	Baseline 1971-2000	**2020s**	**2050s**	**2080s**	**2100**
# Days per year above 90 F	10	26 – 31	39 - 52	44 – 76	*
# Days per year above 95 F	1	2 – 4	3 - 10	6 – 25	*
# Heat waves per year	1	3 – 4	5 – 7	6 – 9	*
Average # days of each heat wave	4	5	5 – 6	5 – 7	*
# Days per year ≤ 32 F	155	127 - 136	104 – 119	84 – 109	*
***Projections not available at this time**					

[27] Zemaitis, Libby, *Working Toward Climate Resilience: General Climate Information Prepared for Hudson Valley Communities* (New Paltz, NY: DEC Hudson River Estuary Program, 2018).
[28] Zemaitis, Libby, *Working Toward Climate Resilience: General Climate Information Prepared for Hudson Valley Communities* (New Paltz, NY: DEC Hudson River Estuary Program, 2018). wri.cals.cornell.edu/sites/wri.cals.cornell.edu/files/shared/documents/HV%20Climate%20Summary%20General%20MAR2018.pdf

Precipitation

Precipitation has become more variable and extreme, whereas total rainfall has changed only marginally. The amount of rain falling in heavy downpour events increased 71% from 1958 to 2012 in the Northeast.[29] Projections indicate total annual precipitation could increase as much as 12% by midcentury and 21% by 2100. Overall, New York State models project more dry periods intermixed with heavy rain and decreased snow cover in winter. However, climate projections for precipitation are considered more uncertain since it is difficult to model. In addition to elevating flood risk, infrastructure such as roads and the Town's wastewater system can become strained during heavy rains.

The Town can reduce potential further damage due to increased stormwater runoff by preserving natural areas, implementing green infrastructure strategies, and limiting impervious surfaces where applicable. Conservation of floodplains, stream corridors, wetlands, and forests will help reduce stormwater runoff and risk from flooding, as well as provide opportunities for plants and animals to migrate north and higher in elevation to adapt to warming conditions. Natural areas also act as carbon sinks, sequestering and storing carbon that helps offset local greenhouse gas emissions. Preservation of natural areas providing stormwater and flood control benefits is in most cases cheaper and more effective than engineered alternatives and should be prioritized wherever feasible. The DEC has published guidance for flood risk management[30] and using natural and nature-based measures to reduce flood risk.[31] In addition, the NYS Department of State has published model local laws to increase community resiliency.[32]

Table 5 – 3 Precipitation Projections for Region 5[33]

	Baseline 1971-2000	2020s	2050s	2080s	2100
Total annual precipitation	51"	52" – 54.5"	53" – 57"	53.5" – 58.5"	53.5" – 61.5"
% Increase in annual precipitation	-	2 – 7%	4 – 12%	5 – 15%	5 – 21%
# Days with precipitation > 1"	10	14 - 15	14 – 16	15 – 17	*
# Days with precipitation > 2"	1	3 – 4	4	4 – 5	*
***Projections not available at this time**					

[29] Melillo, Jerry M., Terese Richmond, and Gary W. Yohe, Eds., Climate Change Impacts in the United States: The Third National Climate Assessment (Washington, D.C.: U.S. Global Change Research Program, 2014), doi:10.7930/J0Z31WJ2. nca2014.globalchange.gov/

[30] New York State Flood Risk Management Guidance, NYS Department of Environmental Conservation. 2020. https://www.dec.ny.gov/docs/administration_pdf/crrafloodriskmgmtgdnc.pdf

[31] Using Natural Measures to Reduce the Risk of Flooding and Erosion, NYS Department of Environmental Conservation and NYS Department of State, 2020. https://www.dec.ny.gov/docs/administration_pdf/crranaturalmeasuresgndc.pdf

[32] Model Local Laws to Increase Resilience, NYS Department of State, 2019. https://www.dos.ny.gov/opd/programs/resilience/index.html

[33] Zemaitis, Libby, *Working Toward Climate Resilience: General Climate Information Prepared for Hudson Valley Communities* (New Paltz, NY: DEC Hudson River Estuary Program, 2018). wri.cals.cornell.edu/sites/wri.cals.cornell.edu/files/shared/documents/HV%20Climate%20Summary%20General%20MAR2018.pdf

Sea-Level Rise

Global sea level is rising due to various factors, including thermal expansion from warmer water temperatures, and melting of land-based ice. The Hudson River is connected to and influenced by the sea; therefore, it experiences tides and is rising with global sea level. Since 1900, sea level in New York Harbor has risen 13 inches. More concerning, the water is rising exponentially faster (from 2000 to 2014 the average rate was 6.8 millimeters per year compared to 4.6 millimeters per year from 1990 to 2014). Projections for additional sea-level rise along the Hudson River range from one to 9 inches by year 2020 and five to 27 inches by mid-century. It is possible that Poughkeepsie could experience as much as 71 inches of sea-level rise by the end of the 21st century if rapid ice melt from the Greenland ice sheet continues. Although this "high projection" scenario is considered very unlikely by DEC to occur by 2100, there is relative certainty that global sea level will ultimately rise at least six feet over current levels after 2100 due to warming that is already locked into the atmosphere. Section 4.3 further discusses sea level rise and includes sea level rise projections maps.

Air (not mapped)

Air pollution can harm human health and damage all the elements of the ecosystem. For over four decades, state and federal governments have controlled the emission of pollutants through permits with enforceable requirements and have measured and monitored pollution levels in the air.

Air pollutants originate from many human activities. Most pollutants come from industries that manufacture chemicals and other goods, from on- and off-road vehicles and power equipment, and from energy facilities that burn oil, gas or coal. Pollutants emitted from tall stacks move high in the air, descending to earth to do damage miles downwind from their source.

Air pollution damages health and the environment in a variety of ways. Hot summer weather sets the stage for formation of ozone (O_3) and fine particulate matter ($PM_{2.5}$), two pollutants of concern for human health. Fish and wildlife show harmful effects from acid rain and mercury in air. Greenhouse gases (e.g., carbon dioxide and methane) in the air are changing the world's climate.

The federal and state air pollution programs include permits and technical requirements to control emission of pollutants, along with extensive measurement and monitoring of ambient pollutant levels. For information about the New York State air quality forecast and current observations, visit: https://www.dec.ny.gov/chemical/34985.html

5.2 Coastline

Coastal Habitats Map

Connections to upper watersheds, the Atlantic Ocean, and the changing tides make the coastal and shoreline zones of the Hudson River Estuary a dynamic area. The Mid-Hudson River estuary is entirely freshwater, supporting globally rare natural communities such as freshwater tidal marshes and swamps. Coastal habitats along the Hudson in the Town of Poughkeepsie are shown in the Coastal Habitats Map. Potential tidal wetland migration pathways are shown in the Hudson River Shoreline Map.

Significant Coastal Fish and Wildlife Habitats

Diverse coastal habitats occur in New York that provide critical habitat and feeding areas for animals as well as economic values. The NYSDEC has identified and evaluated coastal habitats throughout the state's coastal regions, providing recommendations to the NYS Department of State (DOS) so that the most important or significant habitats may be designated for protection in accordance with the Waterfront Revitalization and Coastal Resources Act. The Significant Coastal Fish and Wildlife Habitats describe the highest quality habitats on the Hudson, outlining fish and wildlife values and activities that may have large impacts on the habitats. State and federal law requires that some projects may be reviewed for consistency with coastal policies on significant fish and wildlife habitat. These areas are shown in purple hash on the map. Within the Town of Poughkeepsie, this includes:

- Kingston-Poughkeepsie Deepwater
- Wappinger Creek

Significant Natural Communities

Significant natural communities represent rare or high-quality wetlands, forests, grasslands, ponds, streams, and other types of habitats, ecosystems, and ecological areas. Several significant natural communities have been identified in Poughkeepsie by the New York Natural Heritage Program (NYNHP), including upland forests and tidal wetlands. NYNHP describes the identified limestone woodland as a small, poorly connected habitat fragment that is highly threatened by development and invasive species. The mapped freshwater intertidal mudflats and freshwater tidal marsh are similarly impaired habitats in the mouth of Wappinger Creek. Dredging, changes in hydrology and invasive water chestnut are identified as major threats to long-term viability. Sea level rise is also a major threat.[34]

Submerged Aquatic Vegetation

Submerged aquatic vegetation (SAV) denotes rooted aquatic plants that grow completely underwater. These plants occur in both freshwater and saltwater but in estuaries, where fresh- and saltwater mix together, they can be especially important habitat for fish, crabs, and other aquatic organisms. SAV is a

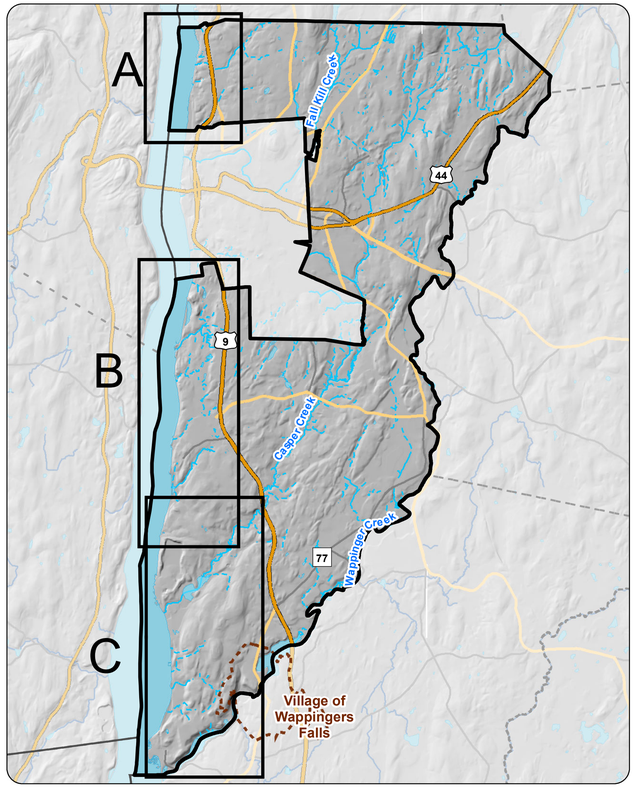
[34] NYS DEC Hudson River Estuary Program. *Natural Areas and Wildlife in Your Community: A Habitat Summary Prepared for Poughkeepsie, NY*. 2019.

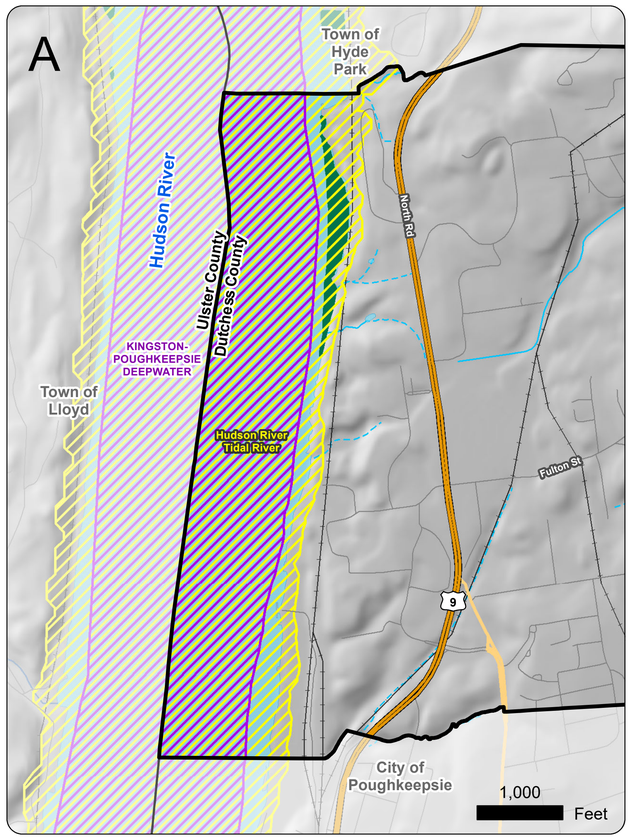
great habitat for fish, including commercially important species, because it provides them with a place to hide from predators, and it hosts a buffet of small invertebrates and other prey.[35] The Coastal Habitats Map shows areas of SAV along much of the Town's Hudson River shoreline.

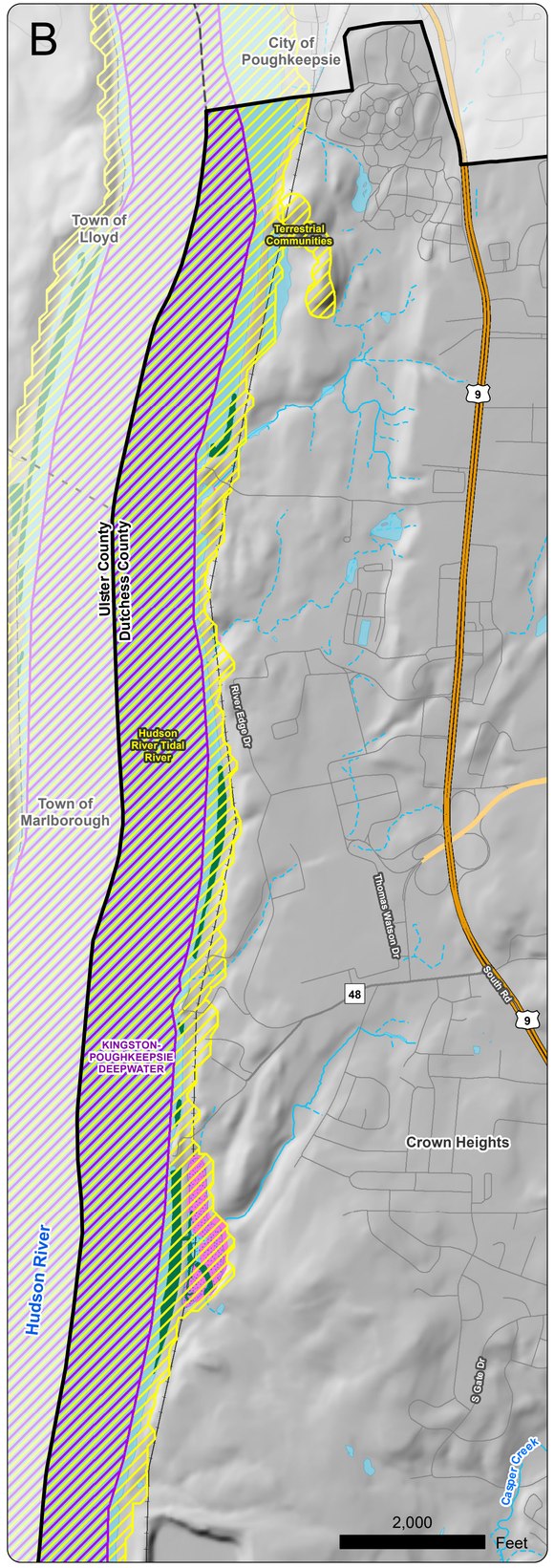
Tidal Wetlands

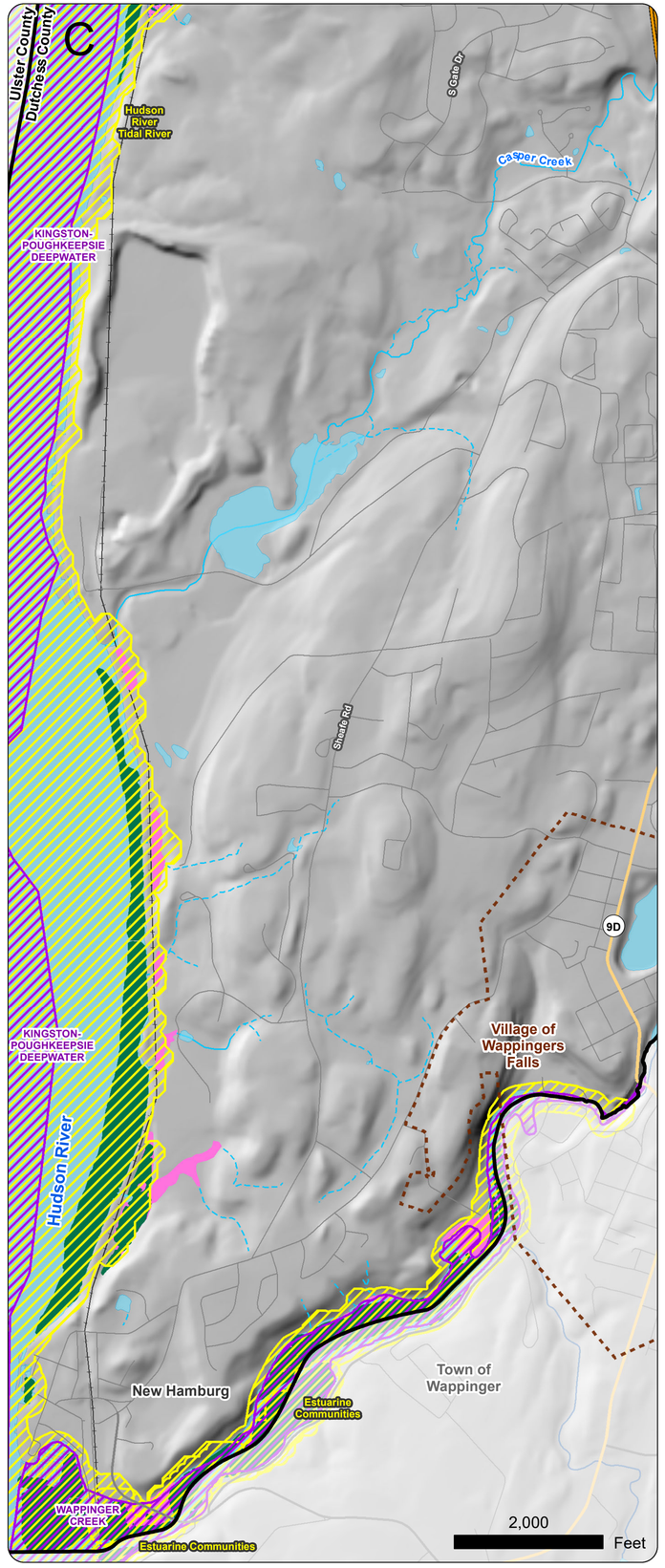
Tidal wetlands are areas regularly inundated to some degree by tides. There are different types of tidal wetlands depending on plant life present and water depth during high and low tides. Tidal wetlands provide vital habitat in the estuary for rare plants and young fish. In addition, waterfront communities benefit from the ability of tidal wetlands to remove some pollutants from wastewater and protect shorelines from waves and strong storms. Tidal wetlands, and other natural habitats in the Town, were mapped by Hudsonia.

