



Village of Catskill

Local Waterfront Revitalization Program

Adopted:

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VILLAGE OF CATSKILL LOCAL WATERFRONT REVITALIZATION PROGRAM

Village of Catskill, New York

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Glossary

NYS BOA- Brownfield Opportunities Area (BOA) Program

CMP- NYS Coastal Management Program

DEC- NYS Department of Environmental Conservation

DOS- NYS Department of State

ECL- NYS Environmental Conservation Law

EPA- U.S. Environmental Protection Agency

EPF- Environmental Protection Fund

FEMA- U.S. Federal Emergency Management Agency

FIRM- Flood Insurance Rate Map

HCR – NYS Homes and Community Renewal

LWRP- Local Waterfront Revitalization Program

NFIP- National Flood Insurance Program

NYCRR- New York Code of Rules and Regulations

NYS- New York State

OGS- NYS Office of General Services

OPRHP- NYS Office of Parks, Recreation and Historic Preservation

SEQR- State Environmental Quality Review

SPDES- State Pollution Discharge Elimination System

USACE- U.S. Army Corps of Engineers

WAC- Waterfront Advisory Committee

WRA- Waterfront Revitalization Area

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Introduction and Overview

A Local Waterfront Revitalization Program (LWRP) is a locally prepared comprehensive land and water use plan for a municipality's natural, public, and developed waterfront resources. A LWRP is prepared with assistance from the New York State Department of State (NYS DOS) Office of Planning, Development, and Community Infrastructure in accordance with the New York State Waterfront Revitalization of Waterfront Areas and Inland Waterways Act. A LWRP formulates waterfront development objectives by adapting statewide legislation and policies to the unique and individual requirements of a waterfront municipality. A LWRP also outlines specific projects to encourage environmental protection, foster economic development, protect valuable water resources, and improve public waterfront accessibility. More importantly, the LWRP is designed to establish a process to ensure that all actions proposed for a municipality's local waterfront revitalization area occur in an intentional fashion. This "consistency" provision is a tool that is intended to create dialogue and encourage cooperation between state, federal and local governments, as well as private sector interests, to build a strong economy and a healthier waterfront environment.¹

LWRP Planning Process

The LWRP planning process involved cooperation with state, county, local, and private agencies as well as an appointed LWRP Waterfront Advisory Committee (WAC) that included local business owners, municipal officials, and residents from the Village of Catskill. A key role of the WAC was to review and provide feedback on draft documents developed throughout the planning process. The development of this LWRP also considered efforts of many previous planning projects and studies that have occurred over the past decades.

As part of the planning effort, an inclusive public outreach effort was conducted to gain feedback from the community on existing land use and water use issues and to build consensus on the vision, projects, and policies to be supported by this LWRP. Public meetings were also held to share and explain drafts of the LWRP as they were being developed. Section 7 of this LWRP summarizes the community engagement process.

LWRP Vision and Objectives

This LWRP supports a healthy and culturally vibrant waterfront for the Catskill community, one that celebrates the importance of the Hudson River and Catskill Creek corridors for their recreational possibilities, historic resources, ecological functions, and beauty. The Village of Catskill defined the following vision and objective for their Waterfront Revitalization Area (WRA):

¹ More information on the Local Waterfront Revitalization Program can be found at <https://dos.ny.gov/local-waterfront-revitalization-program>.

Vision Statement

The Village of Catskill is a thriving, historic community located on both sides of Catskill Creek and at the confluence of the Creek and the Hudson River. The waterfront area is a unique and important asset for the Village of Catskill and Greene County, providing a home to several locally owned businesses and access to the waterfront. The area also serves as a local and regional destination for recreation and tourism activities.

Through the revitalization of the Catskill waterfront, residents and visitors will enjoy:

- *A **revitalized waterfront** that features a mix of uses (commercial, residential, retail, restaurants)*
- *A variety of **waterfront access points** that are appropriate for viewing, boating, fishing, and other water-based recreation activities*
- *A **walkable, vibrant downtown** that builds upon and protects the village's cultural, historic, and natural assets*
- *A **flood-resilient community** that protects and preserves natural resources including Catskill Creek, the Hudson River, wetlands, and floodplains*
- *An **affordable, family-oriented village** that is a great place to live and work*

Village of Catskill LWRP Summary

With this LWRP, the Village of Catskill worked to take on the challenges facing the waterfront along Catskill Creek and the Hudson River. The village focused their efforts on waterfront resources in order to prepare for future changes as well as to enhance the desirability of the community in which they live, work, and play. Participants throughout the development of this LWRP brought a shared desire to protect the open space resources associated with the waterfront, while also increasing public access to the water and adjacent lands for recreation. The key to the success of this LWRP will be to balance the protection of natural areas with the addition of public access and renewed and revitalized development so that together they can contribute to the vibrancy of the community. This LWRP seeks to achieve that balance.

The following is a summary of the seven sections that comprise the Village of Catskill LWRP:

Section 1 - Waterfront Revitalization Area Boundary

This section provides a detailed narrative and graphic description of the Catskill Waterfront Revitalization Area (WRA) boundary.

Section 2 – Inventory and Analysis

This section describes the existing conditions within the WRA and analyzes needs and opportunities facing the waterfront.

Section 3 – Local Waterfront Revitalization Program Policies

This section presents the LWRP policies that apply to the Village of Catskill WRA. The policy explanations of the New York State Coastal Management Program have in some cases been expanded to reflect the unique conditions within the village. These policies are based on the economic, environmental, and cultural characteristics of the village, and represent a balance between economic development and preservation, which will permit beneficial use of and prevent adverse effects on local waterfront resources. The policies serve as the basis for local and state consistency determinations for activities affecting the Catskill WRA. No policy is more significant than another. These policies are implemented by federal, state, and Village of Catskill local laws as outlined in Section 5.

Section 4 – Proposed Land and Water Uses and Proposed Projects

This section describes proposed long-term land and water uses within the WRA. This section also includes proposed short- and long-term projects the Village of Catskill would like to pursue to implement their LWRP. The proposed uses and initiatives outlined in this section have the potential to enrich the Catskill WRA by building on the unique characteristics of the community.

Section 5 – Techniques for Implementation of the Local Program

This section describes the local laws, management structure, and financial resources necessary to implement the policies and proposed uses set forth in Sections 3 and 4.

Section 6 - State Actions and Programs Likely to Affect Implementation

This section consists of a list of state actions and programs which must be undertaken in a manner consistent with the Village of Catskill LWRP, as well as a description of specific state actions necessary for further implementation of the LWRP.

Section 7 – Local Commitment and Consultation

The Village of Catskill LWRP will affect and be affected by the actions of adjacent municipalities and federal, state, regional, and county agencies. This section summarizes the actions taken by the Village of Catskill to obtain local input and support for their LWRP, and the efforts made by the village to involve and/or inform other agencies regarding the development of their LWRP.



Photo Credit: Village of Catskill

1 Waterfront Revitalization Boundary (WRA) Boundary

The Waterfront Revitalization Area (WRA) is the area that would be directly impacted by the policies and projects set forth in the Local Waterfront Revitalization Program (LWRP). The Village of Catskill is defined physically and economically by its location along Catskill Creek and at the confluence of the creek and the Hudson River.

1.1 Boundary Description

Waterfront Revitalization Area (WRA) Boundary

The Catskill Waterfront Revitalization Area (WRA) boundary, illustrated in **Figure 1**, is coterminous with the village municipal boundary. The WRA boundary is described as follows:

All land within the area designated as the Village of Catskill bounded on the north, west and southern sides by the Town of Catskill. The eastern, waterside, boundary is defined as the lands under the waters of the Hudson River to the border of Greene County and Columbia County, approximately located on the centerline of the Hudson River.

Harbor Management Area (HMA)

The Village of Catskill Harbor Management Area (HMA) includes the surface waters, harbors², and underwater lands of the Hudson River and Catskill Creek within the village, as illustrated in **Figure 1**. The HMA extends to the village boundary at the centerline of the Hudson River and the shoreline of Catskill Creek.

² In the Catskill Harbor Management Plan, the Village has chosen a smaller waterside regulatory area known as “Catskill Harbor” that includes a portion of the HMA along Catskill Creek.

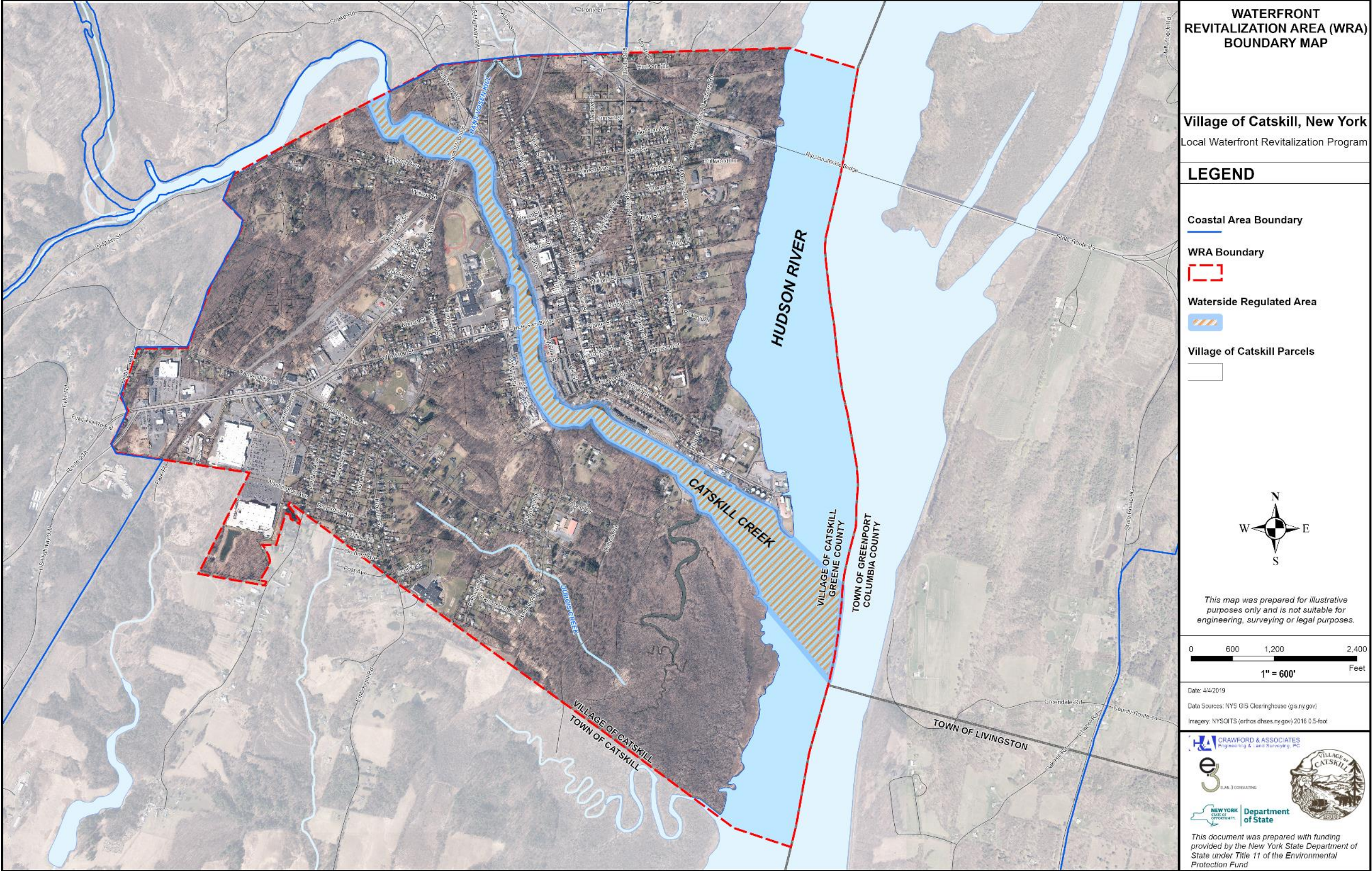


Figure 1. Catskill Waterfront Revitalization Area (WRA) Boundary Map.



Photo: Downtown Catskill

2 Inventory and Analysis

This section provides an overview of existing features, conditions, and resources within the Catskill Waterfront Revitalization Area (WRA) and the Harbor Management Area (HMA). The village's waterfront assets, issues, and opportunities are mapped and assessed.

The section begins with a detailed inventory of community demographics, developmental characteristics, and natural and built environments. The section concludes with a summary of the analysis of community strengths, challenges, and opportunities and vision statement.

2.1 Regional and Community Characteristics

LOCATION

The Village of Catskill is located on the western shore of the Hudson River in Greene County and is the county seat. The village covers approximately two square miles in the northeast part of the Town of Catskill. The village is easily accessible from the NYS Thruway (I-87) and US Route 9W. Catskill is a 45-minute drive from Albany and a 2.5-hour drive from New York City.

Greene County is in southeast central New York State. Its northern and eastern regions are mostly low-lying flatlands in the Hudson Valley. The southern and western areas rise sharply into the Catskill Mountains and include some of the tallest peaks in the state south of the Adirondacks, such as Hunter Mountain. This area contains part of the Catskill Park. Tourism is a strong component of the county economy.

DEMOGRAPHICS

According to U.S. Census Bureau's 2013-2017 American Community Survey (ACS) 5-year population estimates, the Catskill WRA was home to 3,894 residents in 2017. This figure represents a slight decline from the 4,081 residents reported during the 2010 Census. Overall, the village has been experiencing a long-term population decline since 1970.³

The population in the WRA is relatively younger and less wealthy than that of the county. In 2017, the median age of WRA residents was 39.7 compared to 44.0 countywide. Income levels in the WRA are significantly less than in Greene County. In 2017, the median household income for the WRA was \$35,024, compared to \$53,214 countywide. The percentage of individuals who are living in poverty in the WRA was 29.2% in 2017. This figure is more than double the 12.4% estimated for residents of Greene County.⁴

WRA PROFILE	
<i>Population</i>	3,894
<i>Median Age</i>	39.7
<i>Median Household Income</i>	\$35,024
<i>Poverty Rate</i>	29.2%
<i>Housing Units</i>	1,889
<i>Businesses</i>	575
<small>2013-2017 ACS 5-year estimates. Village of Catskill Comprehensive Plan 2020</small>	

The majority of the WRA is within a Potential Environmental Justice Area (**Figure 2**), defined by New York State as U.S. Census block groups of 250 to 500 households each that, in the Census, had populations that met or exceeded at least one of the following statistical thresholds:

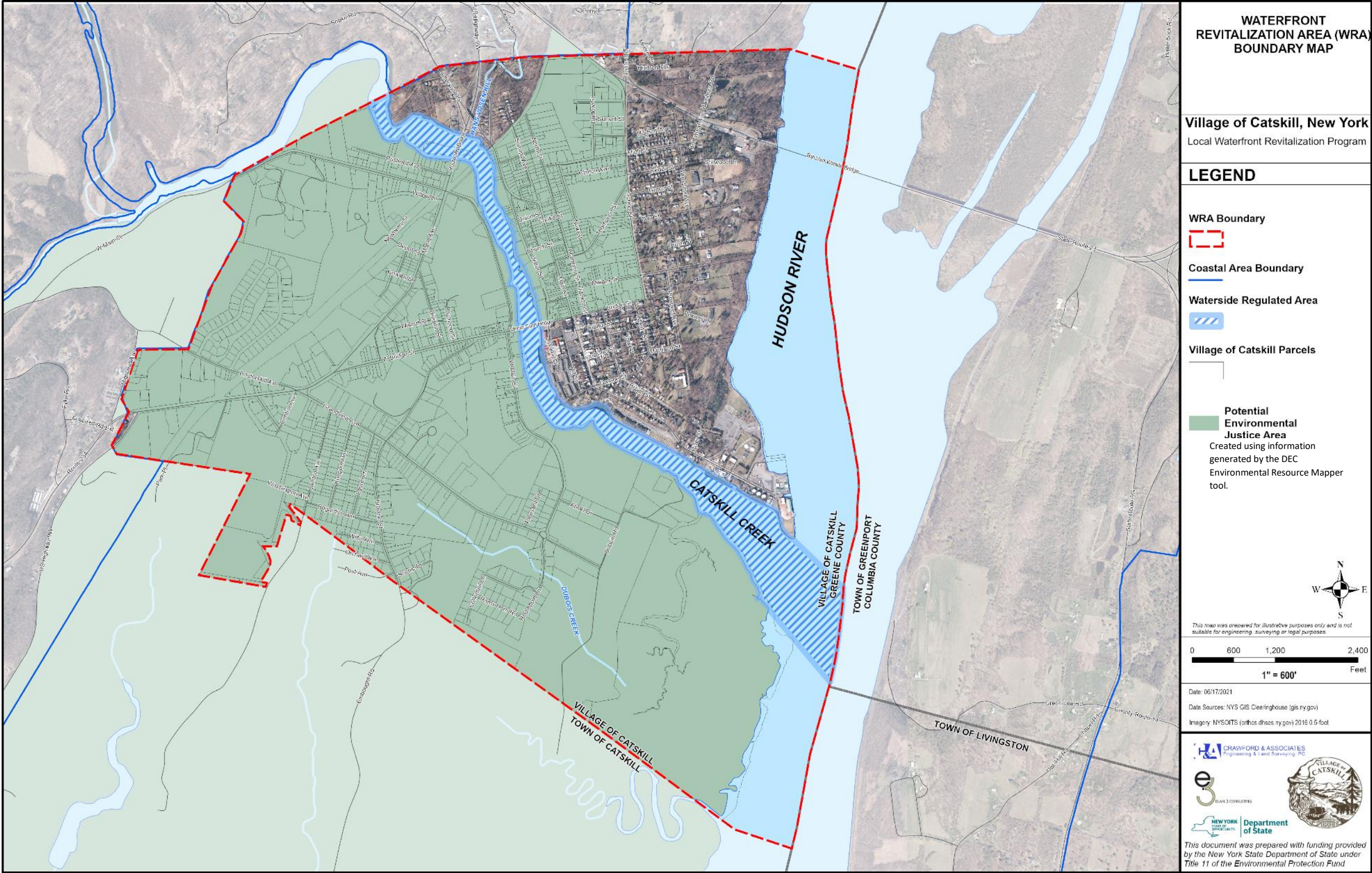
1. At least 51.1% of the population in an urban area reported themselves to be members of minority groups; or
2. At least 33.8% of the populations in a rural area reported themselves to be members of minority groups; or
3. At least 23.59% of the population in an urban or rural area had household incomes below the federal poverty level.⁵

³ U.S Census, American Fact Finder. The WRA is equal to the area of the Village of Catskill.

⁴ U.S. Census 2013-2017 ACS 5-year estimates. The census poverty level differs from the federal poverty level.

⁵ The Federal Poverty Level in 2017 was \$12,060 for an individual and \$24,600 for a four-person household.

Figure 2. Potential Environmental Justice Area.



HOUSING

According to U.S. Census Data, in 2017 there were 1,889 housing units in the WRA. The number had increased 14% since 2000 when there were 1,660 housing units. More housing units and fewer people suggests that there has been an increase in second homeowners in the WRA. Those with a primary residence elsewhere are not counted in the village census.⁶

The housing stock is also changing. Between 2010 and 2017, the number of single-family detached units decreased 13.15% from 750 to 652. During the same period, the number of housing units in 3 to 4-unit apartment buildings increased 74.32% from 197 to 344. Meanwhile, the percentage of owner-occupied housing units decreased from 56.4% to 49.2%. These changes in housing type and occupancy likely reflect the conversion of single-family homes to multi-family and/or short-term rental apartments.⁷

The WRA has a variety of distinct residential development types:

1. Older, established neighborhoods located near Downtown or former industrial areas
2. Suburban style subdivisions located further from Downtown
3. Garden apartments, row houses, and above-the-store housing units in the heart of Downtown
4. Upscale, Townhouse-style units along Catskill Creek

Many of Catskill's single-family homes date back to the mid-nineteenth and early-twentieth centuries and represent a rich variety of architectural styles including, but not limited to, Victorian, Greek Revival, Queen Anne, Italianate, and French Second Empire. Some of these homes are eligible for listing on the State and National Historic Register and are within the village's historic district. Most of these homes are situated on relatively small lots, which results in a dense pattern of development that allows Catskill's residents to conveniently walk to Downtown and local institutions.

ECONOMY AND EMPLOYMENT

Tourism is a major driver of the economy within Greene County. Catskill's location on the Hudson River and Catskill Creek helps it attract tourists from around the region, especially during the summer months. These tourists support the village's local businesses including specialty shops, restaurants, retail stores, markets, and others. There are also several businesses that cater to the everyday needs of the local population.

As of 2012, the WRA was home to 575 privately owned businesses. Many of these businesses are found along Catskill's Main Street in a small, walkable downtown area. Several businesses are also located along Bridge Street and the well-traveled NYS Route 9W.⁸

The 2017 ACS 5-year estimates on the occupational characteristics of the WRA indicate that a large portion (38.7%) of employed village residents work in educational services, health care, and social assistance. Public administration (14.9%) and retail trade (12.6%) are the next largest sectors. A lack of job diversity or an

⁶ U.S. Census 2013-2017 ACS 5-year estimates

⁷ 2017 American Community Survey; 2012 U.S. Census Bureau; and 2009-2011 American Community Survey 3-year Public Use Microdata Samples [SAS Data file].

⁸ 2012 Local Survey of Business Owners, cited in the Village of Catskill Comprehensive Plan, 2020

overdependence on seasonal markets can reduce a community's resilience to market and economic shifts.

A 2019 study on the economic impact of tourism in the Catskills conducted by the Greene County Economic Development Corporation in conjunction with Tourism Economics indicates tourism generates 17% of total employment for the Catskills region.⁹ In 2019, tourism in the Catskills region was a \$1.6 billion industry supporting almost 20,000 jobs, including approximately 3,380 jobs in Greene County. Lodging and second homes accounted for the majority of traveler spending, totaling almost \$1 billion in the region and \$107 million in Greene County.¹⁰

As reported by Hudson Valley Patterns for Progress in 2018, only 24% of Catskill residents work in the village and 40% work in Greene County. Approximately 57% of residents aged 16 and over are employed and 10% are unemployed. The remaining 33% are not in the labor force, including retirees.¹¹

OVERVIEW OF THE WATERFRONT REVITALIZATION AREA

While the WRA includes the shorelines of both the Hudson River and Catskill Creek, only Catskill Creek has been the historic focus of waterfront development. The village has approximately four miles of shoreline on Catskill Creek, two miles on each side of the Creek, and an additional 2.1 miles of shoreline along the Hudson River. The shoreline along the Hudson River is characterized by steep bluffs 100 to 180 feet high. There is a gradual sloping downward to Catskill Point, a point of land on the northeast side of the confluence of Catskill Creek and the Hudson River, which is approximately at sea level. South of the Creek and along the shoreline of the Hudson River is the tidal wetland RamsHorn Marsh, which is a New York State designated Significant Coastal Fish and Wildlife Habitat. The shoreline along the Hudson River is largely under private ownership.

Catskill Creek extends from the Hudson River approximately two miles northwest to the village border. Four bridges provide transportation across the Creek connecting the east and west sides of the village. They are, from east to west, the Uncle Sam Bridge (Bridge Street/ NY-385), Black Bridge (railroad bridge converted into a pedestrian bridge), the CSX Catskill Creek railway bridge, and the Route 9W bridge. Catskill Harbor extends from the mouth of the Creek to the Uncle Sam Bridge and is a federal navigation channel. The U.S. Army Corps of Engineers (USACE) is responsible for reporting the conditions of Federally maintained navigation channels. Routine maintenance dredging by the USACE is necessary to maintain the navigation channel used by the barges and freighters which utilize the Port of Albany and the few remaining industrial sites along the upper river.¹² The Harbor includes several marinas and amenities that attract boaters to the village. The village is unique in Greene County in that its harbor area is proximate to its downtown commercial area.

HISTORICAL DEVELOPMENT OF WATERFRONT REVITALIZATION AREA

As stated in The Catskill Harbor Study and Management Plan prepared by Geoffrey Steadman of Westport Connecticut, much of the history of Catskill can be told with reference to Catskill Harbor and Catskill Point. Opportunities for navigation afforded by the Harbor and Hudson River contributed most prominently to the

⁹ Tourism Economics, 2019 "Economic Impact of Visitors in New York, 2019: Catskills Focus" accessed July 2024 from <https://greenecountyedc.com/wp-content/uploads/2021/09/Catskills-2019-NYS-Tourism-Economic-Impact.pdf>

¹⁰ Catskills 2019 NYS Tourism Economic Impact

¹¹ Hudson Valley Patterns for Progress, Urban Action Agenda, *Community Profile, Village of Catskill*, January 2018.

¹² US Army Corps of Engineers

development of not only the Village of Catskill but also the entire Catskill region of New York State. The port of Catskill was one of the earliest and busiest commercial centers on the Hudson River. Over the years, hundreds of thousands of passengers and millions of tons of freight passed through the port, the most visible part of which was Catskill Point.

The first Dutch settlers of Old Catskill (now Leeds, four miles inland) established a port at Catskill to ship farm products up and down the River. The present-day Catskill was called the “Landing”, and its commerce grew with settlement of the region.

Main Street extended along the east shore of the Harbor as early as 1741. In 1800, Main Street became part of the Susquehanna Turnpike which connected points west with points east of the Hudson River by means of ferries that docked at the foot of Main Street near the present location of the Catskill Marina. The growth of commerce was such that the village was chartered in 1806, after being named the Greene County Seat when the county formed in 1800.

Catskill Point at the mouth of the Catskill Creek is among the most historic places on the Hudson River. The Point was originally an island and was connected in the early 19th century to lower Main Street by a causeway and “the long wharf.” It was one of the earliest and busiest transfer points between vessels and land transportation. Its development led to the growth of local commerce and the introduction of tourism to the Catskill Mountains. Catskill was a favored port for sloops and other freight carriers. With the advent of the steamboat in the early 1800’s, the port also became a regular stop for Hudson River steamers. The waterborne traffic led to the growth of local and water-dependent industries, many of which were established near the Catskill Harbor, including along the Upper Harbor north of the Uncle Sam Bridge. At that time, the bridge functioned as a lift bridge to allow large ships to pass upstream.

After 1825, local shipping industries suffered as a result of competition from the Erie Canal, causing the port to rely more on such local industries as brickmaking, textile manufacturing, ice-harvesting, and tourism for business. Stagecoach service between the village and the Catskill Mountains was started in 1830. Visitors arrived in the Harbor by steamboat and then traveled by stagecoach to the Catskill Mountain House and destinations farther west. The Catskill Mountain House ultimately achieved national fame as the country’s first mountain resort.

Regular steamboat service to and from Catskill by the famous Hudson River Day Line began in 1863, using the wharf at Catskill Point. Competing lines were also established, including the “Night Line” operated by the Catskill Steamboat Company which docked upstream on the east shore of the Harbor. In 1882, the Catskill Mountain Railroad was built to replace the stagecoaches linking the village with the Catskill Mountain House. The trains ran from the Point up Water Street, across the Black Bridge, and along West Main Street towards the mountains. The resort trade through the Harbor brought Catskill to its greatest prosperity at the end of the 19th century and persisted into the 20th century.

The commercial/industrial business of the port began to decline in the early 1900s with the development of the railroads and increasing use of cars and trucks. Tourist traffic also began to diminish, though more gradually. The Mountain Railroad stopped running in 1918, and the Night Line made its last trip in 1932. The Day Line continued until after World War II, but with decreasing frequency.

Today, the freight vessels and passenger ships of the past have been replaced by recreational boats, and the Harbor retains its vitality. As evidenced by the LWRP and other recent waterfront studies and planning efforts, public attention is again being directed toward the opportunities for community enhancement and development associated with the Harbor, and Catskill's water-related heritage is now recognized as an important Harbor resource. Much of the village east of the Harbor is a designated Historic District listed in the National Register of Historic Places, and there are several individual structures with historic significance along the Harbor.¹³

SUMMARY OF EXISTING PLANS, PROJECTS AND INITIATIVES

Over the past 20 years the village and particularly its waterfront area have been the subject of several studies and plans that affect the WRA. Prior to this period, the village had undertaken the task of developing a Harbor Management Plan (HMP) and LWRP in the early 1990's. New York State accepted the HMP but never formally approved the LWRP.

Additionally, in 2007 a Joint Comprehensive Plan for the Village and Town of Catskill was produced following an extensive planning process. The village, however, did not formally adopt the Plan.

A summary of the existing plans, projects and initiatives that affect the WRA is provided below.

Greene County Comprehensive Economic Development Plan, July 2007

This Plan lays the groundwork for economic revitalization on a County-wide level, through analysis of the County's historic and existing economic profile, its local and regional market conditions, and its strategic positioning to take on new economic roles. The following goals of the County Plan are relevant to the Village of Catskill:

1. Generate long-term revenue growth in the tourism industry as a strategy for economic development. Objectives include:
 - Promoting Greene County as a four-season vacation destination by cultivating arts and history attractions, mid-week meetings and conferences, and also with special events and trip packages;
 - Supporting efforts to adapt attractions and accommodations to the expectations of the travel market;
 - Developing retail amenities and services for tourists;
2. Preserve and enhance the physical and environmental characteristics that make Greene County a distinct and identifiable place, while providing for the needs of existing and prospective residents. Objectives include:
 - Identifying incentives to promote investment in established communities and designated growth areas;
 - Promoting policies to improve the general appearance of the County and prevent blight; and,

¹³ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, *The Catskill Harbor Study and Management Plan*, March 1992, revised April 1993 and June 1994.

- Supporting the revitalization of downtowns and Main Street areas.¹⁴

Water Dependent Use Inventory and Assessment Study, July 2008

In July of 2008, Community Natural Resource Solutions completed a Water Dependent Use Inventory and Assessment Study for the Greene County Soil and Water Conservation District and Greene County Planning and Economic Development. The study inventoried and assessed the waterfront areas of Greene County, including Catskill Creek, and evaluated the opportunities and challenges to development or redevelopment. An analysis of the waterfront areas of the Village of Catskill is included in Section 7 of the study.

The study references the 2007 Joint Comprehensive Plan completed but not adopted by the town and village, the LWRP completed but never formally approved, and The Catskill Harbor Study and Management Plan completed in March of 1992 and revised in June of 1994.

According to the Study, the LWRP process in Catskill began as a joint Town of Catskill/Village of Catskill effort in 1984. Planning activities continued into the early 1990's but were stopped sometime in the mid to later 1990s. According to the Study, in 2003 and 2005, the village did adopt and codify local laws recommended in the LWRP. The issues discussed in the study include the following:

- Increased public access to the waterfront, including working with private property owners to permit access
- Support for marinas and water-dependent uses, particularly through planning and zoning, as a means for economic development
- Creating linkages between pocket parks, green space, and the waterfront for passive recreation
- Installing signage to link waterfront activities to downtown shopping
- The need to address creek side flooding and erosion
- The desire to enhance and develop additional public boating facilities

The study also references two recommendations from the 2007 Comprehensive Plan which had been implemented: the repair of Black Bridge and the completion of a LWRP. A copy of the study is available in the Appendices.

Downtown and Waterfront Revitalization Strategy, 2010

The Downtown and Waterfront Revitalization Strategy was developed through a planning process that involved all community members with the help of several County-level entities, the Town of Catskill, the Village of Catskill, and the Heart of Catskill Association. The strategy took a comprehensive and in-depth look at Catskill's assets, desires, needs and challenges and created a vision for the community. The vision recognized the unique combination of geography, history, nature, community and culture in the village and identified the waterfront as the focal point of the community.

¹⁴ Elan Planning, Design, Landscape Architecture, PLLC. 2017. *Village of Catskill Brownfield Opportunity Area, Nomination – Phase II*. Prepared for Village of Catskill and Greene County, NY. January 2017.

The strategy proposed that waterfront properties be developed and utilized in a way that takes maximum advantage of their waterfront location, provides recreational opportunities, and provides public access to and views of the water. The strategy envisioned a future where those who live, work, and play in the village can find all the activities, opportunities, and amenities they need for a high quality of life and a rewarding experience.

Within this study, the following market opportunities were identified:

- Lodging
- Museum and Interactive Center
- Tourist Attractions and Destination Development
- Water-Based Recreation and Tourism
- Retail
- Restaurants

The report recognized that public investment is a critical component of any successful community revitalization and identified the following areas where public investment should be focused:

- Streetscape Improvements
- Trees
- Lighting – consistent and correct scale
- Sidewalks, curbs and crosswalks
- Trash cans and benches on Main and West Bridge St.
- Information and Wayfinding Signage
- Waterfront Walkway
- The Slides – clean, repair, improve for safety
- Public docks and boat launches
 - Catskill Point and near downtown canoe and kayak launch



Photos of Catskill Main Street Streetscape.

Within the study, the village was divided into neighborhoods or areas that function as a distinct area with a unique personality or set of store types. Physical enhancement strategies were developed for each sub-district.

The **Catskill Creek Point District** contains Catskill Point Park, Dutchman's Landing Park and a variety of municipal and private landholdings, creating an opportunity to connect people with water and the Hudson River landscape.

The **Lower Main Street District** connects Main Street to Catskill Point, through a residential neighborhood. As the critical connection between two major areas of the village, this area presents opportunities for streetscape and transportation enhancements.

The **Waterfront Entertainment District** around Uncle Sam Bridge will function as a center for entertainment, with a marina or maritime theme. The district has been identified as offering opportunities for recreation, entertainment, culture, and lifestyle with waterfront activities at the forefront of the experience.

The **Main Street District** represents the first impression of the village for many visitors. As such, significant opportunities for streetscape and downtown enhancement have been identified.

The village includes three **Gateways**: the intersection of Main St and NYS Route 9W, intersection of NYS Route 23 and Spring St around Rip Van Winkle Bridge, and the location where West Bridge Street converges with NYS Route 9W. These areas can be improved to entice visitors to the downtown area.

A copy of the strategy is available in the Appendices.

Summary Design Report, Downtown and Waterfront Enhancements, 2013

The Summary Design Report, Downtown and Waterfront Enhancements was coordinated by the Greene County Economic Development, Tourism and Planning Department and advanced some of the planning ideas presented in the Downtown and Waterfront Revitalization Strategy developed in 2010. The report discusses the Catskill Creek Trail Loop, the Bridge Street Streetscape, Water Street Streetscape, and Main Street Streetscape projects. The goal of the report was to advance several projects by providing designs that improved access to and around Catskill Creek waterfront and strengthened connections to Downtown and Main Street. The suggested improvements generally address access, safety, aesthetics, and walkability.

The Catskill Creek Trail Loop project, including repairs to the Black Bridge, has been completed and is a valuable addition to the community. The Water Street Streetscape Enhancement described in the Summary Design Report presented two alternatives for Water Street Streetscape Enhancement and recommended that further design development be coordinated with potential future developers at the time of their potential redevelopment projects. The Water Street Streetscape Enhancement project is thus not included in this LWRP.

While the Village of Catskill has advanced several of the projects identified in the Design Report, further streetscape enhancements along Main Street are necessary to improve pedestrian safety and enhance connections to the Catskill Creek waterfront. A copy of the design report is included in the Appendices.

Resilient Catskill, Report of the Waterfront Resilience Task Force, 2014

Tropical Storms Irene and Lee (2011) and Superstorm Sandy (2012) caused unprecedented flooding damage to waterfront homes and businesses in the village and prolonged disruption of services and access in some neighborhoods. In response, a Waterfront Resilience Task Force was formed to examine flooding and sea level rise in the context of a revitalized village and waterfront. The initiative was funded by the NYS Department of Environmental Conservation (DEC) and facilitated by Scenic Hudson and others.

The Task Force first completed a Village of Catskill Inventory and Coastal Risk Assessment in January 2014. Using the outcomes of the assessment, the Task Force then synthesized a list of recommendations to serve as a flood and sea level rise action plan. Implementing the recommendations would protect valuable assets and create a safer, more resilient, and vibrant waterfront in the Village of Catskill. The Task Force report has informed the resiliency analysis and recommendations of this LWRP. A copy of the report is included in the Appendices.

All-Hazard Mitigation Plan, Jurisdictional Annex for the Village of Catskill, 2009 and 2016

The All-Hazard Mitigation Plan developed in 2009 and updated in 2016 identified flooding, severe storms, and severe winter storms as the hazards that pose the highest risk to the Village of Catskill. Ground failure was ranked as a medium risk and earthquake as a low risk. In the 2016 update, the village proposed the following hazard mitigation actions:

1. (V)CAT-1: Wastewater Treatment Plant Flood Mitigation – extend the height of the concrete wall, install aluminum plates on all glass doors and windows of the building, and install outward opening doors on the wetwell and drywell outside entrances.
2. (V)CAT -2: Implement the Resilient Catskill Plan.¹⁵

Climate-adaptive Design Studio, 2016

The Climate-adaptive Design (CaD) Studio is a research effort in partnership with Cornell Landscape Architecture, Cornell Water Resources Institute, and the NYS DEC Hudson River Estuary Program. As part of this effort a group of landscape architecture students from Cornell University worked with the village to explore more climate resilient and connected waterfront areas. Community stakeholders were engaged through the design process. Student designs were presented to the public and contained elements that the village and individual property owners may wish to consider as a future waterfront is envisioned. There were four design concepts:

1. Redevelop the east and west banks of Catskill Creek and up to Water Street
2. Create a “Catwalk” with stormwater art installations to attract visitors and residents to the village’s new waterfront trail. It carries the village’s theme of park “slides” connecting residential areas to downtown all the way to the waterfront through a new pedestrian-only walkway on Canal Street.

¹⁵ Village of Catskill, 2014. *Resilient Catskill: Roadmap for Catskill’s Waterfront*. Report of the Catskill Waterfront Resilience Task Force.

3. Connect creek-side features with the creek trail loop to link sustainable shoreline bioengineering techniques, proposed floodable park spaces, and a new Water Street corridor and turn the downtown back toward the waterfront within the constraints of projected flood elevations.
4. Tie the businesses and open spaces along each side of the creek together through a series of “anchor points.” These locations can activate the waterfront by connecting sites, views, and people along Catskill Creek while addressing climate adaptation goals.¹⁶

Zoning Code Analysis for Flood Resiliency, 2017

A recommendation of the Waterfront Task Force, as included in its report, was to “identify which/how local codes can be modified to better weather and adapt to future storms and account for sea level rise”. With funding from DEC, Hudson River Estuary, and Local Stewardship Program, Crawford & Associates Engineering & Land Surveying, PC reviewed the village’s zoning codes, Flood Damage Prevention Law (FDPL), and the NYS Uniform Code (Building Codes) and determined that the existing boundaries of the village’s 100-year floodplain as defined by FEMA did not include areas that flooded during the storms of 2011 and 2012. The Analysis considered NYS Flood Risk Management Standards and NYS Building Uniform Codes and presented a potential flood overlay district that extended to the 500-year floodplain. Sub-districts based on the Floodway, the 10-year floodplain and the 100-year floodplain were also presented. The Report also addressed consideration of potential uses within the subdistricts based on the village’s plan for adaptation to sea level rise: retreat, accommodate, or fortify. Potential zoning regulations were developed that incorporate the requirements of the FDPL such that it is applicable beyond the 100-year floodplain and that allows for accommodation to rising flood levels by requiring first floors to be constructed above existing base flood elevations, as currently required by the FDPL and suggested by the State Flood Risk Management Standards. The Report lays out a regulatory framework which can guide the village as it decides on its response to sea level rise.

Village of Catskill Brownfield Opportunity Area, Nomination – Phase II, 2017

The Catskill Brownfield Opportunity Area (BOA) Nomination is a multi-disciplinary study with a comprehensive approach to brownfield redevelopment based on sound planning principles, environmental analysis, and market analysis. The Catskill BOA study area included properties located in the village’s downtown and along Catskill Creek. The area is characterized by a mix of former mills, vacant and underutilized sites, residential properties, existing businesses, and waterfront and recreation uses. The primary objectives to be achieved through the Nomination Study were to: identify catalytic sites for redevelopment; strengthen the downtown’s commercial core and tax base; enhance water dependent uses; and establish a definitive pedestrian and vehicular connection between the waterfront, downtown, and Catskill Point.¹⁷

Based on an extensive public participation process, the Steering Committee developed the following vision for

¹⁶ Trophic Design. *Climate Adaptive Design*. Available at: <https://trophic.design/cad/catskill>. (Accessed September 2020)

¹⁷ Elan Planning, Design, Landscape Architecture, PLLC for Village of Catskill, Greene County IDA and NYS DOS, Village of Catskill Brownfield Opportunity Area, Nomination – Phase II, January 2017

the Catskill BOA. It is of note that this served as the basis for the LWRP Vision Statement.

“The Village of Catskill is a thriving, historic community located on both sides of Catskill Creek and at the confluence of the Creek and the Hudson River. The BOA study area is a unique and important asset for the Village of Catskill and Greene County, providing a home to several locally owned businesses and access to the waterfront. The area also serves as a local and regional destination for recreation and tourism activities.

Through the revitalization of the Catskill BOA, residents and visitors will enjoy:

- A **revitalized waterfront** that features a mix of uses (commercial, residential, retail, restaurants)
- A variety of **waterfront access points** that are appropriate for viewing, boating, fishing and other water-based recreation activities
- A **walkable, vibrant downtown** that builds upon and protects the village’s cultural, historic and natural assets
- A **flood-resilient community** that protects and preserves natural resources including Catskill Creek, the Hudson River, wetlands and floodplains
- An **affordable, family-oriented village** that is a great place to live and work”

The BOA study identified fourteen priority sites and three sub-area strategic sites and included project recommendations for each. The development of the three sub-areas was considered to have the potential to serve as a catalyst for area-wide change. The three sub-area strategic sites are identified as follows:

Table 1. BOA Sub-Area Parcels.

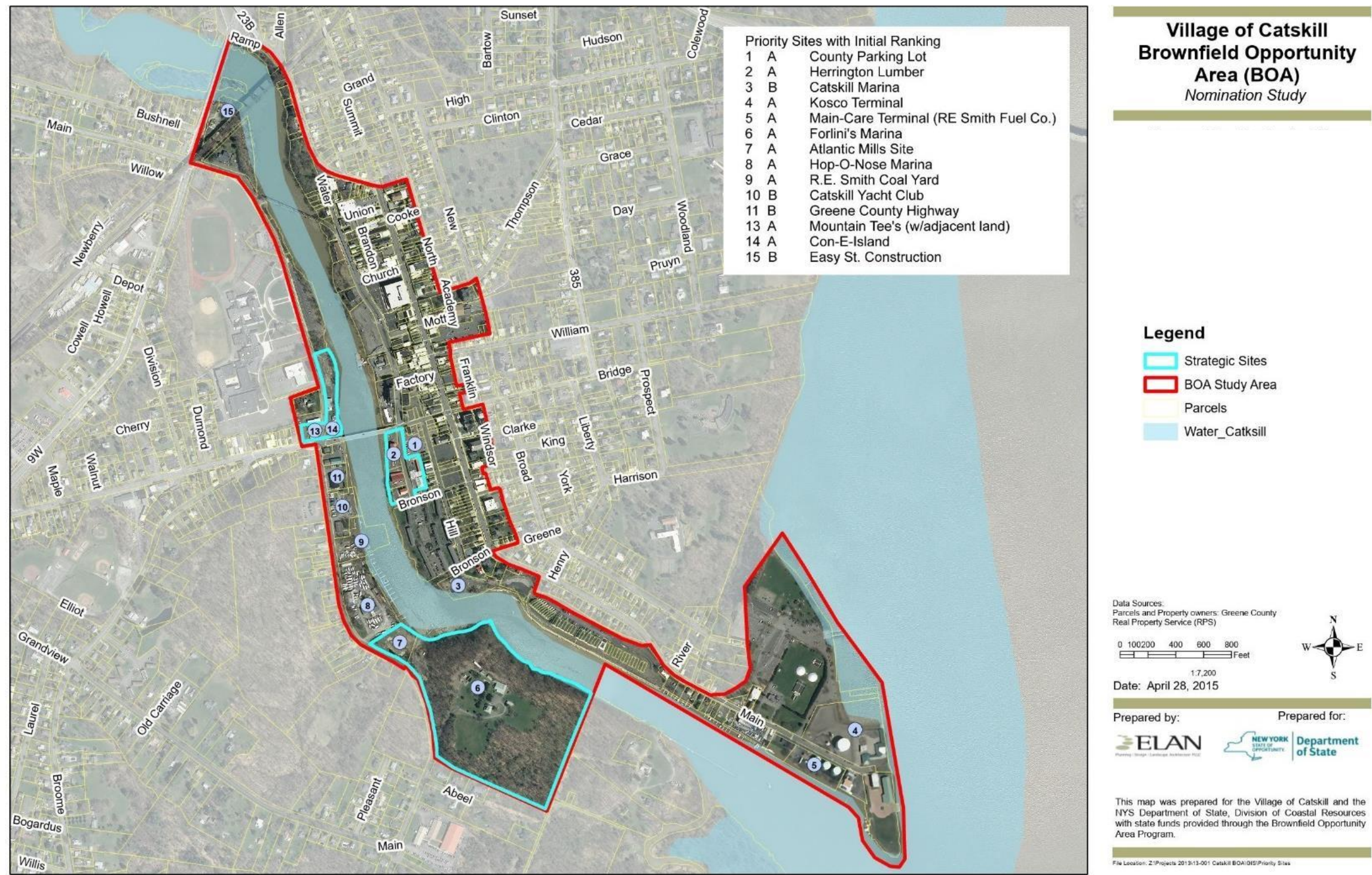
BOA Sub-Area	Parcels
Sub-Area 1	Mountain Tee’s (tax parcel 156.78-1-15) Con-E-Island (tax parcel 156.78-1-16)
Sub-Area 2	Lumberyard (formerly Dunn’s) (tax parcels 156.78-5-1, 172.05-3-2, 172.05-3-1, 172.05-3-19, 172.05-3-18, 172.05-3-17)
Sub-Area 3	Forlini’s (tax parcel 172.05-5.11) Atlantic Mills (tax parcel 172.05-5-10)

Figure 3. Catskill BOA Strategic Sites Map is provided on the following page.

A concept plan was prepared as part of the BOA study for each of these sub-areas. The LWRP recommends implementation of several of these concepts.

A copy of the BOA study is included in the Appendices.

Figure 3. Catskill BOA Strategic Sites Map.¹⁸



¹⁸ Elan Planning, Design, Landscape Architecture, PLLC. 2017. *Village of Catskill Brownfield Opportunity Area, Nomination – Phase II*. Prepared for Village of Catskill and Greene County, NY. January 2017.

Risk and Engineering Review of Wastewater Treatment Plant & Pumping Stations: Improving Resiliency of The Village of Catskill Wastewater Treatment Plant to Flooding and Sea Level Rise, 2017

A recommendation of the Waterfront Task Force Report was that a Risk and Engineering Review be completed at the village's wastewater treatment plant. Funding for the Review was secured from the DEC Hudson River Estuary, Local Stewardship Planning program. Crawford & Associates Engineering & Land Surveying, PC completed the study, which included a review of the collection system, three pump stations, and the wastewater treatment plant. The review included a risk assessment of the following hazards: sea level rise, a 100-year storm, a 25-year storm, and regular inundations during high tide. The consequences of flooding impacts and possible adaptation alternatives were considered.

The review used the sea level rise projections from the Resilient Catskill Report, which was completed prior to the DEC producing their own projections. The Catskill projections are specific to the village while the DEC projections are broader. The Catskill Report projections fell into the medium to high-medium projections from the DEC.

In general, the building and the access road to the plant are projected to experience regular inundation by high tide between the 2050s and the 2080s. By 2100, most of Catskill Point is expected to be regularly inundated by high tide. The recommended adaptation Options and Costs for the wastewater treatment system components is presented in **Table 2**.

Table 2. Recommended Adaptation Options and Costs.¹⁹

	2017	2020s	2030s	2050s
Collections System	Install CSO Check Valves - \$30,000			
	And Continue Sewer Separation and Regularly Scheduled Maintenance			
Pump Station #1	Rebuild and Dry Floodproof Structure - \$200,000 Install Automatic Controls - \$15,000			Add Fill to Elevate Ground Surface or Surround Foundation with Sheet Piling
	And Elevate / Upgrade West Main Street (1)			
Pump Station #2	No Action Needed			
Pump Station #3	Build 2 nd Story, Dry Floodproof Structure and Elevate Surrounding Ground Surface - \$300,000			
WWTP Building (Headworks, Disinfection Equipment, Sludge Press, Administrative Offices)	Dry Floodproof Structure - \$260,000		Reassess SLR, Make Decisions for Catskill Point (2)	Relocate WWTP (2), or Preserve Catskill Point (2)

¹⁹ Crawford & Associates Engineering, PC Risk and Engineering Review of Wastewater Treatment Plant & Pumping Stations, October 25, 2017

WWTP Yard (Primary Settling Tanks, Trickling Filters, Final Settling Tank)			Address long-term viability, see WWTP Building (2)	
Final Settling Tank	Elevate Electrical Equipment - \$17,000			
Backup Generator	Dry Floodproof Structure - \$220,000		Address Long-Term Viability, see WWTP Building	

1. Coordinate with village-wide plans to protect existing waterfront access.
2. Coordinate with village-wide plans for Catskill Point.

Table Source: Risk and Engineering Review of Wastewater Treatment Plant & Pumping Stations: Improving Resiliency of The Village of Catskill Wastewater Treatment Plant to Flooding and Sea Level Rise, 2017

An adaptations summary for wastewater system components is included below. A copy of the full review is included in the Appendices.

Collection System

The village reviews the impacts of proposed projects on surface and groundwater resources through the SEQRA process. Additionally, the village has eliminated over 16 combined sewer overflows (CSOs) and remains committed to eliminating the four CSOs that remain by seeking additional funding through the NYS Environmental Facilities Corporation (EFC) Water Infrastructure Improvement (WIA) and Intermunicipal grants (IMG) programs. The village further protects the water quality of Catskill Creek through its zoning code by requiring sewage pump out facilities at all new marinas and expansion of existing marinas. The village will continue to implement regularly scheduled maintenance projects to minimize infiltration to the Wastewater Treatment Plant (WWTP) through poorly sealed manhole covers and leaky pipes during storm events.

One of the recommendations in this LWRP is for the village to continue with actions to meet its goal of eliminating all CSOs. It is also recommended that CSOs 003A, 004 and 007A either have check valves installed, as suggested in the review, or be eliminated via a separation.

Pump Station #1

The review recommended that Pump Station #1 be rebuilt in its current location and dry floodproofed to 17.5 feet as soon as possible. This floodproofing elevation is consistent with guidelines in the Community Risk and Resiliency Act assuming a 50-year lifetime for the rebuilt pump station and should make the structure resilient to a 100-year storm through 2100. In the 2050s, the village might decide to take action to assess the observed rate of sea level rise and protect the structure foundation from regular inundation at high tide by either adding fill or sheet piling around the pump station. Future infrastructure and building updates will be constructed in accordance with DEC regulations from 6 NYCRR Part 490.

Access to the facility remains vulnerable with this adaptation option, though improvements to West Bridge Street should be considered in the context of village-wide planning efforts to protect the existing waterfront. In the short term, the pump station could be made more autonomous by installing a SCADA system to allow remote control of the pumps. Increasing storage capacity would also make pump station #1 more able to go

offline during a flood if necessary and should be coordinated with the overall sewer separation and reconfiguration of the collection system in the area.

Pump Station #3

The review recommended that the first floor and roof of pump station #3 be elevated on its current foundation and filled to increase the height of finished grade in the access driveway and surrounding the building foundation as soon as possible. Pump station #3 is in a low-lying area such that the structure would not be too obtrusive if elevated. Additionally, this option allows the existing pumping equipment to be used through the remaining service life. As discussed above, it is recommended that the first floor and access door be elevated to 22 feet, the finished grade around the structure be elevated to 16-17 feet, and the access driveway be regraded to have a minimum elevation of 14.5 feet.

The recommendations to increase the resiliency of Pump Stations 1 and 3 have been included as a project identified in Section 4 of this LWRP.

Waste Water Treatment Plant (WWTP)

As soon as possible, it is recommended that the WWTP Building be dry floodproofed to 14.5 feet, which is the projected 1% (100yr) ACF in the 2030s plus three feet of freeboard as recommended by the Community Risk and Resiliency Act amended Environmental Conservation Law (ECL) Article 6 (Smart Growth Public Infrastructure Policy Act [SGPIPA])²⁰. Additionally, the electrical equipment at the final settling tank requires immediate elevation and the structure housing the backup generator needs dry-floodproofing.

In the 2030s, the village should compare sea level rise observations to projections and plan to either relocate the WWTP or elevate the WWTP in its current location and preserve the Catskill Point.

Regarding these options, the study included discussions of WWTP relocation, along with the preservation of Catskill Point and elevation of WWTP. These discussions are summarized below.

Alternative 1: Relocate WWTP

Relocating the WWTP to an area outside of the flood zone was considered as an adaptation option and several sites were considered. The Friary parcel on Harrison Street was considered with the assumption that a new pump station would be installed near the end of the main collection line that extends down Main Street. The new pump station would redirect collected flow to the new WWTP. Given the elevation difference, it is recognized that energy costs would be significant though it may be possible to recover energy losses and generate electricity by installing a micro turbine in the WWTP outfall.

Alternative 2: Preserve Catskill Point and Elevate the WWTP

Options that would allow the WWTP to remain on Catskill Point would include:

²⁰ CRRRA amended Environmental Conservation Law (ECL) Article 6 (Smart Growth Public Infrastructure Policy Act [SGPIPA]) to add mitigation of risk due to sea-level rise, storm surge, and flooding to the list of smart growth criteria used to evaluate public-infrastructure projects.

- Elevating land with structural fill and/or processed dredge material from the Hudson River
- Installing levees and/or floodwalls around the Catskill Point
- Implementing natural flood attenuation and shore stabilization measures

The Catskill Waterfront Taskforce has identified other options for the Point as well, such as converting Main Street to an elevated pier, using docks and boat piers to maintain and encourage water-based commercial uses, and allowing low-lying open spaces to revert to tidal wetland habitat. These proposed adaptations for Catskill Point would require that the WWTP be relocated. The long-term solution for the WWTP depends heavily on village-wide planning efforts for the Catskill Point.

Establishing a plan for the Catskill Point by the 2030s will allow sufficient time to establish a plan for the future of the WWTP.

Village of Catskill, NY Comprehensive Plan, February 2020

The Comprehensive Plan includes a concise statement of a community's vision for development, along with guidelines, policies, standards, devices, and instruments for the immediate and long-range implementation of the vision. The Comprehensive Plan serves as:

- an overall guide for day-to-day development decisions
- a coordinating mechanism for officials responsible for implementing elements of the plan
- an information source for residents on how their community will develop
- a clear statement for the public and private sectors of what the community will expect in development proposals
- a legal basis for the specific land-use regulations and other local government functions that will govern the structure of the community in the future

The Catskill Comprehensive Plan is intended to foster orderly, coordinated, and beneficial development. Within the comprehensive plan are suggestions for the development of policies and tools that promote the implementation of a complete streets policy. Implementing such a policy would improve transportation for all users and create a safer and more welcoming community.

A copy of the plan is provided in Appendix C.

Greene County Hazard Mitigation and Resilience Plan, 2022 update

The Greene County Hazard Mitigation and Resilience Plan analyzed the potential impacts of natural hazards on the landscape and infrastructure of Greene County and proposed actions to mitigate the loss of property, business disruption, or even loss of life.²¹ The 2022 plan updated the 2009 plan and responded to increased risks from natural hazards such as storms, which have increased in both intensity and frequency since 2011.

²¹ Crawford and Associates LLC. 2022. *Greene County Hazard Mitigation and Resilience Plan*. Prepared for Greene County Emergency Services. November 2022.

Evaluation of Shoreline Stability along the Catskill Creek, December 2023

The shoreline stability evaluation, completed by Greene County Soil & Water Conservation District while this LWRP was under development, lays the groundwork for proposed project 19 “Shoreline Protections Measures along Catskill Creek” (Section 4).

The document inventories and assesses the condition of existing stabilization structures along the shorelines of the Catskill Creek within the Village of Catskill. Both shorelines of Catskill Creek are highly developed and have been armored with bulkheads and revetments to protect adjacent properties. The shoreline stability study provides a better understanding of the amount of modified Catskill Creek shoreline, as well as the condition of existing shoreline stabilization structures, to establish baseline conditions and plan for future management.

A copy of the study is provided in the Appendices.

2.2 Existing Land Use and Water Use Patterns

EXISTING LAND USES

As illustrated in **Figure 4**. Existing Land Use Map, the downtown area of the village along Main and Bridge Streets contains the greatest density of development within the WRA. Larger lots and varying, though generally lower, patterns of density are found in surrounding areas.

Property tax data was obtained from the Greene County Planning Department for the Village of Catskill containing property classification codes for each property in the WRA. The distribution of land uses is shown in Table 3.

Table 3. Catskill WRA Land Uses.

CATSKILL WRA LAND USES			
Land Use Classification	Number of Properties	Acres	Percent by Acres
Residential	1268	664.49	42.94%
Vacant	275	499.25	32.26%
Community/Public	50	158.26	10.23%
Commercial	125	152.19	9.83%
Recreation	20	52.19	3.37%
Mixed Use	98	12.58	0.81%
Agriculture	1	6.55	0.42%
Utilities	1	1.71	0.11%
Light Industrial	1	0.23	0.01%
Total:	1839	1547.45	100.00

Source: Village of Catskill Tax Parcel Data, Elan

Commercial

Commercial uses are concentrated along Main Street, Bridge Street, and Route 9W. These are three of the main thoroughfares within the community. The commercial “core” is focused on the intersections of these corridors. Commercial property accounts for a small overall portion of the WRA, approximately 152 acres or 9.83% of the land area within the village. There is a single industrial property in the WRA accounting for only 0.23 acres.

Residential

Residential land accounts for approximately 42.94% of the land area of the WRA with 1,268 residential properties. Single-family homes comprise the majority (52.4%) of residential properties, with 652 single-family units.

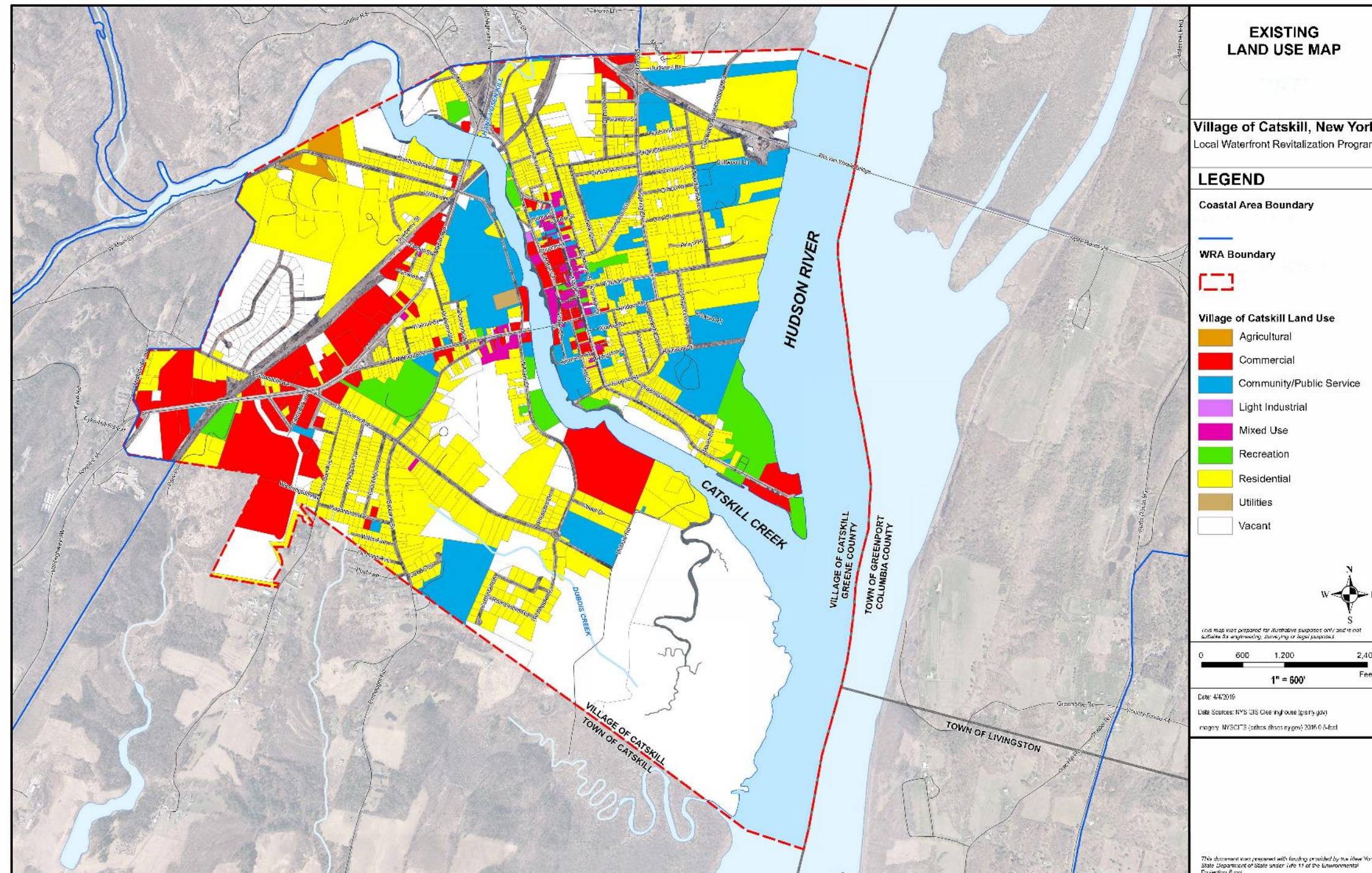
Community & Public Services

Community and public services account for over 10.23% of land use in the WRA and represent religious, health, government, and other community uses. The Village of Catskill Central Schools are the largest of these properties at over 53.93 acres. Order of Friars Minor St. Anthony’s, located in the eastern portion of the WRA, is another notable property with a parcel size of approximately 18.31 acres.

Recreation and Public Park Services

There are several public parks in the WRA including the Dutchman’s Landing Park located on the Hudson River, directly adjacent to Main Street. Other parks include Elliot Park, located along Broome Street and the former Park for Paws along Main Street. Parks are discussed further in Section 2.4.

Figure 4. Existing Land Use Map.



WATER-DEPENDENT USES, WATER-ENHANCED USES AND RELATED ISSUES

Most shoreline property within the village's waterfront revitalization area is privately owned which hinders the ability to implement water-dependent uses and water-enhanced uses.²² The Village of Catskill recognizes that this is an issue and in the 2020 Comprehensive Plan the village expressed a desire to acquire and develop additional public access to the village's waterfront area, especially along the banks of Catskill Creek. The desire for increased public access to the waterfront was echoed during the LWRP public engagement process. As a result, the LWRP recommends that the village identify vacant and/or underutilized properties that could protect or expand public access points to the waterfront. This could include areas adjacent to Catskill Creek, The Point and municipally owned properties.