[35] National Oceanic and Atmospheric Administration. *Submerged Aquatic Vegetation: A Habitat Worth SAV-ing*. 2020. Fisheries.noaa.gov









TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Coastal Habitats

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Significant Coastal Fish and Wildlife Habitat
- Significant Natural Communities
- Submerged Aquatic Vegetation
- Tidal Wetlands (Hudsonia)

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, Hudsonia

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Hudson River Shoreline Map

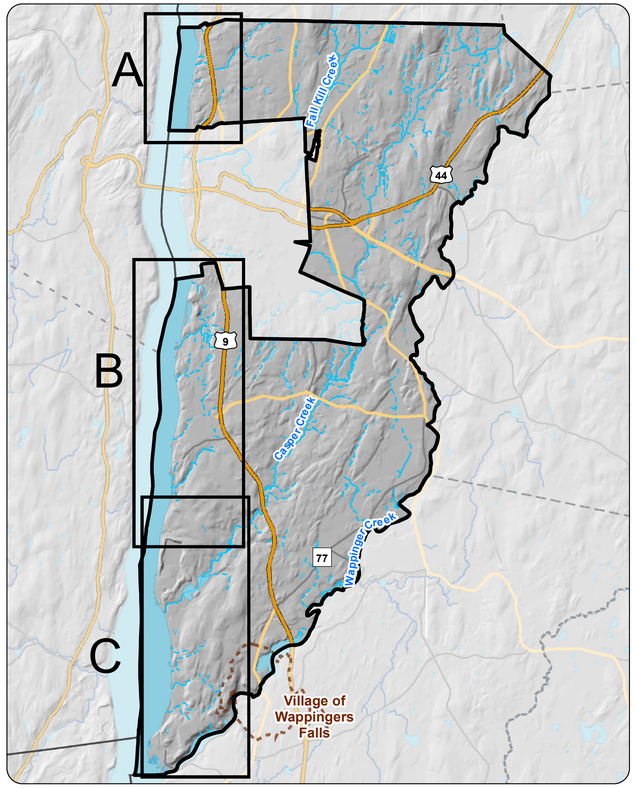
The 153-mile stretch of the Hudson River from the Federal Lock and Dam in Troy to New York Harbor is tidal and thus defined as an estuary. The state of Hudson River shorelines varies from natural to engineered, from tidal habitat to industrial waterfront. Knowing the status of tidal shoreline habitat can help guide restoration and management of a more natural shoreline and identify natural shorelines that might be priorities for conservation. Furthermore, global sea level rise will fundamentally affect the shoreline of the Hudson River estuary in the coming decades. Natural shorelines will potentially allow for the migration of tidal and shoreline habitats as sea level rises. The mapped area is broken up into three quadrants showing both Tidal Wetlands (Hudsonia) and Tidal Wetland Pathways. Tidal wetlands depict areas of brackish and freshwater tidal habitats which are important to a variety of aquatic and terrestrial ecology. Tidal Wetland Pathways illustrate the projected geographic area of future tidal wetlands as a result of sea level rise.[36] Tidal wetlands along the Hudson River will disappear as water rises unless the wetlands can build up sediment in place or move horizontally to higher ground. However, wetlands bordered by steep shorelines, walls, or existing development may have no place to go. Potential tidal wetland loss threatens the health of the entire estuary. Wetlands are also one of the most important tools in flood control as the wetlands are able to absorb and slow the movement of rising waters. A recent study by Scenic Hudson shows areas along the Hudson most likely to support tidal wetlands in the future as sea level rises.[37] The study predicts a significant expansion of tidal wetland acreage in the northern portions of the Hudson River, including Poughkeepsie, by 2100.

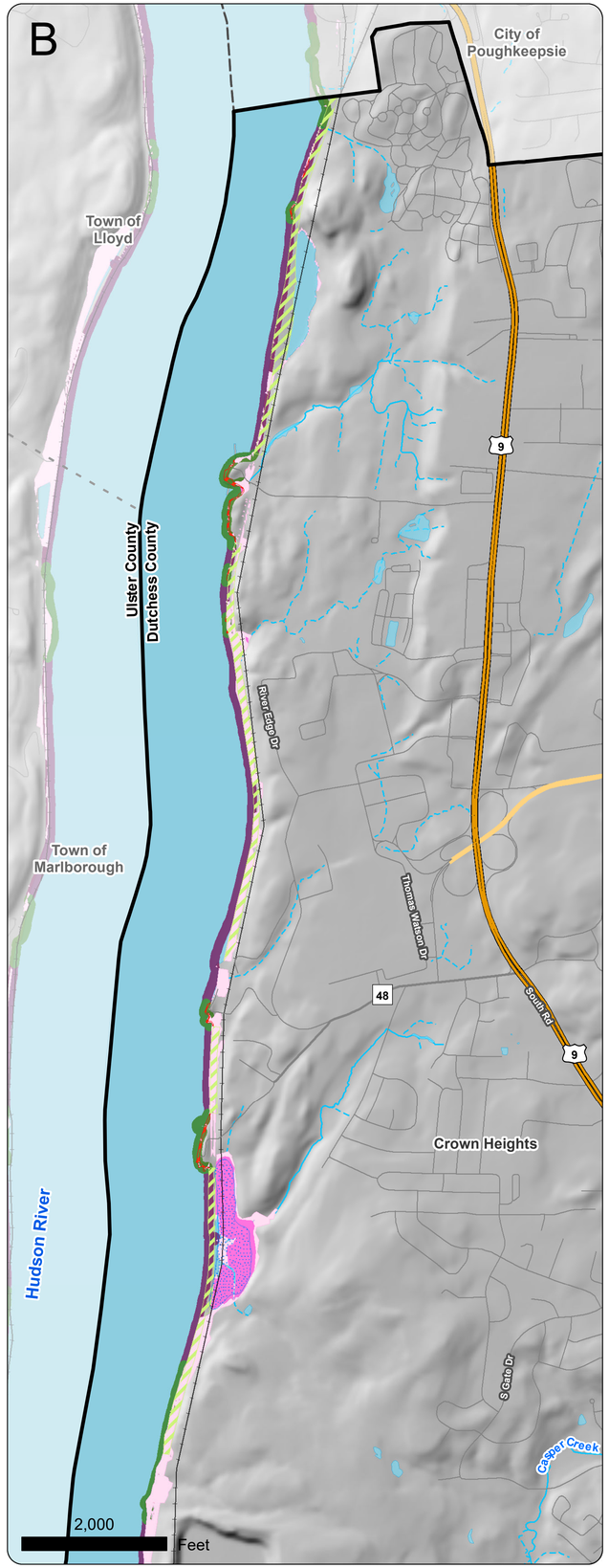
Also included on the map are the shoreline types (Hard Engineered or Natural Shoreline) and Estuarine Rocky Shore and/or Supratidal Railroad Causeway. This data is provided by the Hudson River Estuary Program.

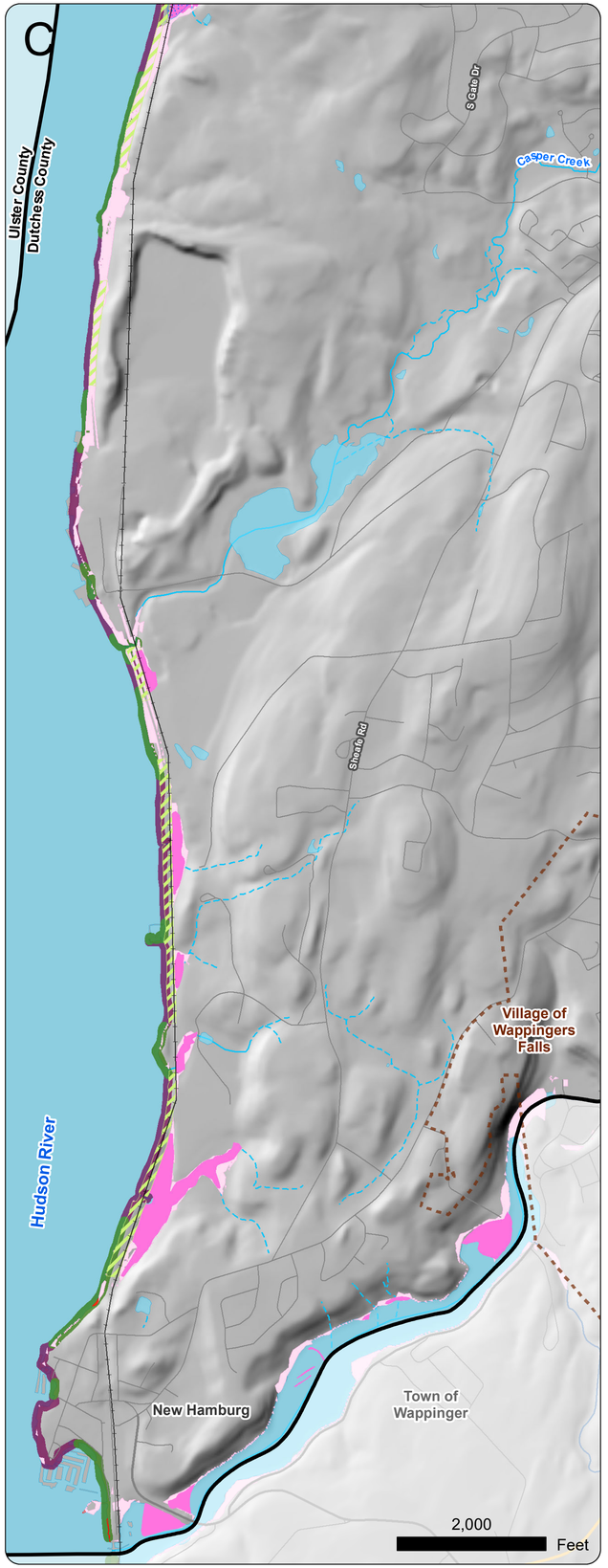
A Greater Yellowlegs in Sunfish Cove. Photo Credit: David Chernack

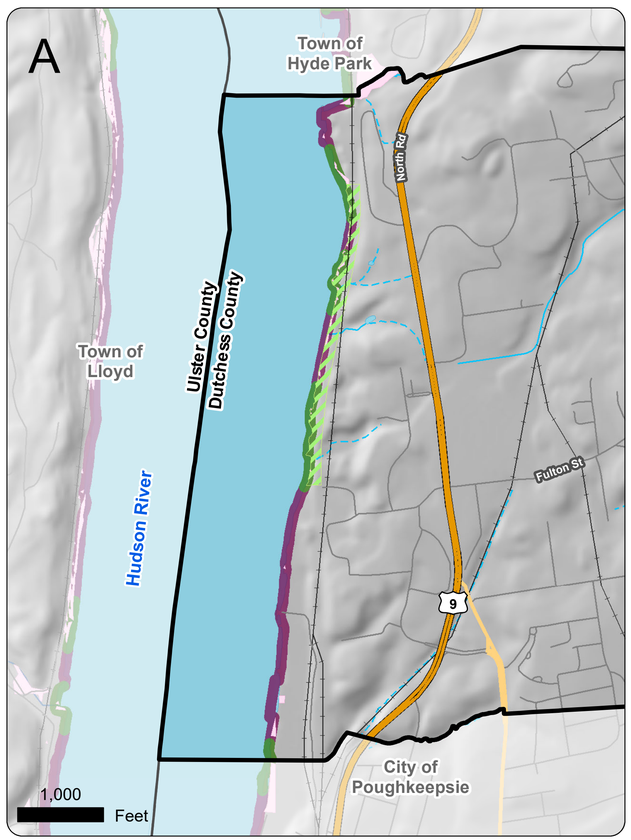
[36] https://scenichudson.org/wp-content/uploads/legacy/protecting-the-pathways.pdf

[37] Tabak, Nava, and Sacha Spector, Protecting the Pathways: A Climate Change Adaptation Framework for Hudson River Estuary Tidal Wetlands (Poughkeepsie, NY: Scenic Hudson, 2016). www.scenichudson.org/sites/deafult/files/protecting-the-pathways.pdf









TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Hudson River Shoreline

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Tidal Wetlands (Hudsonia)
- Tidal Wetland Pathways

Hudson River Shoreline Type

- Hard Engineered
- Natural Shoreline

Relevant Hudsonia Habitats

- Estuarine Rocky Shore
- Supratidal Railroad Causeway

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, Hudson River Estuary Program, Scenic Hudson, Hudsonia

N

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SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

This map was prepared for illustrative purposes only and is not suitable for engineering, surveying, or legal purposes.

5.3 Sea Level Rise

Sea Level Rise Map

As mentioned previously, sea level rise is an important consideration planning for the future. Projections for rapid sea-level rise on the Hudson threaten waterfront development and infrastructure, as well as the future of tidal wetlands.

The NYSDEC has provided projections for sea-level rise for New York State's coastal areas, as well as along the Hudson River. The Town of Poughkeepsie is located within the Lower-Hudson Region which includes the Hudson River from the mouth of Rondout Creek in Kingston, NY and the marine coast of New York City and the Long Island Sound in Westchester County. Table 5 - 3 shows the NYSDEC Sea-level rise projections for the Lower-Hudson region below.[38]

Table 5 - 3 NYSDEC Adopted Sea-Level Rise Projections for the Lower-Hudson Region, 6NYCRR Part 490

Time Interval	Low Projection	Low-Medium Projection	Medium Projection	High-Medium Projection	High Projection
2020s	2 inches	4 inches	6 inches	8 inches	10 inches
2050s	8 inches	11 inches	16 inches	21 inches	30 inches
2080s	13 inches	18 inches	29 inches	39 inches	58 inches
2100	15 inches	22 inches	36 inches	50 inches	75 inches

Sea-level rise scenarios come from the Columbia University Flood Impact Decision Tool[39] which estimates the geographical inundation at various scenarios of Sea-Level rise ranging from 6 inches to 72 inches in 6 inch intervals. The Sea-Level Rise Scenarios Map shows the inundation of potential sea-level rise (SLR) at 30, 60 and 72 inches over current levels. These scenarios correspond most closely (but not exactly) with the NYSDEC Adopted High Projections for the Lower Hudson Region. While this scenario is considered the "worst-case", it is possible that the Town of Poughkeepsie could experience as much as 75 inches of sea-level rise by the end of the 21st century if rapid ice melt from the Greenland ice sheet continues. Although this "high projection" scenario is considered very unlikely by DEC to occur by 2100, there is relative certainty that global sea level will ultimately rise at least six feet over current levels after 2100 due to warming that is already locked into the atmosphere. The high-medium or high projections might therefore be used for long-term projects for which there is low risk tolerance, e.g. critical infrastructure, while lower projections may be appropriate for consideration in situations in which risk tolerance is high.

The Sea Level Rise Scenarios Mapping is presented as a two-map series and identifies inundation at each Sea Level Rise scenario (30, 60 and 72 inches over current levels) along the Hudson River Shoreline of

[38]https://www.dec.ny.gov/regulations/103877.html
[39] http://www.ciesin.columbia.edu/hudson-river-flood-map/

Poughkeepsie. The mapping is presented in four "detail areas". Based on this mapping, the following areas within the Town are at risk of future inundation:

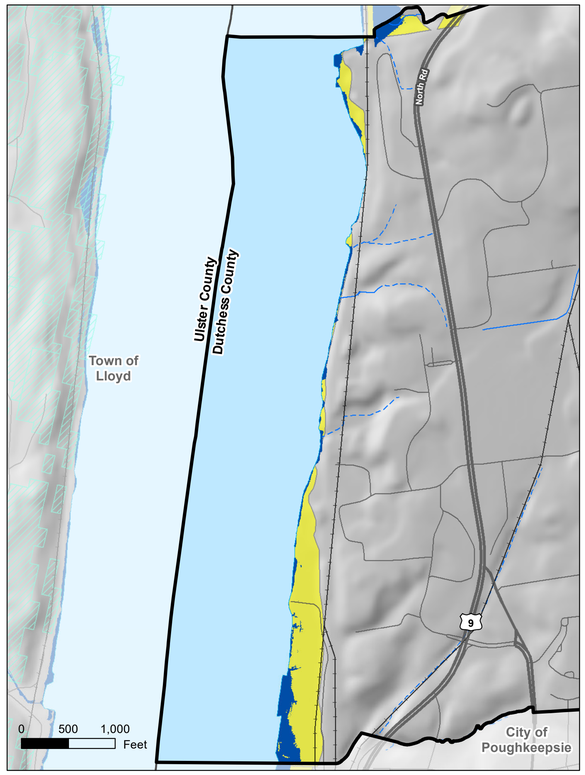
- Areas South of Longview Park, including portions of the railway.
- Sunfish Cove and shoreline areas west of IBM
- Areas within the Tilcon Quarry
- Shoreline within New Hamburg and along Wappinger Creek

Existing natural resources can help protect against the impacts that climate change could have on the Town of Poughkeepsie. The most effective way for municipalities to conserve tidal wetlands in the face of projected changes is to protect and manage the areas where wetlands may move. There is a significant opportunity for wetland expansion in Peekskill through this century. Minimizing future development in these pathways and designing public waterfronts to allow for these changes will ensure that tidal wetlands have room to adapt to rising sea levels. This strategy will also reduce risks to communities and property owners in the changing Hudson River flood zone.

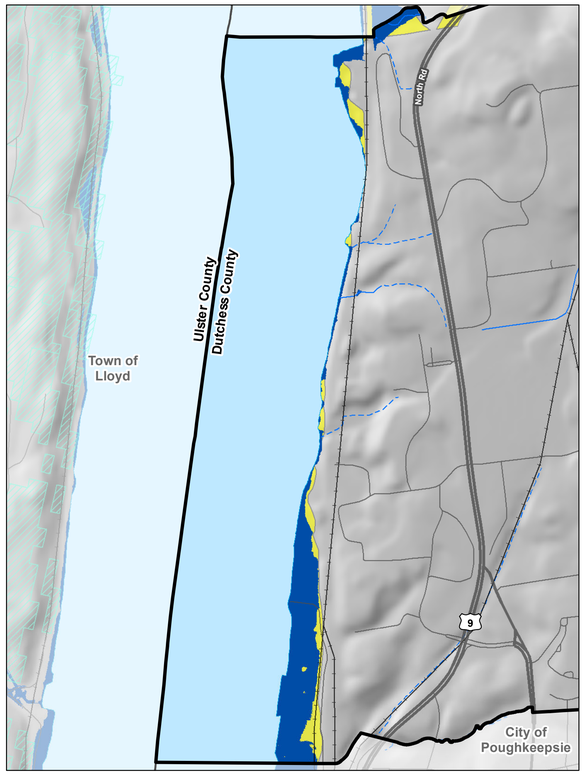
The Sea Level Rise mapping also illustrates "Resilient Sites". This data was developed by the Nature Conservancy and identifies areas with "characteristics (microclimatic buffering and connectedness) that maintain ecological functions and will likely sustain a diversity of species [40]. Areas with above average or far above average resilience are depicted in teal hash on the map.