Water-dependent²³ uses are threatened along Catskill Creek due to erosion and flooding. To ensure that these uses are protected, implementing measures such as timber or concrete bulkheads along the shoreline of Catskill Creek would go a long way in protecting the long-term viability of the creek and water-dependent uses. The majority of the current shoreline is naturally protected by trees, however over time the shoreline will be threatened by extreme weather events. The installation of bulkheads would help protect the shoreline from degrading over time. Rip rap is also used in several areas, most notably the river side of Catskill Point. Maintenance of the bulkheads, the responsibility of which falls to individual property owners, is a particular concern due to costs and state permitting requirements.

Water-dependent uses in the WRA include a mix of public and private ownerships along the shoreline. There are sixteen identified docks along both Catskill Creek and the Hudson River. The major recognized water-dependent uses are the four privately-owned marinas and four public-access docks within Dutchman's Landing and Dutchman's Landing Park. The marinas located on Catskill Creek are: Hop O'Nose Marina, which includes a full service transient marina with pool, showers, laundry, picnic area, and a restaurant; Catskill Marina that includes floating docks, cable, heated pool, showers, restrooms, laundromat, grills & picnic area; Bliss Marina which includes dock, water & cable TV,²⁴ and the Catskill Yacht Club, a private yacht club.

The Village of Catskill recognizes that transient boaters, those that arrive by boat for less than a day, are ideal visitors to the village in that they don't increase traffic or create a need for parking spaces. Some existing marinas provide dock spaces for transient boaters, but it is unknown if the existing number of spaces is adequate or if more boaters would be enticed to stop and visit the village's shops, restaurants, and arts facilities if more dock space were available.

Bulkhead, Docks and Docking Facilities

According to The Catskill Harbor Study and Management Plan, timber or concrete bulkheads account for 6,300 linear feet of shoreline along Catskill Creek. The bulkheads were reported to have been constructed over 100

²² Defined as "a use or activity which does not require a location adjacent to or over coastal waters, but whose location on the land adjacent to the shore adds to the public use and enjoyment of the water's edge. Water-enhanced uses are primarily recreational, cultural, retail or entertainment uses."

²³ Defined by The State of New York Executive Law as "activities that require a location in, on, over or adjacent to a water body because such activity requires direct access to that water body, and which involves as an integral part of such activity the use of the water"

²⁴ <https://blissmarina.wordpress.com/>

years ago to support the development of the Catskill Harbor shoreline for water-dependent industries and commercial facilities (i.e., bulkheads such as flood and erosion protection structures are water dependent).²⁵ According to the Greene County Water Dependent Use Inventory & Assessment Study completed in 2008, the bulkheads are typical of most of the Greene County waterfront having deteriorated to the low water mark.²⁶

Since then, Hurricanes Irene and Sandy caused severe damage that required bank armoring in the form of Riprap along the shore of Catskill Creek. In the ten years since those damaging storms much of that work has deteriorated and needs maintenance. The village has recognized these needs and the opportunity to include numerous shoreline stabilization efforts as projects that can receive funding through this LWRP.

Public dock facilities are owned and maintained by Greene County at Catskill Point. This includes a sturdy wooden wharf that can accommodate larger passenger ships on the river side of the property and seasonal docks for use by visitors on the Creek side. Docking space for visitors and transient boaters is provided at the commercial marinas and yacht clubs and at Frank Guido's Port of Call restaurant on the Creek. Both Riverview Marine Service and Hop-O-Nose Marina are full-service marinas with vessel waste pump-out facilities, and offer fuel, services and repairs, supplies, restrooms and showers, and boat storage. Catskill Marina and Catskill Yacht Club offer both fuel and supplies.

Similarly, there are few water-enhanced uses in the WRA including the picnic area in Dutchman's Landing Park, the Catskill Walking Loop, the Catskill Walking Trail, the LUMBERYARD, Cone-E-Island, Park for Paws, and the Beattie-Powers House. While these sites do provide direct access to either Catskill Creek or the Hudson River their activities/sites aren't dependent on the waterfronts themselves. These locations rather benefit from their relation to the waterfront by providing enhanced experiences and views for users of these locations.

Surface Water Uses

Motorized Boating

The mouth of Catskill Creek and the Hudson River is a popular destination for recreational motor boating. While comprehensive boating use data is not available, the New York State Parks, Recreation, and Historic Preservation annual Recreational Boating Report provides insightful data into the popularity of boating within the region.

In 2018, the report claims that a total of 2,240 boats were registered within Greene County. Three of the marinas in the village; Bliss, Catskill, and Hop-O-Nose, offer a combined 180 boat slips. The Catskill Yacht Club also has 113 registered members as of 2017. Assuming these slips and members represent one boat each, their combined totals (293) account for approximately 13.1% of the county's registered boats.²⁷

The Catskill Creek has a number of commercial vessel support facilities that service the many boats that are berthed in the area as well as those that visit.

Non-Motorized Boating

²⁵ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, The Catskill Harbor Study and Management Plan, March 1992, revised April 1993 and June 1994

²⁶ Community Natural Resource Solutions, Greene County Water Dependent Use Inventory & Assessment, 2008.

²⁷ New York State Park, Recreation, and Historic Preservation Annual Recreational Boating Report 2018

There is a kayak and canoe launch at Dutchman’s Landing. Screaming Eagle Outdoor Adventures, a private mobile kayak and paddle board rental company, launches from 300 W. Main Street (parking lot across from Catskill High School) during the summer months.

Informal access is provided along the end of Old Farm Road, which connects to RamsHorn Creek within the wildlife sanctuary.

Fishing

Catskill Creek offers a variety of fishing opportunities for many different species. According to the DEC, the following species can be found in the creek: Largemouth Bass, Smallmouth Bass, Walleye, Brown Trout, and Rainbow Trout. The creek is actively stocked with fish. The DEC stocks approximately 6,500 yearling and 400 two-year-old brown trout into the creek each year.²⁸ Actual numbers and stocking times may vary depending on fish availability and weather conditions.

The Hudson River also offers ample fishing opportunities for a variety of fish species. According to DEC, the following species can be found in the Greene County section of the river: Striped Bass, Smallmouth Bass, Largemouth Bass, Tiger Musky, and Walleye.

There are no on-shore fishing access sites along Catskill Creek or the Catskill portion of the Hudson River. There are several fishing charter companies and boat clubs within the Village of Catskill that offer guided expeditions along the Hudson waterways.²⁹

Swimming

Water quality in the WRA has improved, in part due to the village’s commitment to reducing Combined Sewer Overflows (CSOs), discussed in more detail below. The Riverkeepers Community Water Quality Report data from 2024 shows that 83% or 5/6 of the water samples collected along Catskill Creek in the WRA met the EPA guidelines for safe swimming.³⁰ However, this is a recent change and neither the Creek nor the River are used for swimming due to a lack of public access and/or beach. Steep slopes along the shoreline of Catskill Creek make safe public access for swimming difficult, if not impossible.

Non-Recreational Uses

The Catskill Aqueduct has a State Pollutant Discharge Elimination Permit (SPDES) that allows discharges into surface and ground waters within the WRA. There are no other commercial or industrial water uses within the WRA.

Congestion

The Catskill Harbor Management Area is relatively quiet and well suited for recreational boaters. Congestion is not a problem. Interference with the existing navigation channel does not occur due to the fast-moving water

²⁸ <https://dec.ny.gov/things-to-do/freshwater-fishing/stocking>

²⁹ The list of boat charters and tour companies active in the WRA changes yearly. The most recent information can be found online at <https://www.greatnortherncatskills.com/outdoors/fishing>

³⁰ <https://www.riverkeeper.org>

of Catskill Creek and the Hudson River which prevents docks being constructed or boats being moored too close to the channel. The lack of general boating congestion and the fact that there are no swimming areas in the Creek preclude concerns about public health and safety.

LAND OWNERSHIP

Most of the land within the WRA is under private ownership. Of the 1,848 taxable parcels within the Village of Catskill, 1,776 parcels (1357.7 acres) are privately owned. Approximately 12.4% of the land area (191.7 acres) is publicly owned. The Village of Catskill directly owns 23 properties in the WRA; they account for approximately 71.0 acres. Greene County, the Town of Catskill, and Catskill Central School District also own property within the WRA.

Table 4. Catskill WRA Land Ownership.

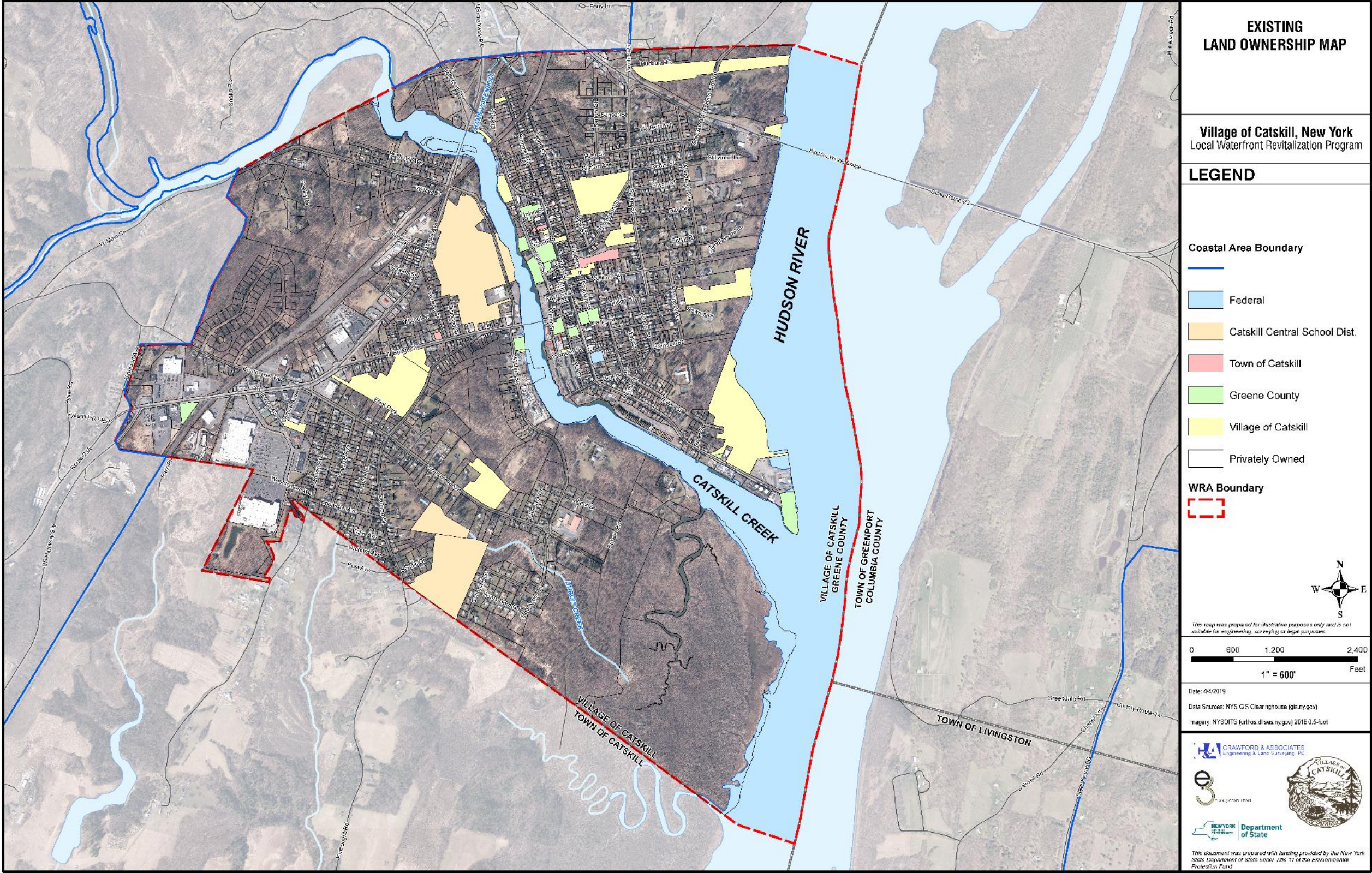
WRA LAND OWNERSHIP			
Owner Type	Number of Properties	Acres	Percent by Acres
Private	1776	1357.7	87.6
Public	72	191.7	12.4
<i>Village of Catskill</i>	23	71.0	4.6
<i>Catskill Central School District</i>	3	54.1	3.5
<i>Various Public Services & Churches</i>	23	45.5	2.9
<i>Greene County</i>	14	10.4	0.7
<i>New York State</i>	2	7.6	0.5
<i>Town of Catskill</i>	4	2.2	0.1
<i>US Postal Service</i>	1	0.6	< 0.1
<i>Catskill Public Library</i>	1	0.2	< 0.1
<i>Dubois Cemetery</i>	1	0.1	< 0.1
Total:	1848	1549.4	100.00

Source: Village of Catskill Tax Parcel Data, Elan

Figure 5. Existing Land Ownership Map is provided on the following page.

It should be noted that, on a tax assessment basis, 30% of the assessed value of land in the village is not taxed due to the tax-exempt status of community and public services land, numerous non-profits, and religious institutions in the village.

Figure 5. Existing Land Ownership Map.



SHORELINE OWNERSHIP

Most of the shorelines along Catskill Creek and the Hudson River are part of privately-owned residential and commercial lands.

There are nine publicly-owned parcels that have direct access to the waterfront, these are Dutchman's Landing/Catskill Point, Dutchman's Landing Park, Greene County Highway Department, Catskill Middle/High School, Intersection of Main and Allen Street, the former Park for Paws, Parking Lot along Water Street, Bridge Authority on the eastern side of the Rip Van Winkle Bridge, and the Beattie-Powers Place. Waterfront access is also available at the RamsHorn-Livingston Audubon Sanctuary, which is cooperatively owned and managed by Audubon New York and Scenic Hudson.

The Greene County Highway Facility is located on the waterfront in an area that would be welcomed by the community as a more suitable water dependent or water enhanced use. The current facility severely limits the public's ability to enjoy the waterfront in that area and has been identified as a potential area for redevelopment to get more use out of areas along the waterfront. While relocating the county's highway facility presents as a challenge, it represents an opportunity for the village to partner with the county to find a new location that benefits both parties.

The LWRP planning process also identified two municipally owned rights-of-way located at the Creek-side ends of Bronson and Greene Streets that could be developed into pocket parks to increase public access to Catskill Creek. Section 4 includes a project to enhance the Bronson Street site to include benches and attractive landscaping and signage that would enhance visual access to Catskill Creek, while the Greene Street site could be made suitable for fishing and a kayak launch.

Section 4 also includes projects to enhance Dutchman's Landing/Catskill Point, Dutchman's Landing Park, relocate the Greene County Highway Department, revitalize the former Park for Paws, and improve connections to Rip Van Winkle Bridge (Hudson Skyway).

UNDERWATER LAND OWNERSHIP

The title of the bed of numerous bodies of water is held in trust for the people of the State of New York under the Public Trust Doctrine. In some instances, the State has relinquished its title to underwater lands by historically granting land under water; in other instances, underwater lands were granted by the King of England prior to State sovereignty. As discussed in the Harbor Management Study, "Another interesting historical aspect of Catskill Harbor is associated with the presence of underwater land grants issued to private interests in and near Catskill Harbor by the State of New York." The purpose of these grants was generally to promote the use and development of the waterfront for commercial purposes. Some of these grants in and near Catskill Harbor date back to the 1700s and are particularly interesting around Catskill Point where much of the surrounding land, including Dutchman's Landing Park, was filled in accordance with the "Cantine Grant" of 1795 and the "Knickerbocker Ice Company Grants" of 1871 and 1887. It appears the village is the successor

in title to the portions of those grants that were never filled.³¹

Structures and utilities, including fill, located in, on, or above state-owned lands now or formerly underwater are regulated under the Public Lands Law. The Hudson River and Catskill Creek underwater lands are owned by New York State. Generally, the boundary between state-owned lands underwater and the upland of a private owner is determined by the last known natural location, prior to the placement of any fill, of the mean high-water mark for tidal waters.

LAND USE REGULATIONS

Village of Catskill Zoning Regulations

This local law is enacted under the authority of Section 10 of the Municipal Home Rule Law, Section 7 of the Village Law, and in order to protect and enhance the physical and visual environment of the Village of Catskill and for the protection, control, order, safety, health, and well-being of people and property within the Village of Catskill. Catskill's zoning aims to balance the commercial and recreational use of the waterfront with the desire to protect and enhance the corridor's natural and cultural resources. The existing land use regulations are sufficient to implement the LWRP.

The Village of Catskill is divided into the following zoning districts: One-Family Residence (R-1); General Residence (R-2); Commercial Residence (R-3); Central Commercial (CC); Commercial (C-1); General Commercial District (C-2); Waterfront District (WD); and Waterfront Overlay District (WOD).³² These districts are depicted in **Figure 6**.

The zoning map reflects the village's historic use of Catskill Creek as its center of commercial activity. The Waterfront District allows water-dependent uses with additional water-enhanced uses allowed subject to special requirements. A commercial corridor along Main and West Bridge Streets creates a connection for further commercial activity. An additional commercial area is established along the NYS Route 9W/23A corridor with this area supporting a mix of large and small retail establishments, restaurants, and small businesses.

The waterfront area adjacent to the Hudson River is zoned Waterfront Overlay District with R-1 One-Family Residential as the underlying district. The purposes of the WOD are to afford priority to waterfront-compatible, well-designed uses; achieve access to the coastal area; control development; and protect and enhance the Hudson River waterfront's natural, scenic, and cultural resources. Various activities are regulated in this overlay district to prevent erosion, ensure soil stability, minimize disturbance to vegetation, maintain water quality and conserve the scenic beauty of the area.

The uses allowed within each of the districts are shown in **Table 5**.

³¹ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, The Catskill Harbor Study and Management Plan, March 1992, revised April 1993 and June 1994

³² Village of Catskill Zoning Regulations, revised May 10, 2023

Waterfront District (WD)

Water-dependent uses are allowed by right or special permit in the Waterfront District. This district includes the waterside regulated area of the HMA designated in the Catskill Harbor Management Plan (Appendices).

The regulations also state that all new uses in the Waterfront District require site plan review by the Planning Board and that the Special Uses additionally require a Special Use Permit. The regulations state that a requirement of a permitted use and a Special Permitted Use is that public access in the form of a permanent easement or granting of fee title to the village. This provision of the Zoning Regulations has not been regularly enforced.

The regulations also state that certain new uses that are not water dependent are allowed in the Waterfront District “subject to the issuance of a special permit” including restaurants, hotels, retail stores and townhouses and one family dwelling units. Under a Zoning Use Incentive, these uses require provision of meaningful, permanent public access or contribution to the Village Waterfront Trust Fund for projects aligned with the LWRP.

Site plan review and approval is required for new building construction, expansion in exterior building dimensions, any new commercial use, expansion of commercial use, increase in footprint of commercial

Figure 6: Existing Zoning Map

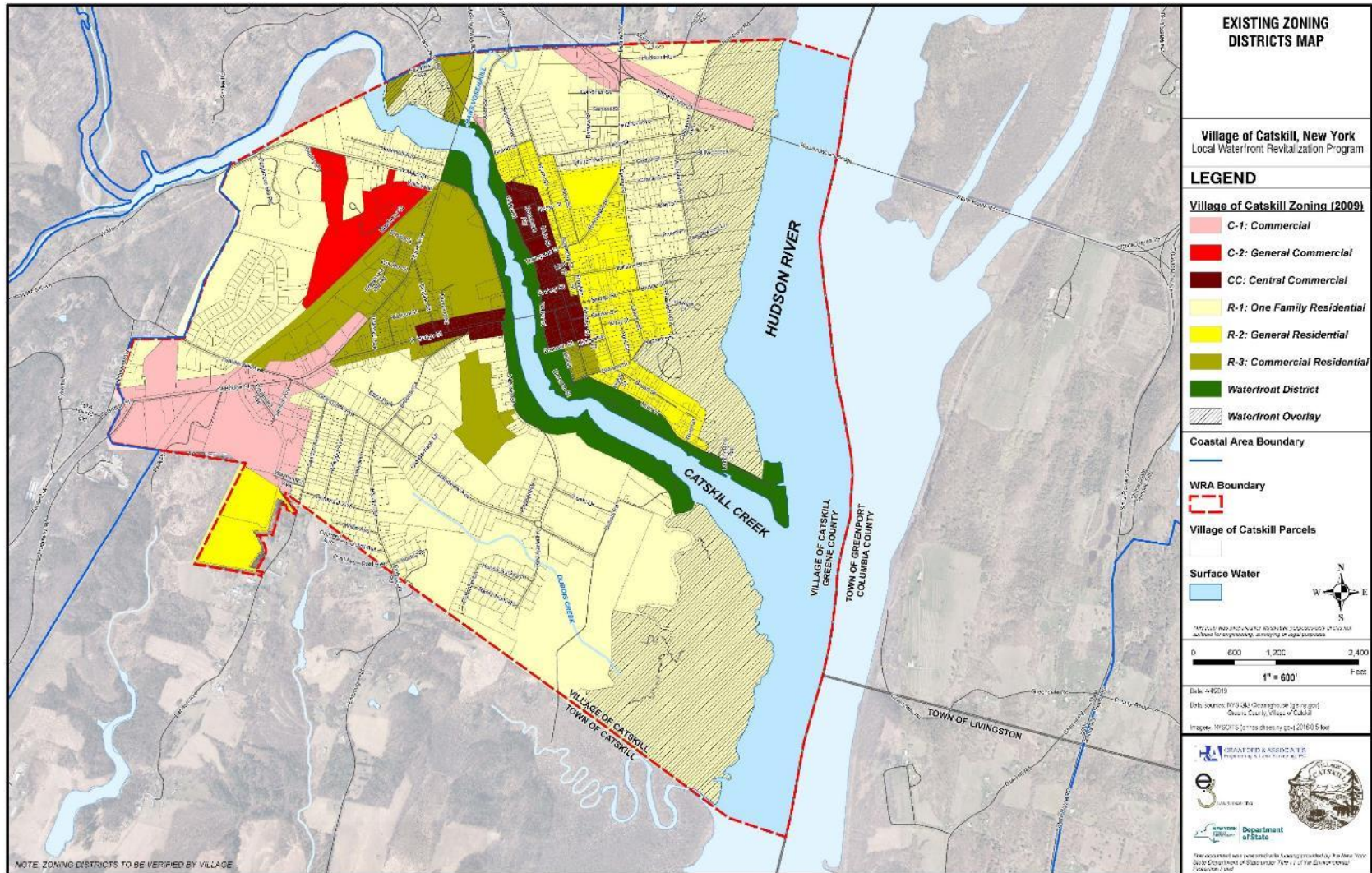


Table 5. Uses Allowed by Zoning (2023).

Zoning District	Permitted Uses	Permitted Subject to Site Plan Review	Uses Allowed by Special Permit
R-1 -One Family Residence	<ul style="list-style-type: none"> • Home Occupation or professional office • Keeping livestock not for commercial gain • Accessory structures • Commercial garden • Municipal parks, playgrounds and beaches including recreational refreshment and service buildings 	<ul style="list-style-type: none"> • One-Family dwelling stick built 	<ul style="list-style-type: none"> • Manufactured home double wide • One family –modular with full cellar • Conversion of 1-family to 2-family • Places of worship • Public utility structure • Schools and School Buildings • Short Term rentals
R-2 - General Residence	<ul style="list-style-type: none"> • Same as R-1 above 	<ul style="list-style-type: none"> • Same as R-1 above, and • Two Family 	<ul style="list-style-type: none"> • Same as R-1 above, and • Conversion of 1-family to multi-family • Multi-family dwelling
R-3 - Commercial Residence	<ul style="list-style-type: none"> • Same as R-1 above 	<ul style="list-style-type: none"> • Same as R-1 and R-2, and • Banks • Cannabis dispensary • Office – business, professional, governmental • Parking lots and garages (autos only) • Personal service establishments • Restaurants • Retail stores • Service establishments 	<ul style="list-style-type: none"> • Same as R-1 and R-2, and • One family –modular • Boarding and rooming houses
WD – Waterfront District	<ul style="list-style-type: none"> • Commercial garden • Municipal parks, playgrounds and beaches including recreational refreshment and service buildings • Municipal public safety uses associated with other uses in the district and boat launches • Public park trails, fishing docks and piers, and swimming facilities 	<ul style="list-style-type: none"> • Fishing/marine supply stores • Manufacture, assembly, or repair of marine products such as boats, sails, and hardware; boat rental facilities; charter boat and fishing guide operations • Specialty boat facilities, including tour, cruise, and dinner boats; • Structures needed for navigational purposes; • Wholesale and retail fish stores • Support facilities necessary for successful functioning of WD uses 	

<i>Zoning District</i>	<i>Permitted Uses</i>	<i>Permitted Subject to Site Plan Review</i>	<i>Uses Allowed by Special Permit</i>
CC - Central Commercial	<ul style="list-style-type: none"> Commercial garden 	<ul style="list-style-type: none"> Residence above-the-first floor Banks Boarding and rooming houses Bars and Nightclubs Cannabis dispensary Cannabis lounge Clubs Cleaning, dyeing or laundry Funeral parlors Hotels and motels Hospitals for human beings Newspaper printing and job printing Office — business, professional, governmental Outlets and pickup stations [laundry] Parking lots and garages (autos only) Personal service establishment Places of worship Public utility structure Restaurants Retail Stores Service establishments Theaters Mari-culture & aquaculture activities Scientific, historic, artistic, and educational activities and similar uses which by their nature require access to coastal waters 	<ul style="list-style-type: none"> Motor vehicle repair service Manufacturing Short Term Rentals

Zoning District	Permitted Uses	Permitted Subject to Site Plan Review	Uses Allowed by Special Permit
C-1 - Commercial	<ul style="list-style-type: none"> • Commercial garden • Shipping Containers and Storage Tents • Short Term Rentals 	<ul style="list-style-type: none"> • Banks • Boarding and rooming houses • Car Sales (New) • Cannabis dispensary • Cleaning, dyeing or laundry • Funeral parlors • Hotels and motels • Hospitals for human beings • Manufacturing • Motor vehicle repair service • Newspaper printing and job printing • Office — business, professional, governmental • Outlets and pickup stations [laundry] • Parking lots and garages (autos only) • Personal service establishments • Places of worship • Public utility structure • Research laboratories • Restaurants • Retail stores • Service establishments • Storage or repair garage • Theaters • Used car sales lot • Warehouse and storage • Wholesale 	<ul style="list-style-type: none"> • Hospital, animal • Gasoline filling stations

Zoning District	Permitted Uses	Permitted Subject to Site Plan Review	Uses Allowed by Special Permit
C-2 - General Commercial	<ul style="list-style-type: none"> • Commercial garden • Shipping Containers and Storage Tents • Short Term Rentals 	<ul style="list-style-type: none"> • Residence above-the-first floor • Home Occupation or professional office • Banks • Cannabis dispensary • Cleaning, dyeing or laundry • Funeral parlors • Hospitals for human beings • Manufacturing • Motor vehicle repair service • Newspaper printing and job printing • Office — business, professional, governmental • Outlets and pickup stations [laundry] • Parking lots and garages (autos only) • Personal service establishments • Places of worship • Public utility structure • Research laboratories • Restaurants • Retail stores • Service establishments • Storage or repair garage • Theaters • Used car sales lot • Warehouse and storage • Wholesale 	<ul style="list-style-type: none"> • Adult uses • Boarding and rooming houses • Hotels and motels • Hospital, animal • Telecommunications tower

structure, or a change in use in any district.³³

The Waterfront District includes several non-conforming uses which existed prior to the enactment of the zoning code and are thus grandfathered in. These uses include the Main Brothers Oil Co. facility adjacent to Catskill Point, Henderson Fuel on West Main Street, just south of the Uncle Sam Bridge and the Greene County Highway Facility located south of Henderson Fuel. The Hop-O-Nose Housing, a federal housing complex on Water Street is another non-conforming waterside use.

³³ Except for (a) home occupation or professional office where permitted which involves no new construction or expansion, (b) keeping livestock not for commercial gain where permitted, (c) commercial garden, (d) residential accessory structures where permitted, (e) permitted municipal uses. Village of Catskill Zoning Regulations, revised May 10, 2023

Historic Preservation

Article V of the Village of Catskill's Zoning Regulations contains provisions for the Review of Historic Properties. The purpose and scope of the review is to conserve, protect, enhance, and preserve historic sites which are listed on, contribute to, nominated for or eligible for inclusion on the National, State or County Registers of Historic Places or have been identified by the Village of Catskill as being historically significant and/or locally important. The Planning Board has powers to review alterations to the historic property prior to the issuance of a building permit, demolition permit, certificate of occupancy, addition or reduction of existing square footage, alteration of windows, doors, siding, façade, or other exterior historical details. The Planning Board is also empowered to review the development of any properties which are contiguous to, or across the street from, a herein identified historic property, provided that the proposed development is first time construction or a change of use, and not the alteration of, or addition to, an existing structure.³⁴

Flood Damage Prevention Law

In 2008 the Village of Catskill passed local law #1 of 2008 for Flood Damage and Prevention. The Flood Damage and Prevention Law (FDPL) passed by the village is based on a model local law developed by the DEC.

The FDPL requires a permit for development within a special flood hazard area (SFHA) (1% annual chance flood area) and defines development as any "man-made change to improved or unimproved real estate, including but not limited to buildings or other structures, mining, dredging, filling, paving, excavation or drilling operations or storage of equipment or materials". The construction standards and definitions included in the FDPL echo those in the NYS Uniform Code, although the NYS Uniform Code provides more detailed, extensive requirements for building within the floodplain. The FDPL applies to all development and substantial improvement (defined as that with a value greater than 50% of the market value of the development prior to the improvement) to existing development. The standards included in the FDPL are as follows:

Development Standards in the Floodway

Development is not allowed in the floodway unless a technical evaluation, completed by a licensed professional engineer, shows that the development will not result in any increase in flood levels during a 1% annual chance storm, or FEMA agrees to amend the FIRM based on an application by the village. The floodway is defined in the village's FDPL as "the channel of a river or other watercourse and the adjacent land areas that must be reserved in order to discharge the base flood without cumulatively increasing the water surface elevation more than a designated height as determined by the Federal Emergency Management Agency in a Flood Insurance Study or by other agencies as provided in Section 4.4-2 of this Law." The floodway is shown as the cross hatched area on the village's Flood Insurance Rate Map (FIRM).

³⁴ Village of Catskill Zoning Regulations, revised May 10, 2023

Standards for All Structures in the SFHA

All development in the SFHA is required to obtain a permit from the designated Local Floodplain Administrator. The village opted to appoint the Code Enforcement Officer as the Local Administrator. The FDPL prescribes the information to be included with a permit application as well as the applicable fee. Certain aspects of the application need to be certified by a professional engineer or licensed surveyor and the Local Administrator may request a technical analysis to determine if the proposed development will result in physical damage to any other property. The Local Administrator and/or the developer's engineer or architect is required to periodically inspect the development to ensure that it conforms to the permit. Once the Local Administrator is satisfied that the development was undertaken in conformance with the permit requirements a certificate of compliance is issued.