[40] http://easterndivision.s3.amazonaws.com/Resilient_Sites_for_Terrestrial_Conservation.pdf

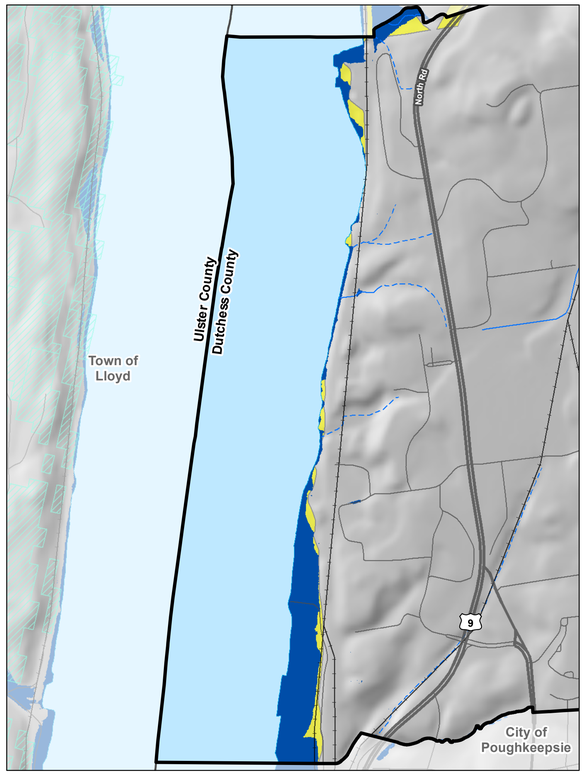
Detail Area 1



Hudson River Flood Decision- 30" Inundation
(compare to the High scenario for 2050s)

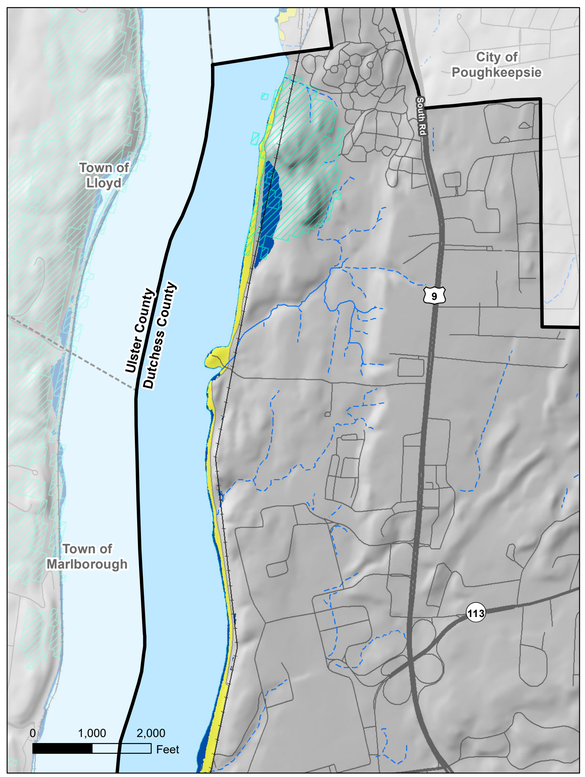


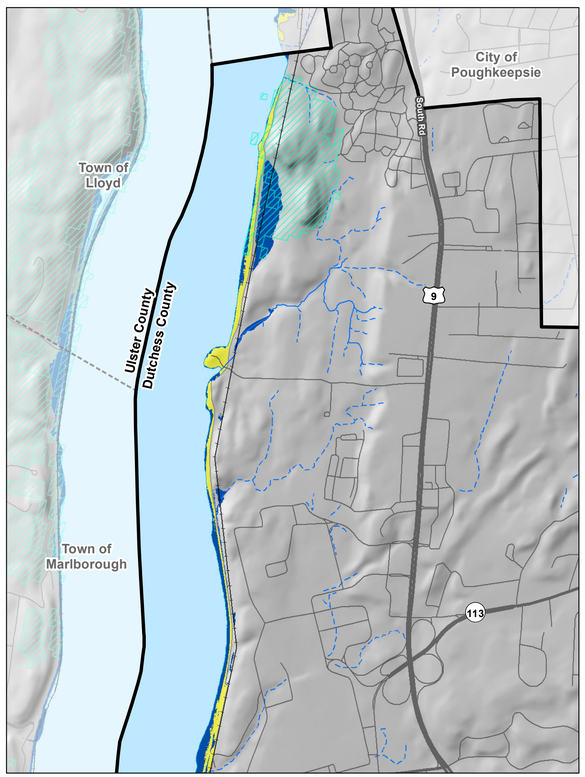
Hudson River Flood Decision- 60" Inundation
(compare to the High scenario for 2080s)

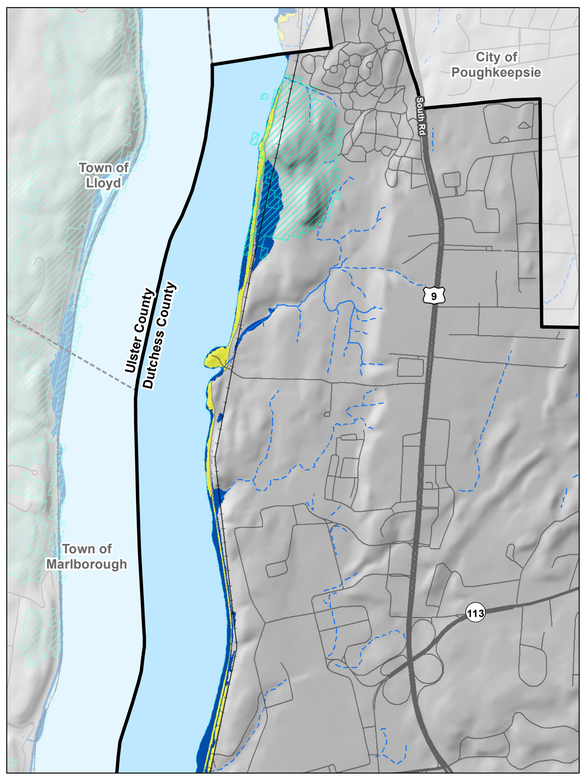


Hudson River Flood Decision- 72" Inundation
(compare to the High scenario for 2100)

Detail Area 2







TOWN OF POUGHKEEPSIE

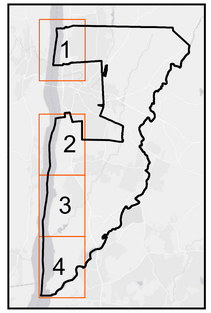
Natural Resources Inventory & Open Space Plan

Sea Level Rise Detail Areas 1 & 2

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- Local Roads
- Major Roads
- Perennial Streams
- Intermittent Streams
- Resilient Sites
- Current Mean High Water
- 100 Year Floodplain
- Sea Level Inundation



NYSDEC Adopted Sea-Level Rise projections for the Lower- Hudson region, 6NYCRR Part 490

Time Interval	Low Projection	Low-Medium Projection	Medium Projection	High-Medium Projection	High Projection
2020s	2 Inches	4 inches	6 inches	8 inches	10 inches
2050s	8 inches	11 inches	16 inches	21 inches	30 inches
2080s	13 inches	18 inches	29 inches	39 inches	58 inches
2100	15 inches	22 inches	36 inches	50 inches	75 inches

N

Sources:
Esri, NYS ITS, Columbia University Hudson River Flood Decision, Dutchess County, NYSDEC, The Nature Conservancy, Hudsonia, Town of Poughkeepsie

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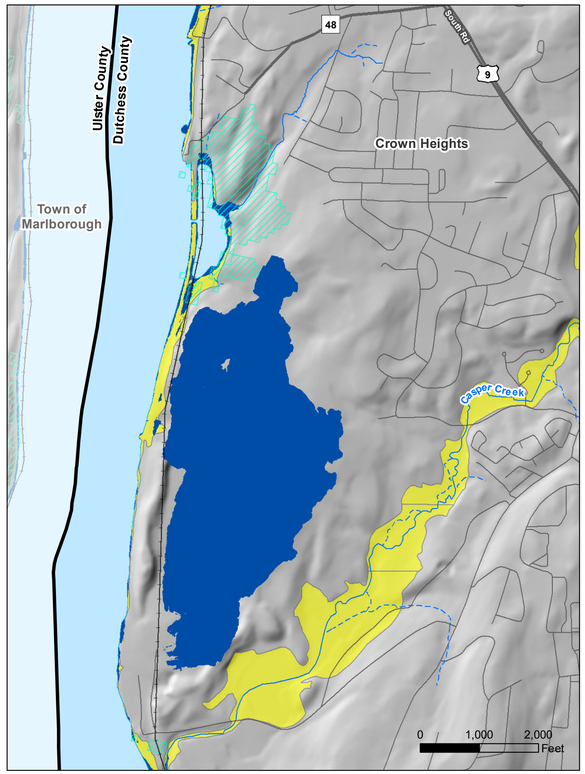
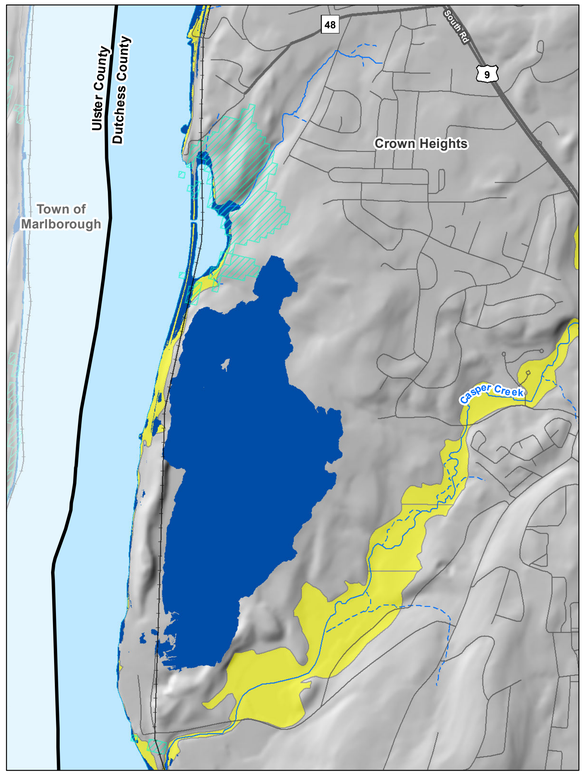
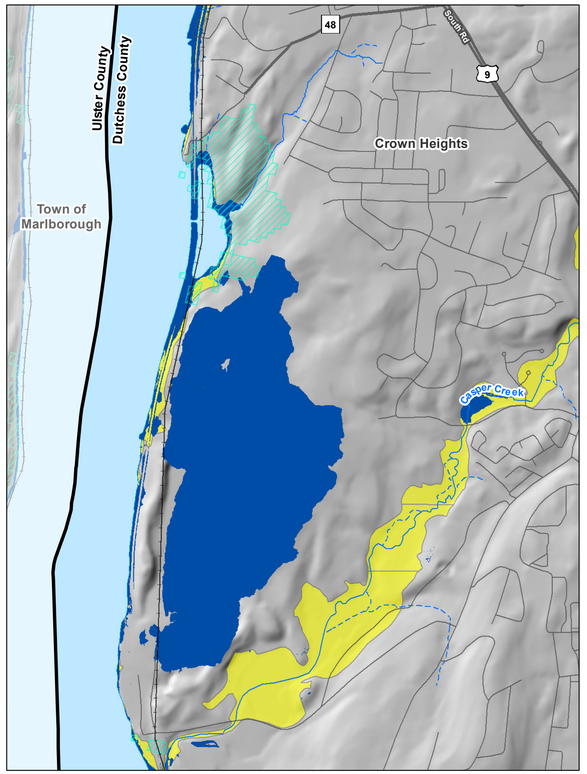
Detail Area 3



Hudson River Flood Decision- 30" Inundation
(compare to the High scenario for 2050s)

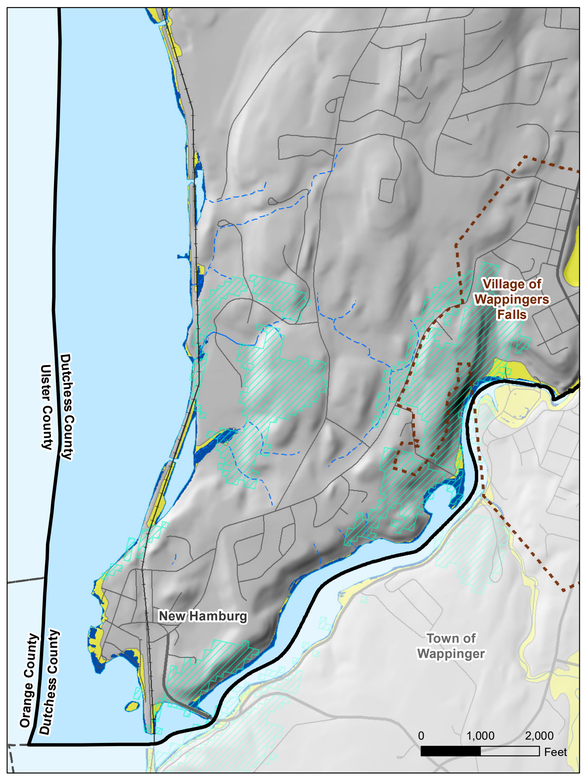


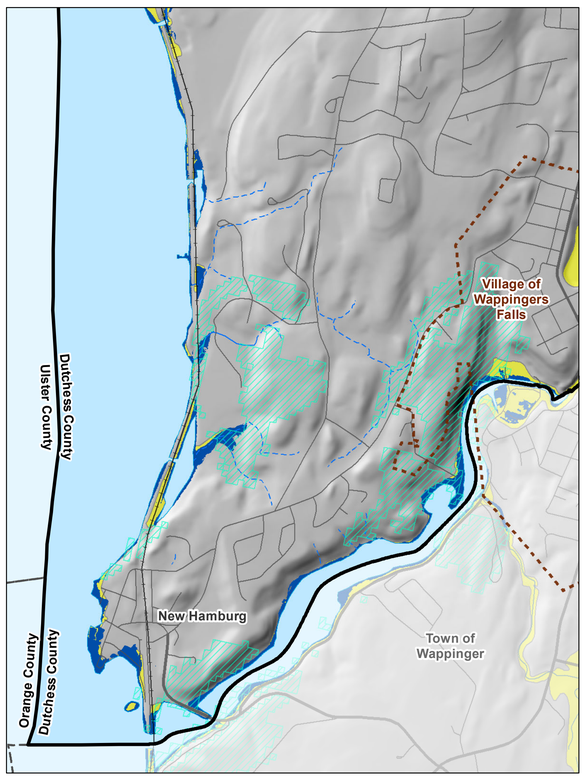
Hudson River Flood Decision- 60" Inundation
(compare to the High scenario for 2080s)

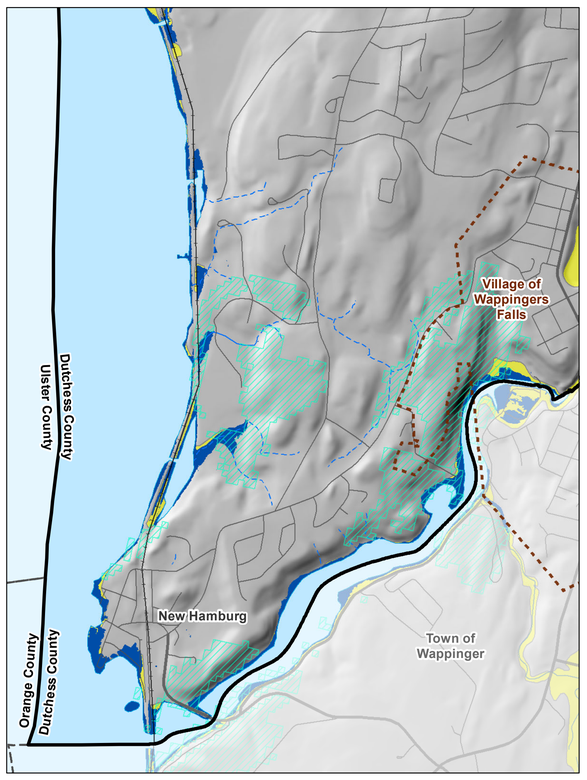


Hudson River Flood Decision- 72" Inundation
(compare to the High scenario for 2100)

Detail Area 4







TOWN OF POUGHKEEPSIE

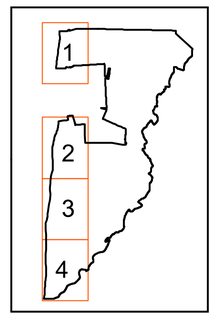
Natural Resources Inventory & Open Space Plan

Sea Level Rise
Detail Areas 3 & 4

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Local Roads
- Major Roads
- Railroad
- Perennial Streams
- Intermittent Streams
- Resilient Sites
- Current Mean High Water
- Sea Level Inundation
- 100 Year Floodplain



NYSDEC Adopted Sea-Level Rise projections for the Lower- Hudson region, 6NYCRR Part 490

Time Interval	Low Projection	Low-Medium Projection	Medium Projection	High-Medium Projection	High Projection
2020s	2 Inches	4 inches	6 inches	8 inches	10 inches
2050s	8 inches	11 inches	16 inches	21 inches	30 inches
2080s	13 inches	18 inches	29 inches	39 inches	58 inches
2100	15 inches	22 inches	36 inches	50 inches	75 inches

N

Sources:
Esri, NYS ITS, Columbia University Hudson River Flood Decision, Dutchess County, NYSDEC, Hudsonia, Town of Poughkeepsie

Engineering and Land Surveying, P.C.
1533 Crescent Road - Clifton Park, NY 12065

SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

6.0 LAND USE AND ZONING

6.1 Land Use

Land Use (not mapped)

The Land Cover and Land Use is not mapped but available in the Town of Poughkeepsie 2030 Comprehensive Plan Update [41] The map provides an overview of the land use within the Town based on the 2019 Tax Assessment data. By far the most predominant land use within the Town is Residential land uses, with Single Family dwellings accounting for nearly 35% of the Town area. See Table 6 -1 below for a breakdown of land use types within the Town. The next most predominant land uses include Vacant and Industrial/Manufacturing lands.

Table 6 - 1 Town of Poughkeepsie Land Use

Land Use	Parcel Count	Acres	% of Total Parcels	% of Total Land Area
Agriculture	21.0	478	0.2%	**2.8%**
Single family Detached Dwelling	9,952	5,958	78.8%	**34.9%**
Single Family w/Commercial Use	11	14	0.1%	**0.1%**
Single Family Attached Dwelling	196	17	1.6%	**0.1%**
Single Family with Accessory Apartment	98	61	0.8%	**0.4%**
2 Family Dwelling	196	103	1.6%	**0.6%**
3 Family Dwelling	32	30	0.3%	**0.2%**
Mobile Home Park	9	184	0.1%	**1.1%**
Multiple Residences	37	105	0.3%	**0.6%**
Apartment	648	357	5.1%	**2.1%**
Office	81.0	366	0.6%	**2.1%**
Commercial	306.0	850	2.4%	**5.0%**
Auto Use	62.0	93	0.5%	**0.5%**
Industrial/Manufacturing	21.0	1,473	0.2%	**8.6%**
Public/Quasi Public	73.0	1,043	0.6%	**6.1%**
Educational	61.0	1,347	0.5%	**7.9%**
Healthcare	12.0	331	0.1%	**1.9%**
Utility	44.0	384	0.3%	**2.3%**
Recreation & Open Space	52.0	1,014	0.4%	**5.9%**
Commercial Recreation	15.0	580	0.1%	**3.4%**
Vacant	670.0	1,986	5.3%	**11.6%**
Parking	19.0	25	0.2%	**0.1%**

[41] https://www.Townofpoughkeepsie.com/DocumentCenter/View/1088/TOPCompPlan_2021-05-28

Approved Developments	8.0	224	0.1%	**1.3%**
Unknown Land Use Code	13.0	29	0.1%	**0.2%**
TOTAL	**12,637**	**17,053**	**100.0%**	**100.0%**
Source: Town of Poughkeepsie 2021 Comprehensive Plan Update				

6.2 Zoning

Zoning and Tax Parcels Map

Local governments have the authority to enact zoning regulations to promote the public health, safety, and general welfare of their communities, among other purposes. Zoning is primarily enacted to control the use of land and the density of those uses, as deemed appropriate for the community. Zoning can encourage a variety of uses that are desirable, strictly regulate those that may be potentially inharmonious, or prohibit those uses that are unwanted in the community. Zoning laws can protect important natural areas and cultural resources such as historic landmarks or districts, wetlands, floodplains, groundwater, wildlife habitats, and scenic areas. Various statutes define the use of zoning to encourage the most appropriate use of land.

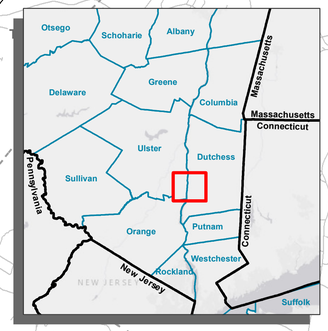
In the Town of Poughkeepsie there are 23 distinct Zoning Districts (shown in Table 6 - 2) and 8 district overlays (shown in Table 6 - 3).

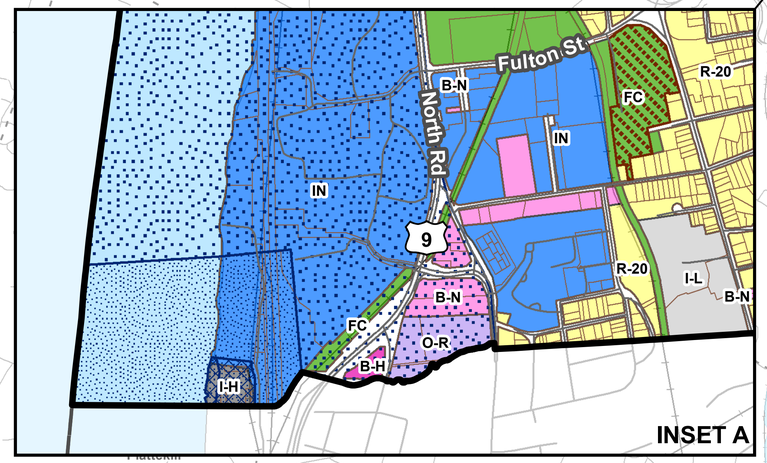
The map also includes the parcel boundaries for all of the properties located within the Town. Tax parcels boundaries are defined within the deed of each individual property. Parcel level information including owner, type of use, and physical size, can be found in the Town's assessment roll. The Town Assessor's office has the working copy of a tax map to record property transfers and other features of land.

The Zoning and Tax Parcels Map displays a wide range of information that is invaluable when making decisions on potential development projects. By pairing this information with the information found in the other maps of the Natural Resources Inventory it is possible see how potential development could affect the natural resources of the Town.

Table 6 - 2 Town of Poughkeepsie Zoning Districts			
Zoning District	**Abbreviation**	**Acres**	**Percentage**
Arlington Town Center	ATC	148	1%
Highway Business	B-H	489	2%
Neighborhood Business	B-N	127	1%
Neighborhood Highway Business	B-NH	26	<1%
Shopping Center	B-SC	291	1%
Fairview Center	FC	69	<1%
Historic Revitalization Development District	HRDD	163	1%
Heavy Industry	I-H	963	5%
Light Industry	I-L	82	<1%
Institutional	IN	1547	8%
MacDonnell Heights Center	MHC	61	<1%
Office Research	O-R	113	1%
Quarry	Q	1089	6%
Residence, Single Family; 1.5 Acre	R-1.5A	158	1%
Residence, Single Family; 20,000 Square Feet	R-20	7404	37%
Residence, Single Family; 2 Acre	R-2A	742	4%
Residence, Single Family; 4 Acre	R-4A	2583	13%
Residence, Multifamily	R-M	482	2%
Residence, Mobile Home	R-MH	197	1%
Residence, New Hamburg	R-NH	26	<1%
Red Oaks Mill Neighborhood Services Center	ROMNSC	25	<1%
South Hills Center	SHC	82	<1%
Salt Point Center	SPC	29	<1%

Table 6 -3 Zoning District Overlays			
Zoning District Overlay	**Abbreviation**	**Acres**	**Percentage**
Coastal Zone 1	WD1	2871	15%
Coastal Zone 2	WD2	2345	12%
Crown Heights Center Overlay	CHCO	87	<1%
Crown Heights Center Overlay Extended Overlay	CHCO EO	14	<1%
Main Street Drive-thru Overlay District	MSDTOD	1	<1%
Planned Residential Overlay District	PROD	14	<1%
Senior Housing Overlay District	SHOD	7	<1%
Waterfront Housing Overlay District	WHOD	5	<1%





TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Zoning and Tax Parcels

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- Roads
- Hudson River
- Tax Parcel Boundaries

Overlay

- Coastal Zone 1 (WD1)
- Coastal Zone 2 (WD2)
- Crown Heights Center Overlay (CHCO)
- CHCO Extended Overlay District (CHCO EO)
- Planned Residential Overlay District (PROD)
- Main Street Drive-thru Overlay District (MSDTOD)
- Senior Housing Overlay District (SHOD)
- Waterfront Housing Overlay District (WHOD)

Zoning District

- Arlington Town Center (ATC)
- Highway Business (B-H)
- Neighborhood Business (B-N)
- Neighborhood Highway Business (B-NH)
- Shopping Center (B-SC)
- Fairview Center (FC)
- Historic Revitalization Development District (HRDD)
- Heavy Industry (I-H)
- Light Industry (I-L)
- Institutional (IN)
- MacDonnell Heights Center (MHC)
- Office Research (O-R)
- Quarry (Q)
- Residence, Single Family; 1.5 Acre (R-1.5A)
- Residence, Single Family; 20,000 Square Feet (R-20)
- Residence, Single Family; 2 Acre (R-2A)
- Residence, Single Family; 4 Acre (R-4A)
- Residence, Multifamily (R-M)
- Residence, Mobile Home (R-MH)
- Residence, New Hamburg (R-NH)
- Red Oaks Mill Neighborhood Services Center (ROMNSC)
- South Hills Center (SHC)
- Salt Point Center (SPC)

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie

0 0.5 1 Mile

N

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SHUMAKER Consulting Engineering & Land Surveying, D.P.C.

6.3 Regulated Facilities

Regulated Facilities Map

The map shows the locations of bulk storage facilities, mining and waste facilities, and point source discharges regulated under the Clean Water Act. Information about individual permitted facilities identified on the map is available through the DECinfo Locator interactive online map at https://www.dec.ny.gov/pubs/109457.html.

SPDES Permit Sites

New York's State Pollutant Discharge Elimination System (SPDES) program is intended to control surface wastewater and stormwater discharges in accordance with the Clean Water Act. Permits are required for constructing or using an outlet or discharge pipe (i.e., a "point source") discharging wastewater to surface waters or ground waters of the state and disposal systems such as a sewage treatment plant.[42] Municipal SPDES permits are issued for several sites, including fire stations, mobile home parks, industrial parks, and manufacturing facilities. Within the Town of Poughkeepsie, there are 21 SPDES sites.

Chemical Bulk Storage Facility

These locations are regulated under the NYS Chemical Bulk Storage (CBS) program, which applies to facilities that store a "hazardous substance" listed in 6 NYCRR Part 597 in an aboveground storage tank larger than 185 gallons, any size underground storage tank, with some exceptions, or in a non-stationary tank used to store 1,000 kg or more for a period of 90 consecutive days or more.[43] Active chemical bulk storage facilities can include wastewater treatment plants and industrial sites. As shown on the Regulated Facilities map, eleven (11) chemical bulk storage facilities exist within the Town.

Major Oil Storage Facility

These locations are regulated under the NYS Oil Spill Prevention, Control and Compensation Act, which requires regulation of all oil terminals and transport vessels operating in the waters of the State that have a storage capacity of 400,000 gallons or more.[44] There are two major oil storage facilities within the Town, both of which are located along the Hudson River. These facilities are involved in the storage and distribution of various refined petroleum products.

Petroleum Bulk Storage Facility

These locations are regulated under the NYS Petroleum Bulk Storage Program, which applies to facilities that store more than 1,100 gallons of petroleum in aboveground and underground storage tanks.[45] The

[42] DEC, State Pollutant Discharge Elimination System (SPDES) Permit Program, www.dec.ny.gov/permits/6054.html
[43] iBid
[44] Regulation of Major Oil Storage Facilities. NYSDEC, https://www.dec.ny.gov/chemical/2644.html
[45] DEC, *Bulk Storage of Chemicals, Petroleum, and Liquefied Natural Gas*, www.dec.ny.gov/chemical/287.html

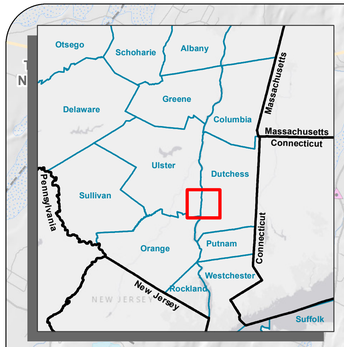
majority of these facilities are gas stations, fuel suppliers, and industrial or mining facilities. Within the Town of Poughkeepsie, there are 126 petroleum bulk storage sites.

Examining the Regulated Facilities and Industrial Land Use map in relation to other maps of the Natural Resources Inventory can provide insight into the types of regulated and industrial activities occurring in Town and their locations relative to natural resources and other significant features. More information about facilities regulated under DEC permits is available online through the DECinfo Locator tool.[46]

A full list of Regulated Facilities is included within Appendix A.

Photo Credit: MJ

[46] DECinfo Locator https://www.dec.ny.gov/pubs/109457.html



TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Brownfields, Waste Sites & Regulated Facilities

April 2021

LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- SPDES Permit Sites
- Chemical Bulk Storage Facility
- Major Oil Storage Facility
- Petroleum Bulk Storage Facility
- Industrial Sites
- Waste Sites
- Critical Environmental Areas

Remediation Sites

- Brownfield Cleanup Program
- Environmental Restoration Program*
- Resource Conservation and Recovery
- State Superfund Program
- Voluntary Cleanup Program

*None present within the Town

Sources:
Esri, NYS ITS, Dutchess County, Town of Poughkeepsie, NYSDEC, Hudsonia

N

0 0.5 1 Mile

Engineering and Land Surveying, P.C.
1533 Crescent Road - Clifton Park, NY 12065

SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

6.4 Cultural and Historic Sites

Cultural and Historic Resources Map

Historic Sites refers to the location of resources of historic and archaeological significance within the Town. This includes individual properties and historic districts that are listed in the New York State and/or National Registers of Historic Places and areas of Archaeological sensitivity. Table 6 – 3 identifies the 17 State Historic Preservation Office (SHPO) historic sites and Table 6 – 4 identifies the addresses of locally designated historic sites in the Town of Poughkeepsie.

Indigenous Americans have lived in the Hudson River Valley for over 10,000 years. The Hudson River Valley has always been a source of fresh water and natural resources for survival and sustainability. Those who called this area home were the Wappinger, part of the Lenape (or "People"). The Wappinger (meaning "Easterner") spoke a dialect of Eastern Algonquin and were hunters, gatherers, and farmers. Starting at what is now Maple Grove Estate and running through the Poughkeepsie Rural Cemetery is a small non-navigable creek known as the U-puku-ipi-sing, "little reed house by the water" or "meeting place," which feeds into the Hudson River. The Wappinger camped, traded, and negotiated at this site and it is believed that this is where Poughkeepsie (U-puku-ipi-sing) gets its name.

The Dutch were the first Europeans to settle in the area once Henry Hudson explored the river. They set up fur trading posts along its banks from New Amsterdam to Fort Orange, obtaining beaver pelts from indigenous Americans for the European felt industry. On October 24, 1686, the Wappinger deeded land to Robert Sanders and Myndert Harmans Van Den Bogaerdt, who, in turn, conveyed the tract to Baltus Van Kleeck and Poughkeepsie was established. The settlement gradually grew. In 1740, a ferry was created that encouraged commerce and economic growth. It ran from Barnegat (IBM Road today), to south of Milton, transporting passengers and lime from the kilns at Barnegat across the Hudson River.

During the Revolutionary War, Poughkeepsie was spared from battle, and it became the second capital of New York.[47] After the Revolutionary War, Arlington, New Hamburg, Channingville, and Rochdale were centers of commerce that included farming, whaling, lumber, brick making, shipping, cattle raising, telegraph communication, and steamship and railroad transportation.

That commerce brought Irish, Italians, Polish, Germans and other European immigrants to the area to fill these newly created jobs. The Township of Poughkeepsie was established on March 7, 1788. Due to organizational disagreements with the town, part of the western section of the town, already an independent village, became the City of Poughkeepsie on March 28, 1854. New industries and jobs developed during the 19th century as the town grew during the Industrial Revolution. Poughkeepsie has grown ever since and has become the successful, diverse town it is today.

[47] Town of Poughkeepsie 2030 Comprehensive Plan Update

Table 6 – 4 SHPO Historic Sites Within the Town of Poughkeepsie	
NAME	ADDRESS
1871 Hudson River State Hospital, Main Building	US 9
1865 Rosenlund Gothic-style Estate House	North Road (Marist College)
1850 Samuel F. B. Morse - Locust Grove	370 South Street
1865 Main Building, Vassar College	Vassar College campus
1875 Bain Residence & Commercial Building	59-61 W. Main Street, Wappingers Falls
1845, Adolph Brower Greek Revival House	1 Water Street, New Hamburg
1845 Abraham Brower Greek Revival House	2 Water Street, New Hamburg
1878 Union Free Schoolhouse No. 4	2 Academy Street, New Hamburg
1903 Zion Episcopal Memorial Chapel	37 Point Street, New Hamburg
1870 William Shay Gothic-style House	18 Point Street, New Hamburg
1870 Shay's Warehouse and Stable	Rear of 32 Point Street, New Hamburg
1865 Vassar College Observatory	Vassar College Campus
1850 Maple Grove Gothic-style Residence	301 South Road (US 9)
1880 Kimlin Cider Mill	140 Cedar Avenue
1951-52 McComb, Peter and Karen House Modern Home Designed by Marcel Breuer	27 Hornbeck Ridge
1938 Violet Avenue Elementary School	191 Violet Avenue
1865 Lewis Dubois Plantation House	6 Greenvale Farms Road

Table 6 – 5 Local Historic Sites- Provided by Town	
NAME	ADDRESS
1744 Westervelt Stone House	202 Spackenkill Road
1840 Common One Room Schoolhouse	925 Dutchess Turnpike
1850 Parrish-Overocker House	110 Overocker Road
1830 Downing Federal Greek Revival House	1209 Dutchess Turnpike
1840 Common One Room Schoolhouse	179 Delavergne Avenue
1760 Johannes Abraham Fort Stone House	2228 South Road
U-puku-ipi-sing Creek Site	600 Spring Manor Circle
Johannes Abraham Fort Family Cemetery	1 South Gate Drive (behind)
1938 Juliet Theatre Neon Sign	60 Raymond Avenue
1800 Mill Hallow	2092 New Hackensack Road
1835 Tangletop Gothic-style House	68 Channingville Road, Wappingers Falls
1880 Kimlin Cider Mill	140 Cedar Avenue
1865 Lewis DuBois Plantation House	6 Greenvale Farms Road
1750 Kimlin Cider Mill House	141 Cedar Avenue

1951-52 Peter & Karen McComb Modern Designed by Marcel Breuer	27 Hornbeck Ridge
1938 Violet Avenue Elementary School	191 Violet Avenue
1870 Brower Greek Revival Worker's House	5 Conklin Street, New Hamburg
1860 Victorian House	15 Conklin Street, New Hamburg
1860 Gothic Revival & Italianate House	19 Conklin Street, New Hamburg
Sources: Town of Poughkeepsie, Dutchess County, New York Reconnaissance-Level Historic Resource Survey Update, Larson Fisher Associates; The Importance of Hudson River Tributaries to Native Americans, July 19, 2010, Casperkill Watershed Oral History Project; Historical Sketch of Poughkeepsie Township, Edwin H. Rozell & Harold Dickerson (1949)	

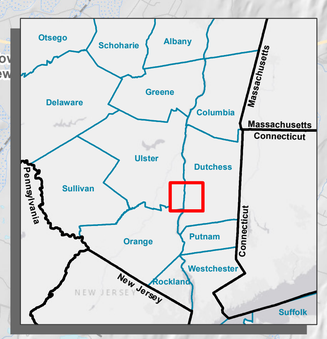
Hudson River waterfront area in the Hamlet of New Hamburg. Photo Credit: Jeffrey Anzevino

TOWN OF POUGHKEEPSIE

Natural Resources Inventory & Open Space Plan

Cultural & Historic Sites

April 2021



LEGEND

- Town of Poughkeepsie
- County Boundary
- City/Town Boundary
- Village Boundary
- Railroad
- US Routes
- State Routes
- County Routes
- Local Roads
- Dutchess County Rail Trail
- Perennial Streams
- Intermittent Streams
- NYSDEC Wetland
- Open Water
- Town Hall
- Colleges
- Schools
- Local Historic Site
- National Register Site
- National Register Historic District
- Cemeteries
- Native American Sites*

*Generalized site locations (not exact)

Sources:
Esri, NYS ITS, Dutchess County, NYSDEC, Hudsonia, Town of Poughkeepsie, NYSOPRHP

Engineering and Land Surveying, P.C.
1533 Crescent Road - Clifton Park, NY 12065

SHUMAKER
Consulting Engineering & Land Surveying, D.P.C.

N

0 0.5 1 Mile

7.0 CONCLUSION

Municipal planning is intended to protect the health, safety, and welfare of community residents. This cannot be achieved without information on the natural resources that deliver benefits like clean air and water, create opportunities such as agriculture and outdoor recreation, provide habitat for wildlife, and build climate change and economic resiliency in growing communities. Municipalities are encouraged to create a natural resources inventory, update it regularly, and use it to identify community priorities and inform land-use decisions. The foundation of information contained in an NRI can be a springboard for plans and policies that are designed to conserve important natural resources, and an insurance policy that protects the community's natural assets for current residents and future generations.

REFERENCES

New York State Department of Environmental Conservation. *Natural Areas and Wildlife in Your Community: A Habitat Summary Prepared for Poughkeepsie, NY*. (New York: NYSDEC Hudson River Estuary Program, 2019).

Tabak, Nava & Stevens, Gretchen. *Significant Habitats in the Town of Poughkeepsie, Dutchess County, New York*. (New York: Hudsonia, Ltd., 2008).

APPENDICES

Appendix A: Regulated Facilities List

Appendix B: Resolution of Adoption and Full Environmental Assessment Form

APPENDIX A: REGULATED FACILITIES

SPDES Sites

DISTRICT NAME	PERMITEE NAME	LOCATION DIRECTIONS
AW MACK MANUFACTURING CO INC	AW MACK MANUFACTURING CO INC	1098 DUTCHESS TPKE
IBM CORP COUNTRY CLUB	INTERNATIONAL BUSINESS MACHINES CORPORATION	SOUTH RD
PAGE INDUSTRIAL PARK	PAGE FIVE LLC	RT 55
APARTMENT BUILDING	NEMICKAS*JURGIS	497 STANTON TER
ADAMS FAIRACRE FARM INC	ADAMS FAIRACRE FARMS INC	765 DUTCHESS TPKE (US RTE 44)
TILCON - CLINTON POINT QUARRY	TILCON NEW YORK INC	SHEAFE RD
POUGHKEEPSIE CORP CENTER	POUGHKEEPSIE BUSINESS PARK LLC	350 DUTCHESS TPKE
NEW HAMBURG TERMINAL	NEW HAMBURG TERMINAL CORP	17 POINT ST
ASHBY FUEL OIL	TNP LLC	35 PECKHAM RD
POUGHKEEPSIE STP	POUGHKEEPSIE, CITY OF	173 KITTREDGE PL
RACQUET CLUB APTS	RCA REALTY MANAGEMENT	375 SALT POINT TURNPIKE
ROUTE 9D MINI MART	9D MINI MART INC	2327 ST RTE 9D
STRATFORD FARMS	STRATFORD FARMS SEWER CORP	BOWER RD
IBM CORP SOUTH RD FACILITY	INTERNATIONAL BUSINESS MACHINES CORPORATION	2455 SOUTH RD
POUGHKEEPSIE (T) ARLINGTON WWTP	POUGHKEEPSIE, TOWN OF	78 SAND DOCK RD
TRI-MUNICIPAL WWTP	TRI-MUNICIPAL SEWER COMMISSION	171 SHEAFE RD
MANOR HILL MOBILE HOME PARK	MANOR HILL MOBILE HOME PARK LLC	179 VAN WAGNER RD
PRESTIGE AUTOBODY	ROBS PRESTIGE AUTO BODY INC	729 DUTCHESS TPKE
ARLINGTON FIRE STATION	ARLINGTON FIRE DISTRICT	VASSER RD
GIBSON'S RESTAURANT	J CROTONE PROPERTIES INC	11 VASSAR RD
PIRATE CANOE CLUB	PIRATE CANOE CLUB INC	WEST OF RT 9/RIVERCREST APT RD