In addition to permitting, the following standards are applicable to all structures to be located within the SFHA:

1. Anchoring is required to prevent floatation, collapse, or lateral movement during the base flood.
2. New construction and substantially improved structures shall be constructed with materials and utility equipment resistant to flood damage.
3. New construction and substantially improved structures shall be constructed using methods and practices that minimize flood damage.
4. New and substantially improved structures shall have fully enclosed areas below the lowest floor that are useable solely for the parking of vehicles, building access or storage in an area other than a basement and which are subject to flooding, designed to automatically equalize hydrostatic flood forces on exterior walls by allowing for the entry and exit of flood waters.
5. New and replacement electrical equipment, heating, ventilating, air conditioning, plumbing connections, and other service equipment shall be located at or above the base flood elevation or be designed to prevent water from entering and accumulating within the components during a flood and to resist hydrostatic and hydrodynamic loads and stresses. Electrical wiring and outlets, switches, junction boxes and panels shall be elevated to or above the base flood elevation unless they conform to the appropriate provisions of the electrical part of the Building Code of NYS or the Residential Code of NYS for location of such items in wet locations.
6. New and replacement water supply systems shall be designed to minimize or eliminate infiltration of flood waters into the system.
7. New and replacement sanitary sewage systems shall be designed to minimize or eliminate infiltration of flood waters.
8. On-site waste disposal systems shall be located to avoid impairment to them or contamination from them during flooding.

Elevation Standards for Residential Structures

1. New construction and substantial improvements shall have the lowest floor (including basement) elevated to or above two feet above the base flood elevation.

Elevation Standards for Non-Residential Structures

1. New construction and substantial improvements, together with attendant utility and sanitary facilities shall either:
 - (i) have the lowest floor (including basement) elevated to or above two feet above the base flood elevation, or,
 - (ii) be floodproofed so that the structure is watertight below two feet above the base flood elevation with walls substantially impermeable to the passage of water. All structural components located below the base flood level must be capable of resisting hydrostatic and hydrodynamic loads and the effects of buoyancy. A licensed professional engineer or architect shall provide certification of floodproofing.

Based on information provided in the 2014 Resilient Catskill Study and the recorded damaged from storms in in the past decade, there is an opportunity to update the language of this law based on NYS CRRRA Flood Risk Management Guidance and the recommendations from the 2014 Resilient Catskill Study.

PUBLIC SERVICES AND FACILITIES

Municipal Water Supply

The municipal water source for the Village of Catskill is the Potic Reservoir located in the Town of Coxsackie on Schoharie Turnpike. The reservoir was created by the construction of a dam and the total capacity of the Reservoir which includes the three-foot spillway boards is approximately 249 million gallons with an estimated fourteen square mile watershed area.

The water is treated at the Village of Catskill Water Plant which includes three micro floc Trident 420 package filters, each capable of filtering 700 gallons per minute (GPM). The water flows to the village through a 16-inch transmission main from which it is distributed throughout the village to approximately 8,500 people through 2,200 service connections. Public water service is available to all waterfront areas.

The village has ample water supply capacity but lacks enough storage capacity near the actual source area. A break along the main 16-inch transmission or a problem at the filter plant would cause a service interruption in the village. The village has applied for funding to construct a water storage tower on land closer to the village.³⁵ The village distribution system is also aged and experiences periodic breaks. The village applied for and

³⁵ Catskill Water System – Annual Water Quality Report – PWS ID#1900026

received a \$2.9 million Water Infrastructure Improvement Act (WIIA) grant in 2019 to help replace the water main beneath Main Street.

The past improvements to the municipal water system were essential. However, the village has indicated that further improving the distribution system is needed to ensure future water quality, quantity, and system reliability.

Public Sewage Treatment

The village owns and operates a wastewater treatment plant (WWTP) with a permitted capacity of 1.55 million gallons per day and a maximum flow rate of 3.2 million gallons per day. The collection system that serves residents of the village and several out-of-district users in the Town of Catskill includes more than 27 miles of piping.

Originally, the sewer system was developed to convey sanitary sewage and storm water in a single sewer system to Catskill Creek. This type of sewer is known as a combined sewer system (CSS). Historically sewers were constructed on an as needed basis. Commercial and residential buildings tied into the sewer system at the most convenient location. The oldest portions of the sewer collection system were constructed before 1900. In many instances, these older sewers have no manholes, limiting the accessibility to the system, and accurate schematics or plans of the entire system do not exist. Aided by the topography of the village, most of the sewers operate by gravity flow. The sewer system for the village has undergone construction at various times over a period of more than 100 years. Prior to 1971, wastewater from the village was discharged directly to Catskill Creek. However, water quality concerns prompted federal legislation, which led to the construction of the WWTP and sewer interceptor lines. The collection system contains a total of eight wastewater pumping stations. These pumping stations serve various low-lying areas within the village's district and convey wastewater from areas near Catskill Creek to the interceptor line to the WWTP. Currently, all dry weather flows are collected in the system and treated at the WWTP. Wet weather flows are treated by the WWTP to the extent that overflows may occur depending on precipitation.

The village collection system at present is approximately 18% combined by length, this compares to an estimated 50-75% thirty years ago. Currently, the majority of the village gravity sewer lines consist of concrete, clay tile, and PVC pipe ranging in sizes from 6" to 30". Given the age of the system, various areas need replacement.

During wet weather conditions the CSS can be surcharged and combined sewer overflows (CSOs) are used to divert a portion of the wastewater directly to the receiving water. The current conditions of the CSSs and CSOs indicate an opportunity to upgrade the municipal water, wastewater, and stormwater systems.

Within the last thirty years the Village of Catskill has proactively implemented projects to separate sanitary and stormwater flows to help reduce overflows into Catskill Creek. With this reduction the quantity of wastewater treated by the wastewater treatment plant (WWTP) is increased and eliminates the need for the CSO's. The WWTP is operating with all available unit processes optimized therefore minimizing the flow to the CSO's. Through

infrastructure improvement projects and regulation enforcement, the Village and the State of New York are in the process of reducing the overflows.

By utilizing funding from the NYS Environmental Facilities Corporation (EFC), the village has successfully reduced the number of active collection systems from 25 to just four.³⁶The village will continue to seek grant funding to eliminate the remaining CSOs.

Transportation

Transportation systems in the Village of Catskill include vehicular, rail, air, public and water allowing for the efficient movement of people, goods, and services. These are all necessary to support a successful and vibrant economy.

The Village of Catskill is directly accessible by road, public transportation, freight rail and water. Passenger rail and air transportation are available close to the village.

The village is accessible by the New York State Thruway/Interstate 87 via exit 21 and US Route 9W. The roads run North/South through the village. New York State Routes 23 and 32 also service the area.

The roads that directly access the Catskill Harbor are Main Street (lower end) which connects the downtown area on Main Street to the Catskill Point; Water Street which runs along the Creek and parallel to Main Street both north and south of the Uncle Sam Bridge until it intersects with Greene Street which then connects it to Main Street and on the west side of the Uncle Sam Bridge, West Main Street and Bushnell Avenue, which is parallel to the northern end of West Main Street.

Rail Access

Passenger rail service is available through Amtrak (www.amtrak.com). Trains are available from NYC's Penn Station and any connecting Amtrak service. The Amtrak stop nearest to Catskill is in Hudson, NY, approximately six miles away.

Vessel Waste Facilities

Vessel waste pump-out facilities are available at Catskill Marina and Hop-O-Nose Marina.

Navigation Basins/Channels

The Village of Catskill has access to two Federal Navigation Channels, the Hudson River and Catskill Creek. The US Army Corps of Engineers (USACE) has the responsibility to maintain channel depths in Federal Navigation Channels. The river is approximately 400 feet wide and at least 32 feet deep in the Catskill WRA. Catskill Creek is designated a Federal Navigation Channel from its convergence with the Hudson River to the Uncle Sam Bridge, approximately 650 feet. The USACE may maintain a channel depth of 12 feet (at mean low

³⁶ Catskill Water System – Annual Water Quality Report – PWS ID#1900026

tide) in the lower, wider section and eight feet for the remaining length of channel to the Uncle Sam Bridge.

The Catskill Harbor was last dredged in 1973-1975. A January 1992 bathometric survey showed a potential shoaling concern in the navigation channel in the area between the Hop-o-nose historic marker and Dutchman's Landing. Excessive shoaling can reduce depth and create waves, posing a danger to boats navigating this area. The need for interventions such as dredging may be periodically reviewed to ensure safe navigation conditions. Given the recreational nature of Catskill Creek, it is not a high priority dredging areas for the USACE.

ABANDONED, DETERIORATED OR UNDERUTILIZED AREAS, SITES AND BUILDINGS

As part of the 2017 Catskill Brownfield Opportunity Area (BOA) Nomination Study, the village identified several vacant, abandoned, or underutilized properties along Catskill Creek, including strategic sites for redevelopment. Those properties are listed in **Figure 3**. Catskill BOA Strategic Sites Map and **Table 6**. Vacant, Abandoned and Underutilized Properties. The BOA information was shared with the Waterfront Advisory Committee during a work session and no additional properties were identified.

The Catskill WAC recognizes the need to restore and revitalize underutilized waterfront sites. The village sees an opportunity to implement the BOA site redevelopment recommendations and the sub-area concept plans (see Section 2.1) in this LWRP, as described in Section 4, projects 5 and 12.

The BOA study recommended that the **Forlini** and **Atlantic Mills** strategic sites have a Master Plan completed to explore the best redevelopment options. The Atlantic Mills site is best suited for water-dependent or water-enhanced uses. The Forlini site was once a popular resort and still has several structures on the site including docks, a restaurant, home, seasonal cottages, a pool, and recreational facilities. These available structures indicate there is an opportunity to invest in the existing structures and develop a modern resort and/or marina at the site. The steep slopes on the edge of the site that border Catskill Creek also indicate this property could be an area where the village implements shoreline stabilization measures.

A portion of the **Dunn Property** located along Catskill Creek was purchased and transformed from a vacant industrial property into the non-profit LUMBERYARD Center for Film and Performing Arts. The LUMBERYARD performing arts and film campus includes a state-of-the-art facility in downtown Catskill for performing artists to test and perfect their work before they premiere in New York City. Three vacant waterfront parcels remain adjacent to the LUMBERYARD campus and have the potential to become a vibrant community focal point. Based on positive feedback received from the community for this idea, the LWRP recommends that the village advance the BOA redevelopment concepts for these parcels, as described in project 12 in Section 4. Project ideas include ferry dockage that will link downtown Catskill with neighboring riverfront communities, slips for small transient boaters who will then have easy access to Catskill's downtown shopping and eating destinations and a Creekside Plaza for community use.

Table 6. Vacant, Abandoned and Underutilized Properties.

Parcel Name	Parcel Tax Number	Acres	Land Use	Ownership
County Parking Lot	156.78-5-18	0.44	Parking Lot	Greene County
Dunn Property	156.78-5-1 172.05-3-2 172.05-3-1 172.05-3-19 172.05-3-17 172.05-3-18	1.82	Vacant Industrial, Commercial	Steel Holding Corp.
Catskill Marina/ Harborlights Marina	172.05-4-24	1.30	Commercial Marina	Harborlights Marina Corp.
Kosco Terminal	172.10-1-3	5.00	Vacant	Power Test Realty Co. LP
Main Brothers Oil	172.10-1-2.1	1.50	Oil Terminals	Main Brothers
Forlini's	172.05-5-11	24.00	Marina & Restaurant	Mary Forlini
Atlantic Mills	172.05-5-10	1.18	Vacant	John Kiebert & James Rucano
Noe Property Off Cauterskill Ave	77 subdivided parcels	55.00	Vacant land subdivided for residential use	Catskill Greene LLC.
Condor Property 310 W. Bridge St..08-1-16	171.08-1-16	3.72	Vacant/former car dealership	314 Catskill Property
Vacant Bushnell Area	155.16-1-6.1	6.7	Vacant	Harry O. Vincent

The **Main Care/ Brothers Oil Co. facility** is located adjacent to Dutchman's Landing Park and Catskill Point. The facility is a non-conforming use and is located in an area that is threatened by flooding and erosion. The large tanks detract from the views along the Hudson River and Catskill Creek. The community and WAC have expressed a desire to relocate the business and remove the oil tanks to improve the aesthetic of that area of the WRA.

HAZARDS TO NAVIGATION

The only potential future hazard to navigation is an area of shoaling that has been identified between the Hop-o-Nose historic marker and Dutchman's Landing on the north side of Catskill Creek.

LIMITATIONS TO DEVELOPMENT

The village has been extensively developed with few remaining developable lots. Limitations to development include current and future flooding and sea level rise, steep slopes in some areas, soils with poor drainage capabilities, and rock outcrops.

PORT OR SMALL HARBOR DEVELOPMENT

Catskill Harbor, which includes the waterside regulated area of the HMA along Catskill Creek, has developed as a small harbor serving the recreational needs of residents and visitors. The Harbor, with its existing density of development, comfortably supports its current level of use. The existing marinas meet the needs of the boating market. Further development desired in the Harbor would include the establishment of docking facilities, including docking for a ferry boat (see project 12 in Section 4) to connect visitors who travel by boat closer to the downtown area. The ferry dock will also link downtown Catskill with neighboring riverfront communities.

2.3 Natural Resources and Environmental Assessment

NYS SIGNIFICANT COASTAL FISH AND WILDLIFE HABITATS

The village includes three Significant Coastal Fish and Wildlife Habitats: Catskill Creek, Catskill Deepwater, and Ramshorn Marsh. Copies of the full habitat descriptions are provided in the Appendices. These habitats support local tourism including recreational boating and fishing. Any activity that would encroach upon these areas, degrade water quality, reduce water levels, or alter tidal fluctuations could result in significant impairments or loss of these habitats.³⁷

Catskill Creek

The Catskill Creek fish and wildlife habitat is an approximately 5-mile segment of this freshwater tributary, extending from its mouth on the Hudson River to falls located just downstream from the NYS Route 23 bridge. The lower one and one-half miles of Catskill Creek are within the tidal range of the Hudson River. Beds of submerged aquatic vegetation found at the creek mouth and in Catskill Creek up to the Kaaterskill Creek are dominated by water celery (*Vallisneria americana*). Freshwater tidal marsh, intertidal mudflats and freshwater tidal swamp are also found in this habitat. A number of threatened, endangered, and rare plant species can be found in wetland areas including bur-marigold (*Bidens hyperborean* var. *hyperborean*) (threatened), Northern estuary beggar ticks (*Bidens hyperborea* var. *hyperborea*) (endangered), golden club (*Orontium aquaticum*) (threatened) and Southern estuary beggar ticks (*Bidens bidentoides*) (rare). Habitat disturbances in the Catskill Creek area include the presence of road and railroad crossings, discharges of wastewater from adjacent commercial developments, maintenance of boat docking facilities, and invasive species including

³⁷ NYS Department of State. *Significant Coastal Fish and Wildlife Habitats*. Available at: https://dos.ny.gov/system/files/documents/2020/03/ramshorn_marsh_final.pdf.

common reed (*Phragmites australis*), purple loosestrife (*Lythrum salicaria*) and water chestnut (*Trapa natans*).³⁸

Fish and wildlife values in Catskill Creek and Marsh include a variety of migratory as well as resident freshwater fish species including alewife (*Alosa pseudoharengus*), blueback herring (*Alosa aestivalis*), white perch (*Morone americana*), sea lamprey (*Petromyzon marinus*) (at the confluence of Catskill Creek and Kaaterskill), American shad (*Alosa sapidissima*) and striped bass (*Morone saxatilis*). The tidal portion of the Catskill Creek is a wintering site for adult largemouth (*Micropterus salmoides*) and smallmouth (*Micropterus dolomieu*) bass. American eel (*Anguilla rostrata*) is also present. The area is also habitat for northern water snake (*Nerodia s. sipedon*), red-spotted newt (*Notophthalmus v. viridescens*), redback salamander (*Plethodon cinereus*), common mudpuppy (*Necturus maculosus*), Eastern American toad (*Bufo americanus*), gray treefrog (*Hyla versicolor*), spring peeper (*Pseudacris crucifer*), American bullfrog (*Rana catesbeiana*), green frog (*Rana clamitans*) and wood frog (*Rana sylvatica*). Wood turtle (*Glyptemys insculpta*) (SC) has been observed in the area.³⁹

Catskill Deepwater in the Hudson River

The Catskill Deepwater Habitat is the northernmost extensive section of deepwater habitat in the Hudson River. Deepwater estuaries such as this are rare in the eastern United States and the Hudson River is the only river in New York State that contains this ecosystem type. Deepwater areas may provide wintering habitat for juvenile and adult shortnose sturgeon (*Acipenser brevirostrum*) ('E') as well as spawning habitat for adult Atlantic sturgeon (*Acipenser oxyrinchus oxyrinchus*) ('E') and support a diversity of resident and coastal migratory species in the Hudson River. The Catskill Deepwater Habitat is also important spawning area for American shad (*Alosa sapidissima*), blueback herring (*Alosa aestivalis*), white perch (*Morone americana*), Atlantic sturgeon (C- Fed), and a variety of resident freshwater species.

Catskill Deepwater is a critical habitat for most estuarine-dependent fisheries originating from the Hudson River. This area contributes directly to the production of in-river and ocean populations of food, game, and forage fish species. Consequently, commercial, and recreational fisheries throughout the North Atlantic benefit from these biological inputs from the Hudson River estuary.⁴⁰

Ramshorn Marsh

Ramshorn Marsh is a major wetland and littoral area in the Hudson Valley Region. It contains one of the largest forested tidal wetlands on the Hudson River and exists in an essentially natural condition. Significant populations of American eel, American Shad, smallmouth bass (*Micropterus dolomieu*), and largemouth bass (*Micropterus salmoides*) can be found in the Marsh. The area provides productive spawning and nursery

³⁸ NYS Department of State. *Significant Coastal Fish and Wildlife Habitats*. Available at: https://dos.ny.gov/system/files/documents/2020/03/catskill_creek_final.pdf.

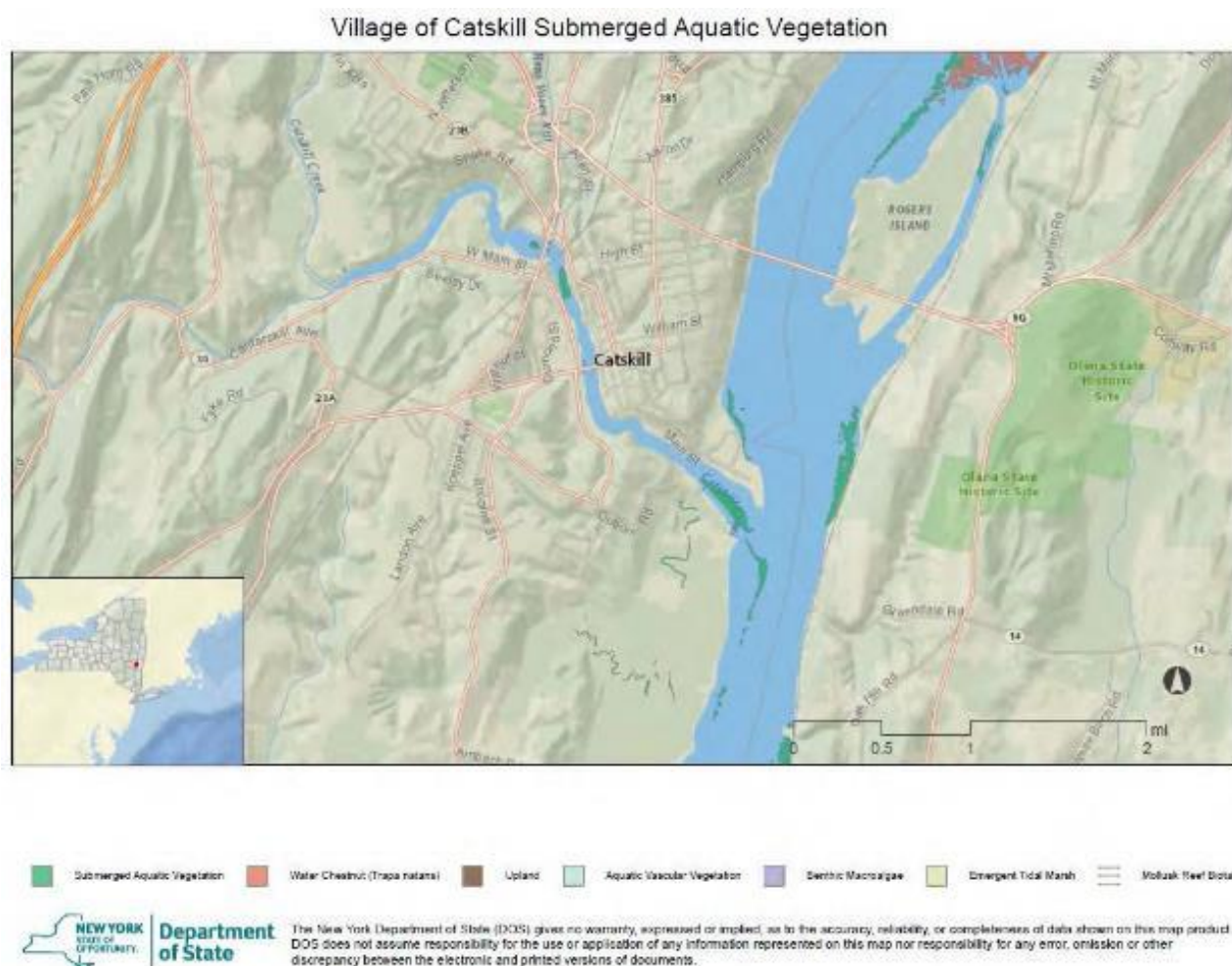
³⁹ NYS Department of State. *Significant Coastal Fish and Wildlife Habitats*. Available at: https://dos.ny.gov/system/files/documents/2020/03/catskill_creek_final.pdf.

⁴⁰ Ibid.

habitat for these and a variety of other coastal migratory and resident species. The submerged aquatic vegetation, mainly water celery, provides food for fish, invertebrates, and waterfowl as well as refuge for fish and invertebrates.

Ramshorn Marsh is also habitat for wood turtle, northern water snake, Eastern red-spotted newt (*Notophthalmus viridescens*), Eastern redback salamander (*Plethodon cinereus*), American toad, gray treefrog, spring peeper, bullfrog (*Lithobates catesbeianus*), green frog (*Lithobates clamitans*), and wood frog. Northern map turtles (*Graptemys geographica*) use the marsh shores for their habitat.

Figure 7. Village of Catskill Submerged Aquatic Vegetation.



Ramshorn Marsh and the tidal mudflats that adjoin it provide vital resting and feeding habitat for large concentrations of waterfowl during the fall and spring migrations, and it is an important waterfowl wintering area (November – March) on the upper Hudson River estuary, especially for dabbling ducks. Ramshorn

Marsh supports a high level of human use. Both waterfowl hunters and birdwatchers use this wetland extensively during fall bird migrations. Recreational fishing for bass is also significant in the area.

Catskill Creek and the Hudson River in the village contain additional areas of submerged aquatic vegetation. These areas are depicted in **Figure 7. Village of Catskill Submerged Aquatic Vegetation.**

FISH AND WILDLIFE HABITAT (OR OTHER IMPORTANT AREAS NOT DESIGNATED BY NYS)

The Bushnell Area, the alluvial fan jutting into the Creek in the area where Catskill Creek takes a sharp eastward turn toward downtown, is an expected fish and wildlife habitat area. This area presents an opportunity for the creation of public access for fishing, birding, and hiking. This area, as well as a major portion of the land along Bushnell Avenue (both sides) is highly vulnerable to flooding.

SURFICIAL GEOLOGY AND SOILS

Geologic Conditions

According to the United States Department of Agriculture (USDA) Soil Survey, the majority of the soils within the WRA are classified as Hydrologic Soil Group C or D which is consistent with their waterfront location. Soils classified as Group C have a slow infiltration rate when wet and a slow rate of water transmission. Group C consists predominately of soils having a layer that impedes the downward movement of water or soils of moderately fine texture or fine texture. Soils classified as Group D have a very slow infiltration when thoroughly wet and a very slow rate of water transmission. These consist predominately of clays, soils that have a high-water table, soils that have a clay layer at or near the surface, and/or soils that are shallow over nearly impervious material. The eastern side of the village (east of Catskill Creek) primarily consists of Group D soils, whereas the western side generally consists of Group C soils. Due to these characteristics, Group C and D soils have a high runoff potential and are more prone to flooding than more pervious soil types. Stormwater management measures that retain water to allow for gradual infiltration into the soil may be needed to control runoff.

The depths to bedrock and groundwater within the village are also prominent geologic conditions. The USDA Web Soil Survey details the majority of the village with a depth of bedrock greater than 200 centimeters. However, a large portion of the village (east of Catskill Creek) is described as having a depth to bedrock of 25-50 centimeters. From the Soil Map, as well as direct observations, it is evident that the depth to bedrock is relatively shallow east of Catskill Creek. When examining the USDA “Depth to Water Table” Map, it is evident that the soils on the western side of the village (west of Catskill Creek), consists almost entirely of a relatively shallow water table located at approximately 50-100 centimeters below grade. To the east of Catskill Creek, the majority of the soils are representative of a water table at depths greater than 200 centimeters. A shallow water table can increase the risk of flooding, groundwater contamination, and limit certain types of development (e.g., structures with basements). See **Figure 8. Surficial Geology and Soils Map** provided below.

Figure 8. Surficial Geology and Soils Map.

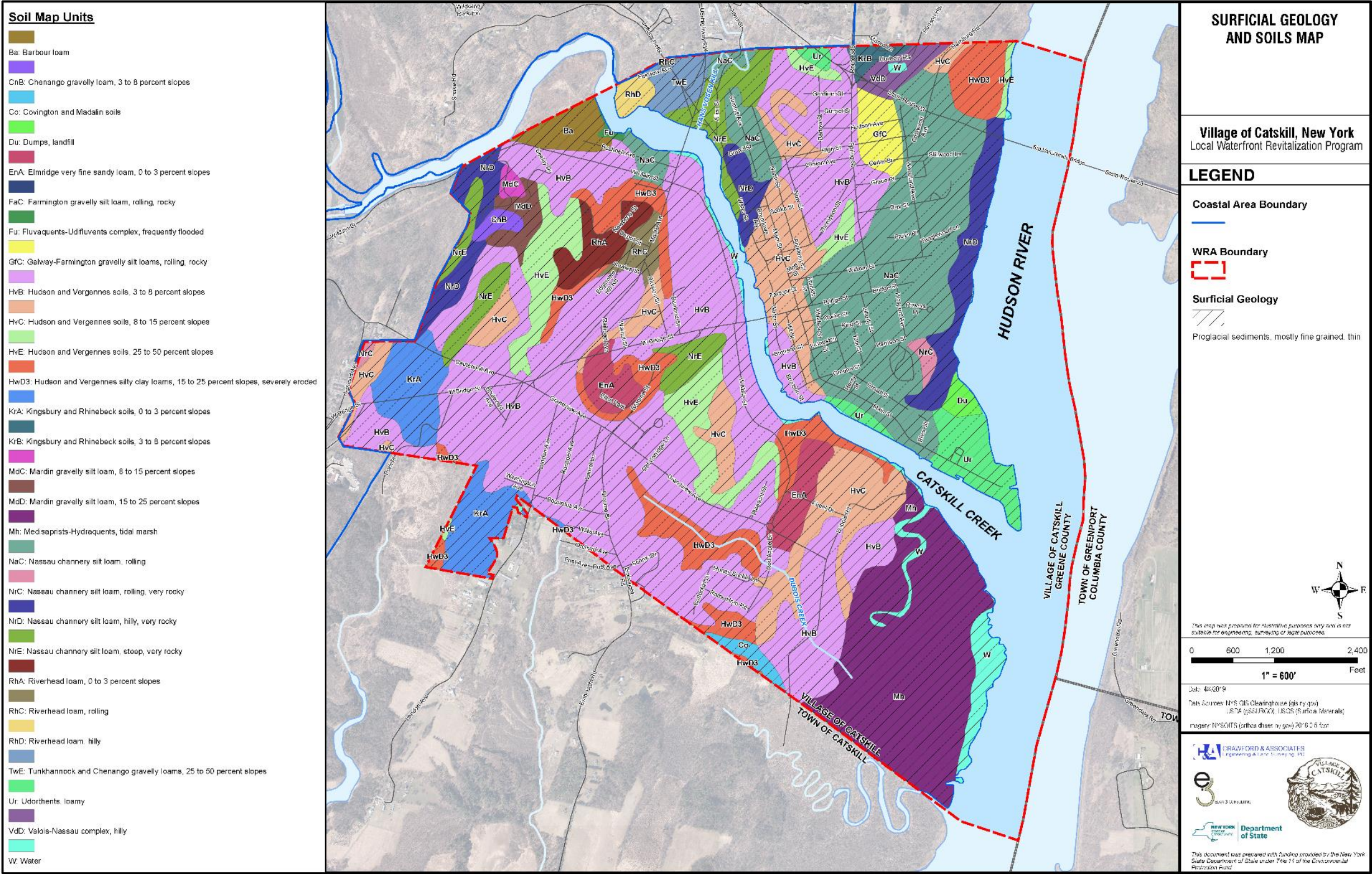
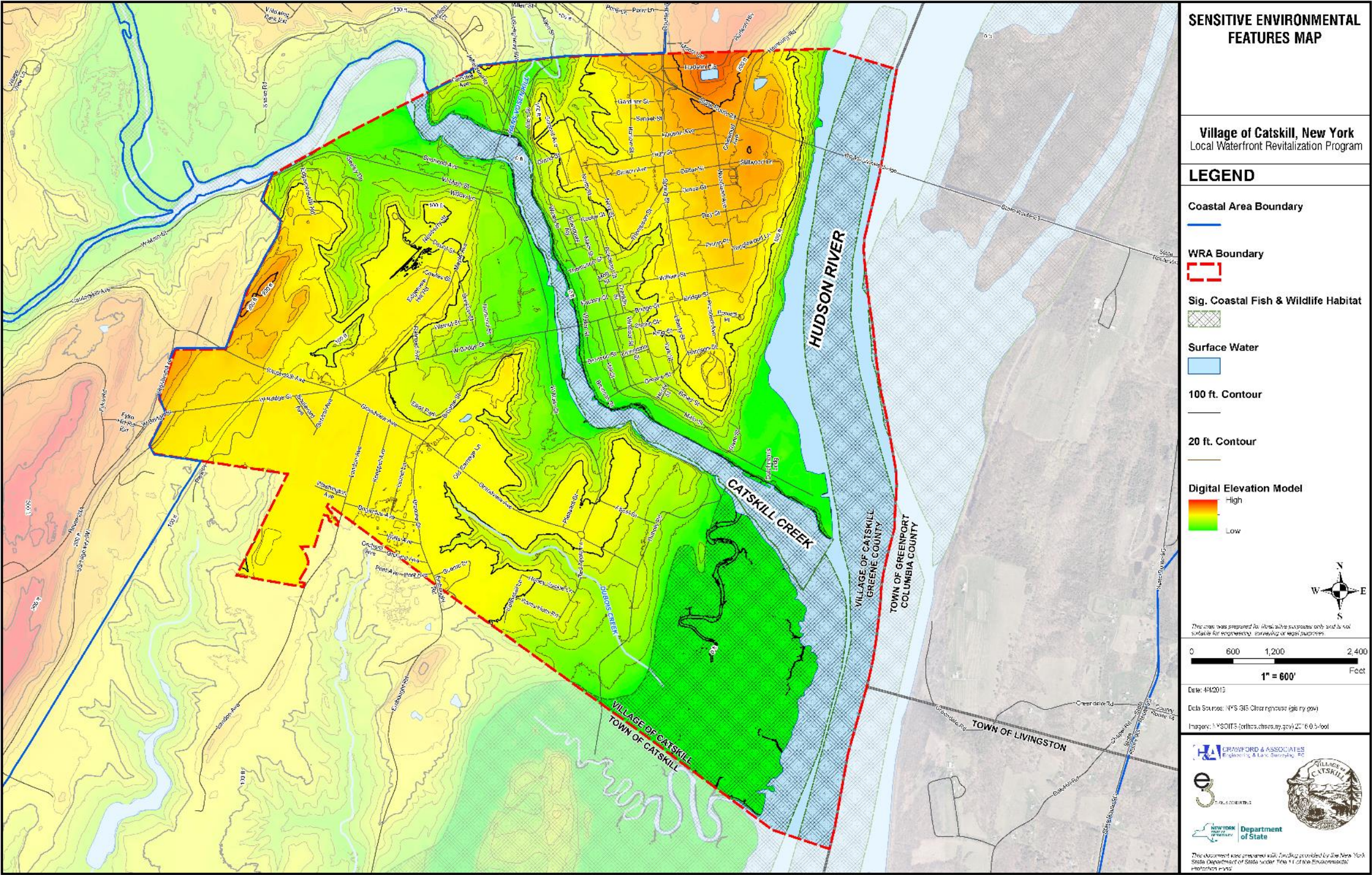


Figure 9. Sensitive Environmental Features Map.