Bulk Storage Sites

Name	Type
3-000008 - ARLINGTON TREATMENT PLANT	Chemical Bulk Storage
3-000111 - IBM CORPORATION	Chemical Bulk Storage
3-000126 - POUGHKEEPSIE WTP	Chemical Bulk Storage
3-000129 - DUTCHESS COUNTY RESOURCE RECOVERY FACILITY	Chemical Bulk Storage
3-000244 - HUDSON RIVER PUMPING STATION	Chemical Bulk Storage
3-000279 - CITY OF POUGHKEEPSIE WATER POLLUTION CONTROL PLANT	Chemical Bulk Storage
3-000312 - GRUBB and ELLIS MNGT SERVICES, INC.	Chemical Bulk Storage
3-000327 - TRI-MUNICIPAL WASTEWATER TREATMENT PLANT	Chemical Bulk Storage
3-000445 - CENTRAL DUTCHESS PUMPING STATION	Chemical Bulk Storage
3-000453 - CITY OF POUGHKEEPSIE WATER POLL CONTROL PLANT	Chemical Bulk Storage
3-000496 - ARLINGTON WASTEWATER TREATMENT PLANT	Chemical Bulk Storage
3-003506 - COLLEGE CENTER (CAMPUS DELI)	Petroleum Bulk Storage
3-004286 - CULLIGAN DUTCHESS-PUTNAM	Petroleum Bulk Storage
3-005770 - DUTCHESS COUNTY RESOURCE RECOV	Petroleum Bulk Storage
3-005916 - FARGO MFG COMPANY INC	Petroleum Bulk Storage
3-008354 - CONSOLIDATED FREIGHTWAYS	Petroleum Bulk Storage
3-016381 - BRIDGE CITY DISTRIBUTORS	Petroleum Bulk Storage
3-016470 - SATURN OF POUGHKEEPSIE	Petroleum Bulk Storage
3-016799 - MACK TRUCK DEALERSHIP	Petroleum Bulk Storage
3-016837 - MID HUDSON REGIONAL HOSPITAL OF WESTCHESTER MEDICA	Petroleum Bulk Storage
3-018627 - OAK GROVE ELEMENTARY SCHOOL	Petroleum Bulk Storage
3-018635 - SHEAFE RD SCHOOL	Petroleum Bulk Storage
3-018651 - KINRY ROAD ELEMENTARY SCHOOL	Petroleum Bulk Storage
3-019488 - BEECHWOOD SOUTH CONDOMINIUMS	Petroleum Bulk Storage
3-024945 - JIM WATERS CORP	Petroleum Bulk Storage
3-025259 - MARIST - BLOCKSOM PROPERTY	Petroleum Bulk Storage
3-025364 - KEM PLASTIC PLAYING CARDS, INC	Petroleum Bulk Storage
3-026360 - U-HAUL OF POUGHKEEPSIE	Petroleum Bulk Storage
3-029564 - SUPERIOR WALLS OF THE HUDSON VALLEY	Petroleum Bulk Storage
3-029815 - ARLINGTON TREATMENT PLANT	Petroleum Bulk Storage
3-034096 - WATER POLLUTION CONTROL PLANT	Petroleum Bulk Storage
3-037273 - VIRK CONVENIENT MART, INC.	Petroleum Bulk Storage
3-037281 - JYOTI INC. CITGO MART	Petroleum Bulk Storage
3-047953 - MOBIL	Petroleum Bulk Storage
3-047961 - MOBIL	Petroleum Bulk Storage
3-047996 - MOBIL	Petroleum Bulk Storage
3-068683 - VIOLET AVE ELEMENTARY	Petroleum Bulk Storage
3-074144 - MARIST COLLEGE	Petroleum Bulk Storage
3-074179 - ST MARTIN DE PORRES SCHOOL	Petroleum Bulk Storage
3-078964 - INNIS AVENUE KWIK MART, INC.	Petroleum Bulk Storage
3-104914 - HUDSON RIVER PSYCHIATRIC CENTER	Petroleum Bulk Storage
3-105007 - NETPUB	Petroleum Bulk Storage
3-1180 - IBM CORPORATION	Major Oil Storage
3-1220 - NEW HAMBURG TERMINAL CORP.	Major Oil Storage

3-122386 - TILCON NEW YORK, INC. POUGHKEEPSIE ASPHALT	Petroleum Bulk Storage
3-122408 - MID HUDSON BUSINESS PARK	Petroleum Bulk Storage
3-122548 - SPACKENKILL HIGH SCHOOL	Petroleum Bulk Storage
3-122556 - ORVILLE A TODD JR HIGH SCHOOL	Petroleum Bulk Storage
3-122564 - MARTHA W. LAWRENCE SCHOOL	Petroleum Bulk Storage
3-122572 - NASSAU SPACKENKILL ELEMEMENTARY SCHOOL	Petroleum Bulk Storage
3-122580 - HAGAN ELEMENTARY SCHOOL	Petroleum Bulk Storage
3-123471 - J C PAPER CO INC	Petroleum Bulk Storage
3-138525 - POUGHKEEPSIE WATER TREATMENT FACILITY	Petroleum Bulk Storage
3-138568 - BOARDMAN ROAD COMPLEX	Petroleum Bulk Storage
3-138959 - TRI-MUNICIPAL WASTE WATER TREATMENT PLANT	Petroleum Bulk Storage
3-164011 - ROUTE 44 VALERO	Petroleum Bulk Storage
3-164267 - VALVOLINE INSTANT OIL CHANGE	Petroleum Bulk Storage
3-165859 - ST MARYS CONVENT	Petroleum Bulk Storage
3-166316 - FRIENDLY HONDA HOUSE	Petroleum Bulk Storage
3-166901 - TAFT LANES,INC.	Petroleum Bulk Storage
3-168394 - STOFAS TEXACO	Petroleum Bulk Storage
3-168866 - ROUTE 44 MART	Petroleum Bulk Storage
3-170259 - LAWRENCE F. SHEEHAN ENT. INC.	Petroleum Bulk Storage
3-171786 - WAPPINGERS RT 9D	Petroleum Bulk Storage
3-172219 - SALS AUTO SERVICE	Petroleum Bulk Storage
3-173525 - TONY'S GARAGE	Petroleum Bulk Storage
3-174114 - SPEEDWAY # 7598	Petroleum Bulk Storage
3-175064 - SOUTH ROAD SUNOCO	Petroleum Bulk Storage
3-175161 - GETTY 58731	Petroleum Bulk Storage
3-175226 - POWERTEST 00166	Petroleum Bulk Storage
3-175234 - GETTY #157	Petroleum Bulk Storage
3-175838 - VASSAR COLLEGE	Petroleum Bulk Storage
3-176028 - M and N MANUFACTURING	Petroleum Bulk Storage
3-176141 - FIRST STUDENT, INC. #11541/12370	Petroleum Bulk Storage
3-176257 - THOMAS GLEASON INC.	Petroleum Bulk Storage
3-176273 - ARTHUR MAY REDEVELOPMENT LLC	Petroleum Bulk Storage
3-176362 - ARLINGTON MIDDLE SCHOOL	Petroleum Bulk Storage
3-176370 - ARLINGTON BUS/ARTHUR S. MAY	Petroleum Bulk Storage
3-177709 - ELEANOR ROOSEVELT STATE OFFICE BUILDING	Petroleum Bulk Storage
3-178438 - AVIS RENT A CAR SYSTEM, INC.	Petroleum Bulk Storage
3-178705 - COUNTY HIGHWAY DEPT	Petroleum Bulk Storage
3-178802 - BOWDOIN PARK	Petroleum Bulk Storage
3-179663 - AT and T POUGHKEEPSIE, NEW YORK NY 0203	Petroleum Bulk Storage
3-180122 - TNP LLC	Petroleum Bulk Storage
3-183490 - HOLY TRINITY CHURCH	Petroleum Bulk Storage
3-184020 - VERIZON NEW YORK INC-NY-99228	Petroleum Bulk Storage
3-184047 - Verizon New York Inc-NY-99504	Petroleum Bulk Storage
3-408700 - THORNTONS SERVICE STATION INC	Petroleum Bulk Storage
3-409405 - NYSDOT	Petroleum Bulk Storage
3-409413 - NYSDOT	Petroleum Bulk Storage
3-410136 - HERTZ RENT A CAR (7930-15)	Petroleum Bulk Storage

3-410705 - VASSAR RD. SNACK SHOP INC.	Petroleum Bulk Storage
3-410772 - THE CHILDRENS HOME OF POUGHKEEPSIE	Petroleum Bulk Storage
3-411205 - GREAT EASTERN COLOR	Petroleum Bulk Storage
3-411280 - VIC'S GARAGE, INC.	Petroleum Bulk Storage
3-411396 - DUTCHESS COMMUNITY COLLEGE	Petroleum Bulk Storage
3-412112 - LOVE and RICHARDS OIL TERMINAL	Petroleum Bulk Storage
3-413879 - ENVOY PLAZA	Petroleum Bulk Storage
3-413909 - KARL'S SERVICE CENTER	Petroleum Bulk Storage
3-414085 - T/POUGHKEEPSIE WATER DEPT.	Petroleum Bulk Storage
3-437743 - HARVEY RUSSELL and SONS INC.	Petroleum Bulk Storage
3-440698 - ARLINGTON FIRE DIST. STATION 3	Petroleum Bulk Storage
3-448117 - ARNOFF MOVING and STORAGE, INC.	Petroleum Bulk Storage
3-448206 - MID-HUDSON CONTRACTORS SUPPLY	Petroleum Bulk Storage
3-448222 - TOWN OF POUGHKEEPSIE	Petroleum Bulk Storage
3-449814 - ROE MOVERS	Petroleum Bulk Storage
3-457817 - ARLINGTON FIRE DISTRICT HEADQUARTERS	Petroleum Bulk Storage
3-487104 - POUGHKEEPSIE BUS. PARK LLC	Petroleum Bulk Storage
3-496804 - DUPONT SEMICONDUCTOR PROD.INC.	Petroleum Bulk Storage
3-502243 - FORMER AVELLO PAVING	Petroleum Bulk Storage
3-502340 - DUTCHESS GOLF and COUNTRY CLUB	Petroleum Bulk Storage
3-504475 - STEWART'S SHOPS #306	Petroleum Bulk Storage
3-505064 - CONVENIENT FOOD MART,DAIRY MRT	Petroleum Bulk Storage
3-506931 - RIDGEFIELD APTS.	Petroleum Bulk Storage
3-506974 - DEVILS HOLE, INC.	Petroleum Bulk Storage
3-507245 - BOTTINI FUEL CORP.	Petroleum Bulk Storage
3-600050 - MANCHESTER GARDENS	Petroleum Bulk Storage
3-600083 - DUTCHESS APARTMENTS	Petroleum Bulk Storage
3-600101 - VASSAR REALTY PARTNERS LLC	Petroleum Bulk Storage
3-600149 - HUDSON RIVER HOUSING, INC.	Petroleum Bulk Storage
3-600257 - 191 DELAFIELD LLC	Petroleum Bulk Storage
3-600274 - SEARS DEPARTMENT STORE	Petroleum Bulk Storage
3-600280 - BRIGGS PAVING, INC.	Petroleum Bulk Storage
3-600380 - TACONIC TRANSMISSIONS	Petroleum Bulk Storage
3-600403 - AMERICA'S BEST INN/DAYS INN	Petroleum Bulk Storage
3-600475 - STEWART'S SHOPS #302	Petroleum Bulk Storage
3-600502 - POST ROAD PLAZA	Petroleum Bulk Storage
3-600511 - K. and D. DELI	Petroleum Bulk Storage
3-600592 - POUGHKEEPSIE SHELL	Petroleum Bulk Storage
3-600687 - DUTCHESS OVERHEAD DOORS, INC.	Petroleum Bulk Storage
3-600709 - POUGHKEEPSIE CHEVROLET	Petroleum Bulk Storage
3-600712 - AUTOMATIC SYSTEMS DEVELOPERS	Petroleum Bulk Storage
3-600728 - SOUTH HILLS MALL	Petroleum Bulk Storage
3-600952 - POUGHKEEPSIE DAY SCHOL	Petroleum Bulk Storage
3-600955 - POUGHKEEPSIE DAY SCHOOL	Petroleum Bulk Storage
3-601025 - FIRESTONE COMPLETE AUTO CARE # 021679	Petroleum Bulk Storage
3-601204 - VALVOLINE INSTANT OIL CHANGE	Petroleum Bulk Storage
3-601242 - FOAM and WASH EXPRESS	Petroleum Bulk Storage

3-601268 - STEWART'S SHOPS #387	Petroleum Bulk Storage
3-601323 - YOUNG-MORRIS HISTORIC SITE	Petroleum Bulk Storage
3-601401 - MCCOLLISTER'S MOVING and STORAGE, INC.	Petroleum Bulk Storage
3-601404 - STEWART'S SHOPS #357	Petroleum Bulk Storage
3-601455 - NYSDOT EQUIPMENT MANAGEMENT	Petroleum Bulk Storage
3-601518 - MOBIL R/S #19200	Petroleum Bulk Storage
3-601536 - OIL CHANGE EXPRESS	Petroleum Bulk Storage
3-601538 - STOP and SHOP #540 FUELING FACILITY	Petroleum Bulk Storage
3-601555 - VASSAR COLLEGE	Petroleum Bulk Storage
3-601556 - IBM 730 BOILER BUILDING	Petroleum Bulk Storage
3-601563 - AALCO AUTO PARTS	Petroleum Bulk Storage
3-601572 - DUTCHESS CHRYSLER JEEP DODGE	Petroleum Bulk Storage
3-601573 - SHAH GASOLINE, INC.	Petroleum Bulk Storage
3-601597 - 716 ROUTE 211 WEST, LTD	Petroleum Bulk Storage
3-601602 - IBM CORPORATION	Petroleum Bulk Storage
3-601639 - ECONOLODGE	Petroleum Bulk Storage
3-601653 - DELKING PROPERTIES LLC	Petroleum Bulk Storage
3-601663 - FREEMAN RESIDENCE	Petroleum Bulk Storage
3-601672 - DC MENTAL HYGIENE	Petroleum Bulk Storage
3-601737 - CASPERKILL GOLF CLUB	Petroleum Bulk Storage
3-601742 - GIUSEPPE CARUSO	Petroleum Bulk Storage
3-601784 - MARKET PROPERTIES	Petroleum Bulk Storage
3-601798 - MARK ADAMS GREENHOUSE, INC.	Petroleum Bulk Storage
3-601848 - NEW HAMBURG FIRE DISTRICT	Petroleum Bulk Storage
3-601855 - VIKING MTG PROPERTIES, LLC	Petroleum Bulk Storage
3-601918 - NEW YORK COMMUNICATIONS CO., INC.	Petroleum Bulk Storage
3-601988 - LOWE'S OF POUGHKEEPSIE, #0541	Petroleum Bulk Storage
3-602053 - DURHAM SCHOOL SERVICES	Petroleum Bulk Storage
3-602134 - TOWN OF POUGHKEEPSIE	Petroleum Bulk Storage
3-602150 - MAVIS DISCOUNT TIRE #12	Petroleum Bulk Storage
3-602151 - CIRCLEVIEW PROPERTIES	Petroleum Bulk Storage
3-602227 - POUGHKEEPSIE WATER TREATMENT FACILITY	Petroleum Bulk Storage

Remediation Sites

SITENAME	PROGRAM	ADDRESS
Schatz Plant	State Superfund Program	70 FAIRVIEW AVENUE
Nine Mall Plaza	Voluntary Cleanup Program	1810 - 1840 Route 9
Page Industrial Park (Tau Industries)	State Superfund Program	ROUTE 55
IBM B952/982	State Superfund Program	Neptune Road
B906 - Page Industrial Area	State Superfund Program	275 Manchester Road (Route 55)
OFF-SITE Former A.C. Dutton Lumber Yard	Brownfield Cleanup Program	1 Dutchess Avenue
Wappinger Creek	State Superfund Program	Wappinger Creek
Former Drive & Park Inc. Site	Brownfield Cleanup Program	28 IBM Road
Nine Mall Plaza	Brownfield Cleanup Program	1810 - 1840 Route 9
Hudson River Psychiatric Center - South Area	Brownfield Cleanup Program	3532 North Rd
Hudson River Psychiatric Center - North Area	Brownfield Cleanup Program	3532 North Rd
A.C. Dutton Greenway North Town	Brownfield Cleanup Program	1 Dutchess Avenue
Poughkeepsie Rifle Range	State Superfund Program	Titusville Road
Alpha - Laval	Resource Conservation and Recovery	900 Dutchess Tpke (formerly 350 Dutchess Tpke)
Former A.C. Dutton Lumber Yard	Brownfield Cleanup Program	1 Dutchess Avenue
Hudson River PCB Sediments	State Superfund Program	Hudson River, Hudson Falls-NYC Battery
Former Duso Chemical	State Superfund Program	33 Fulton Street
Love Road Development Site	Brownfield Cleanup Program	20-50 Love Road
IBM Country Club	Resource Conservation and Recovery	Route 9
Arborio Construction	State Superfund Program	35 West Cedar Street
Hudson River Psychiatric Center - Landfill Area 6	Voluntary Cleanup Program	NYS Route 9
Dutchess Sanitation (FICA)	State Superfund Program	275 Van Wagner Road
Fargo Manufacturing	State Superfund Program	130 Salt Point Turnpike
Great Eastern Lithographic Co.	State Superfund Program	46 Violet Avenue
IBM - Poughkeepsie	State Superfund Program	South Road
Harris Corporation	State Superfund Program	Mid-Hudson Industrial Park & 70A Overocker Road
Hudson River Psych. Center (HRPC)	State Superfund Program	North Road
Schatz Federal Bearings	State Superfund Program	223-47 Van Wagner Road

APPENDIX B: RESOLUTION OF ADOPTION AND FULL ENVIRONMENTAL ASSESSMENT FORM

RESOLUTION 4:12 - # 7 OF 2023

WHEREAS, the Town Board of the Town of Poughkeepsie adopted the Comprehensive Plan Update on October 6, 2021, and a priority implementation action in the Comprehensive Plan Update was to complete a town-wide Natural Resource Inventory (NRI) and Open Space Plan, and

WHEREAS, the Town received grant funding in 2020 through the DEC's Hudson River Estuary Program for the preparation of a Natural Resources Inventory (NRI) and Open Space Plan; and

WHEREAS, by Resolution 11:18 - #3A of 2020, the Town Board authorized the hiring of MJ Engineering and Land Surveying as the Town's planning consultant for preparation of the NRI and Open Space Plan; and

WHEREAS, by Resolution 11:18 - #3B of 2020, the Town Board appointed a temporary "Steering Committee" consisting of the membership of the Town's Conservation Advisory Commission (CAC), plus a member of the Town Board and a member of the Planning Board; and

WHEREAS, the NRI/Open Space Plan Steering Committee along with town staff and consultants held three public workshops, convened several stakeholder meetings, and conducted a community survey which received over 600 responses, while preparing the NRI and Open Space Plan; and

WHEREAS, the NRI/Open Space Plan Steering Committee along with town staff and consultants completed a draft version of the NRI and Open Space Plan in December 2022 and presented the documents (2 volumes) to the Town Board at a Committee of the

Whole on February 8, 2023, and the documents were made available for review on the project website and town website immediately following this presentation; and

WHEREAS, no additional comments have been received;

NOW THEREFORE BE IT RESOLVED THAT, because it is the only Involved Agency, the Town Board hereby declares that it is the Lead Agency for purposes of the environmental review of this matter pursuant to Article 8 of the Environmental Conservation Law; and

BE IT FURTHER RESOLVED THAT, the Town Board, as Lead Agency, notes that adoption of the NRI and Open Space Plan is a Type 1 Action under the New York State Environmental Quality Review Act; and

BE IT FURTHER RESOLVED THAT, that the Town Board has reviewed the Long Environmental Assessment Form (EAF) prepared by the Director of Municipal Development and hereby determines that: 1) adoption of the NRI and Open Space Plan would not have a significant adverse effect on the environment and; 2) the Supervisor is authorized to execute Parts 2 and 3 of the EAF as drafted and; 3) a draft environmental impact statement will not be required and; 4) a Negative Declaration is hereby issued; and

BE IT FURTHER RESOLVED THAT, the Town Board hereby adopts the NRI and Open Space Plan, a copy of which can be found on the Town's website at https://www.townofpoughkeepsieopenspace.com/documents, and directs that it be used as a policy guide by the Town Board, Planning Board, CAC, staff and the public in evaluating the effects of proposed land-use and zoning changes, for informing the

environmental review of development proposals, and for identifying land conservation and stewardship opportunities in the Town of Poughkeepsie; and

BE IT FURTHER RESOLVED THAT, the Town Board thanks the NRI/Open Space Plan Steering Committee, the DEC's Hudson River Estuary Program, town staff, consultants, and the many members of the community who provided input and contributed to the preparation of this important document over the last three years.