As previously mentioned, the WRA has steep slopes along the shoreline which limit public access, but also protect against flooding. The steepest slopes are north of Catskill Creek along the Hudson, where 120 foot bluffs drop quickly down to the shoreline. The slopes east of Catskill Creek are fairly steep, predominately ranging from 5 to 45 percent slopes. The west side of Catskill Creek is mostly flat, though some steep areas are present. See **Figure 9. Sensitive Environmental Features** for a depiction of slopes.

WATER RESOURCES AND WATER QUALITY/WATER QUALITY CLASSIFICATIONS AND USE STANDARDS

The Village of Catskill WRA includes the following water resources:

Hudson River

The Village of Catskill is located in the coastal portion of the Hudson River. This area is identified on the Priority Water List as Segment 1301-0276.⁴¹ This segment extends from Kingston to the south end of Houghtaling Island. While the segment is considered Class A, suitable for drinking, it is identified as an impaired waterbody with known metal (cadmium) and priority organics (PCBs) contamination resulting from past industrial discharges. Consumption of fish from this segment of the river is impaired.

Fish consumption is impaired due to a NYSDOH health advisory for waters north of the Rip Van Winkle Bridge that recommends eating no fish of any species, except alewife (up to once a week) and American shad, blueback herring, rock bass and yellow perch (up to once a month). South of the Rip Van Winkle Bridge the advisory is to eat no gizzard shad, channel catfish or white catfish, and no more than one meal per month of American eel, Atlantic needlefish, bluefish, carp, goldfish, largemouth bass, smallmouth bass, rainbow smelt, striped bass, walleye, white catfish and white perch because of elevated levels of PCBs. Advisories along this stretch also recommend eating no more than six blue crabs per week and discarding hepatopancreas (mustard, liver, or tomalley), and cooking liquid. These restrictions have severely affected what had been at one time thriving commercial fishing industries.⁴²

Given its Waterbody Classification of Class A, any discharge to the Hudson River would need to meet Class A waterbody standards.

Catskill Creek

Catskill Creek is identified on the Priority Waterbody List as ID 1309-0010. This segment extends from the mouth of the Creek to Cauterskill. The water quality of this segment is identified as unassessed.⁴³ According to the DEC Environmental Resource Mapper, this segment is considered Class C, which indicates best usage as fishing and non-contact recreation. Class C water quality standards would apply to any discharge to the Creek.⁴⁴

⁴¹ The Waterbody Inventory/Priorities Waterbodies List is a statewide inventory of the waters of New York State that the DEC uses to track support (or impairment) of water uses, overall assessment of water quality, causes and sources of water quality impact/impairment, and the status of restoration, protection and other water quality activities and efforts.

⁴² NYSDEC, DECinfo Locator. Available at: <https://giservices.dec.ny.gov/gis/dil/> (Accessed 8/1/19)

⁴³ Ibid.

⁴⁴ NYSDEC, Environmental Resource Mapper. Available at: <http://www.dec.ny.gov/gis/erm/> (Accessed 8/1/19)

Dubois Creek

Dubois Creek is located south of Grandview Ave and flows into Ramshorn Marsh. The Dubois Creek, along with a smaller stream that also flows into Ramshorn Marsh are considered minor tributaries (from the west) of the Hudson River. These are identified on the Priority Waterbody List as 1301-0221. The water quality of Dubois Creek is unassessed.⁴⁵ According to the Environmental Mapper, Dubois Creek is considered Class C and Class C use standards would apply to any discharge to the Creek.⁴⁶

Van Hozen Kill

Van Hozen Kill is a tributary to Catskill Creek flowing from the north in the area of Maple Avenue. It is identified on the Priority Waterbody List as segment 1309-0012 and its quality is unassessed.⁴⁷ According to the Environmental Resource Mapper, the Van Hozen Kill is considered Class C and Class C water quality standards would apply to any discharge to the Kill.

WETLANDS

Wetlands are among the most productive ecosystems in the world. These water-laden lowlands are a breeding ground for vegetation, fish and wildlife and provide invaluable services to people in the form of water-cleaning filtration and flood control. Natural resources, including wetlands, are a popular destination for environmental tourists.

The Ramshorn Marsh is located in the southern portion of the village (as well as in the Town of Catskill), extending along the western shore of the Hudson River for approximately three miles (**Figure 10. Wetlands and Floodplains Map**). The Marsh encompasses approximately 1,300 acres and contains one of the largest tidal swamps on the Hudson River that exists in an essentially natural condition. Ramshorn Marsh is comprised of freshwater tidal swamp and marsh, mudflats, and open river and hosts a number of plants, including golden club, Northern estuary beggar ticks, Southern estuary beggar ticks, and swamp lousewort. The National Audubon Society manages the northern portion of this marsh for use as a bird sanctuary.⁴⁸

Article 24, the NYS Freshwater Wetlands Act, was amended in 2022 with provisions going into effect in 2025 and 2028 that may bring some additional freshwater wetlands in the Village under the jurisdiction of NYSDEC. In 2025, the jurisdictional nature of the existing state freshwater wetlands maps will be eliminated by removing “as shown on the freshwater wetlands maps” in the definition of Freshwater wetlands in § 24-0107.1. As a result, it will be more important to contact NYSDEC to determine whether a wetland is 12.4 acres or larger or of unusual importance and therefore subject to NYSDEC regulation. In 2028, the threshold for state regulated wetlands will be reduced from 12.4 acres to 7.4 acres (also in § 24-0107.1), potentially bringing more wetlands under NYSDEC’s jurisdiction. Sponsors of proposed projects in Section 4 should be aware of the law in effect at the time they undertake development and determine its applicability before commencing work.

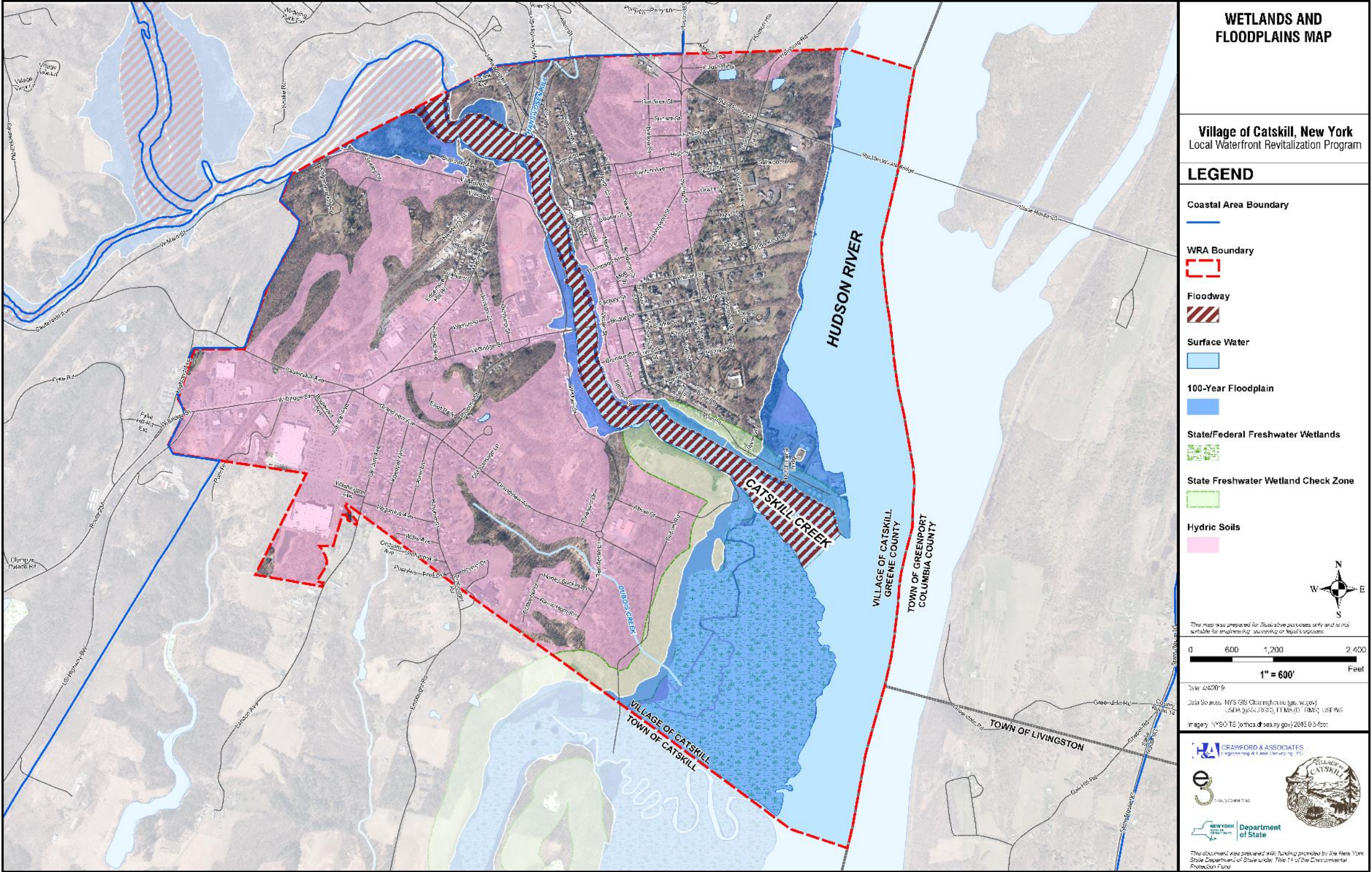
⁴⁵ NYSDEC, DECinfo Locator, <https://giservices.dec.ny.gov/gis/dil/> (Accessed 8/1/19)

⁴⁶ NYSDEC, Environmental Resource Mapper, <http://www.dec.ny.gov/gis/erm/> (Accessed 8/1/19)

⁴⁷ NYSDEC, DECinfo Locator, <https://giservices.dec.ny.gov/gis/dil/> (Accessed 8/1/19)

⁴⁸ NYS Department of State, Significant Coastal Fish and Wildlife Habitats, Available at: https://dos.ny.gov/system/files/documents/2020/03/ramshorn_marsh_final.pdf

Figure 10. Wetlands and Floodplains Map.



To ensure that natural resources, including Ramshorn Marsh, are protected, the Catskill LWRP recommends in that green infrastructure practices be implemented in private and public development projects to manage stormwater runoff and protect water resources.

FLOODING AND EROSION

The 2022 Greene County Hazard Mitigation and Resilience Plan ranks flooding and severe storms as the most likely natural hazards to impact the village, noting that these threats are likely to increase in frequency and severity in the future. Flooding and erosion are closely linked, meaning that as weather events that will lead to flooding in the WRA increase, the conditions of the shoreline will deteriorate as well. While the village has protective regulatory measures in place, these are based on FEMA modeling from 1987, which did not account for climate change impacts including sea level rise and more extreme weather events.

An overview of current flood and erosion hazards and regulations in the WRA is provided below, followed by a summary of the most recent risk assessment data and proposed mitigation measures.

Flood and Erosion Hazards

The Kaaterskill Creek drains into Catskill Creek just beyond the village's western boundary. Combined, the two watersheds drain the east and north slopes of the Catskill Mountains, approximately 250 square miles, with much of it steep and subject to high levels of runoff at high velocity flows. This flow can cause flooding and accompanying erosion of the streambanks, erosion is specifically an issue along the shore at the Catskill Yacht Club.

As noted by the Greene County Water Use Inventory and Assessment Study, Catskill Creek is typically calmer for transient boaters than the Hudson River, except when it occasionally floods due to upland rainfall, or large storms. When large storms hit the watershed, "Catskill Creek becomes a raging torrent, carrying sediment and significant floating debris to the Hudson River. Every few years, a storm of this magnitude occurs with docks and boats experiencing varying degrees of damage. On the larger flood events, entire sections of dock with boats still moored have broken loose, only to be recovered down river later. When the peak flood flows from the Catskills watershed occurs at the point of a high tide, or when the river is high from broader flooding in the Hudson Valley, the flooding from Catskill Creek can be much worse."⁴⁹

The Catskill WRA is also impacted by sea level rise and storm surge due to its location on the tidal Hudson River. Climate change contributes to global sea level rise in two ways: 1) higher seawater temperatures cause the volume of seawater to increase, a phenomenon known as "thermal expansion," and 2) melting ice caps, glaciers and ice sheets increase the total amount of seawater.⁵⁰ The effects of sea level rise are compounded by potential increases in extreme precipitation events and storms associated with climate change. These storms are known to increase storm surges resulting in more flooding further inland than previously. Storm surge is a dramatic elevation of the ocean surface that leads to rapid flooding. The village experienced historic coastal storm surges during Superstorm Sandy in 2012.

⁴⁹ Community Natural Resource Solutions, Greene County Water Dependent Use Inventory & Assessment, July 2008.

⁵⁰ New York State Sea Level Rise Task Force, Report to Legislature, December 2010. Available at: https://www.dec.ny.gov/docs/administration_pdf/slrffinalrep.pdf.

Over the last 100 years the waterfront has experienced flooding from at least 12 hurricanes and tropical storms and many nor'easters. From June to July 2006 a severe storm in Catskill deposited 4.43 inches of rain which exacerbated stream bank erosion on Catskill Creek. It cost an estimated \$1-\$1.5 million to restore the damage. In 2011 and 2012, the village's entire waterfront – including residential neighborhoods, commercial areas, and Catskill Point - was seriously impacted by flooding from both the Hudson and Catskill Creek during Tropical Storms Irene and Lee and by record-breaking storm surge during Hurricane Sandy. Sandy and Irene also caused significant erosion along Catskill Creek.

Protective Regulatory Measures

Erosion of the streambanks of Catskill Creek is a long-time concern that threatens access to the Creek. In the past, timber and concrete bulkheads were installed to stabilize the streambank and allow for continued use. Rip rap is also used in several areas, most notably the river side of Catskill Point. Maintenance of the bulkheads, the responsibility of which falls to individual property owners. The cost and state permitting requirements for reconstruction of erosion protective structures are heavy burdens for property owners. The village supports the policy that those being constructed or reconstructed only be undertaken if they have a reasonable probability of controlling erosion for at least 30 years. While state and federal permitting agencies will require adherence to specific design standards as a condition of permitting, flooding and erosion protective structures are additionally subject to the issuance of a Special Permit under the village's zoning code.

The village includes a FEMA designated Special Flood Hazard Area along Catskill Creek. The floodway and 100-year flood zone are depicted in **Figure 10. Wetlands and Floodplains Map**. The Special Flood Hazard Area is defined as the spatial extent of the area covered by floodwaters of the base flood (100-year storm event). The base flood elevation is the computed elevation to which floodwater is anticipated to rise during the base flood. The base flood elevation for the Creek is identified as 10 feet above mean sea level around the mouth of the Creek, at about 12 feet in elevation in the area of the Uncle Sam Bridge. It is approximately 19 feet in the area of NYS Route 9W and approximately 21 feet near the village limit.

The Village of Catskill has sought to minimize damage to property and the endangering of human lives caused by flooding and erosion by adopting the Flood Damage Prevention Law (FDPL). Under Catskill's FDPL, building within the floodway requires a detailed technical evaluation, elevation above the base flood elevation or floodproofing to this elevation for non-residential structures, and construction methods to minimize property damage. Additionally, for those uses requiring Site Plan Review, the Planning Board considers the "adequacy of floodproofing and prevention measures consistent with flood hazard prevention district regulations" in its review of site plans. The FDPL also addresses that erosion may be a problem for residents as damages may occur at private and public housing and public and privately owned facilities.⁵¹

While the village has found the FDPL effective in the past, it now faces the risk of increased flooding due to sea-level rise in the Hudson River and increased frequency and severity of storms occurring within the watershed of Catskill Creek. The storm modelling that FEMA prepared to develop the flood maps was conducted in 1987 and does not consider sea level rise and the increased frequency and severity of storms.

⁵¹ Village of Catskill Zoning Ordinance.

2014 Risk Assessment

The unprecedented flooding in 2011 and 2012 focused the community's attention on increasing resilience to future storm events and mitigating impacts on public health and safety, accessibility, local assets, and businesses. In 2012, the village convened the Catskill Waterfront Task Force to seek solutions to future flooding problems.

The Task Force was awarded funding through the DEC's Hudson River Estuary Program and partnered with Scenic Hudson and the Consensus Building Institute to study the problem and develop a flood and sea level rise resilience action plan to guide future actions with the goal of creating a safer, more vibrant Catskill waterfront. The Task Force used the DOS's Inventory and Coastal Risk Assessment tools developed by the NYS Department of State as part of the New York Rising Community Reconstruction Program (NYR-CR Program) to examine risk, exposure, and vulnerability in the village.

The outcomes of the risk assessment were detailed in the Village of Catskill Inventory and Coastal Risk Assessment and provided the basis for the report *Resilient Catskill, Report of the Catskill Waterfront Resilience Task Force, 2014*. A copy of the report is provided in the Appendices. The findings of the risk assessment and *Resilient Catskill* report remain relevant to the WRA and are excerpted below.

Risk Assessment Methodology

The Task Force first inventoried community assets and the location of socially vulnerable populations. Community assets include housing as well as economic, health, and social service assets such as schools, hospitals, treatment plants, parks, natural areas, and commercial areas. Socially vulnerable populations have a higher rate of socio-economic conditions that reduce their ability to avoid, adapt to, or bounce back from losses (e.g., from flooding and storms). For example, populations with an above average percentage of people who are disabled, low income, elderly, children, Non-English speaking, living in low quality housing, or homeless would be considered socially vulnerable.

Using information from Scenic Hudson's Sea Level Rise Mapper and additional modeling by Scenic Hudson, the Task Force then examined the current extent of flood prone areas, and areas that will be exposed to daily tides (inundated) or become increasingly flood prone under various sea level rise scenarios. For mapping the future extent of floodplains above the high tide line, the base flood elevation was simply added to projected future Mean Higher High Water (MHHW) following sea level rise.

The Task Force then used the DOS tool to calculate the relative exposure and resilience of community assets to flooding and storm surge hazards. In this tool, overall risk scores are calculated based on multiple factors having to do with a particular structure, household, or item of infrastructure's position on the land, its ability to resist damage from a flood event, and the likelihood and magnitude of anticipated flood events.

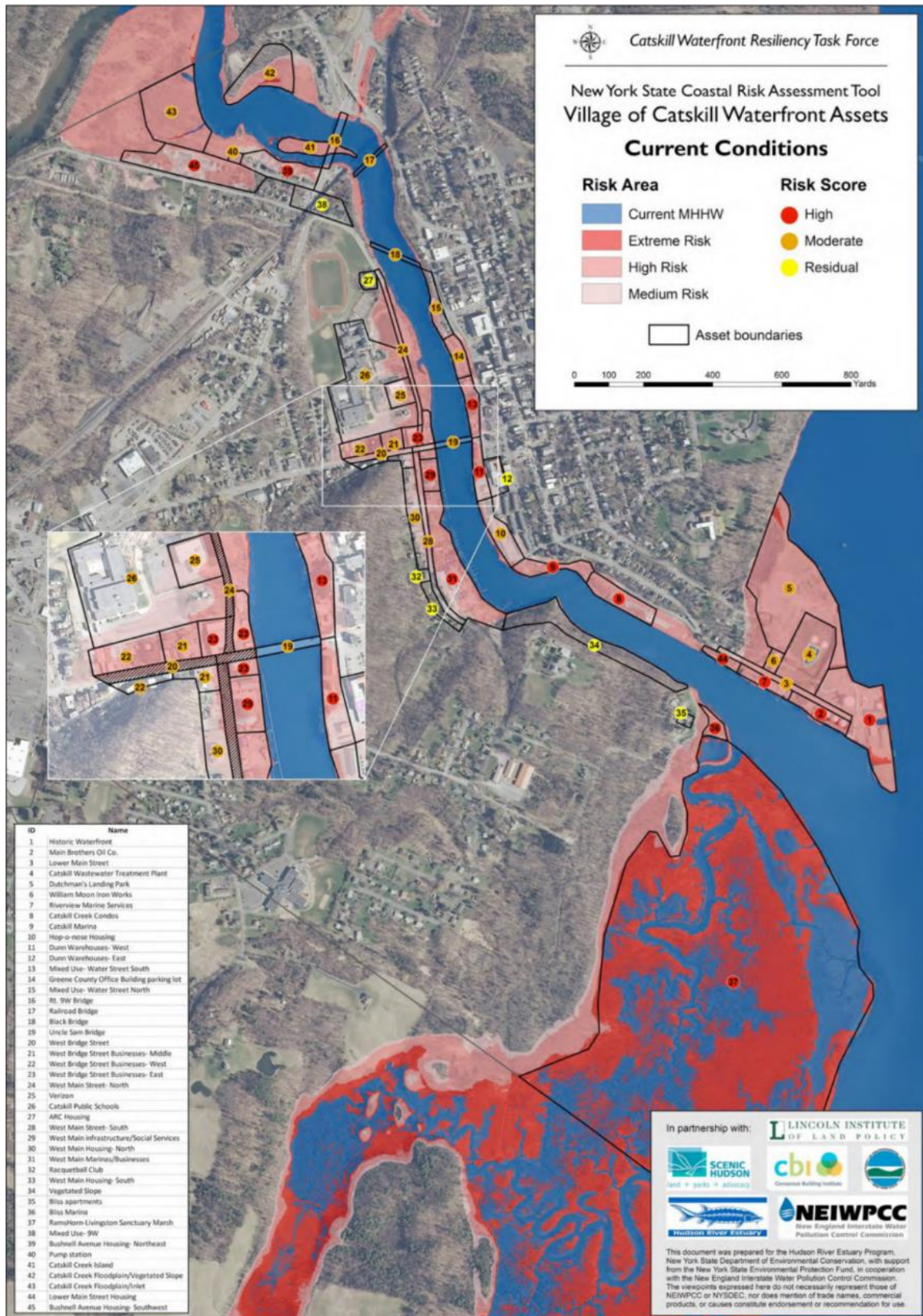
The detailed asset inventory illustrating the exposure of community assets to flooding is provided in **Table 7**. Inventory of Community Assets. The location of community assets and their relative risk scores are shown on **Figure 11**. Village of Catskill Waterfront Assets.

A summary of findings is provided below by location and asset type.

Table 7. Inventory of Community Assets.

ID	Name	Class	Sub-class	FEMA critical facility	Socially vulnerable	Current Risk Area	6.5" SLR Risk Area	21.5" SLR Risk Area	60" SLR Risk Area
1	Historic Waterfront			No, Locally Significant	No	High	High	Extreme	Inundated
2	Main Brothers Oil Co.	Infrastructure_Systems	Liquid Fuels	No	No	Extreme	Extreme	Inundated	Inundated
3	Lower Main Street	Infrastructure_Systems	Transportation	No, Locally Significant	No	High	High	Extreme	Inundated
4	Catskill Wastewater Treatment Plant	Health_and_Social_Services	Public Works Facilities	Yes	No	High	High	Extreme	Inundated
5	Dutchman's Landing Park	Natural_and_Cultural_Resources	Parks and Recreation	No	No	High	High	Extreme	Inundated
6	William Moon Iron Works	Economic	Industrial, Warehousing and Manufacturing	No	No	High	High	High	Inundated
7	Riverview Marine Services	Economic	Marina/Water Based Business	No	No	High	High	Extreme	Inundated
8	Catskill Creek Condos	Housing	Multi-Family Residence	No	Yes	High	High	High	High
9	Catskill Marina	Economic	Marina/Water Based Business	No	No	High	High	Extreme	Inundated
10	Hop-o-nose Housing	Housing	Multi-Family Residence	No	Yes	Moderate	High	High	High
11	Dunn Warehouses- West	Economic	Industrial, Warehousing and Manufacturing	No	No	High	High	High	Inundated
12	Dunn Warehouses- East	Economic	Industrial, Warehousing and Manufacturing	No	No	N/A	Moderate	Moderate	High
13	Mixed Use- Water Street South	Economic	Downtown Center	No	No	High	High	High	High
14	Greene County Office Building parking lot	Infrastructure_Systems	Transportation	No	No	High	High	High	Extreme
15	Mixed Use- Water Street North			No	No	Moderate	Moderate	High	High
16	Rt. 9W Bridge	Infrastructure_Systems	Transportation	Yes	No	High	High	High	High
17	Railroad Bridge	Infrastructure_Systems	Transportation	No	No	High	High	High	High
18	Black Bridge	Infrastructure_Systems	Transportation	No	No	High	High	High	High
19	Uncle Sam Bridge	Infrastructure_Systems	Transportation	Yes	No	High	High	High	High
20	West Bridge Street	Infrastructure_Systems	Transportation	No, Locally Significant	No	High	High	High	High
21	West Bridge Street Businesses- Middle	Economic	Small Business	No	No	High	High	High	High
22	West Bridge Street Businesses- West	Economic	Small Business	No	No	High	High	High	High
23	West Bridge Street Businesses- East	Economic	Small Business	No	No	High	High	High	Extreme
24	West Main Street- North	Infrastructure_Systems	Transportation	No, Locally Significant	No	High	High	High	Inundated
25	Verizon	Infrastructure_Systems	Telecommunications	No	No	High	High	High	High
26	Catskill Public Schools	Health_and_Social_Services	Schools	Yes	Yes	High	High	High	High
27	ARC Housing	Housing	Supportive Housing	No, Locally Significant	Yes	N/A	N/A	N/A	N/A
28	West Main Street- South	Infrastructure_Systems	Transportation	No, Locally Significant	No	High	High	High	Extreme
29	West Main infrastructure/Social Services			Yes	No	High	High	High	Extreme
30	West Main Housing- North	Housing		No	Yes	Moderate	Moderate	High	High
31	West Main Marinas/Businesses	Economic		No	No	High	High	High	Inundated
32	Racquetball Club	Natural_and_Cultural_Resources	Parks and Recreation	No	No	N/A	N/A	N/A	High
33	West Main Housing- South	Housing	Single-Family Residence	No	No	N/A	N/A	Moderate	High
34	Vegetated Slope	Natural_and_Cultural_Resources	Natural Habitats	No	No	N/A	N/A	N/A	N/A
35	Bliss apartments	Housing	Multi-Family Residence	No	Yes	N/A	N/A	N/A	Moderate
36	Bliss Marina	Economic	Marina/Water Based Business	No	No	High	High	High	Inundated
37	RamsHorn-Livingston Sanctuary Marsh	Natural_and_Cultural_Resources	Parks and Recreation	No	No	Extreme	Inundated	Inundated	Inundated
38	Mixed Use- 9W			No	Yes	N/A	N/A	N/A	N/A
39	Bushnell Avenue Housing- Northeast	Housing	Single-Family Residence	No, Locally Significant	Yes	High	High	High	High
40	Pump station	Infrastructure_Systems	Water Supply	Yes	No	High	High	High	High
41	Catskill Creek Island	Natural_and_Cultural_Resources	Natural Habitats	No	No	High	High	High	Inundated
42	Catskill Creek Floodplain/Vegetated Slope	Natural_and_Cultural_Resources	Natural Habitats	No	No	High	High	High	Extreme
43	Catskill Creek Floodplain/Inlet	Natural_and_Cultural_Resources	Natural Habitats	No	No	High	High	High	Inundated
44	Lower Main Street Housing	Housing	Single-Family Residence	No	No	High	High	Extreme	Inundated
45	Bushnell Avenue Housing- Southwest	Housing	Single-Family Residence	No, Locally Significant	Yes	High	High	High	High
Source: the Village of Catskill Inventory and Coastal Risk Assessment									

Figure 11. Village of Catskill Waterfront Assets.



Risks to Waterfront Locations

The risk assessment illustrated that current risks and predicted future changes in risk vary considerably along Catskill Creek and the Hudson waterfronts. This range in variation is due to both Catskill's varied waterfront topography and Base Flood Elevations, and the different impacts that stormwater and coastal storm surge flooding events have on the waterfront. Catskill Point and smaller, low-lying floodplain areas along the creek are expected to experience a dramatic increase in risk and regular inundation by the end of the century. In contrast, the currently high-risk Bushnell Avenue residential area is predicted to remain in the same risk category in the coming decades without experiencing daily inundation. In the West Bridge Street area, the businesses fronting the creek are in the highest risk area, but it is the portion of West Main Street that provides access to the public schools that is expected to experience regular inundation by 2100.⁵²

Neighborhoods Bushnell

The Bushnell waterfront neighborhood, west of Route 9W on the south side of Catskill Creek, includes approximately two dozen single-family homes⁵³ and a pump station located between the creek and the road. Most homes in the neighborhood, as well as the pump station, are in Moderate and High-risk areas currently. Risk areas are expected to become higher without expanding their area significantly beyond their current location in this neighborhood, therefore meaning that those homes that are outside of current risk areas are likely to remain so for the foreseeable future, while those already in risk areas will more uniformly experience High risk by the end of the century. Several assets on the south side of West Main Street in this part of the village (and which were not included in the description above) will be at higher risk by mid-century.

The neighborhood along Bushnell Avenue was one of the hardest hit by Hurricane Irene, Tropical Storm Lee and Hurricane Sandy. Many homes in this area are within the current 100-year flood zone, are constructed at elevations that make them vulnerable to flooding events and were damaged during the recent storms.

The homes, which collectively are considered socially vulnerable assets, demonstrated significant vulnerability during past flooding events and are experiencing High overall risk. Due primarily to its lower vulnerability, the pump station is categorized as having a Moderate risk score. The overall risk for the assets in this neighborhood (which are grouped together in this analysis) is not expected to change by the end of the century. However, it should be noted that increasing risk areas will mean increasing overall risk for individual homes, and it is also likely that the vulnerability of homes will increase with time - a factor which is not included in the future risk scores. There are three nearby natural assets which may provide some attenuation of both stormwater stream flooding and tidal storm surge flooding. Two of these assets will experience at least partial inundation by the end of the century, which may reduce the efficacy of their protection.⁵⁴

West Bridge Street

A mixed-use area centered on West Bridge Street is characterized by small businesses and the Catskill public schools. Most assets in this zone currently fall within the High-risk area, though the majority of school

⁵² Scenic Hudson: Sea Level Rise Mapper

⁵³ This count includes homes between Catskill Creek and West Main Street.

⁵⁴ Scenic Hudson, Consensus Building Institute, Lincoln Institute of Land Policy, NEIWPCC and NYSDEC HRE, Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

buildings are still outside of any risk area. By the end of the century the school buildings are predicted to be in Moderate and High-risk areas.

Sometime in the second half of the century West Main Street north of West Bridge Street (an important access route) and the small businesses closest to the creek will move into Extreme risk or experience some regular inundation.