Dated: April 12, 2023

Moved: Jon Jay Baisley

Seconded: Stephan Krakower

Motion passes/ fails: Ayes 6 Nays 0

JEN/mem
t-4/3/2023
m-4/12/2023

		AYE	NAY	ABSTAIN
PRESENT/ABSENT	Councilman Renihan	absent		
PRESENT/ABSENT	Councilman Carlos	✓		
PRESENT/ABSENT	Councilwoman Burger	✓		
PRESENT/ABSENT	Councilman Cifone	✓		
PRESENT/ABSENT	Councilman Krakower	✓		
PRESENT/ABSENT	Councilwoman Shershin	✓		
PRESENT/ABSENT	Supervisor Baisley	✓		

Full Environmental Assessment Form
Part 1 - Project and Setting

Instructions for Completing Part 1

Part 1 is to be completed by the applicant or project sponsor. Responses become part of the application for approval or funding, are subject to public review, and may be subject to further verification.

Complete Part 1 based on information currently available. If additional research or investigation would be needed to fully respond to any item, please answer as thoroughly as possible based on current information; indicate whether missing information does not exist, or is not reasonably available to the sponsor; and, when possible, generally describe work or studies which would be necessary to update or fully develop that information.

Applicants/sponsors must complete all items in Sections A & B. In Sections C, D & E, most items contain an initial question that must be answered either "Yes" or "No". If the answer to the initial question is "Yes", complete the sub-questions that follow. If the answer to the initial question is "No", proceed to the next question. Section F allows the project sponsor to identify and attach any additional information. Section G requires the name and signature of the applicant or project sponsor to verify that the information contained in Part 1is accurate and complete.

A. Project and Applicant/Sponsor Information.

Name of Action or Project: Adoption of the Town of Poughkeepsie Natural Resource Inventory (NRI) and Open Space Plan		
Project Location (describe, and attach a general location map): Town of Poughkeepsie, New York		
Brief Description of Proposed Action (include purpose or need): The Town of Poughkeepsie Natural Resource Inventory (NRI) and Open Space Plan was prepared by the NRI/Open Space Plan Steering Committee appointed by the Town Board, along with town staff and consultants. Funding and technical assistance was provided by the NYSDEC's Hudson River Estuary Program. Development of the plan included three public workshops, several stakeholder meetings, and a community survey which received over 600 responses. A final draft of the NRI and Open Space Plan (2 documents) was completed in December 2022 and formally presented to the Town Board on February 8, 2023. The purpose of the Natural Resource Inventory (NRI) is to compile and describe important, naturally occurring resources within the Town. Cultural resources, such as historic, scenic, and recreational, are included as well. The NRI is comprised of a series of 23 maps as well as an accompanying report with narrative descriptions, supporting data tables, and recommendations. The Open Space Plan establishes a vision for a Town-wide network of open spaces, working landscapes and natural habitats. The plan is a policy document that will enable the Town to identify priorities for natural resource protection and to explore, and ultimately select, community-supported tools and techniques for conserving these resources.		
Name of Applicant/Sponsor: Town of Poughkeepsie Town Board	Telephone: (845) 485-3600 E-Mail: jbaisley@townofpoughkeepsie-ny.gov	
Address: 1 Overocker Road		
City/PO: Poughkeepsie	State: New York	Zip Code: 12603
Project Contact (if not same as sponsor; give name and title/role): Michael Welti, AICP - Director of Municipal Development - Town of Poughkeepsie	Telephone: (845) 485-3657 E-Mail: mwelti@townofpoughkeepsie-ny.gov	
Address: 1 Overocker Road		
City/PO: Poughkeepsie	State: NY	Zip Code: 12603
Property Owner (if not same as sponsor): N/A	Telephone: N/A E-Mail: N/A	
Address: N/A		
City/PO: N/A	State: N/A	Zip Code: N/A

B. Government Approvals

B. Government Approvals, Funding, or Sponsorship. ("Funding" includes grants, loans, tax relief, and any other forms of financial assistance.)

Government Entity	If Yes: Identify Agency and Approval(s) Required	Application Date (Actual or projected)
a. City Counsel, Town Board, or Village Board of Trustees ☑Yes ☐No	Town Board - Adoption of the NRI and Open Space Plan	Proposed April 2023
b. City, Town or Village Planning Board or Commission ☐Yes ☑No		
c. City, Town or Village Zoning Board of Appeals ☐Yes ☑No		
d. Other local agencies ☐Yes ☑No		
e. County agencies ☐Yes ☑No		
f. Regional agencies ☐Yes ☑No		
g. State agencies ☐Yes ☑No		
h. Federal agencies ☐Yes ☑No		

i. Coastal Resources.
i. Is the project site within a Coastal Area, or the waterfront area of a Designated Inland Waterway? ☑Yes ☐No

ii. Is the project site located in a community with an approved Local Waterfront Revitalization Program? ☑Yes ☐No

iii. Is the project site within a Coastal Erosion Hazard Area? ☐Yes ☑No

C. Planning and Zoning

C.1. Planning and zoning actions.

Will administrative or legislative adoption, or amendment of a plan, local law, ordinance, rule or regulation be the only approval(s) which must be granted to enable the proposed action to proceed? ☑Yes ☐No

- **If Yes,** complete sections C, F and G.
- **If No,** proceed to question C.2 and complete all remaining sections and questions in Part 1

C.2. Adopted land use plans.

a. Do any municipally- adopted (city, town, village or county) comprehensive land use plan(s) include the site where the proposed action would be located? ☑Yes ☐No

If Yes, does the comprehensive plan include specific recommendations for the site where the proposed action would be located? ☑Yes ☐No

b. Is the site of the proposed action within any local or regional special planning district (for example: Greenway; Brownfield Opportunity Area (BOA); designated State or Federal heritage area; watershed management plan; or other?) ☑Yes ☐No

If Yes, identify the plan(s):

The Town of Poughkeepsie is a Hudson River Valley Greenway Compact Community and is within the Hudson River Valley National Heritage Area.

c. Is the proposed action located wholly or partially within an area listed in an adopted municipal open space plan, or an adopted municipal farmland protection plan? ☑Yes ☐No

If Yes, identify the plan(s):

The proposed action is the adoption of a municipal Natural Resource Inventory (NRI) and Open Space Plan.

C.3. Zoning

a. Is the site of the proposed action located in a municipality with an adopted zoning law or ordinance. ☑ Yes ☐ No
If Yes, what is the zoning classification(s) including any applicable overlay district?
All parts of the Town and, therefore, all zoning districts are covered by the Natural Resource Inventory (NRI) and Open Space Plan.

b. Is the use permitted or allowed by a special or conditional use permit? ☐ Yes ☑ No

c. Is a zoning change requested as part of the proposed action? ☐ Yes ☑ No
If Yes,
i. What is the proposed new zoning for the site? _____

C.4. Existing community services.

a. In what school district is the project site located? Arlington CSD, Wappingers CSD, Spackenkill CSD, and Hyde Park CSD

b. What police or other public protection forces serve the project site?
Town of Poughkeepsie Police Department

c. Which fire protection and emergency medical services serve the project site?
Arlington Fire District, Fairview Fire District, and New Hamburg Fire District

d. What parks serve the project site?
Town and County Parks

D. Project Details

D.1. Proposed and Potential Development

a. What is the general nature of the proposed action (e.g., residential, industrial, commercial, recreational; if mixed, include all components)?

b. a. Total acreage of the site of the proposed action? _____ acres
b. Total acreage to be physically disturbed? _____ acres
c. Total acreage (project site and any contiguous properties) owned or controlled by the applicant or project sponsor? _____ acres

c. Is the proposed action an expansion of an existing project or use? ☐ Yes ☐ No
i. If Yes, what is the approximate percentage of the proposed expansion and identify the units (e.g., acres, miles, housing units, square feet)? % _____ Units: _____

d. Is the proposed action a subdivision, or does it include a subdivision? ☐ Yes ☐ No
If Yes,
i. Purpose or type of subdivision? (e.g., residential, industrial, commercial; if mixed, specify types)
ii. Is a cluster/conservation layout proposed? ☐ Yes ☐ No
iii. Number of lots proposed? _____
iv. Minimum and maximum proposed lot sizes? Minimum _____ Maximum _____

e. Will the proposed action be constructed in multiple phases? ☐ Yes ☐ No
i. If No, anticipated period of construction: _____ months
ii. If Yes:
- Total number of phases anticipated _____
- Anticipated commencement date of phase 1 (including demolition) _____ month _____ year
- Anticipated completion date of final phase _____ month _____ year
- Generally describe connections or relationships among phases, including any contingencies where progress of one phase may determine timing or duration of future phases: _____

f. Does the project include new residential uses? ☐Yes ☐No

If Yes, show numbers of units proposed.

	One Family	Two Family	Three Family	Multiple Family (four or more)
Initial Phase	_____	_____	_____	_____
At completion of all phases	_____	_____	_____	_____

g. Does the proposed action include new non-residential construction (including expansions)? ☐Yes ☐No

If Yes,

i. Total number of structures _____

ii. Dimensions (in feet) of largest proposed structure: _____ height; _____ width; and _____ length

iii. Approximate extent of building space to be heated or cooled: _____ square feet

h. Does the proposed action include construction or other activities that will result in the impoundment of any liquids, such as creation of a water supply, reservoir, pond, lake, waste lagoon or other storage? ☐Yes ☐No

If Yes,

i. Purpose of the impoundment: _____

ii. If a water impoundment, the principal source of the water: ☐ Ground water ☐ Surface water streams ☐Other specify:

_____

iii. If other than water, identify the type of impounded/contained liquids and their source.

_____

iv. Approximate size of the proposed impoundment. Volume: _____ million gallons; surface area: _____ acres

v. Dimensions of the proposed dam or impounding structure: _____ height; _____ length

vi. Construction method/materials for the proposed dam or impounding structure (e.g., earth fill, rock, wood, concrete):

_____

D.2. Project Operations

a. Does the proposed action include any excavation, mining, or dredging, during construction, operations, or both? (Not including general site preparation, grading or installation of utilities or foundations where all excavated materials will remain onsite) ☐Yes ☐No

If Yes:

i .What is the purpose of the excavation or dredging? _____

ii. How much material (including rock, earth, sediments, etc.) is proposed to be removed from the site?

- Volume (specify tons or cubic yards): _____
- Over what duration of time? _____

iii. Describe nature and characteristics of materials to be excavated or dredged, and plans to use, manage or dispose of them.

_____

_____

iv. Will there be onsite dewatering or processing of excavated materials? ☐Yes ☐No

If yes, describe. _____

_____

v. What is the total area to be dredged or excavated? _____ acres

vi. What is the maximum area to be worked at any one time? _____ acres

vii. What would be the maximum depth of excavation or dredging? _____ feet

viii. Will the excavation require blasting? ☐Yes ☐No

ix. Summarize site reclamation goals and plan: _____

_____

_____

b. Would the proposed action cause or result in alteration of, increase or decrease in size of, or encroachment into any existing wetland, waterbody, shoreline, beach or adjacent area? ☐Yes ☐No

If Yes:

i. Identify the wetland or waterbody which would be affected (by name, water index number, wetland map number or geographic description): _____

_____

ii. Describe how the proposed action would affect that waterbody or wetland, e.g. excavation, fill, placement of structures, or alteration of channels, banks and shorelines. Indicate extent of activities, alterations and additions in square feet or acres:

_____

_____

_____

_____

iii. Will the proposed action cause or result in disturbance to bottom sediments? ☐Yes ☐No

If Yes, describe: _____

iv. Will the proposed action cause or result in the destruction or removal of aquatic vegetation? ☐Yes ☐No

If Yes:

- acres of aquatic vegetation proposed to be removed: _____
- expected acreage of aquatic vegetation remaining after project completion: _____
- purpose of proposed removal (e.g. beach clearing, invasive species control, boat access): _____

_____

- proposed method of plant removal: _____
- if chemical/herbicide treatment will be used, specify product(s): _____

v. Describe any proposed reclamation/mitigation following disturbance: _____

_____

c. Will the proposed action use, or create a new demand for water? ☐Yes ☐No

If Yes:

i. Total anticipated water usage/demand per day: _____ gallons/day

ii. Will the proposed action obtain water from an existing public water supply? ☐Yes ☐No

If Yes:

- Name of district or service area: _____
- Does the existing public water supply have capacity to serve the proposal? ☐Yes ☐No
- Is the project site in the existing district? ☐Yes ☐No
- Is expansion of the district needed? ☐Yes ☐No
- Do existing lines serve the project site? ☐Yes ☐No

iii. Will line extension within an existing district be necessary to supply the project? ☐Yes ☐No

If Yes:

- Describe extensions or capacity expansions proposed to serve this project: _____

_____

- Source(s) of supply for the district: _____

iv. Is a new water supply district or service area proposed to be formed to serve the project site? ☐ Yes ☐No

If, Yes:

- Applicant/sponsor for new district: _____
- Date application submitted or anticipated: _____
- Proposed source(s) of supply for new district: _____

v. If a public water supply will not be used, describe plans to provide water supply for the project: _____

_____

vi. If water supply will be from wells (public or private), what is the maximum pumping capacity: _____ gallons/minute.

d. Will the proposed action generate liquid wastes? ☐Yes ☐No

If Yes:

i. Total anticipated liquid waste generation per day: _____ gallons/day

ii. Nature of liquid wastes to be generated (e.g., sanitary wastewater, industrial; if combination, describe all components and approximate volumes or proportions of each): _____

_____

_____

iii. Will the proposed action use any existing public wastewater treatment facilities? ☐Yes ☐No

If Yes:

- Name of wastewater treatment plant to be used: _____
- Name of district: _____
- Does the existing wastewater treatment plant have capacity to serve the project? ☐Yes ☐No
- Is the project site in the existing district? ☐Yes ☐No
- Is expansion of the district needed? ☐Yes ☐No

- Do existing sewer lines serve the project? ☐Yes ☐No
- Will a line extension within an existing district be necessary to serve the project? ☐Yes ☐No

If Yes:

- Describe extensions or capacity expansions proposed to serve this project: _____

_____

_____

iv. Will a new wastewater (sewage) treatment district be formed to serve the project site? ☐Yes ☐No

If Yes:

- Applicant/sponsor for new district: _____
- Date application submitted or anticipated: _____
- What is the receiving water for the wastewater discharge? _____

v. If public facilities will not be used, describe plans to provide wastewater treatment for the project, including specifying proposed receiving water (name and classification if surface discharge or describe subsurface disposal plans):

_____

_____

vi. Describe any plans or designs to capture, recycle or reuse liquid waste: _____

_____

_____

e. Will the proposed action disturb more than one acre and create stormwater runoff, either from new point sources (i.e. ditches, pipes, swales, curbs, gutters or other concentrated flows of stormwater) or non-point source (i.e. sheet flow) during construction or post construction? ☐Yes ☐No

If Yes:

i. How much impervious surface will the project create in relation to total size of project parcel?

_____ Square feet or _____ acres (impervious surface)

_____ Square feet or _____ acres (parcel size)

ii. Describe types of new point sources. _____

_____

iii. Where will the stormwater runoff be directed (i.e. on-site stormwater management facility/structures, adjacent properties, groundwater, on-site surface water or off-site surface waters)?

_____

_____

- If to surface waters, identify receiving water bodies or wetlands: _____

_____

_____

- Will stormwater runoff flow to adjacent properties? ☐Yes ☐No

iv. Does the proposed plan minimize impervious surfaces, use pervious materials or collect and re-use stormwater? ☐Yes ☐No

f. Does the proposed action include, or will it use on-site, one or more sources of air emissions, including fuel combustion, waste incineration, or other processes or operations? ☐Yes ☐No

If Yes, identify:

i. Mobile sources during project operations (e.g., heavy equipment, fleet or delivery vehicles)

_____

ii. Stationary sources during construction (e.g., power generation, structural heating, batch plant, crushers)

_____

iii. Stationary sources during operations (e.g., process emissions, large boilers, electric generation)

_____

g. Will any air emission sources named in D.2.f (above), require a NY State Air Registration, Air Facility Permit, or Federal Clean Air Act Title IV or Title V Permit? ☐Yes ☐No

If Yes:

i. Is the project site located in an Air quality non-attainment area? (Area routinely or periodically fails to meet ambient air quality standards for all or some parts of the year) ☐Yes ☐No

ii. In addition to emissions as calculated in the application, the project will generate:

- _____Tons/year (short tons) of Carbon Dioxide (CO_2)
- _____Tons/year (short tons) of Nitrous Oxide (N_2O)
- _____Tons/year (short tons) of Perfluorocarbons (PFCs)
- _____Tons/year (short tons) of Sulfur Hexafluoride (SF_6)
- _____Tons/year (short tons) of Carbon Dioxide equivalent of Hydroflourocarbons (HFCs)
- _____Tons/year (short tons) of Hazardous Air Pollutants (HAPs)

h. Will the proposed action generate or emit methane (including, but not limited to, sewage treatment plants, landfills, composting facilities)? ☐Yes ☐No

If Yes:

i. Estimate methane generation in tons/year (metric): _____

ii. Describe any methane capture, control or elimination measures included in project design (e.g., combustion to generate heat or electricity, flaring): _____

_____

i. Will the proposed action result in the release of air pollutants from open-air operations or processes, such as quarry or landfill operations? ☐Yes ☐No

If Yes: Describe operations and nature of emissions (e.g., diesel exhaust, rock particulates/dust):

_____

_____

j. Will the proposed action result in a substantial increase in traffic above present levels or generate substantial new demand for transportation facilities or services? ☐Yes ☐No

If Yes:

i. When is the peak traffic expected (Check all that apply): ☐ Morning ☐ Evening ☐Weekend
☐ Randomly between hours of _____ to _____.

ii. For commercial activities only, projected number of truck trips/day and type (e.g., semi trailers and dump trucks): _____

_____

iii. Parking spaces: Existing _____ Proposed _____ Net increase/decrease _____

iv. Does the proposed action include any shared use parking? ☐Yes ☐No

v. If the proposed action includes any modification of existing roads, creation of new roads or change in existing access, describe:

_____

vi. Are public/private transportation service(s) or facilities available within ½ mile of the proposed site? ☐Yes ☐No

vii Will the proposed action include access to public transportation or accommodations for use of hybrid, electric or other alternative fueled vehicles? ☐Yes ☐No

viii. Will the proposed action include plans for pedestrian or bicycle accommodations for connections to existing pedestrian or bicycle routes? ☐Yes ☐No

k. Will the proposed action (for commercial or industrial projects only) generate new or additional demand for energy? ☐Yes ☐No

If Yes:

i. Estimate annual electricity demand during operation of the proposed action: _____

_____

ii. Anticipated sources/suppliers of electricity for the project (e.g., on-site combustion, on-site renewable, via grid/local utility, or other):

_____

iii. Will the proposed action require a new, or an upgrade, to an existing substation? ☐Yes ☐No

l. Hours of operation. Answer all items which apply.

i. During Construction:

- Monday - Friday: _____
- Saturday: _____
- Sunday: _____
- Holidays: _____

ii. During Operations:

- Monday - Friday: _____
- Saturday: _____
- Sunday: _____
- Holidays: _____

m. Will the proposed action produce noise that will exceed existing ambient noise levels during construction, operation, or both? ☐Yes ☐No

If yes:

i. Provide details including sources, time of day and duration:

_____

_____

ii. Will the proposed action remove existing natural barriers that could act as a noise barrier or screen? ☐Yes ☐No

Describe: _____

_____

n. Will the proposed action have outdoor lighting? ☐Yes ☐No

If yes:

i. Describe source(s), location(s), height of fixture(s), direction/aim, and proximity to nearest occupied structures:

_____

_____

ii. Will proposed action remove existing natural barriers that could act as a light barrier or screen? ☐Yes ☐No

Describe: _____

_____

o. Does the proposed action have the potential to produce odors for more than one hour per day? ☐Yes ☐No

If Yes, describe possible sources, potential frequency and duration of odor emissions, and proximity to nearest occupied structures: _____

_____

_____

p. Will the proposed action include any bulk storage of petroleum (combined capacity of over 1,100 gallons) or chemical products 185 gallons in above ground storage or any amount in underground storage? ☐Yes ☐No

If Yes:

i. Product(s) to be stored _____

ii. Volume(s) _____ per unit time _____ (e.g., month, year)

iii. Generally, describe the proposed storage facilities: _____

_____

q. Will the proposed action (commercial, industrial and recreational projects only) use pesticides (i.e., herbicides, insecticides) during construction or operation? ☐Yes ☐No

If Yes:

i. Describe proposed treatment(s):

_____

_____

_____

_____

ii. Will the proposed action use Integrated Pest Management Practices? ☐Yes ☐No

r. Will the proposed action (commercial or industrial projects only) involve or require the management or disposal of solid waste (excluding hazardous materials)? ☐Yes ☐No

If Yes:

i. Describe any solid waste(s) to be generated during construction or operation of the facility:

- Construction: _____ tons per _____ (unit of time)
- Operation : _____ tons per _____ (unit of time)

ii. Describe any proposals for on-site minimization, recycling or reuse of materials to avoid disposal as solid waste:

- Construction: _____

_____

- Operation: _____

_____

iii. Proposed disposal methods/facilities for solid waste generated on-site:

- Construction: _____

_____

- Operation: _____

_____

s. Does the proposed action include construction or modification of a solid waste management facility? ☐ Yes ☐ No

If Yes:

i. Type of management or handling of waste proposed for the site (e.g., recycling or transfer station, composting, landfill, or other disposal activities): _____

ii. Anticipated rate of disposal/processing:

- _____ Tons/month, if transfer or other non-combustion/thermal treatment, or
- _____ Tons/hour, if combustion or thermal treatment

iii. If landfill, anticipated site life: _____ years

t. Will the proposed action at the site involve the commercial generation, treatment, storage, or disposal of hazardous waste? ☐ Yes ☐ No

If Yes:

i. Name(s) of all hazardous wastes or constituents to be generated, handled or managed at facility: _____

ii. Generally describe processes or activities involving hazardous wastes or constituents: _____

iii. Specify amount to be handled or generated _____ tons/month

iv. Describe any proposals for on-site minimization, recycling or reuse of hazardous constituents: _____

v. Will any hazardous wastes be disposed at an existing offsite hazardous waste facility? ☐ Yes ☐ No

If Yes: provide name and location of facility: _____

If No: describe proposed management of any hazardous wastes which will not be sent to a hazardous waste facility:

E. Site and Setting of Proposed Action

E.1. Land uses on and surrounding the project site

a. Existing land uses.

i. Check all uses that occur on, adjoining and near the project site.

☐ Urban ☐ Industrial ☐ Commercial ☐ Residential (suburban) ☐ Rural (non-farm)
☐ Forest ☐ Agriculture ☐ Aquatic ☐ Other (specify): _____

ii. If mix of uses, generally describe:

b. Land uses and covertypes on the project site.

Land use or Covertype	Current Acreage	Acreage After Project Completion	Change (Acres +/-)
• Roads, buildings, and other paved or impervious surfaces			
• Forested			
• Meadows, grasslands or brushlands (non-agricultural, including abandoned agricultural)			
• Agricultural (includes active orchards, field, greenhouse etc.)			
• Surface water features (lakes, ponds, streams, rivers, etc.)			
• Wetlands (freshwater or tidal)			
• Non-vegetated (bare rock, earth or fill)			
• Other Describe: _____			

c. Is the project site presently used by members of the community for public recreation? ☐Yes☐No

i. If Yes: explain: _____

d. Are there any facilities serving children, the elderly, people with disabilities (e.g., schools, hospitals, licensed day care centers, or group homes) within 1500 feet of the project site? ☐Yes☐No

If Yes,

i. Identify Facilities:

_____

_____

e. Does the project site contain an existing dam? ☐Yes☐No

If Yes:

i. Dimensions of the dam and impoundment:

- Dam height: _____ feet
- Dam length: _____ feet
- Surface area: _____ acres
- Volume impounded: _____ gallons OR acre-feet

ii. Dam's existing hazard classification: _____

iii. Provide date and summarize results of last inspection:

_____

_____

f. Has the project site ever been used as a municipal, commercial or industrial solid waste management facility, or does the project site adjoin property which is now, or was at one time, used as a solid waste management facility? ☐Yes☐No

If Yes:

i. Has the facility been formally closed? ☐Yes☐ No

- If yes, cite sources/documentation: _____

ii. Describe the location of the project site relative to the boundaries of the solid waste management facility:

_____

_____

iii. Describe any development constraints due to the prior solid waste activities: _____

_____

g. Have hazardous wastes been generated, treated and/or disposed of at the site, or does the project site adjoin property which is now or was at one time used to commercially treat, store and/or dispose of hazardous waste? ☐Yes☐No

If Yes:

i. Describe waste(s) handled and waste management activities, including approximate time when activities occurred:

_____

_____

h. Potential contamination history. Has there been a reported spill at the proposed project site, or have any remedial actions been conducted at or adjacent to the proposed site? ☐Yes☐ No

If Yes:

i. Is any portion of the site listed on the NYSDEC Spills Incidents database or Environmental Site Remediation database? Check all that apply: ☐Yes☐No

☐ Yes – Spills Incidents database Provide DEC ID number(s): _____

☐ Yes – Environmental Site Remediation database Provide DEC ID number(s): _____

☐ Neither database

ii. If site has been subject of RCRA corrective activities, describe control measures: _____

_____

_____

iii. Is the project within 2000 feet of any site in the NYSDEC Environmental Site Remediation database? ☐Yes☐No

If yes, provide DEC ID number(s): _____

iv. If yes to (i), (ii) or (iii) above, describe current status of site(s):

_____

_____

v. Is the project site subject to an institutional control limiting property uses? ☐Yes ☐No

- If yes, DEC site ID number: _____
- Describe the type of institutional control (e.g., deed restriction or easement): _____
- Describe any use limitations: _____
- Describe any engineering controls: _____
- Will the project affect the institutional or engineering controls in place? ☐Yes ☐No
- Explain: _____

E.2. Natural Resources On or Near Project Site

a. What is the average depth to bedrock on the project site? _____ feet

b. Are there bedrock outcroppings on the project site? ☐Yes ☐No
If Yes, what proportion of the site is comprised of bedrock outcroppings? _____%

c. Predominant soil type(s) present on project site: _____ _____%
_____ _____%
_____ _____%

d. What is the average depth to the water table on the project site? Average: _____ feet

e. Drainage status of project site soils: ☐ Well Drained: _____% of site
☐ Moderately Well Drained: _____% of site
☐ Poorly Drained _____% of site

f. Approximate proportion of proposed action site with slopes: ☐ 0-10%: _____% of site
☐ 10-15%: _____% of site
☐ 15% or greater: _____% of site

g. Are there any unique geologic features on the project site? ☐Yes ☐No
If Yes, describe: _____

h. Surface water features.

i. Does any portion of the project site contain wetlands or other waterbodies (including streams, rivers, ponds or lakes)? ☐Yes ☐No

ii. Do any wetlands or other waterbodies adjoin the project site? ☐Yes ☐No

If Yes to either *i* or *ii*, continue. If No, skip to E.2.i.

iii. Are any of the wetlands or waterbodies within or adjoining the project site regulated by any federal, state or local agency? ☐Yes ☐No

iv. For each identified regulated wetland and waterbody on the project site, provide the following information:

- Streams: Name _____ Classification _____
- Lakes or Ponds: Name _____ Classification _____
- Wetlands: Name _____ Approximate Size _____
- Wetland No. (if regulated by DEC) _____

v. Are any of the above water bodies listed in the most recent compilation of NYS water quality-impaired waterbodies? ☐Yes ☐No

If yes, name of impaired water body/bodies and basis for listing as impaired: _____

i. Is the project site in a designated Floodway? ☐Yes ☐No

j. Is the project site in the 100-year Floodplain? ☐Yes ☐No

k. Is the project site in the 500-year Floodplain? ☐Yes ☐No

l. Is the project site located over, or immediately adjoining, a primary, principal or sole source aquifer? ☐Yes ☐No
If Yes:

i. Name of aquifer: _____

m. Identify the predominant wildlife species that occupy or use the project site:
N/A

n. Does the project site contain a designated significant natural community? ☐Yes ☐No
If Yes:
i. Describe the habitat/community (composition, function, and basis for designation): _____
ii. Source(s) of description or evaluation: _____
iii. Extent of community/habitat:
- Currently: _____ acres
- Following completion of project as proposed: _____ acres
- Gain or loss (indicate + or -): _____ acres

o. Does project site contain any species of plant or animal that is listed by the federal government or NYS as endangered or threatened, or does it contain any areas identified as habitat for an endangered or threatened species? ☐Yes ☐No
If Yes:
i. Species and listing (endangered or threatened): _____

p. Does the project site contain any species of plant or animal that is listed by NYS as rare, or as a species of special concern? ☐Yes ☐No
If Yes:
i. Species and listing: _____

q. Is the project site or adjoining area currently used for hunting, trapping, fishing or shell fishing? ☐Yes ☐No
If yes, give a brief description of how the proposed action may affect that use: _____

E.3. Designated Public Resources On or Near Project Site

a. Is the project site, or any portion of it, located in a designated agricultural district certified pursuant to Agriculture and Markets Law, Article 25-AA, Section 303 and 304? ☐Yes ☐No
If Yes, provide county plus district name/number: _____

b. Are agricultural lands consisting of highly productive soils present? ☐Yes ☐No
i. If Yes: acreage(s) on project site? _____
ii. Source(s) of soil rating(s): _____

c. Does the project site contain all or part of, or is it substantially contiguous to, a registered National Natural Landmark? ☐Yes ☐No
If Yes:
i. Nature of the natural landmark: ☐ Biological Community ☐ Geological Feature
ii. Provide brief description of landmark, including values behind designation and approximate size/extent: _____

d. Is the project site located in or does it adjoin a state listed Critical Environmental Area? ☐Yes ☐No
If Yes:
i. CEA name: _____
ii. Basis for designation: _____
iii. Designating agency and date: _____

e. Does the project site contain, or is it substantially contiguous to, a building, archaeological site, or district which is listed on the National or State Register of Historic Places, or that has been determined by the Commissioner of the NYS Office of Parks, Recreation and Historic Preservation to be eligible for listing on the State Register of Historic Places? ☐Yes ☐No

If Yes:

i. Nature of historic/archaeological resource: ☐Archaeological Site ☐Historic Building or District

ii. Name: _____

iii. Brief description of attributes on which listing is based:

_____

f. Is the project site, or any portion of it, located in or adjacent to an area designated as sensitive for archaeological sites on the NY State Historic Preservation Office (SHPO) archaeological site inventory? ☐Yes ☐No

g. Have additional archaeological or historic site(s) or resources been identified on the project site? ☐Yes ☐No

If Yes:

i. Describe possible resource(s): _____

ii. Basis for identification: _____

h. Is the project site within fives miles of any officially designated and publicly accessible federal, state, or local scenic or aesthetic resource? ☐Yes ☐No

If Yes:

i. Identify resource: _____

ii. Nature of, or basis for, designation (e.g., established highway overlook, state or local park, state historic trail or scenic byway, etc.): _____

iii. Distance between project and resource: _____ miles.

i. Is the project site located within a designated river corridor under the Wild, Scenic and Recreational Rivers Program 6 NYCRR 666? ☐Yes ☐No

If Yes:

i. Identify the name of the river and its designation: _____

ii. Is the activity consistent with development restrictions contained in 6NYCRR Part 666? ☐Yes ☐No

F. Additional Information

Attach any additional information which may be needed to clarify your project.

If you have identified any adverse impacts which could be associated with your proposal, please describe those impacts plus any measures which you propose to avoid or minimize them.

G. Verification

I certify that the information provided is true to the best of my knowledge.

Applicant/Sponsor Name Town of Poughkeepsie Date April 6, 2023

Signature Michael A. Welti, AICP Title Dir./Municipal Development - Town of Poughkeepsie

PRINT FORM

Agency Use Only [If applicable]

Project : Adoption of NRI and Open Space Plan

Date : April 6, 2023

Full Environmental Assessment Form
Part 2 - Identification of Potential Project Impacts

Part 2 is to be completed by the lead agency. Part 2 is designed to help the lead agency inventory all potential resources that could be affected by a proposed project or action. We recognize that the lead agency's reviewer(s) will not necessarily be environmental professionals. So, the questions are designed to walk a reviewer through the assessment process by providing a series of questions that can be answered using the information found in Part 1. To further assist the lead agency in completing Part 2, the form identifies the most relevant questions in Part 1 that will provide the information needed to answer the Part 2 question. When Part 2 is completed, the lead agency will have identified the relevant environmental areas that may be impacted by the proposed activity.

If the lead agency is a state agency **and** the action is in any Coastal Area, complete the Coastal Assessment Form before proceeding with this assessment.

Tips for completing Part 2:

- Review all of the information provided in Part 1.
- Review any application, maps, supporting materials and the Full EAF Workbook.
- Answer each of the 18 questions in Part 2.
- If you answer "**Yes**" to a numbered question, please complete all the questions that follow in that section.
- If you answer "**No**" to a numbered question, move on to the next numbered question.
- Check appropriate column to indicate the anticipated size of the impact.
- Proposed projects that would exceed a numeric threshold contained in a question should result in the reviewing agency checking the box "Moderate to large impact may occur."
- The reviewer is not expected to be an expert in environmental analysis.
- If you are not sure or undecided about the size of an impact, it may help to review the sub-questions for the general question and consult the workbook.
- When answering a question consider all components of the proposed activity, that is, the "whole action".
- Consider the possibility for long-term and cumulative impacts as well as direct impacts.
- Answer the question in a reasonable manner considering the scale and context of the project.

1. Impact on Land
Proposed action may involve construction on, or physical alteration of, the land surface of the proposed site. (See Part 1. D.1)
If "Yes", answer questions a - j. If "No", move on to Section 2.

☑ NO ☐ YES

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may involve construction on land where depth to water table is less than 3 feet.	E2d	☐	☐
b. The proposed action may involve construction on slopes of 15% or greater.	E2f	☐	☐
c. The proposed action may involve construction on land where bedrock is exposed, or generally within 5 feet of existing ground surface.	E2a	☐	☐
d. The proposed action may involve the excavation and removal of more than 1,000 tons of natural material.	D2a	☐	☐
e. The proposed action may involve construction that continues for more than one year or in multiple phases.	D1e	☐	☐
f. The proposed action may result in increased erosion, whether from physical disturbance or vegetation removal (including from treatment by herbicides).	D2e, D2q	☐	☐
g. The proposed action is, or may be, located within a Coastal Erosion hazard area.	B1i	☐	☐
h. Other impacts: _____		☐	☐

2. Impact on Geological Features

The proposed action may result in the modification or destruction of, or inhibit access to, any unique or unusual land forms on the site (e.g., cliffs, dunes, minerals, fossils, caves). (See Part 1. E.2.g) ☑NO ☐YES

If "Yes", answer questions a - c. If "No", move on to Section 3.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. Identify the specific land form(s) attached: _____ _____	E2g	☐	☐
b. The proposed action may affect or is adjacent to a geological feature listed as a registered National Natural Landmark. Specific feature: _____	E3c	☐	☐
c. Other impacts: _____ _____		☐	☐

3. Impacts on Surface Water

The proposed action may affect one or more wetlands or other surface water bodies (e.g., streams, rivers, ponds or lakes). (See Part 1. D.2, E.2.h) ☑NO ☐YES

If "Yes", answer questions a - l. If "No", move on to Section 4.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may create a new water body.	D2b, D1h	☐	☐
b. The proposed action may result in an increase or decrease of over 10% or more than a 10 acre increase or decrease in the surface area of any body of water.	D2b	☐	☐
c. The proposed action may involve dredging more than 100 cubic yards of material from a wetland or water body.	D2a	☐	☐
d. The proposed action may involve construction within or adjoining a freshwater or tidal wetland, or in the bed or banks of any other water body.	E2h	☐	☐
e. The proposed action may create turbidity in a waterbody, either from upland erosion, runoff or by disturbing bottom sediments.	D2a, D2h	☐	☐
f. The proposed action may include construction of one or more intake(s) for withdrawal of water from surface water.	D2c	☐	☐
g. The proposed action may include construction of one or more outfall(s) for discharge of wastewater to surface water(s).	D2d	☐	☐
h. The proposed action may cause soil erosion, or otherwise create a source of stormwater discharge that may lead to siltation or other degradation of receiving water bodies.	D2e	☐	☐
i. The proposed action may affect the water quality of any water bodies within or downstream of the site of the proposed action.	E2h	☐	☐
j. The proposed action may involve the application of pesticides or herbicides in or around any water body.	D2q, E2h	☐	☐
k. The proposed action may require the construction of new, or expansion of existing, wastewater treatment facilities.	D1a, D2d	☐	☐

l. Other impacts: _____		☐	☐

4. Impact on groundwater

The proposed action may result in new or additional use of ground water, or may have the potential to introduce contaminants to ground water or an aquifer. (See Part 1. D.2.a, D.2.c, D.2.d, D.2.p, D.2.q, D.2.t) ☑ NO ☐ YES

If "Yes", answer questions a - h. If "No", move on to Section 5.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may require new water supply wells, or create additional demand on supplies from existing water supply wells.	D2c	☐	☐
b. Water supply demand from the proposed action may exceed safe and sustainable withdrawal capacity rate of the local supply or aquifer. Cite Source: _____	D2c	☐	☐
c. The proposed action may allow or result in residential uses in areas without water and sewer services.	D1a, D2c	☐	☐
d. The proposed action may include or require wastewater discharged to groundwater.	D2d, E2l	☐	☐
e. The proposed action may result in the construction of water supply wells in locations where groundwater is, or is suspected to be, contaminated.	D2c, E1f, E1g, E1h	☐	☐
f. The proposed action may require the bulk storage of petroleum or chemical products over ground water or an aquifer.	D2p, E2l	☐	☐
g. The proposed action may involve the commercial application of pesticides within 100 feet of potable drinking water or irrigation sources.	E2h, D2q, E2l, D2c	☐	☐
h. Other impacts: _____		☐	☐

5. Impact on Flooding

The proposed action may result in development on lands subject to flooding. (See Part 1. E.2) ☑ NO ☐ YES

If "Yes", answer questions a - g. If "No", move on to Section 6.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may result in development in a designated floodway.	E2i	☐	☐
b. The proposed action may result in development within a 100 year floodplain.	E2j	☐	☐
c. The proposed action may result in development within a 500 year floodplain.	E2k	☐	☐
d. The proposed action may result in, or require, modification of existing drainage patterns.	D2b, D2e	☐	☐
e. The proposed action may change flood water flows that contribute to flooding.	D2b, E2i, E2j, E2k	☐	☐
f. If there is a dam located on the site of the proposed action, is the dam in need of repair, or upgrade?	E1e	☐	☐

g. Other impacts: _____ _____		☐	☐

6. Impacts on Air

The proposed action may include a state regulated air emission source. (See Part 1. D.2.f., D.2.h, D.2.g) ☑NO ☐YES