In terms of overall risk, most assets in this neighborhood are currently at Moderate risk, with the exception of businesses closest to the creek which are experiencing High risk. As with the Bushnell neighborhood, most assets are not expected to move into higher risk categories by the end of the century. The notable exception is West Main Street north of West Bridge Street, where a stretch of approximately 400 feet located in front of the Verizon building will be partially inundated by 2100.⁵⁵

Catskill Point

Located at the confluence of Catskill Creek and the Hudson River, Catskill Point is a low-lying, relatively flat area that is central to the village's waterfront character. The assets identified at Catskill Point include the Catskill Wastewater Treatment Plant (a FEMA critical facility), the Historic Waterfront area, infrastructure assets such as Lower Main Street and an oil company, several small businesses, single-family housing, and Dutchman's Landing (a public waterfront park).

Small portions of the Main Brothers Oil Company, the park and the Historic Waterfront already fall within the Extreme risk area. The Oil Company, Historic Waterfront, Riverview Marine Services, and Lower Main Street housing have High overall risk scores under current conditions for a 100-year event. A 500-year event elevates the risk to all Catskill Point assets but Lower Main Street to High. Risk areas are not expected to change dramatically by the 2020s, but by the 2050s the oil company will experience some inundation, and all but William Moon Iron Works will be in the Extreme risk area. By the year 2100, the entire Point is expected to experience regular inundation.⁵⁶

Risks to Natural Protective Features

The assessment highlighted the role of Catskill's natural protective features. Wetlands, vegetated stream buffers, and forested land in the WRA can help protect water quality by absorbing the extra water from storms and filtering out pollutants. In this way, they can also help with reducing the impacts of flooding.

Natural areas along Catskill's waterfront include the large tidal marsh at RamsHorn-Livingston Sanctuary (which extends south beyond the village boundary), a steep vegetated slope on the south side of Catskill Creek near its mouth, and the Catskill Creek floodplain near Bushnell Avenue (three vegetated floodplain and sloped areas upstream of the Route 9W bridge). The Catskill Creek floodplain is an undeveloped, largely forested area that can provide a degree of water quality and flood protection. RamsHorn Marsh also provides natural water quality improvements and flood buffering services. As sea level rise occurs, however, the capability of Ramshorn Marsh

⁵⁵ Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

⁵⁶ Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

to provide protective services is threatened due to expected inundation. As this occurs, the marsh is expected to migrate inland.

The landscape attributes for natural assets, which contribute to the exposure score, were difficult to classify using the DOS tool. For instance, RamsHorn Marsh is tidal, and is already inundated regularly, and yet it is currently an important natural asset. Without adaptation it is likely that by the 2020s the increased inundation will negatively impact the marsh and the characteristics that may provide protection to other assets, and by the 2050s they will be diminished. The longevity of the marsh and its protective services may be extended by marsh adaptation and/or migration, through natural or human assisted processes (e.g., assisted accretion). Upstream on Catskill Creek the shore floodplains and island in the creek (known locally as Goat Island) are likely important for attenuating flood waters. They are expected to experience gradual increases in inundation driven by sea level rise.⁵⁷

Highly Vulnerable Assets

Community assets were assigned a vulnerability score between one (low) to five (high) that represented the asset's capacity to return to service after a storm. No assets were assigned a score of five. Ten assets were assigned a "4- significant vulnerability" score:

- Historic Waterfront
- Riverview Marine Services (now closed)
- Catskill Marina
- Dunn Warehouses – West
- Mixed-Use Water Street South
- West Bridge Street Businesses – East
- West Main marinas/businesses
- Bliss Marina
- Bushnell Avenue Housing – Northeast
- Bushnell Avenue Housing - Southwest

All of these assets currently have high risk scores and are expected to remain in this category into the 2050's. Beyond that time, those that are downstream from the Uncle Sam Bridge are expected to begin experiencing regular inundation. Examining the specific conditions that cause high vulnerability in assets (e.g., mechanical in basement) may present opportunities for effective adaptation actions.

While significant vulnerability is not the only indicator of flood risk, it is likely the most important factor in determining flood risk. Assets that were identified as being vulnerable to flooding and sea level rise are more likely to be included in plans for adaptive action.

⁵⁷ Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

Risks to Key Assets

Key assets include FEMA defined critical assets, which are those whose loss or impairment would compromise any critical facilities or any essential cultural, social, economic, or environmental function of the community, and other non-FEMA defined, locally significant assets.

The analysis identified seven assets that are considered critical facilities according to FEMA's definition. Those at highest risk under current conditions are the Greene County Highway Department and a Pump Station (which were grouped along with an adjacent oil business into one asset called West Main Infrastructure/Social Services). While the risk to these two critical facilities is expected to increase with sea level rise above 21", it is the Wastewater Treatment Plan (located on Catskill Point) that is expected to first experience regular inundation, sometime in the latter half of the century. All other FEMA critical facilities are expected to remain at relatively low risk through the remainder of the century.⁵⁸

Risks to Transportation Access/Assets

All nine transportation/access assets included in the analysis are currently at relatively low risk, and most are expected to remain so for the timeframe of this assessment (Year 2100). The most notable exceptions are the stretch of West Main Street north of West Bridge Street and lower Main Street, which are both predicted to experience periodic inundation in the second half of the century. The southern portion of West Main Street and the Greene County Office Building Parking lot are both also expected to become exposed to higher risk (though not become inundated) sometime after the 2050s. West Main Street north of West Bridge Street provides important access to the Catskill public schools and other assets, and the village may wish to examine ways to extend its longevity. Lower Main Street provides access to Catskill Point, which is expected to experience widespread inundation and is discussed in greater detail below.⁵⁹

Risks of Socially Vulnerable Populations

The risks to socially vulnerable populations are summarized in **Table 8**. Four of these population areas are currently at high risk of facing "significant" impacts from flooding and the number will increase to six by 2050 due to sea level rise. Based on the risk assessment, it is apparent that planning and implementing resiliency measures are needed immediately in those six identified areas with socially vulnerable populations.

⁵⁸ Scenic Hudson, Consensus Building Institute, Lincoln Institute of Land Policy, NEIWPCC and NYSDEC HRE, Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

⁵⁹ Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

Table 8. Risk to Socially Vulnerable Populations.⁶⁰

Location of Socially Vulnerable Population	Current Risk Area	6.5" Sea Level Rise Risk Area 2020	21.5" " Sea Level Rise Risk Area 2050	60" Sea Level Rise Risk Area 2100
Catskill Creek Condos	High	High	High	High
Hop-O-Nose Housing	Moderate	High	High	High
Catskill Public Schools	High	High	High	High
ARC Housing	N/A	N/A	N/A	N/A
West Main Housing - North	Moderate	Moderate	High	High
Bliss Apartments	N/A	N/A	N/A	Moderate
Mixed-Use 9W	N/A	N/A	N/A	N/A
Bushnell Ave Housing – Northeast	High	High	High	High
Bushnell Ave Housing - Southwest	High	High	High	High

Actions and Policies to Improve Resilience

Village-wide

Based on the outcomes of the local risk assessment, the *Resilient Catskill, Report of the Catskill Waterfront Resilience Task Force, 2014* provided a series of village-wide recommendations for increasing resilience. These recommendations, and their status, are summarized in **Table 9**.

These recommendations were reviewed by the Catskill WAC and have been incorporated in the LWRP. Recommendations which have not yet been fully implemented have been included as projects 20 and 22 in Section 4.

Table 9. Catskill Waterfront Task Force Village-wide Resiliency Recommendations

Recommendation	Status*
<i>Communication and Emergency Management</i>	
1. Review the village comprehensive emergency management plan for any necessary updates.	<i>Completed. The village does not have such a plan. The County Comprehensive Emergency Management Plan (CEMP) has been reviewed and updated February 2017.</i>
2. Improve emergency communications.	<i>Completed. County Code Red.</i>
3. Design and install high-watermark signs in the waterfront area to educate the community about flood risk and sources of flood preparedness informational resources.	<i>Not completed. Included in LWRP Project 20 in Section 4.</i>

⁶⁰ Scenic Hudson, Consensus Building Institute, Lincoln Institute of Land Policy, NEIWPCC and NYSDEC HRE, Village of Catskill Inventory and Coastal Risk Assessment for the Catskill Waterfront Resilience Task Force, January 2014

Increased Flood Preparedness	
4. Establish an Interim Flooding and Storm Resilience committee and create a Permanent Joint Village and Town Conservation Commission.	<i>In-progress. The village co-hosted training on Conservation Advisory Councils in 2015, formed an LWRP committee in 2018 and a Climate Smart Communities committee in 2019.</i>
5. Invite agencies or experts to give public outreach presentations on storm preparedness and flood-mitigation options for families, businesses, institutions, structures and facilities, including funding opportunities when applicable.	<i>Not completed. Included in LWRP Project 20 in Section 4.</i>
6. Create a flooding best practices manual for distribution to village residents and businesses.	<i>Completed. The Village of Catskill has created a Flood Preparedness Guide for Residents and Businesses</i>
7. Post key information on flood risks and emergency plans on the village website.	<i>Completed.</i>
8. On an annual basis, direct property owners and residents of current and projected future floodplains to the village's informational resources about flooding and emergency preparedness.	<i>Not completed. Included in LWRP Project 20 in Section 4.</i>
9. Support regular training for the village floodplain manager (Code Enforcement Officer).	<i>Not completed. Included in LWRP Project 20 in Section 4.</i>
10. Work with other communities in the Catskill Creek watershed to better manage storm water and runoff.	<i>In-Progress. Meetings held in October 2015 and May 2016.</i>
Reduce Infrastructure Risks	
11. Work through the Greene County Multi-Hazard Mitigation Plan (MHMP) to position Catskill for resiliency actions and funding opportunities.	<i>Completed. Waste water treatment plant upgrades and implementation of task force recommendations included in 2017 MHMP.</i>
12. Conduct a risk and engineering review of key municipal infrastructure to identify adaptation needs/options/plans.	<i>In progress. Crawford and Associates to conduct risk and engineering review of village wastewater treatment plant. The review recommended improvements to increase the flood resiliency of the Wastewater Treatment Plant (WWTP) and Pump Stations 1 and 3. Resiliency improvements to the WWTP and Pump Stations included in LWRP Project 22 in Section 4.</i>
13. Maintain an inventory and stock all necessary replacement parts for sewage treatment plant and pump stations.	<i>Completed</i>

Update Zoning and Codes	
14. Convene a working group including representation from village boards, committees, officials and municipal planners to review the Task Force Report and identify which/how local codes can be modified to better weather and adapt to future storms and account for sea level rise.	<i>Completed. Hudson River Estuary Program grant, awarded 2015, for Crawford and Associates to conduct review of local codes and make recommendations for improvement. An analysis of the village's zoning with a framework for addressing future flooding is provided in the Zoning Code Analysis for Flood Resiliency Report, November 2017</i>
15. Consider applying to participate in the National Flood Insurance Program (NFIP) Community Rating System (CRS), to reduce flood insurance rates and improve flood resilience.	<i>Completed. Considered, but deemed not cost effective to participate, given the relatively low number of floodplain properties.</i>
Update Planning	
16. Ensure that all proposals and plans address projected sea level rise and are responsive to flood resilience issues.	<i>In-process. BOA vision addresses flooding, LWRP is underway. Comprehensive Plan is complete and includes recommendations to address</i>
17. Promote the use of Green Infrastructure techniques throughout the village to reduce flooding from runoff and minimize stormwater treatment burdens.	<i>In-process. Participated in Cornell Landscape Architecture Climate Adaptive Design studio, which included green infrastructure, but no advancement of this project.</i> Crosscutting recommendation for all relevant projects
18. Consider participating in NYS DEC's Climate Smart Communities and its new certification program, in order to receive free technical assistance and eligibility for future grant applications.	<i>Complete. The village was certified a Bronze Level Climate Smart Community in 2023.</i>
19. Promote the long-term persistence of natural storm buffer areas, particularly Ramshorn- Livingston Marsh, Catskill Point, and undeveloped riparian areas along Catskill Creek (e.g., Goat Island, Pelican Island).	<i>Scenic Hudson acquired creekside property upstream of the village and enlarged Ramshorn Livingston Marsh holdings in 2016/17.</i>
20. Consult Task Force report for neighborhood/asset specific recommendations and begin developing strategies to address them (e.g., developing an alternate access to the school complex via West Bridge Street).	<i>Not completed.</i> Included in LWRP Project 21 in Section 4.
Municipal Operations	
21. Take advantage of training opportunities from federal, state, and local partners to improve staff and volunteer understanding of tools available to help plan for and respond to flood emergencies.	<i>In progress. Staff attended local trainings and waterfront resilience task force learning group.</i>

22. Integrate departmental funding requests into a village-wide Capital Improvement Plan that incorporates and prioritizes the needs of all departments, along with phased adaptation of infrastructure to flooding and sea level rise.	<i>Not completed.</i> <i>Included in LWRP Project 20 in Section 4.</i>
23. Incorporate cost-benefit analyses and long-term flood risk due to sea level rise and stronger storms into asset design and the prioritization of strategies to manage key municipal assets.	<i>Not completed.</i> <i>Included in LWRP Project 20 in Section 4.</i>
24. Create an orientation packet or a presentation on flood hazards and municipal plans for all newly elected/appointed municipal representatives, to ensure that new personnel are well-informed on the issues and procedures in the village.	<i>Not completed.</i> <i>Included in LWRP Project 20 in Section 4.</i>
*Status as of 2022. Information provided by Elizabeth LoGiudice, Principal at Resilience Communications and Consulting, LLC.	

Site-Based Recommendations

The *Resilient Catskill* report also included site-based recommendations for waterfront neighborhoods. The Waterfront Task Force delineated eight Adaptation Neighborhoods which are defined as segments of the waterfront united by their physical conditions, uses, assets and populations. Each of these neighborhoods present challenges and opportunities for positive transformation toward resiliency.

The Adaptation Neighborhoods are presented in **Figure 12**. Village of Catskill Adaptation Neighborhoods.

The *Resilient Catskill* recommendations for adapting each neighborhood are summarized in **Table 10**. Resilient Catskill Site-Based Recommendations.

Building on the work of the Waterfront Task Force, a proposed LWRP project is that the village conduct neighborhood planning for sea level rise and future flooding, including, if necessary, an update of the zoning code. Socially vulnerable populations could be kept informed and included in public discussion. A full project description is provided under project 21 in Section 4 of the LWRP.

Figure 12. Village of Catskill Adaptation Neighborhoods.⁶¹



⁶¹ Resilient Catskill Report, 2014

Table 10. Resilient Catskill Site-Based Recommendations.⁶²

Recommendation
<i>Catskill Point & Lower Main Street</i>
<ul style="list-style-type: none"> ➤ Consider ways to maintain the viability and accessibility of the mainly commercial (with a small component of residential) uses of the point. These may include using fill to elevate Main Street along with commercial and residential uses, converting Main Street to an elevated Pier, using docks and boat piers to maintain and encourage additional water-based commercial uses, and adapting residences through wet-floodproofing or other structure adaptations. ➤ Begin planning for long-term relocation of the village's wastewater treatment plant. ➤ Allow low-lying open spaces (including Dutchmans Landing Park and wastewater treatment plant site, once relocated) to revert to tidal wetland habitat. ➤ Seek alternate locations for waterfront parkland, to maintain public access opportunities for residents and visitors. ➤ Reconcile proposed redevelopment alternatives proposed in the Downtown and Waterfront Revitalization Strategy with sea level rise and risk area projections, to generate a more resilient redevelopment vision.
<i>Central Waterfront (East Shore of Catskill Creek)</i>
<ul style="list-style-type: none"> ➤ Explore near- and long-term flood adaptations for waterfront buildings, and encourage/incentivize their implementation. Wet-floodproofing of buildings may be feasible in the short-term, while elevation of individual buildings or raising sections of the waterfront with fill may be investigated as long-term options. ➤ Research upgrades to erosion-controlling shoreline treatments, including nature-based and ecologically enhanced options, as well as the hydrological impacts such upgrades may have on other stretches of the Catskill Creek waterfront within the village. ➤ Reconcile proposed redevelopment alternatives proposed in the Downtown and Waterfront Revitalization Strategy with sea level rise and risk area projections, to generate a more resilient redevelopment vision.
<i>West Main Street Waterfront (West Main Street- South)</i>
<ul style="list-style-type: none"> ➤ Consider various long-term adaptation pathways for the area, including floodproofing or elevating existing structures, raising or otherwise upgrading West Main Street, incentivizing a shift of water-based businesses to the landward (west) side of the road, or using fill or nature-based erosion protection solutions to create areas that extend the longevity of water-based businesses on the water (east) side of the road. ➤ Continue supporting Greene County with planning for relocation of its Highway Department facility out of the flood hazard zone. ➤ Reconcile proposed redevelopment alternatives proposed in the Downtown and Waterfront Revitalization Strategy with sea level rise and risk area projections, to generate a more resilient redevelopment vision.
<i>West Bridge Street</i>

⁶² Resilient Catskill Report, 2014

<ul style="list-style-type: none"> ➤ Work with present and potential new business/property owners to encourage building adaptations such as wet floodproofing. ➤ Assess interest in developing a master plan to coordinate the adaptation activities of individual property owners, in order to minimize expenses and create an appealing commercial area. ➤ Reconcile proposed redevelopment alternatives proposed in the Downtown and Waterfront Revitalization Strategy with sea level rise and risk area projections, to generate a more resilient redevelopment vision.
<i>Schools (West Main Street- North)</i>
<ul style="list-style-type: none"> ➤ Research erosion-controlling shoreline treatments, including nature-based and ecologically-enhanced techniques, as well as the hydrological impacts such upgrades may have on other stretches of the Catskill Creek waterfront within the village. Such shoreline treatments may be incorporated into the Bridge-to-Bridge greenway design. ➤ Seek an alternate route to the school complex, possibly via Dumond Street, in order to maintain access and continued operation of the facilities during and immediately after flood events. ➤ Monitor flood risk to school buildings, and plan ahead for dry-floodproofing when necessary. ➤ Consider moderately raising West Main Street to reduce flood impacts to road infrastructure.
<i>Bushnell – Route 9W</i>
<ul style="list-style-type: none"> ➤ Ensure that re-developments or substantial improvements are adapted to current and future projected flood risks. ➤ Research the possibility of partial or full neighborhood buyouts in order to reduce the continued impacts on property and human safety. Areas of research may include sources of funding that allow for adaptive redevelopment, assessing property owner and resident opinion/interest, identifying potential places for whole neighborhood relocation within the village, exploring the possibility of extending the planned recreational Bridge-to-Bridge walkway along this shore, and understanding the benefits and costs of restoring the creek floodplain to a more natural state. ➤ Consider developing a master plan to either coordinate the adaptation activities of individual property owners or find collective alternatives.
<i>Natural Buffer</i>
<ul style="list-style-type: none"> ➤ Consider permanent protection and/or restoration efforts to enhance the protective services of this floodplain area upstream of the Village waterfront.
<i>RamsHorn Livingston Marsh</i>
<ul style="list-style-type: none"> ➤ Evaluate ways to enhance the flood-buffering characteristics of the marsh, to protect the existing marsh area from degradation, and to secure open space for inland marsh migration. ➤ Research the need for and feasibility of assisted marsh adaptation (e.g. assisted accretion).
Resilient Catskill Report, 2014

Shoreline Stabilization

Based on the flood and erosion risks in the WRA, the Catskill WAC identified the need to evaluate existing shoreline stabilization measures.

In 2023, while this LWRP was under development, Greene County Soil and Water Conservation District (GCSWCD) completed an Evaluation of Shoreline Stability along the Catskill Creek and assisted with the survey, assessment, design, and permitting for Catskill Creek Waterfront Project. This project was partially funded through the NYS Department of Environmental Conservation’s Water Quality Improvement Project (WQIP)

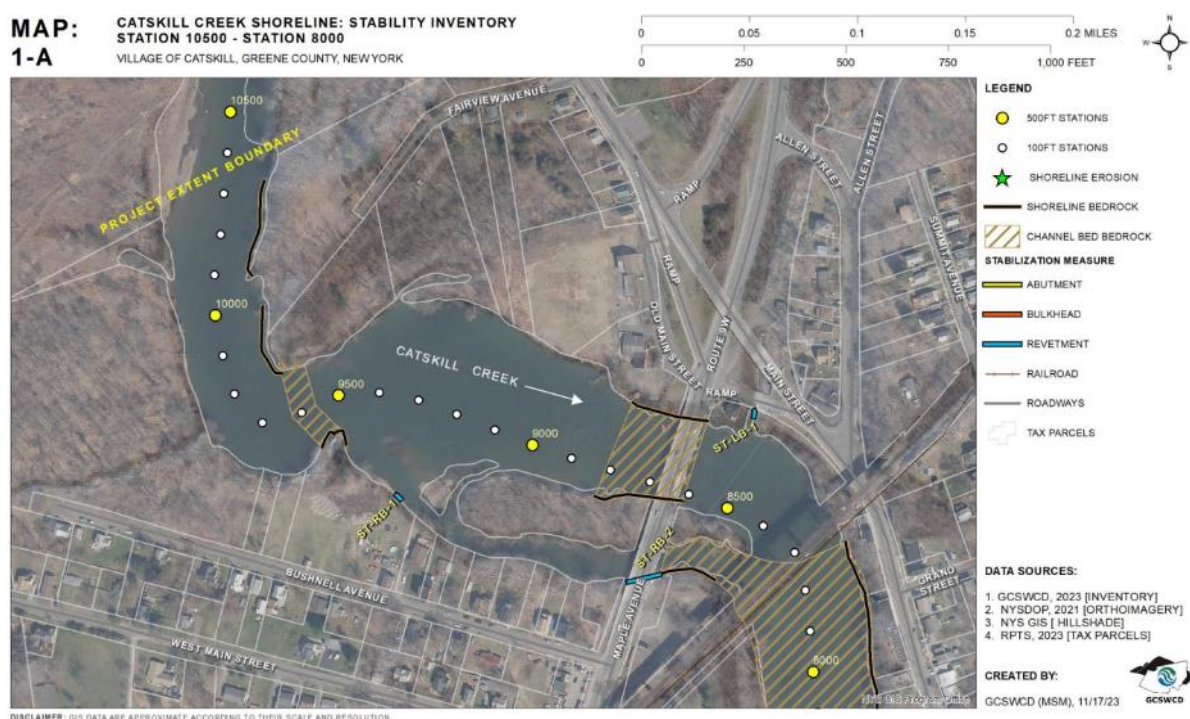
Program, a reimbursement grant program, and was partially funded as a Nonpoint Source Abatement and Control project. The project objective included stabilizing 350 linear feet of the shoreline and establishing a native riparian buffer within the stabilized reach, with the goal that this measure would filter runoff and improve aquatic and terrestrial habitat.

For reference, the Catskill Creek Shoreline Stability Inventory map is provided below. The full report is provided in the Appendices.

The shoreline stability study provides a better understanding of the amount of modified Catskill Creek shoreline, as well as the condition of existing shoreline stabilization structures, to establish baseline conditions and plan for future management.

LWRP project 19 detailed in Section 4 aims to build on the GCSWCD study to develop potential repair/replacement scenarios for shoreline stabilization structures, work with regulatory agencies to streamline the permitting process, and evaluate the need for the village management of the shoreline.

Figure 13. Catskill Creek Shoreline Stability Inventory



Monitoring Progress Towards Improved Resilience

The village's progress towards improved resiliency is monitored through its participation in the Hudson River Flood Resilience Network, (formerly the Sea Level Rise Learning Group). The group aims to meet three times per year. Members discuss the efforts their communities have taken to meet the challenges of resiliency and lessons learned.

ENVIRONMENTAL QUALITY

Discharge of Pollutants

The State Pollutant Discharge Elimination System (SPDES) Program regulates municipal and industrial wastewater treatment facilities that discharge directly into navigable waters. The village's wastewater treatment plant maintains a SPDES permit regulating its discharge of treated wastewater into the Hudson River. In order to remain compliant with its permit, the WWTP must treat the wastewater to the quality levels dictated by the permit. See **Figure 16** under the 2.4 Public Access Section for the location of the WWTP outfall.

Under the village's SPDES permit the practice of discharging excess sewage flow through its combined sewer system is allowed, though this practice degrades water quality and is not desirable. While at one time the village had over 20 locations where sewage was allowed to overflow the collection system, currently only four remain. The continued elimination of combined sewer outflows (CSO) elimination is an LWRP project identified in Section 4.

Management of Solid Waste

Solid waste generated within the village is managed by private haulers or through the Greene County system of transfer stations. According to the DEC Environmental Facilities Navigator, Casings Tires on NYS Rte. 9W is the only permitted Solid Waste Management Facility in the village.⁶³ Casings has been recycling waste tires for over 30 years.

Air Quality

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.⁶⁴

The federal and air pollution programs include permits and technical requirements to control emission of pollutants, along with extensive measurement and monitoring of ambient pollutant levels. Federal law requires DEC to submit a State Implementation Plan (SIP) that demonstrates how state air pollution control programs will be carried out to reduce pollution and to ensure that air contaminant levels are in compliance with the National Ambient Air Quality Standards (NAAQS). The SIP includes plans to bring areas that contravene the NAAQS into attainment.⁶⁵

National Ambient Air Quality Standards (NAAQS) have been established for six air pollutants – particulates, sulfur dioxide, nitrogen oxides, carbon monoxide, ozone, and lead. In 1990, ultrafine particulate matter was added to the list of criteria pollutants. This is associated with the combustion of fossil fuels, including natural gas and propane. Primary and secondary standards for varying exposure times have been established for each of these criteria pollutants. Primary standards are designed to protect public health, while secondary

⁶³ <http://www.dec.ny.gov/gis/facilities/>

⁶⁴ <https://www.dec.ny.gov/chemical/281.html>

⁶⁵ <https://www.dec.ny.gov/chemical/281.html>

standards are established to prevent other adverse environmental impacts and to protect public welfare.

Based on the DEC info Locator, there are no permitted air emission sites in the Village of Catskill. The village is also not known to have issues with air quality.⁶⁶

2.4 Public Access, Recreation, Scenic, and Historic Resources

RECREATION RESOURCES

The Catskill WRA is served by several municipal parks and recreation assets, many of which provide visual access to Catskill Creek and Hudson River waterfronts, with some providing physical access for boaters. Parks, recreation, and open space include Dutchman's Landing Park, Catskill Creek Point Park, Elliot Park, RamsHorn, Livingston Audubon Sanctuary, a dog park located at the former Pruyn's Park, the Catskill Creek Walking Loop and Hudson River Skywalk, as well as several pocket parks.

RamsHorn-Livingston Audubon Sanctuary

The RamsHorn-Livingston Audubon Sanctuary within the Village of Catskill is a large nature-reserve, and the largest freshwater tidal swamp located along the Hudson River. This 612-acre preserve is co-owned and co-managed by Scenic Hudson and Audubon New York and is open to the public. It features all the amenities for a successful birdwatching expedition.



Source: <http://ny.audubon.org/ramshorn>

The sanctuary contains over 436 acres of tidal wetlands, forests, marshes, and uncultivated fields. The sanctuary has direct access and connections to the Hudson River via the Burget, Catskill, and Ramshorn Creek. These waterways can be easily navigated by canoes or kayaks. There are four distinct walking trails within the nature reserve, which provide great opportunities for scenic views. One of these is in the WRA and the other three are in the Town of Catskill outside of the WRA. The sanctuary is home to a diverse collection of aquatic, avian, and plant wildlife as well, fueling the region's educational and recreational appeal.⁶⁷

⁶⁶ <https://gisservices.dec.ny.gov/gis/dil/>

⁶⁷ <http://ny.audubon.org/ramshorn>

Dutchman's Landing Park

The Dutchman's Landing Park at 1 Main Street is located along the shore of the Hudson River, at the easternmost point of Main Street within the Village of Catskill. This park is a local asset and is a draw for people outside of the area for the amenities that the park offers as well as the events that are held in the park. It is open to the public and owned by the village. This site contains a variety of recreational and outdoor amenities including boat launch ramps, picnic tables, and a playground. Directly across from the park across the Hudson is the Olana State Historic Site, and further north is the Rip Van Winkle Bridge. The park features special public events and other programming such as the “Music in the Park” event, which is held at Dutchman’s Landing on Thursday nights during the summer months. The free summer concert series attracts people from neighboring counties and beyond.⁶⁸



Source: Scenic Hudson

As part of the LWRP public engagement process, the community identified the need to upgrade existing facilities and equipment to better serve those that use the park for years to come. Specific project ideas identified by the public included rehabilitating boat launches, adding an ADA compliant canoe and kayak launch, adding a dining pavilion with kitchen, upgrading existing bathrooms, restoring the gazebo, adding updated playground equipment, and adding an ADA accessible walking path. These ideas will be considered as part of the Park Facility Improvement Plan project described in Section 4.

Historic Catskill Point Park, Dutchman's Landing

The Historic Catskill Point at Dutchman’s Landing on Main Street is a waterfront park and event venue located at the confluence of Catskill Creek and Hudson River. The property is owned by Greene County. The Point features two 19th-century buildings and a 9,000 square foot warehouse with stunning waterfront views of the Hudson River and Catskill Creek. Historically, Catskill Point served as the “Gateway to the Catskills” acting as a disembarkment point for Day-Liner boats traveling up from New York City. Currently the site serves as both a kayak and canoe launch. The area is also a popular and historic event venue, as described on the Great Northern Catskills of Greene County website:



Source: EDR

“The Historic Catskill Point includes an open-air cobblestone plaza, a waterfront park overlooking the Hudson

⁶⁸ Catskill Brownfield Opportunity Area Nomination Study, 2017

River and Catskill Creek, floating docks and two restored 19th century buildings: the Freightmasters Building and the Historic Warehouse. The former Freightmasters Building is a vintage brick structure converted into a maritime museum. The building's South Bay is ideal for classroom-style meetings and more intimate gatherings of up to 50 guests. The Historic Warehouse is a 115-year-old wooden structure with truss ceilings and a clear span covering 180 ft. x 50 ft. or 9,000 square feet. With large bay doors that can be opened on both the Hudson River and Plaza sides, the building provides an 'open air' feeling that is perfect for larger gatherings, such as weddings, fundraising events, galas, and other special events. The Warehouse can host up to 600 guests. Together, the Freightmasters Building, Historic Warehouse and outside park area which provide visual access to the Hudson River and Catskill Creek, can accommodate up to 1,500 guests."⁶⁹

One of the concerns identified by the community during the LWRP public engagement process was that the Hudson River shoreline at the Historic Catskill Point is known to be severely eroded. To ensure that the Historic Catskill Point remains a viable tourist destination, the Catskill LWRP recommends that the village partner with Greene County to improve the park to bring more people to the park and to implement stabilization measures to the shoreline to ensure the park remains a recreational asset within the WRA for years to come.

Elliot Park

Elliot Park is a public park owned by the village in the WRA. The park is located within the western portion of the village, situated between Broome Street, W Bridge Street, and Grandview Avenue. This compact public park is located in the WRA but is not along the waterfront. The park provides residents and visitors with access to important recreation amenities including four separate baseball fields and playground equipment. The baseball fields are used by both the Catskill Little League and the "Old Timers Softball League," which make Elliot Park their home turf.⁷⁰



Source: <http://www.greatnortherncatskills.com/events/historic-catskill-point>

Former Park for Paws

This former community dog park at 506 Main Street is owned by the village and located within the Catskill Heights neighborhood in the WRA. The creek-side park is situated at the intersection of Main and Water Streets. Park amenities include picnic tables and an agility course.⁷¹

During the LWRP public engagement process, the community identified that the site is underutilized due to often muddy conditions and steep slopes that make the site difficult to access. In fact, conditions at the park deteriorated to the point that the village has paused its use as a dog park until the site can be renovated, a proposed LWRP project.