If "Yes", answer questions a - f. If "No", move on to Section 7.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. If the proposed action requires federal or state air emission permits, the action may also emit one or more greenhouse gases at or above the following levels:			
i. More than 1000 tons/year of carbon dioxide (CO_2)	D2g	☐	☐
ii. More than 3.5 tons/year of nitrous oxide (N_2O)	D2g	☐	☐
iii. More than 1000 tons/year of carbon equivalent of perfluorocarbons (PFCs)	D2g	☐	☐
iv. More than .045 tons/year of sulfur hexafluoride (SF_6)	D2g	☐	☐
v. More than 1000 tons/year of carbon dioxide equivalent of hydrochloroflourocarbons (HFCs) emissions	D2g	☐	☐
vi. 43 tons/year or more of methane	D2h	☐	☐
b. The proposed action may generate 10 tons/year or more of any one designated hazardous air pollutant, or 25 tons/year or more of any combination of such hazardous air pollutants.	D2g	☐	☐
c. The proposed action may require a state air registration, or may produce an emissions rate of total contaminants that may exceed 5 lbs. per hour, or may include a heat source capable of producing more than 10 million BTU's per hour.	D2f, D2g	☐	☐
d. The proposed action may reach 50% of any of the thresholds in "a" through "c", above.	D2g	☐	☐
e. The proposed action may result in the combustion or thermal treatment of more than 1 ton of refuse per hour.	D2s	☐	☐
f. Other impacts: _____ _____		☐	☐

7. Impact on Plants and Animals

The proposed action may result in a loss of flora or fauna. (See Part 1. E.2. m.-q.) ☑NO ☐YES

If "Yes", answer questions a - j. If "No", move on to Section 8.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may cause reduction in population or loss of individuals of any threatened or endangered species, as listed by New York State or the Federal government, that use the site, or are found on, over, or near the site.	E2o	☐	☐
b. The proposed action may result in a reduction or degradation of any habitat used by any rare, threatened or endangered species, as listed by New York State or the federal government.	E2o	☐	☐
c. The proposed action may cause reduction in population, or loss of individuals, of any species of special concern or conservation need, as listed by New York State or the Federal government, that use the site, or are found on, over, or near the site.	E2p	☐	☐
d. The proposed action may result in a reduction or degradation of any habitat used by any species of special concern and conservation need, as listed by New York State or the Federal government.	E2p	☐	☐

e. The proposed action may diminish the capacity of a registered National Natural Landmark to support the biological community it was established to protect.	E3c	☐	☐
f. The proposed action may result in the removal of, or ground disturbance in, any portion of a designated significant natural community. Source: _____	E2n	☐	☐
g. The proposed action may substantially interfere with nesting/breeding, foraging, or over-wintering habitat for the predominant species that occupy or use the project site.	E2m	☐	☐
h. The proposed action requires the conversion of more than 10 acres of forest, grassland or any other regionally or locally important habitat. Habitat type & information source: _____ _____	E1b	☐	☐
i. Proposed action (commercial, industrial or recreational projects, only) involves use of herbicides or pesticides.	D2q	☐	☐
j. Other impacts: _____ _____		☐	☐

8. Impact on Agricultural Resources
The proposed action may impact agricultural resources. (See Part 1. E.3.a. and b.) ☑NO ☐YES
If "Yes", answer questions a - h. If "No", move on to Section 9.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may impact soil classified within soil group 1 through 4 of the NYS Land Classification System.	E2c, E3b	☐	☐
b. The proposed action may sever, cross or otherwise limit access to agricultural land (includes cropland, hayfields, pasture, vineyard, orchard, etc).	E1a, Elb	☐	☐
c. The proposed action may result in the excavation or compaction of the soil profile of active agricultural land.	E3b	☐	☐
d. The proposed action may irreversibly convert agricultural land to non-agricultural uses, either more than 2.5 acres if located in an Agricultural District, or more than 10 acres if not within an Agricultural District.	E1b, E3a	☐	☐
e. The proposed action may disrupt or prevent installation of an agricultural land management system.	El a, E1b	☐	☐
f. The proposed action may result, directly or indirectly, in increased development potential or pressure on farmland.	C2c, C3, D2c, D2d	☐	☐
g. The proposed project is not consistent with the adopted municipal Farmland Protection Plan.	C2c	☐	☐
h. Other impacts: _____		☐	☐

9. Impact on Aesthetic Resources
The land use of the proposed action are obviously different from, or are in sharp contrast to, current land use patterns between the proposed project and a scenic or aesthetic resource. (Part 1. E.1.a, E.1.b, E.3.h.)
If "Yes", answer questions a - g. If "No", go to Section 10.

☑ NO ☐ YES

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. Proposed action may be visible from any officially designated federal, state, or local scenic or aesthetic resource.	E3h	☐	☐
b. The proposed action may result in the obstruction, elimination or significant screening of one or more officially designated scenic views.	E3h, C2b	☐	☐
c. The proposed action may be visible from publicly accessible vantage points: i. Seasonally (e.g., screened by summer foliage, but visible during other seasons) ii. Year round	E3h	☐ ☐	☐ ☐
d. The situation or activity in which viewers are engaged while viewing the proposed action is: i. Routine travel by residents, including travel to and from work ii. Recreational or tourism based activities	E3h E2q, E1c	☐ ☐	☐ ☐
e. The proposed action may cause a diminishment of the public enjoyment and appreciation of the designated aesthetic resource.	E3h	☐	☐
f. There are similar projects visible within the following distance of the proposed project: 0-1/2 mile ½ -3 mile 3-5 mile 5+ mile	D1a, E1a, D1f, D1g	☐	☐
g. Other impacts: _____ _____		☐	☐

10. Impact on Historic and Archeological Resources
The proposed action may occur in or adjacent to a historic or archaeological resource. (Part 1. E.3.e, f. and g.)
If "Yes", answer questions a - e. If "No", go to Section 11.

☑ NO ☐ YES

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may occur wholly or partially within, or substantially contiguous to, any buildings, archaeological site or district which is listed on the National or State Register of Historical Places, or that has been determined by the Commissioner of the NYS Office of Parks, Recreation and Historic Preservation to be eligible for listing on the State Register of Historic Places.	E3e	☐	☐
b. The proposed action may occur wholly or partially within, or substantially contiguous to, an area designated as sensitive for archaeological sites on the NY State Historic Preservation Office (SHPO) archaeological site inventory.	E3f	☐	☐
c. The proposed action may occur wholly or partially within, or substantially contiguous to, an archaeological site not included on the NY SHPO inventory. Source: _____	E3g	☐	☐

d. Other impacts: _____		☐	☐
e. If any of the above (a-d) are answered "Moderate to large impact may occur", continue with the following questions to help support conclusions in Part 3:			
i. The proposed action may result in the destruction or alteration of all or part of the site or property.	E3e, E3g, E3f	☐	☐
ii. The proposed action may result in the alteration of the property's setting or integrity.	E3e, E3f, E3g, E1a, E1b	☐	☐
iii. The proposed action may result in the introduction of visual elements which are out of character with the site or property, or may alter its setting.	E3e, E3f, E3g, E3h, C2, C3	☐	☐

11. Impact on Open Space and Recreation

The proposed action may result in a loss of recreational opportunities or a reduction of an open space resource as designated in any adopted municipal open space plan.
(See Part 1. C.2.c, E.1.c., E.2.q.)
If "Yes", answer questions a - e. If "No", go to Section 12.

☑ NO ☐ YES

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may result in an impairment of natural functions, or "ecosystem services", provided by an undeveloped area, including but not limited to stormwater storage, nutrient cycling, wildlife habitat.	D2e, E1b E2h, E2m, E2o, E2n, E2p	☐	☐
b. The proposed action may result in the loss of a current or future recreational resource.	C2a, E1c, C2c, E2q	☐	☐
c. The proposed action may eliminate open space or recreational resource in an area with few such resources.	C2a, C2c E1c, E2q	☐	☐
d. The proposed action may result in loss of an area now used informally by the community as an open space resource.	C2c, E1c	☐	☐
e. Other impacts: _____		☐	☐

12. Impact on Critical Environmental Areas

The proposed action may be located within or adjacent to a critical environmental area (CEA). (See Part 1. E.3.d)
If "Yes", answer questions a - c. If "No", go to Section 13.

☑ NO ☐ YES

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may result in a reduction in the quantity of the resource or characteristic which was the basis for designation of the CEA.	E3d	☐	☐
b. The proposed action may result in a reduction in the quality of the resource or characteristic which was the basis for designation of the CEA.	E3d	☐	☐
c. Other impacts: _____		☐	☐

13. Impact on Transportation
The proposed action may result in a change to existing transportation systems. ☑ NO ☐ YES
(See Part 1. D.2.j)
If "Yes", answer questions a - f. If "No", go to Section 14.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. Projected traffic increase may exceed capacity of existing road network.	D2j	☐	☐
b. The proposed action may result in the construction of paved parking area for 500 or more vehicles.	D2j	☐	☐
c. The proposed action will degrade existing transit access.	D2j	☐	☐
d. The proposed action will degrade existing pedestrian or bicycle accommodations.	D2j	☐	☐
e. The proposed action may alter the present pattern of movement of people or goods.	D2j	☐	☐
f. Other impacts: _____ _____		☐	☐

14. Impact on Energy
The proposed action may cause an increase in the use of any form of energy. ☑ NO ☐ YES
(See Part 1. D.2.k)
If "Yes", answer questions a - e. If "No", go to Section 15.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action will require a new, or an upgrade to an existing, substation.	D2k	☐	☐
b. The proposed action will require the creation or extension of an energy transmission or supply system to serve more than 50 single or two-family residences or to serve a commercial or industrial use.	D1f, D1q, D2k	☐	☐
c. The proposed action may utilize more than 2,500 MWhrs per year of electricity.	D2k	☐	☐
d. The proposed action may involve heating and/or cooling of more than 100,000 square feet of building area when completed.	D1g	☐	☐
e. Other Impacts: _____ _____			

15. Impact on Noise, Odor, and Light
The proposed action may result in an increase in noise, odors, or outdoor lighting. ☑ NO ☐ YES
(See Part 1. D.2.m., n., and o.)
If "Yes", answer questions a - f. If "No", go to Section 16.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may produce sound above noise levels established by local regulation.	D2m	☐	☐
b. The proposed action may result in blasting within 1,500 feet of any residence, hospital, school, licensed day care center, or nursing home.	D2m, E1d	☐	☐
c. The proposed action may result in routine odors for more than one hour per day.	D2o	☐	☐

d. The proposed action may result in light shining onto adjoining properties.	D2n	☐	☐
e. The proposed action may result in lighting creating sky-glow brighter than existing area conditions.	D2n, E1a	☐	☐
f. Other impacts: _____ _____		☐	☐

16. Impact on Human Health
The proposed action may have an impact on human health from exposure to new or existing sources of contaminants. (See Part 1.D.2.q., E.1. d. f. g. and h.) ☑ NO ☐ YES
If "Yes", answer questions a - m. If "No", go to Section 17.

	Relevant Part I Question(s)	No,or small impact may occur	Moderate to large impact may occur
a. The proposed action is located within 1500 feet of a school, hospital, licensed day care center, group home, nursing home or retirement community.	E1d	☐	☐
b. The site of the proposed action is currently undergoing remediation.	E1g, E1h	☐	☐
c. There is a completed emergency spill remediation, or a completed environmental site remediation on, or adjacent to, the site of the proposed action.	E1g, E1h	☐	☐
d. The site of the action is subject to an institutional control limiting the use of the property (e.g., easement or deed restriction).	E1g, E1h	☐	☐
e. The proposed action may affect institutional control measures that were put in place to ensure that the site remains protective of the environment and human health.	E1g, E1h	☐	☐
f. The proposed action has adequate control measures in place to ensure that future generation, treatment and/or disposal of hazardous wastes will be protective of the environment and human health.	D2t	☐	☐
g. The proposed action involves construction or modification of a solid waste management facility.	D2q, E1f	☐	☐
h. The proposed action may result in the unearthing of solid or hazardous waste.	D2q, E1f	☐	☐
i. The proposed action may result in an increase in the rate of disposal, or processing, of solid waste.	D2r, D2s	☐	☐
j. The proposed action may result in excavation or other disturbance within 2000 feet of a site used for the disposal of solid or hazardous waste.	E1f, E1g E1h	☐	☐
k. The proposed action may result in the migration of explosive gases from a landfill site to adjacent off site structures.	E1f, E1g	☐	☐
l. The proposed action may result in the release of contaminated leachate from the project site.	D2s, E1f, D2r	☐	☐
m. Other impacts: _____ _____			

17. Consistency with Community Plans

The proposed action is not consistent with adopted land use plans. ☑ NO ☐ YES

(See Part 1. C.1, C.2. and C.3.)

If "Yes", answer questions a - h. If "No", go to Section 18.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action's land use components may be different from, or in sharp contrast to, current surrounding land use pattern(s).	C2, C3, D1a E1a, E1b	☐	☐
b. The proposed action will cause the permanent population of the city, town or village in which the project is located to grow by more than 5%.	C2	☐	☐
c. The proposed action is inconsistent with local land use plans or zoning regulations.	C2, C2, C3	☐	☐
d. The proposed action is inconsistent with any County plans, or other regional land use plans.	C2, C2	☐	☐
e. The proposed action may cause a change in the density of development that is not supported by existing infrastructure or is distant from existing infrastructure.	C3, D1c, D1d, D1f, D1d, E1b	☐	☐
f. The proposed action is located in an area characterized by low density development that will require new or expanded public infrastructure.	C4, D2c, D2d D2j	☐	☐
g. The proposed action may induce secondary development impacts (e.g., residential or commercial development not included in the proposed action)	C2a	☐	☐
h. Other: _____ _____		☐	☐

18. Consistency with Community Character

The proposed project is inconsistent with the existing community character. ☑ NO ☐ YES

(See Part 1. C.2, C.3, D.2, E.3)

If "Yes", answer questions a - g. If "No", proceed to Part 3.

	Relevant Part I Question(s)	No, or small impact may occur	Moderate to large impact may occur
a. The proposed action may replace or eliminate existing facilities, structures, or areas of historic importance to the community.	E3e, E3f, E3g	☐	☐
b. The proposed action may create a demand for additional community services (e.g. schools, police and fire)	C4	☐	☐
c. The proposed action may displace affordable or low-income housing in an area where there is a shortage of such housing.	C2, C3, D1f D1g, E1a	☐	☐
d. The proposed action may interfere with the use or enjoyment of officially recognized or designated public resources.	C2, E3	☐	☐
e. The proposed action is inconsistent with the predominant architectural scale and character.	C2, C3	☐	☐
f. Proposed action is inconsistent with the character of the existing natural landscape.	C2, C3 E1a, E1b E2g, E2h	☐	☐
g. Other impacts: _____ _____		☐	☐

PRINT FULL FORM

Agency Use Only [IfApplicable]

Project : Adoption of NRI and Open Space Plan

Date : April 6, 2023

Full Environmental Assessment Form
Part 3 - Evaluation of the Magnitude and Importance of Project Impacts
and
Determination of Significance

Part 3 provides the reasons in support of the determination of significance. The lead agency must complete Part 3 for every question in Part 2 where the impact has been identified as potentially moderate to large or where there is a need to explain why a particular element of the proposed action will not, or may, result in a significant adverse environmental impact.

Based on the analysis in Part 3, the lead agency must decide whether to require an environmental impact statement to further assess the proposed action or whether available information is sufficient for the lead agency to conclude that the proposed action will not have a significant adverse environmental impact. By completing the certification on the next page, the lead agency can complete its determination of significance.

Reasons Supporting This Determination:

To complete this section:

- Identify the impact based on the Part 2 responses and describe its magnitude. Magnitude considers factors such as severity, size or extent of an impact.
- Assess the importance of the impact. Importance relates to the geographic scope, duration, probability of the impact occurring, number of people affected by the impact and any additional environmental consequences if the impact were to occur.
- The assessment should take into consideration any design element or project changes.
- Repeat this process for each Part 2 question where the impact has been identified as potentially moderate to large or where there is a need to explain why a particular element of the proposed action will not, or may, result in a significant adverse environmental impact.
- Provide the reason(s) why the impact may, or will not, result in a significant adverse environmental impact
- For Conditional Negative Declarations identify the specific condition(s) imposed that will modify the proposed action so that no significant adverse environmental impacts will result.
- Attach additional sheets, as needed.

Adoption of the Natural Resource Inventory (NRI) and Open Space Plan will not have a significant adverse impact on the environment; instead its adoption by the Town Board will likely have a beneficial impact on the environment. The Natural Resource Inventory (NRI) and Open Space Plan is intended to be used as a policy guide by the Town Board, Planning Board, CAC, staff and the public in evaluating the effects of proposed land-use and zoning changes, for informing the environmental review of development proposals, and for identifying land conservation and stewardship opportunities in the Town of Poughkeepsie.

The Natural Resource Inventory (NRI) compiles and describes important, naturally occurring resources within the Town. Cultural resources, such as historic, scenic, and recreational, are included as well. The inventory has two basic purposes: 1) to provide the building blocks for comprehensive land-use and conservation planning, and 2) to allow natural resource information to be included in local planning and zoning decisions. The NRI is comprised of a series of 23 maps as well as an accompanying report with narrative descriptions, supporting data tables, and recommendations.

The Open Space Plan establishes a vision for a Town-wide network of open spaces, working landscapes and natural habitats. The plan enables the Town to identify priorities for natural resource protection and to explore, and ultimately select, community-supported tools and techniques for conserving these resources. This work sets the stage for future implementation of conservation projects by creating community consensus about conservation goals and priorities and about appropriate methods (such as regulations, incentives, and perhaps public funding) for completing such projects. Individual initiatives and/or projects may undergo their own environmental review under SEQR as needed.

Completion and adoption of the Natural Resource Inventory (NRI) and Open Space Plan is consistent with the recommendations of the Town's 2021 Comprehensive Plan Update and with "Greenway Connections: Greenway Compact Program and Guides for Dutchess County Communities" pursuant to Chapter 18 of the Town Code.

Determination of Significance - Type 1 and Unlisted Actions

SEQR Status: ☑ Type 1 ☐ Unlisted

Identify portions of EAF completed for this Project: ☑ Part 1 ☑ Part 2 ☑ Part 3

Upon review of the information recorded on this EAF, as noted, plus this additional support information

and considering both the magnitude and importance of each identified potential impact, it is the conclusion of the Town of Poughkeepsie Town Board as lead agency that:

☑ A. This project will result in no significant adverse impacts on the environment, and, therefore, an environmental impact statement need not be prepared. Accordingly, this negative declaration is issued.

☐ B. Although this project could have a significant adverse impact on the environment, that impact will be avoided or substantially mitigated because of the following conditions which will be required by the lead agency:

There will, therefore, be no significant adverse impacts from the project as conditioned, and, therefore, this conditioned negative declaration is issued. A conditioned negative declaration may be used only for UNLISTED actions (see 6 NYCRR 617.7(d)).

☐ C. This Project may result in one or more significant adverse impacts on the environment, and an environmental impact statement must be prepared to further assess the impact(s) and possible mitigation and to explore alternatives to avoid or reduce those impacts. Accordingly, this positive declaration is issued.

Name of Action: Adoption of the Town of Poughkeepsie Natural Resource Inventory (NRI) and Open Space Plan

Name of Lead Agency: Town of Poughkeepsie Town Board

Name of Responsible Officer in Lead Agency: Jon J. Baisley

Title of Responsible Officer: Supervisor

Signature of Responsible Officer in Lead Agency: Date: April 12, 2023

Signature of Preparer (if different from Responsible Officer) Michael A. Welti, AICP Date: April 6, 2023

For Further Information:

Contact Person: Michael A. Welti, AICP

Address: 1 Overocker Road, Poughkeepsie, NY 12603

Telephone Number: 845-485-3657

E-mail: mwelti@townofpoughkeepsie-ny.gov

For Type 1 Actions and Conditioned Negative Declarations, a copy of this Notice is sent to:

Chief Executive Officer of the political subdivision in which the action will be principally located (e.g., Town / City / Village of)
Other involved agencies (if any)
Applicant (if any)
Environmental Notice Bulletin: http://www.dec.ny.gov/enb/enb.html

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