⁶⁹ <http://www.greatnortherncatskills.com/events/historic-catskill-point>

⁷⁰ Catskill Brownfield Opportunity Areas 2017

⁷¹ <https://www.greatnortherncatskills.com/outdoors/park-paws>



Source: <https://www.greatnortherncatskills.com/outdoors/park-paws>

Catskill Walking Loop & Black Bridge

The municipally owned Catskill Walking Loop and Black Bridge crossing are located along Catskill Creek within the village. Black Bridge is located at the northern end of the village between Catskill High School and Catskill Heights. The walking loop consists of a ½ mile long pedestrian pathway which connects Water Street, the Black Bridge, West Main Street, and the Uncle Sam Bridge. The trailway includes pedestrian scale lighting, boardwalks, benches, and pocket parks along its course. This area preserves the historic Black Bridge, while also offering new connections and recreation opportunities to the community.⁷²



Source: <https://www.hudsonvalley360.com/article/black-bridge-takes-walking-loop-full-circle>

Pocket Parks & “Catskill Slides”

The Village of Catskill features many downtown pocket parks also known as “Catskill Slides” due to their steeply sloping nature. These pocket parks and slides are owned by the Village of Catskill. The slides, which are located at Howard Street, Summit Street and Academy Street, Leggio Park, and Mott Street, provide opportunities for passive recreation. The slides are maintained by Cultivate Catskill, a volunteer organization dedicated to beautifying the village. The Howard Street slide pictured includes impressive plantings and an elegant mini “plaza.”



Source: Cultivate Catskill

⁷² Greene County Non-Motorized Economic and Tourism Development Plan

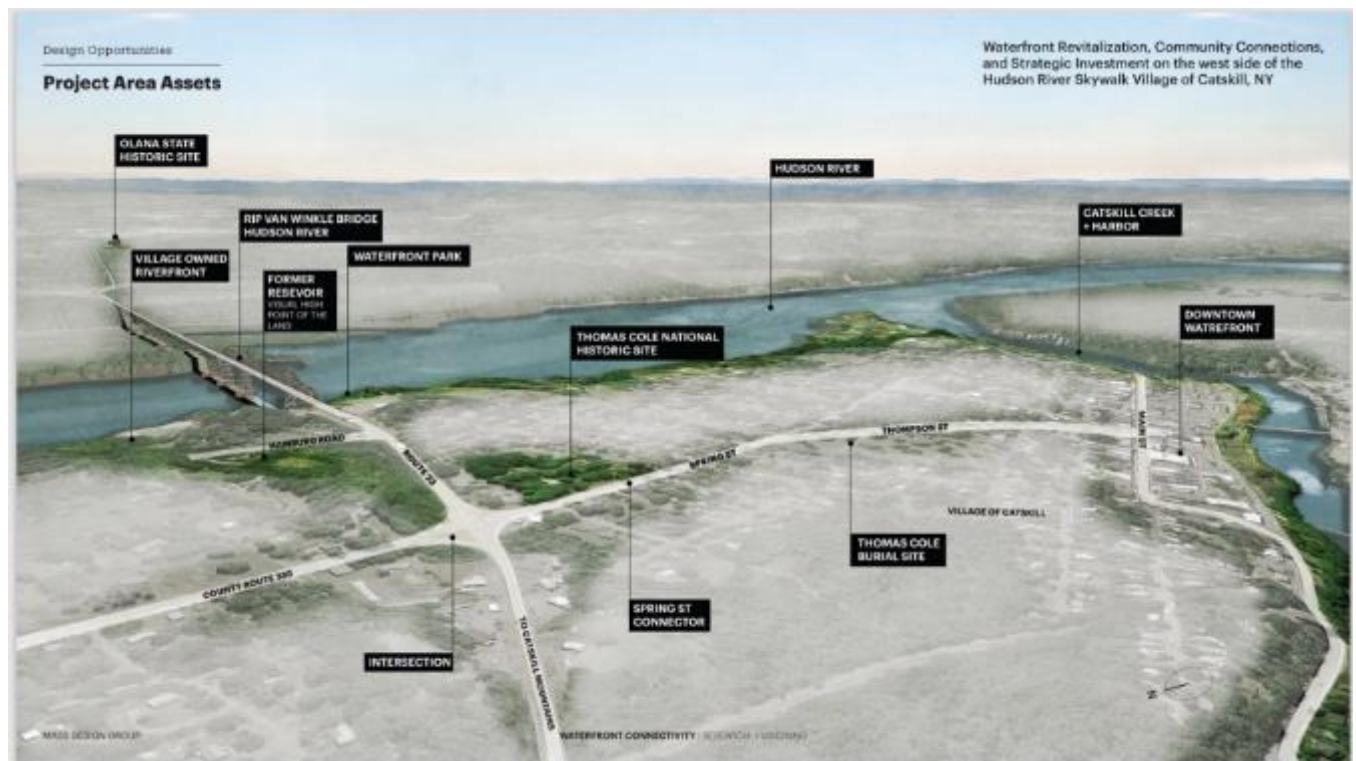
Catskill Walking Tour

The Catskill Walking Tour is a mapped walking route that runs from the Rip Van Winkle Bridge, along Spring Street, along the top of the bluffs overlooking the Hudson River, to the Beattie-Powers House, and down through Dutchman's Landing Park. The walking route is free and open to the public. The map also provides the location of numerous historic sites and points of interest within the village.

Hudson River Skywalk

The Hudson River Skywalk is a pedestrian path that connects Thomas Cole National Historic Site and Frederic Church's Olana State Historic Site. The Skywalk allows pedestrians to walk in the path of two historic artists. It spans the Rip Van Winkle Bridge, which connects Greene and Columbia Counties. The Skywalk includes viewpoints that offer scenic views of the Catskill-Olana Scenic Area of Statewide Significance. According to *Revitalization: The Journal of Urban, Rural and Environmental Resilience*, the Skywalk attracts over 150,000 visitors annually. Target markets include millennials looking to access art and outdoor activities, and international travelers interested in the work of world-renowned artists Thomas Cole and Frederic Church.

Any amenities or resources that draw over 150,000 visitors are an asset of the village. One method to better leverage the Hudson River Skywalk would be to advance the pedestrian connections between the waterfront and the skywalk. In doing so, more visitors would be able to access the skywalk who arrive in the village by boat or who want to park near the waterfront and spend their time walking throughout the area. By increasing connections, the village would be able to increase foot traffic in the village, which would increase the number of consumers in the village.



Source: Mass Design Group

Canoe and Kayak Rental

Canoes and kayaks are available for rent at Riverview Marina. A second commercial entity, Screaming Eagle Outdoor Adventures, has been approved for rental of canoes and kayaks on West Main Street around Con-E-Island.

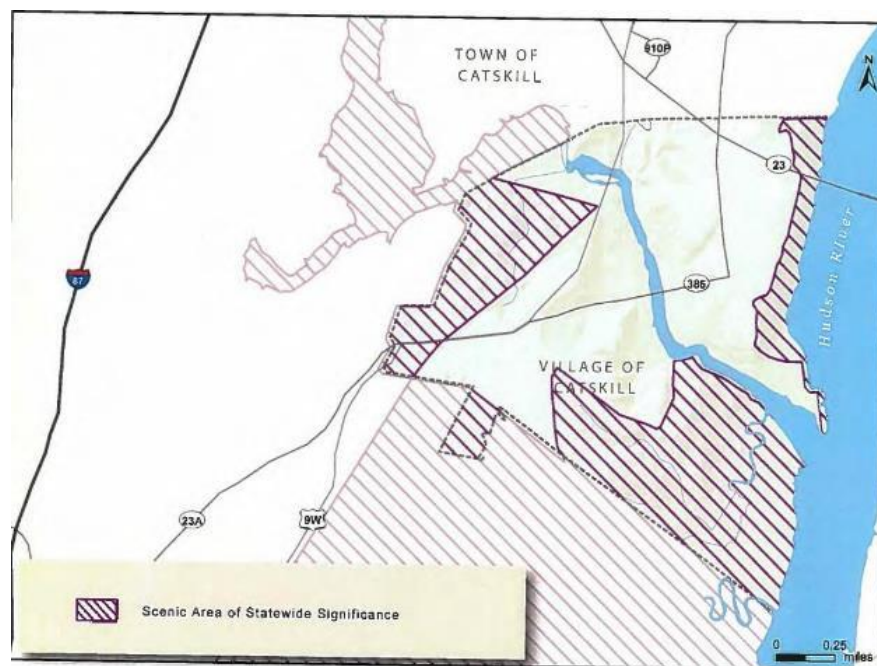
Summary

Improving the recreational offerings is a key element in the Catskill LWRP. There is a need and desire to improve and/or enhance all village parks, which will make the WRA more appealing for residents and visitors and establish Catskill as a waterfront destination along the Hudson River.

SCENIC RESOURCES AND VISUAL QUALITY

As shown in **Figure 14**, a portion of the Catskill/Olana Scenic Area of Statewide Significance (SASS) falls within the WRA. A copy of relevant pages from the NYS DOS Scenic Area of Statewide Significant (1993) are provided in the Appendices. SASS's are scenic landscapes protected by State regulation and require review by the NYS DOS. The Catskill/Olana SASS is considered of statewide aesthetic significance because it exhibits an unusual variety as well as unity of major landscape components and striking contrasts between lines, forms, textures and colors in the landscapes. The Catskill/Olana SASS constitutes an area known as the home of two major artists of the Hudson River School of Painting, Thomas Cole, considered the father of the Hudson River School and his student, Frederic Church. The Catskill/Olana SASS is unique because it is the landscape which inspired the Hudson River School, the first indigenous American painting movement.⁷³

Figure 14. Catskill-Olana Scenic Area of Statewide Significance (SASS).



⁷³ <https://dos.ny.gov/system/files/documents/2020/08/hudson-river-valley-sass.pdf>

PUBLIC ACCESS

Public access to Catskill Creek and Hudson River has been important to the Village of Catskill. According to the Catskill Harbor Study and Management Plan, “Improving opportunities for public access to Catskill Harbor – including both physical (e.g., boating facilities) and visual access – will have an important influence on the use and condition of the Harbor. An important consideration regarding public access is the need to balance that access with the rights of waterfront property owners.”⁷⁴ The Catskill Harbor Study and Management Plan mentions the potential to use publicly owned street ends for waterfront parks and Harbor access facilities.

The provision for public access was written into the village’s zoning code for the Waterfront District.

In addition, Catskill’s 2020 Comprehensive Plan update called for the development of policies and tools that would promote the implementation of complete streets. An important part of public access is allowing all users the ability to access public places, by foot, bicycle, car or transit. Public feedback during the LWRP planning process reconfirmed the need for multimodal Complete Streets with attractive streetscapes and gateways that connected the waterfront, downtown, and local attractions.

Public access to the waterfront is currently available at several locations, as summarized in **Table 11**.

Table 11. Waterfront Public Access in the Catskill WRA

Location	Waterbody	Type of Access
Hudson River Skywalk	Hudson River	Visual
Dutchman’s Landing Park, Main Steet	Hudson River	Visual, motorized and non-motorized boats
Dutchman’s Landing / Catskill Point, 1 Main Street	Hudson River, Catskill Creek	Visual
300 West Main Street (across from Catskill Central School parking lot)	Catskill Creek	Visual, non-motorized boats
Former Parks for Paws at 506 Main Street	Catskill Creek	Visual
Black Bridge and Catskill Walking Loop	Catskill Creek	Visual
Beattie-Powers Place	Hudson Creek	Visual

The RamsHorn-Livingston Audubon Sanctuary provides visual access to the tidal marsh in the WRA, which connects to the Hudson River. There are no on-shore fishing access points in the WRA and no beaches. These uses are limited by steep slopes and the water quality classifications of the Hudson River and Catskill Creek (Section 2.3). Public access locations are shown below in **Figure 15: Parks and Recreational Sites and Facilities Map** and **Figure 16. Water Uses / Harbor Management Area Boundary Map**.

⁷⁴ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, The Catskill Harbor Study and Management Plan, March 1992, revised April 1993 and June 1994.

Figure 15. Parks and Recreational Sites and Facilities Map.

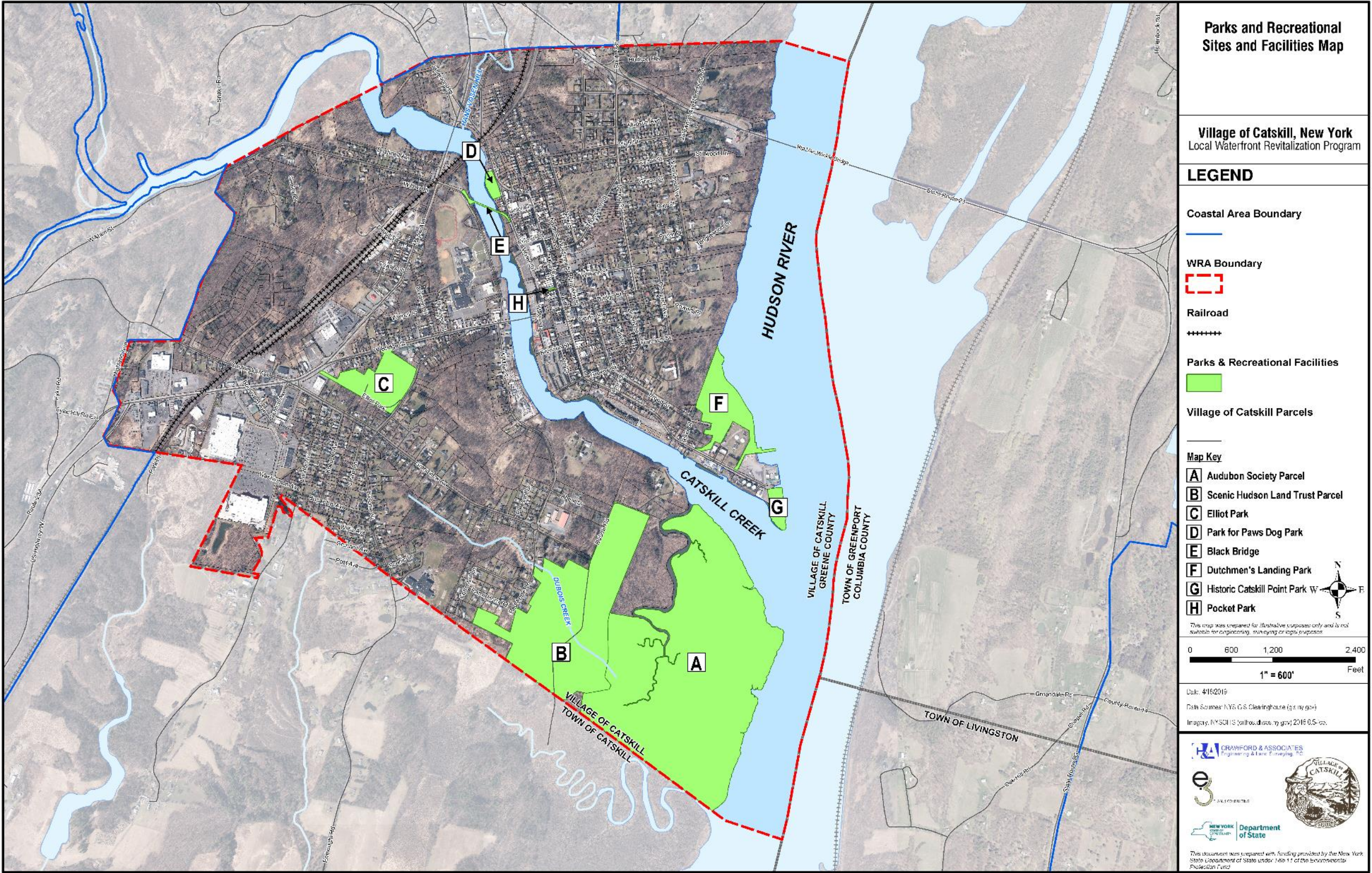
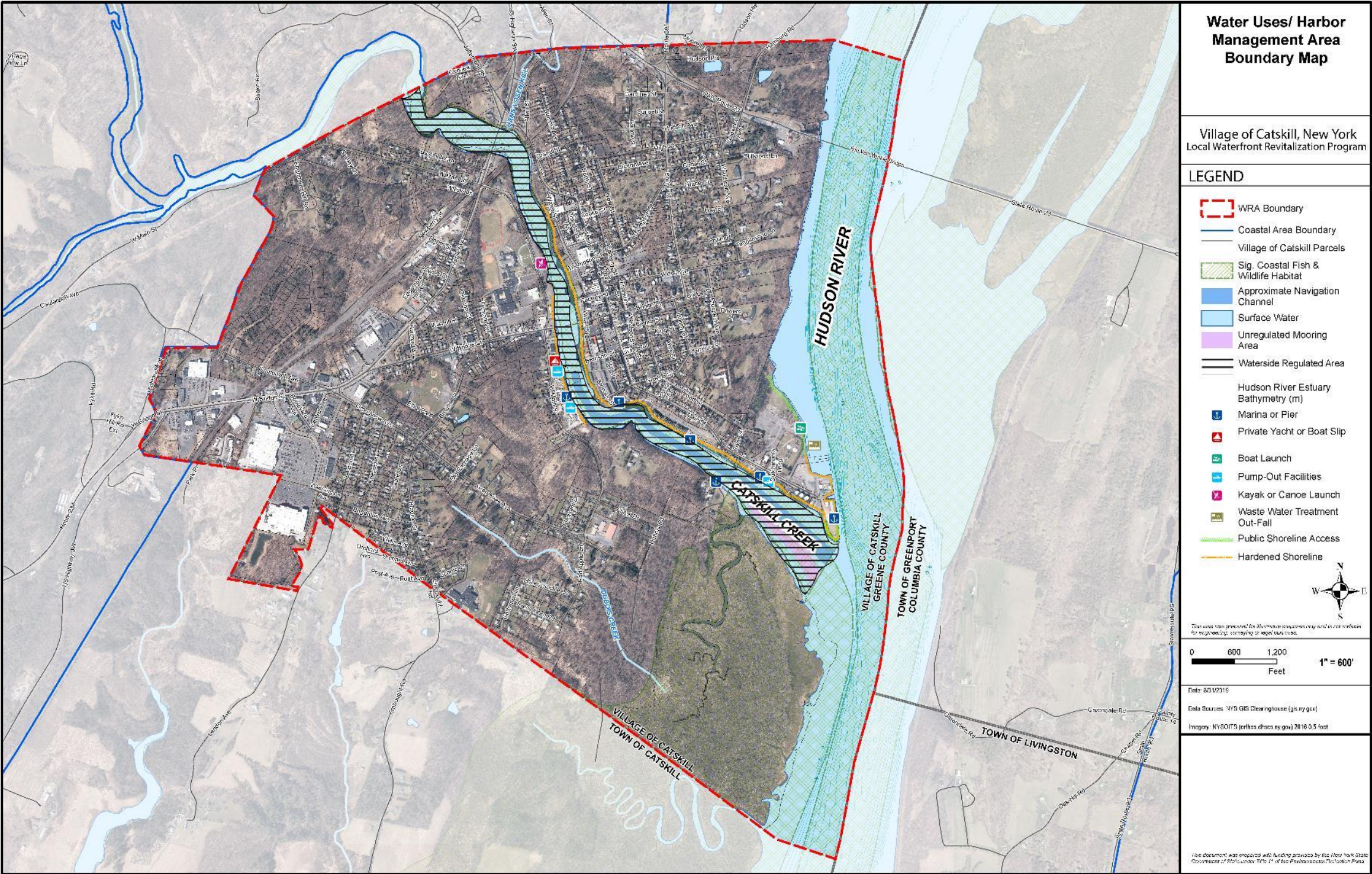


Figure 16. Water Uses / Harbor Management Area Boundary Map.



This LWRP aims to improve public access throughout the WRA. Section 4 lists several projects to improve public access. These include improving existing public access spaces at Dutchman’s Landing Park, Catskill Point / Dutchman’s Landing, and the former Park for Paws (506 Main Street) and advancing pedestrian connections to the Hudson River Skywalk. The Village would also evaluate municipally owned properties located along Catskill Creek as potential new sites for public access. To begin, the LWRP proposes adding public access pocket parks at the street ends of Bronson Street and Greene Street, potentially with fishing access and a non-motorized boat launch on Catskill Creek and adding a Creekside plaza for community use by the existing LUMBERYARD performance space. Lastly, the LWRP proposes adopting a complete streets policy and adding wayfinding signage to improve walkability and multimodal transportation in the WRA.

HISTORIC, CULTURAL AND ARCHEOLOGICAL RESOURCES

As noted in the *Catskill Downtown and Waterfront Revitalization Strategy*, “The village, and particularly the area in and around the downtown, has historically been a center for mining, lumber, and tourism, as well an important trade port. The village was also notable for attracting artists and fostering what would become the Hudson River School of painting. The historic downtown of Catskill no longer serves as a trade port but continues to support tourism and the arts with a number of restaurants, galleries, and waterfront activities.”

Anchor historic and cultural assets in the WRA include the East Side Historic district, which is recognized on the National Register of Historic Places, the Thomas Cole National Historic Site, and the LUMBERYARD Center for Film and Performing Arts. Through the development of the LWRP, potential action steps to connect these assets to the village’s waterfront were discussed. Projects 7 and 9 in Section 4 include streetscape enhancements, wayfinding signage, and pedestrian connections between cultural assets and the downtown waterfront. Project 12 focuses on enhancements to the LUMBERYARD site.

East Side Historic District

Buildings in the Village of Catskill date from the 17th century, mid-to-late 19th century, and early 20th century with a mix of commercial and residential structures that vary in style and materials (stick, wood, stone, brick). In 1979, The Association for the Preservation of Historic Catskill organized and conducted a survey of more than one thousand buildings in the village. Five hundred and thirty buildings located on the east side of Catskill Creek were included in a National Register nomination application, resulting in the East Side Historic District, designated in 1982.

The boundaries of the East Side Historic District run between Catskill Creek eastward to the Hudson River and from Gardner Street south to River Street. The district contains the majority of the village’s commercial buildings along Main Street, grand residential avenues, and the Thomas Cole National Historic Site Cedar Grove.⁷⁵

Thomas Cole National Historic Site

The Thomas Cole National Historic Site, also known as “Cedar Grove,” is located along Spring Street in the Village of Catskill. Formerly the home and studio of American Landscape artist Thomas Cole, the site attracts

⁷⁵ Margaret Nowack, Village Historian

approximately 25,000 visitors annually and is estimated to have a \$1,898,000 economic impact on the local economy.

West Side Historic Properties

The West Side of the creek contains several properties that are individually listed on the National Register of Historic Buildings. They are the Hop- O- Nose Knitting Mill, Joseph Hallock House, West Bridge St Commercial Building, Stone House, David Van Gelder Octagon House ‘Spring Side’, Benjamin Dubois Stone House, and William Lampman House.

Other Historic Assets

Other historic resources in the Village of Catskill include buildings of architectural interest as well bridges, railroads, and other infrastructure that display the heritage of the area and make the WRA attractive to residents and visitors. Specific infrastructure examples include the West Shore Train Station, traces of the small gauge Catskill Mountain Railroad, the double Albany-made cast iron facade on West Bridge Street, and the Catskill Mountain Railroad Bridge. Residential and commercial examples include ice houses, former fire stations, properties on Division and Cherry Streets that belonged to the Van Gelder family, and 251 West Main Street, the home of “Uncle Sam” Wilson and marriage place of Martin Van Buren. In addition, Catskill Middle School is a magnificent example of a Works Project Administration building.

The village would like to continue the protection of its historical resources. A way that the village could achieve this is by participating in the NYS OPRHP Certified Local Government program. This program would be beneficial for the village as it would make the village eligible for grants that would be used to research potentially historic properties as well as education about historic preservation.

Archaeologically Sensitive Areas

Most of the Village of Catskill’s Waterfront Revitalization Area, has been classified as an archeologically sensitive area by the NYS Office of Parks, Recreation and Historic Preservation.⁷⁶ However, no shipwrecks, dry docks or underwater archeological sites are known to exist in the WRA (**Figure 17**).

LUMBERYARD Center for Film and Performing Arts

Regarding local cultural assets, the LUMBERYARD, founded in 2011, is a non-profit that serves as a residency for performance artists, as well as an art and film campus. Located along the shores of Catskill Creek, the LUMBERYARD is also a venue available for weddings and community events. Proceeds from renting the space out to film and television production companies are invested back into the Catskill community through programs such as:

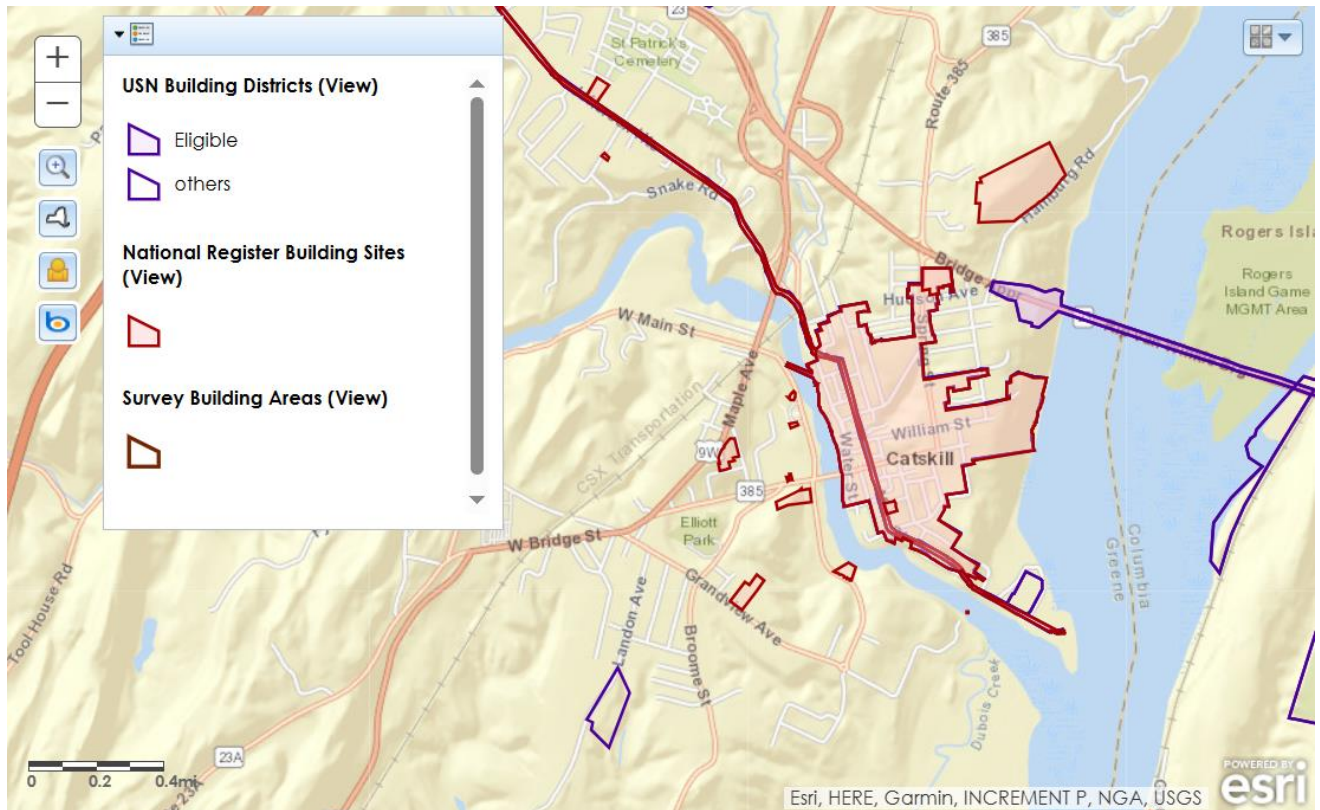
- LUMBERYARD Young Performers, which provides free dance education for students living in low-income communities in and around Catskill,
- Fresh Start, an intervention program for incarcerated teens, and
- Junior Crew, which provides summer jobs and workforce development training for local high school

⁷⁶ <https://cris.parks.ny.gov/>

students.

The LUMBERYARD creates many opportunities for locals to enjoy the arts and the community has expressed an interest in expanding their uses and redeveloping the space to increase economic activity and waterfront access along Catskill Creek.

Figure 17. Historic and Archaeologically Sensitive Areas.



TOURISM RESOURCES

With its historic and cultural resources, abundant natural resources, and multimodal accessibility, the village recognizes its potential to serve a growing tourism market. The Greene County Economic Development Plan developed in 2007 seeks to generate long-term revenue growth in the tourism industry as a strategy for economic development. Objectives of that goal include supporting efforts to adapt attractions and accommodations to the expectations of the travel market and developing retail amenities and services for tourists.

While the village has numerous restaurants along the waterfront and Main Street for tourists it lacks sufficient accommodations. Currently, accommodations are available at The Post Cottage, a restored bed and breakfast facility on Spring Street, and Catskill Charters which provides overnight lodging on boats moored at Riverview Marina. The former First Niagara Bank building on Main Street is currently being refurbished as a hotel. The Catskill BOA Nomination Study identified the Forlini property as an ideal location to develop a resort-type facility. The village hopes to attract a developer for that property.

The village is also a stop along the Great Loop, which is a continuous waterway that recreational mariners can travel that includes part of the Atlantic, Gulf Intercoastal Waterways, the Great Lakes, Canadian Heritage Canals, and the inland rivers of America’s heartland. Recreational boaters are known to stop at village marinas for fuel, services, and to restock supplies. It is unknown if existing dock space and amenities are sufficient to support current and/or expanded visitation of transient boaters.

The village has indicated a desire to increase tourism resources and take advantage of the scenic Hudson River and Catskill Creek, including existing recreational boater traffic. The village recognizes the need to provide transportation from the waterfront area to the downtown and NYS Route 9W retail areas. Implementing public transportation options to shuttle visitors and locals around the waterfront would be a tremendous draw. Implementing a River shuttle and/or a water taxi would also be an incredible asset and would set the village apart from other waterfront communities in the region. Additional funding would be needed to support these projects. Notably, as of 2024, Greene County collects sales tax but does not share sales tax revenue with municipalities. The Catskill Village board has proposed a plan to share sales tax.

Finally, improving village gateways would encourage visitors traveling by car, bike, or foot to stop and explore the WRA. The village includes three Gateways: the intersection of Main St and NYS Route 9W, intersection of NYS Route 23 and Spring St around Rip Van Winkle Bridge, and the location where West Bridge Street converges with NYS Route 9W. Gateways are areas where visitors experience a critical first impression of the community. These areas can be improved with informative signage and landscaping that reflect the community and entice visitors to the downtown area.

Projects 1, 3, 4, 7, 8, 9, 10, 15, and 16 in Section 4 aim to advance Catskill’s tourism goals by providing amenities, transportation, pedestrian connections, and/or streetscape enhancements to strengthen draw more tourists to the waterfront, and from the waterfront to downtown businesses.

2.5 Harbor Management Plan

The Catskill Harbor Study and Management Plan (HMP), prepared in 1992 and last revised in 1994, describes Catskill Harbor and its uses, activities, and environmental conditions. In the HMP, the Village of Catskill elected to regulate a portion of the Harbor Management Area (HMA). This “waterside regulated area” is referred to as Catskill Harbor. The HMP summarizes the various government authorities and private organizations with responsibility or influence concerning the Harbor and identifies issues and concerns. The HMP also presents goals and policies that are intended to achieve balance between the use and development of the Harbor and the conservation of environmental quality. A copy of the HMP is provided in the Appendices.

The HMP divides the Harbor into the Upper Harbor and Lower Harbor. The Upper Harbor includes Catskill Creek and waterfront from the Uncle Sam Bridge to the Black Bridge, a distance of about 1,600 feet. The width of the Creek in the Upper Harbor varies from about 160 to 260 feet. Historically, the Upper Harbor supported water-dependent industries on both banks. At that time the Uncle Sam Bridge functioned as a movable bridge. Currently, the fixed vertical distance of the Uncle Sam Bridge (15.91 ft at mean low tide) limits

the size of boats that can access the Upper Harbor.⁷⁷ The Upper Harbor remains accessible to recreational boaters.

The Lower Harbor includes Catskill Creek from Catskill Point at the Hudson River upstream to the Uncle Sam Bridge, a distance of about one mile. The width of the Creek in the Lower Harbor varies from about 320 feet near the mouth of the Creek to about 120 feet near the Hop-O-Nose. Most of the Lower Harbor is about 200 feet wide. The Lower Harbor contains most of the Harbor's existing water-dependent facilities.

The Creek is designated a Federal Navigation Channel from the Hudson River. According to the Catskill Harbor Study and Management Plan, "The entrance channel is authorized to be 12 feet deep, and tapers from 250 to 100 feet wide as it extends from the 12-foot contour in the Hudson River for a distance of about three-tenths of a mile upstream in Catskill Creek. The inner channel is eight feet deep and 100 feet wide for almost a mile further upstream, or to a point about 650 feet south of the Uncle Sam Bridge."⁷⁸ The USACE may maintain a channel depth of 12 feet (at mean low tide) in the lower, wider section and 8 feet for the remainder. The Federal Navigation Channel of the Creek connects to the Federal Navigation Channel of the Hudson River (**Figure 16**).

2.6 Summary of Assets, Challenges, and Opportunities

A summary of assets, challenges, opportunities, and needs for the WRA is included below, based on the inventory of existing conditions (Section 2) and community feedback throughout the planning process (Section 7). The LWRP projects described in Section 4 aim to address these needs to achieve Catskill's vision for the WRA (Introduction).

Assets

- Significant prior planning and visioning efforts to inform waterfront development
- Existing Catskill Harbor Study and Management Plan (1992)
- Local laws and zoning supportive of LWRP vision and policies including flood resilience
- Significant natural resources to support tourism
- Significant scenic quality of the WRA, which contains a portion of the Catskill/Olana Scenic Area of Statewide Significance (SASS) and many public access viewpoints
- Significant historic and cultural resources and a strong artistic and creative character to support a vibrant village and tourist destination
- Several water-dependent and water-enhanced public access sites over or adjacent to the water including Dutchman's Landing Park, Catskill Point/ Dutchman's Landing, RamsHorn-Livingston Audubon Sanctuary, Hudson River Skywalk, and Black Bridge pedestrian bridge
- Established recreational harbor area and businesses

⁷⁷ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, The Catskill Harbor Study and Management Plan, March 1992, revised April 1993 and June 1994.

⁷⁸ Catskill Local Waterfront Revitalization Program Committee, Geoffrey Steadman of Westport CT, Consultant to the LWRP Committee, The Catskill Harbor Study and Management Plan, March 1992, revised April 1993 and June 1994.

- Strong commercial and civic node downtown
- Compact downtown and a network of sidewalks and walking paths that can support improved walkability and connections between the shoreline and local businesses and regional attractions

Challenges

- Low-income community with declining population and limited economic diversity
- Limited tax base due to many tax-exempt properties and Greene County policy of not sharing sales tax with municipalities
- Limited public access to the shoreline, especially physical access (e.g., for fishing or launching boats), with a high level of private property ownership and steep slopes along Catskill Creek
- Non-water-dependent uses along the waterfront in key development areas
- Aging water distribution and sewer infrastructure including some combined sewer overflows
- Flood and erosion risks that threaten key assets and areas in the village
- Climate change risks that threaten protective natural and scenic resources
- Flood regulation standards (e.g., FEMA maps) are based on outdated flood and climate data
- High cost of replacing deteriorating shoreline armoring

Opportunities

- Vacant and underutilized parcels poised for redevelopment by public and private partners, with existing profiles and concepts featured in the Catskill BOA Nomination Study
- Publicly owned parcels and rights-of-way that can be repurposed for water-related or water-enhanced uses
- Recreational boaters who regularly access Harbor marinas for refueling, service, and restocking of supplies and represent an underutilized market
- Improved water quality in the Catskill Creek and Hudson River
- Natural protective features along the shoreline to support flood resilience

Needs

- Upgrades to existing public spaces on the waterfront to increase public access and tourism
- New public waterfront spaces on vacant and underutilized village-owned property to increase visual and physical access to the water
- Relocation of non-water-related uses away from the shoreline and redevelopment of those properties with water-related or water-enhanced uses
- Redevelopment of underutilized private properties profiled in the Catskill BOA in a manner that aligns with the BOA and LWRP visions
- An understanding if current dock space and amenities are sufficient to continue attracting recreational transient boaters
- Improved pedestrian connections, amenities, wayfinding signage, and transit options at the

Harbor that allow transient boaters and waterfront visitors (without cars) to more easily access and patronize downtown, the NYS Route 9W retail areas, and local attractions

- Complete streets with enhanced gateway areas, streetscapes, and connections between downtown and the Hudson River Skywalk that draw visitors to the downtown area
- Continued protection and development of historic resources, in partnership with NYS OPRHP
- Updates to municipal water and sewer systems and elimination of CSOs
- Implementation of incomplete, village-wide actions recommended in *Resilient Catskill, Report of the Catskill Waterfront Resilience Task Force, 2014* to increase the resilience of natural and man-made features in the WRA
- Neighborhood adaptation planning for sea level rise and future flooding
- A holistic shoreline protection plan that accounts for projected sea level rise and future flooding
- Ongoing assessment and stabilization of the shoreline with armoring and/or nature-based features



Photo: View of the Hudson River

3 Local Waterfront Revitalization Policies

This section of the Local Waterfront Revitalization Program (LWRP) presents the 44 New York State Coastal Policies that shall apply to the Village of Catskill. The policies allow for coordination between local, federal, and state agencies regarding coastal resources within the Catskill's Waterfront Revitalization Area (WRA).

The State Coastal Policies are legal statements, enforceable through NYS and Local Laws and a local process to review project proposals for consistency with these laws. These policies manage and support the most efficient and beneficial uses of waterfront resources. More specifically, the policies aid governmental agencies in the regulation and prevention of water resource impairment, while also encouraging a balance between both economic development and land/water preservation.

3.1 Local Responsibility

The Village of Catskill is responsible for implementing the policies set forth for its specific WRA boundaries. Federal, state, and local government actions shall be consistent to the maximum extent possible with the policies and procedures outlined in the Catskill LWRP.

3.2 Policies

This section includes the State Coastal Policies and indicates which policies are applicable within the Village of Catskill WRA described in Section 1 of this LWRP. Following the policy statements are explanations of the policies, including any local refinements necessary to relate to the Catskill WRA.

These policies are organized and grouped under eleven headings:

- Development Policies (1-6)
- Fish and Wildlife Policies (7-10)
- Flooding and Erosion Hazards Policies (11-17)
- General Policy (18)
- Public Access Policies (19-20)
- Recreation Policies (21-22)
- Historic and Scenic Resources Policies (23-25)
- Agricultural Lands Policies (26)
- Energy and Ice Management Policies (27-29)
- Water and Air Resources Policies (30-43)
- Wetlands Policies (44)

DEVELOPMENT POLICIES

POLICY 1: RESTORE, REVITALIZE, AND REDEVELOP DETERIORATED AND UNDERUTILIZED WATERFRONT AREAS FOR COMMERCIAL, INDUSTRIAL, CULTURAL, RECREATIONAL, AND OTHER COMPATIBLE USES.

Explanation of Policy

State and federal agencies must ensure that their actions further the revitalization of urban waterfront areas. The transfer and purchase of property; the construction of a new office building, highway or park; the provision of tax incentives to businesses; and establishment of enterprise zones, are all examples of governmental means for spurring economic growth. When any such action or similar action is proposed, it must be analyzed to determine if the action would contribute to or adversely affect a waterfront revitalization effort.

It must be recognized that revitalization of once dynamic waterfront areas is one of the most effective means of encouraging economic growth in the state, without consuming valuable open space outside of these waterfront areas. Waterfront redevelopment is also one of the most effective means of rejuvenating or at least stabilizing residential and commercial districts adjacent to the redevelopment area.

In responding to this policy, several other policies must be considered: (1) Uses requiring a location abutting the waterfront must be given priority in any redevelopment effort. (Refer to Policy 2 for the means to effectuate this priority); (2) As explained in Policy 5, one reason for revitalizing previously dynamic waterfront areas is that the costs for providing basic services to such areas is frequently less than providing new services to areas not previously developed; (3) The likelihood for successfully simplifying permit procedures and easing certain requirements (Policy 6) will be increased if a discrete area and not the entire urban waterfront is the focus for this effort. In turn, ease in obtaining permits should increase developers' interest to invest in these areas. Further, once this concentrated effort has succeeded, stabilization and revitalization of surrounding areas is more likely to occur.

Local governments through waterfront revitalization programs have the primary responsibility for implementing this policy. Though local waterfront revitalization programs need not be limited to redevelopment, local governments are urged to identify areas as suitable for redevelopment and establish and enforce redevelopment programs.

1. When a federal or state action is proposed to take place in an urban waterfront area regarded as suitable for redevelopment, the following guidelines will be used:
 - a. Priority should be given to uses which are dependent on a location adjacent to the water (see Policy 2);
 - b. The action should enhance existing and anticipated uses. For example, a new highway should be designed and constructed so as to serve the potential access needs for desirable industrial development;
 - c. The action should serve as a catalyst to private investment in the area;
 - d. The action should improve the deteriorated condition of a site and, at a minimum, must not cause further deterioration. For example, a building could not be abandoned without protecting it against vandalism and/or structural decline;
 - e. The action must lead to development which is compatible with the character of the area, with consideration given to scale, architectural style, density, and intensity of use;
 - f. The action should have the potential to improve the existing economic base of the community and, at a minimum, must not jeopardize this base. For example, waterfront development meant to serve consumer needs would be inappropriate in an area where no increased consumer demands were expected and existing development was already meeting demand;
 - g. The action should improve adjacent and upland views of the water, and, at a minimum, must not affect these views in an insensitive manner;
 - h. The action should have the potential to improve the potential for multiple uses of the site
2. If a state or federal action is proposed to take place outside of a given deteriorated, underutilized urban

waterfront area suitable for redevelopment, and is either within the relevant community or adjacent coastal communities, the agency proposing the action must first determine if it is feasible to take the action within the deteriorated, underutilized urban waterfront area in question. If such an action is feasible, the agency should give strong consideration to taking the action in that area. If not feasible, the agency must take the appropriate steps to ensure that the action does not cause further deterioration of that area.

POLICY 2: FACILITATE THE SITING OF WATER DEPENDENT USES AND FACILITIES ON OR ADJACENT TO COASTAL WATERS.

Explanation of Policy

There is a finite amount of waterfront space suitable for development purposes. Consequently, while the demand for any given piece of property will fluctuate in response to varying economic and social conditions, on a statewide basis, the only reasonable expectation is that long-term demand for waterfront space will intensify.

The traditional method of land allocation, i.e., the real estate market, with or without local land use controls, offers little assurance that uses which require waterfront sites will, in fact, have access to the state's coastal waters. To ensure that such "water-dependent" uses can continue to be accommodated within the state, state agencies will avoid undertaking, funding, or approving non water dependent uses when such uses would preempt the reasonably foreseeable development of water dependent uses; furthermore, agencies will utilize appropriate existing programs to encourage water dependent activities.

Water dependent activities shall not be considered a private nuisance, provided such activities were commenced prior to the surrounding activities and have not been determined to be the cause of conditions dangerous to life or health and any disturbance to enjoyment of land and water has not materially increased.

A water dependent use is an activity which can only be conducted on, in, over or adjacent to a water body because such activity requires direct access to that water body, and which involves, as an integral part of such activity, the use of the water.

The following uses and facilities are considered as water-dependent:

1. Uses which depend on the utilization of resources found in coastal waters (for example: fishing, mining of sand and gravel, mariculture activities)
2. Recreational activities which depend on access to coastal waters (for example: swimming, fishing, boating, wildlife viewing)
3. Uses involved in the sea/land transfer of goods (for example: docks, loading areas, pipelines, short-term storage facilities)
4. Structures needed for navigational purposes (for example: dams, locks, lighthouses)
5. Flood and erosion protection structures (for example: breakwaters, bulkheads)
6. Facilities needed to store and service boats and ships (for example: marinas, boat repair, boat

construction yards)

7. Uses requiring large quantities of water for processing and cooling purposes (for example: hydroelectric power plants, fish processing plants, pumped storage power plants)
8. Uses that rely heavily on the waterborne transportation of raw materials or products which are difficult to transport on land, thereby making it critical that a site near to shipping facilities be obtained (for example: coal export facilities, cement plants, quarries)
9. Uses which operate under such severe time constraints that proximity to shipping facilities become critical (for example: firms processing perishable foods)
10. Scientific/educational activities which, by their nature, require access to coastal waters (for example: certain meteorological and oceanographic activities)
11. Support facilities which are necessary for the successful functioning of permitted water- dependent uses (for example: parking lots, snack bars, first aid stations, short-term storage facilities). Though these uses must be near the given water dependent use they should, as much as possible, be sited inland from the water dependent use rather than on the shore.

In addition to water dependent uses, those uses which are enhanced by a waterfront location should be encouraged to locate along the shore, though not at the expense of water dependent uses. A “water enhanced” use is defined as a use or activity which does not require a location adjacent to or over coastal waters, but whose location on land adjacent to the shore adds to the public use and enjoyment of the water’s edge. Water enhanced uses are primarily recreational, cultural, retail, or entertainment uses. A restaurant which uses good site design to take advantage of a waterfront view is an example of a water enhanced use.

If there is no immediate demand for a water dependent use in a given area but a future demand is reasonably foreseeable, temporary non-water dependent uses should be considered preferable to a non-water dependent or enhanced use which involves an irreversible or nearly irreversible commitment of land. Parking lots, passive recreational facilities, outdoor storage areas, and non-permanent structures are uses or facilities which would likely be considered as "temporary" non-water dependent uses.

In the actual choice of sites where water-dependent uses will be encouraged and facilitated, the following guidelines should be used:

- a. Competition for space - competition for space, or the potential for it, should be indicated before any given site is promoted for water dependent uses. The intent is to match water dependent uses with suitable locations and thereby reduce any conflicts between competing uses that might arise. Not just any site suitable for development should be chosen as a water dependent use area. The choice of a site should be made with some meaningful impact on the real estate market anticipated. The anticipated impact could either be one of increased protection to existing water dependent activities or else the encouragement of water dependent development.
- b. In-place facilities and services - most water dependent uses, if they are to function effectively, will

require basic public facilities and services. In selecting appropriate areas for water-dependent uses, consideration should be given to the following factors:

- a. The availability of public sewers, public water lines and adequate power supply;
- b. Access to the area for trucks and rail, if heavy industry is to be accommodated; and
- c. Access to public transportation, if a high number of person trips are to be generated.
- c. Access to navigational channels - if commercial shipping, commercial fishing, or recreational boating are planned, the locality should consider setting aside a site, within a sheltered harbor, from which access to adequately sized navigation channels would be assured.
- d. Compatibility with adjacent uses and the protection of other coastal resources – water dependent uses should be located so that they enhance, or at least do not detract from, the surrounding community. Consideration should also be given to such factors as the protection of nearby residential areas from odors, noise and traffic. Affirmative approaches should also be employed so that water dependent uses and adjacent uses can serve to complement one another. For example, a recreation-oriented water dependent use area could be sited in an area already oriented towards tourism. Clearly, a marina, fishing pier or swimming area would enhance, and in turn be enhanced by, nearby restaurants, motels and other non-water oriented tourist activities. Water dependent uses must also be sited so as to avoid adverse impacts on the significant coastal resources.
- e. Preference to underutilized sites: The promotion of water-dependent uses should serve to foster development as a result of the capital programming, permit expediting and other state and local actions that will be used to promote the site. Nowhere is such a stimulus needed more than in those portions of the state's waterfront areas which are currently underutilized.
- f. Providing for expansion - a primary objective of the policy is to create a process by which water dependent uses can be accommodated well into the future. State agencies and localities should therefore give consideration to long-term space needs and, where practicable, accommodate future demand by identifying more land than is needed in the near future.

In promoting water dependent uses, the following kinds of actions will be considered:

1. Favored treatment to water dependent use areas with respect to capital programming. Particular priority should be given to the construction and maintenance of port facilities, roads, railroad facilities, and public transportation within areas suitable for water dependent uses.
2. When areas suitable for water dependent uses are publicly owned, favored leasing arrangements should be given to water dependent uses.
3. Where possible, consideration should be given to providing water dependent uses with property tax abatements, loan guarantees, or loans at below market rates.
4. State and local planning and economic development agencies should actively promote water

dependent uses. In addition, a list of sites available for non-water dependent uses should be maintained in order to assist developers seeking alternative sites for their proposed projects.

5. Local, state and federal agencies should work together to streamline permitting procedures that may be burdensome to water dependent uses. This effort should begin for specific uses in a particular area.
6. Local land use controls, especially the use of zoning districts exclusively for waterfront uses, can be an effective tool of local government in assuring adequate space for the development of water dependent uses.

POLICY 3: FURTHER DEVELOP THE STATE'S MAJOR PORTS OF ALBANY, BUFFALO, NEW YORK, OGDENSBURG, AND OSWEGO AS CENTERS OF COMMERCE AND INDUSTRY, AND ENCOURAGE THE SITING, IN THESE PORT AREAS, INCLUDING THOSE UNDER THE JURISDICTION OF STATE PUBLIC AUTHORITIES, OF LAND USE AND DEVELOPMENT WHICH IS ESSENTIAL TO, OR IN SUPPORT OF, THE WATERBORNE TRANSPORTATION OF CARGO AND PEOPLE.

Explanation of Policy

The aim of this policy is to support port development in New York, Buffalo, Ogdensburg, and Oswego. Three other development policies, discussed in this Section, have significant implications for port development, namely: water dependency, concentration of development, and the expediting of permit reviews. In implementing this policy, state agencies will recognize the legally-established jurisdictional boundaries of the port authorities. If an action is proposed for a site within or abutting a major port, or if there is a reasonable expectation that a proposed action elsewhere would have an impact on a major port, then the following guidelines shall be used in determining consistency:

1. In assessing proposed projects within or abutting a major port, given that all other applicable policies are adhered to, the overriding consideration is the maintenance and enhancement of port activity, i.e., development related to waterborne transportation, which will have precedence over other non-port related activities.
2. Dredging to maintain the economic viability of major ports will be regarded as an action of regional or statewide public benefit if: a clear need is shown for maintaining or improving the established alignment, width, and depth of existing channels or for new channels essential to port activity; and, it can be demonstrated that environmental impacts would be acceptable according to State regulations governing the activity.
3. Landfill projects in the near-shore areas will be regarded as an acceptable activity within major port areas, provided adverse environmental impacts are acceptable under all applicable environmental regulations and a strong economic justification is demonstrated.
4. If non-port related activities are proposed to be located in or near to a major port, these uses shall be sited so as not to interfere with normal port operations.
5. When not already restricted by existing laws or covenants and when there is no other overriding regional or statewide public benefit for doing otherwise, surplus public land or facilities within or

adjacent to a major port shall be offered for sale, in the first instance, to the appropriate port authority.

6. In the programming of capital projects for port areas, highest priority will be given to projects that promote the development and use of the port. However, in determining such priorities, consideration must also be given to non-port related interests within or near the ports that have demonstrated critical capital programming needs.
7. No buildings, piers, wharves, or vessels shall be abandoned or otherwise left unused by a public agency or sold without making provisions for their maintenance in sound condition or for their demolition or removal.
8. Proposals for the development of new major ports will be assessed in terms of the anticipated impact on: a) existing New York State major ports; b) existing modes of transportation; and c) the surrounding land uses and overall neighborhood character of the area in which the proposed port is to be located; and other valued coastal resources.
9. Port development shall provide opportunities for public access insofar as these opportunities do not interfere with the day-to-day operations of the port and the port authority and its tenants do not incur unreasonable costs.
10. In applying the above guidelines, the information in harbor management plans being developed by local governments pursuant to Article 42 of the Executive Law and local laws that would implement them shall be considered.

POLICY 4: STRENGTHEN THE ECONOMIC BASE OF SMALLER HARBOR AREAS BY ENCOURAGING THE DEVELOPMENT AND ENHANCEMENT OF THOSE TRADITIONAL USES AND ACTIVITIES WHICH HAVE PROVIDED SUCH AREAS WITH THEIR UNIQUE MARITIME IDENTITY.

Explanation of Policy

This policy recognizes that the traditional activities occurring in and around numerous smaller harbors throughout the state's coastal area contribute much to the economic strength and attractiveness of these harbor communities. Thus, efforts of state agencies shall center on promoting such desirable activities as recreational and commercial fishing, ferry services, marinas, historic preservation, cultural pursuits, and other compatible activities which have made smaller harbor areas appealing as tourist destinations and as commercial and residential areas. Particular consideration will be given to the visual appeal and social benefits of smaller harbors which, in turn, can make significant contributions to the state's tourism industry.

The following guidelines shall be used in determining consistency:

1. The action shall give priority to those traditional and/or desired uses which are dependent on or enhanced by a location adjacent to the water.
2. The action will enhance or not detract from or adversely affect existing traditional and/or desired anticipated uses.
3. The action shall not be out of character with, nor lead to development which would be out of the

character with, existing development in terms of the area's scale, intensity of use, and architectural style.

4. The action must not cause a site to deteriorate, e.g., a structure shall not be abandoned without protecting it against vandalism and/or structural decline.
5. The action will not adversely affect the existing economic base of the community e.g., waterfront development designed to promote residential development might be inappropriate in a harbor area where the economy is dependent upon tourism and commercial fishing.
6. The action will not detract from views of the water and smaller harbor area, particularly where the visual quality of the area is an important component of the area's appeal and identity.
7. In applying the above guidelines the information in harbor management plans being developed by local governments pursuant to Article 42 of the Executive Law and local laws that would implement them shall be considered.

POLICY 5: ENCOURAGE THE LOCATION OF DEVELOPMENT IN AREAS WHERE PUBLIC SERVICES AND FACILITIES ESSENTIAL TO SUCH DEVELOPMENT ARE ADEQUATE.

Explanation of Policy

By its construction, taxing, funding and regulatory powers, government has become a dominant force in shaping the course of development. Through these government actions, development, particularly large-scale development, in the coastal area will be encouraged to locate within, contiguous to, or in close proximity to, existing areas of concentrated development where infrastructure and public services are adequate, where topography, geology, and other environmental conditions are suitable for and able to accommodate development.

The above policy is intended to accomplish the following:

- strengthen existing residential, industrial and commercial centers;
- foster an orderly pattern of growth where outward expansion is occurring;
- increase the productivity of existing public services and moderate the need to provide new public services in outlying areas;
- preserve open space in sufficient amounts and where desirable
- foster energy conservation by encouraging proximity between home, work, and leisure activities.

For any action that would result in large scale development or an action which would facilitate or serve future development, a determination shall be made as to whether the action is within, contiguous to, or in close proximity to an area of concentrated development where infrastructure and public services are adequate. The

following guidelines shall be used in making that determination:

1. Cities, built-up suburban towns and villages, and rural villages in the coastal area are generally areas of concentrated development where infrastructure and public services are adequate.
2. Other locations in the coastal area may also be suitable for development, if three or more of the following conditions prevail:
 - a. Population density of the area surrounding or adjacent to the proposed site exceeds 1,000 persons per square mile;
 - b. Fewer than 50% of the buildable sites (i.e., sites meeting lot area requirements under existing local zoning regulations) within one mile radius of the proposed site are vacant;
 - c. Proposed site is served by or is near to public or private sewer and water lines;
 - d. Public transportation service is available within one mile of the proposed site; and
 - e. A significant concentration of commercial and/or industrial activity is within one-half mile of the proposed site.
3. The following points shall be considered in assessing the adequacy of an area's infrastructure and public services:
 - a. Streets and highways serving the proposed site can safely accommodate the peak traffic generated by the proposed land development;
 - b. Development's water needs (consumptive and firefighting) can be met by the existing water supply system;
 - c. Sewage disposal system can accommodate the wastes generated by the development;
 - d. Energy needs of the proposed land development can be accommodated by existing utility systems;
 - e. Storm water runoff from the proposed site can be accommodated by on-site and/or off-site facilities; and
 - f. Schools, police and fire protection, and health and social services are adequate to meet the needs of the population expected to live, work, shop, or conduct business in the area as a result of the development.

It is recognized that certain forms of development may and/or should occur at locations which are not within or near areas of concentrated development. Thus, this coastal development policy does not apply to the following types of development projects and activities.

1. Economic activities which depend upon sites at or near locations where natural resources are present, e.g., lumber industry, quarries.
2. Development which, by its nature, is enhanced by a non-urbanized setting, e.g., a resort complex, campgrounds, second home developments.
3. Development, which is designed to be a self-contained activity, e.g., a small college, an academic or religious retreat.
4. Water uses with site requirements not compatible with this policy or when alternative sites are not available.
5. Development which because of its isolated location and small scale has little or no potential to generate and/or encourage further land development.
6. Uses and/or activities which because of public safety consideration should be located away from populous areas.
7. Rehabilitation or restoration of existing structures and facilities.
8. Development projects which are essential to the construction and/or operation of the above uses and activities.

In certain urban areas where development is encouraged by this policy, the condition of existing public water and sewage infrastructure may necessitate improvements. Those state and federal agencies charged with allocating funds for investments in water and sewer facilities should give high priority to the needs of such urban areas so that full advantage may be taken of the rich array of their other infrastructure components in promoting waterfront revitalization.

POLICY 6: EXPEDITE PERMIT PROCEDURES IN ORDER TO FACILITATE THE SITING OF DEVELOPMENT ACTIVITIES AT SUITABLE LOCATIONS.

Explanation of Policy

For specific types of development activities, and in areas suitable for such development, state agencies and local governments participating in the Waterfront Revitalization Program will make every effort to coordinate and synchronize existing permit procedures and regulatory programs, as long as the integrity of the regulations' objectives is not jeopardized. These procedures and programs will be coordinated within each agency. Also, efforts will be made to ensure that each agency's procedures are synchronized with other agencies' procedures at each level of government. Finally, regulatory programs and procedures will be coordinated and synchronized between levels of government, and if necessary, legislative and/or programmatic changes will be recommended.

When proposing new regulations, an agency will determine the feasibility of incorporating the regulations within existing procedures, if this reduces the burden on a particular type of development and does not jeopardize the integrity of the regulations' objectives.

FISH AND WILDLIFE POLICIES

POLICY 7: SIGNIFICANT COASTAL FISH AND WILDLIFE HABITATS WILL BE PROTECTED, PRESERVED, AND WHERE PRACTICAL, RESTORED SO AS TO MAINTAIN THEIR VIABILITY AS HABITATS.

Explanation of Policy

Habitat protection is recognized as fundamental to assuring the survival of fish and wildlife populations. Certain habitats are particularly critical to the maintenance of a given population and, therefore, merit special protection. Such habitats exhibit one or more of the following characteristics:

1. are essential to the survival of a large portion of a particular fish or wildlife population (e.g., feeding grounds, nursery areas);
2. support populations of rare and endangered species;
3. are found at a very low frequency within a coastal region;
4. support fish and wildlife populations having significant commercial and/or recreational value; and
5. would be difficult or impossible to replace.

In order to protect and preserve a significant habitat, land and water uses or development shall not be undertaken if such actions destroy or significantly impair the viability of an area as a habitat. When the action significantly reduces a vital resource (e.g., food, shelter, living space) or changes environmental conditions (e.g., temperature, substrate, salinity) beyond the tolerance range of an organism, then the action would be considered to "significantly impair" the habitat. Indicators of a significantly impaired habitat may include: reduced carrying capacity, changes in community structure (food chain relationships, species diversity), reduced productivity and/or increased incidence of disease and mortality.

The range of generic activities most likely to affect significant coastal fish and wildlife habitats include, but are not limited to the following:

1. Draining wetlands, ponds: Cause changes in vegetation, or changes in groundwater and surface water hydrology.
2. Filling wetlands, shallow areas of streams, lakes, bays, estuaries: May change physical character of substrate (e.g., sandy to muddy, or smother vegetation, alter surface water hydrology).
3. Grading land: Results in vegetation removal, increased surface runoff, or increased soil erosion and downstream sedimentation.
4. Clear cutting: May cause loss of vegetative cover, increase fluctuations in amount of surface runoff, or increase streambed scouring, soil erosion, sediment deposition.
5. Dredging or excavation: May cause change in substrate composition, possible release of

contaminants otherwise stored in sediments, removal of aquatic vegetation, or change circulation patterns and sediment transport mechanisms.

6. Dredge spoil disposal: May include shoaling of littoral areas or change circulation patterns.
7. Physical alteration of shore areas through channelization or construction of shore structure: May change volume and rate of flow or increase scouring, sedimentation.
8. Introduction, storage or disposal of pollutants such as chemical, petrochemical, solid wastes, nuclear wastes, toxic material, pesticide, sewage effluent, urban and rural runoff, leachate of hazardous and toxic substances stored in landfills: May cause increased mortality or sublethal effects on organisms, alter their reproductive capabilities, or reduce their value as food organisms.

The range of physical, biological and chemical parameters which should be considered include but are not limited to the following:

1. Physical parameters, such as living space, circulation, flushing rates, tidal amplitude, turbidity, water temperature, depth (including loss of littoral zone), morphology, substrate type, vegetation, structure, erosion and sedimentation rates;
2. Biological parameters, such as community structure, food chain relationships, species diversity, predator/prey relationships, population size, mortality rates, reproductive rates, behavioral patterns and migratory patterns; and
3. Chemical parameters, such as dissolved oxygen, carbon dioxide, acidity, dissolved solids, nutrients, organics, salinity, and pollutants (heavy metals, toxic and hazardous materials).

When a proposed action is likely to alter any of the biological, physical or chemical parameters as described in the narrative beyond the tolerance range of the organisms occupying the habitat, the viability of that habitat has been significantly impaired or destroyed. Such an action, therefore, would be inconsistent with the above policy.

In cooperation with the State's Coastal Management Program, the Department of Environmental Conservation has developed a rating system incorporating these five parameters (The Development and Evaluation of a System for Rating Fish and Wildlife Habitats in the Coastal Zone of New York State, Final Report, January 1981, 15 pp.).

To further aid federal and state agencies in determining the consistency of a proposed action with this policy, a narrative will be prepared for each significant habitat which will: (1) identify the location of the habitat; (2) describe the community of organisms which utilize the habitat; (3) identify the biological, physical and chemical parameters which should be considered when assessing the potential impacts of a project on that habitat; (4) identify generic activities which would most likely create significant impacts on the habitat; and (5) provide the quantitative basis used to rate the habitat. Prior to formal designation of significant fish and wildlife habitats, copies of the individual habitat narratives plus copies of habitat maps and completed rating forms will be

provided to federal and state agencies and the public for the review and comment.

This policy is particularly important to the three NYS Significant Coastal Fish and Wildlife Habitats in the Village of Catskill WRA. Those habitats are Catskill Creek, Catskill Deepwater, and Ramshorn Marsh.

POLICY 8: PROTECT FISH AND WILDLIFE RESOURCES IN THE COASTAL AREA FROM THE INTRODUCTION OF HAZARDOUS WASTES AND OTHER POLLUTANTS WHICH BIO-ACCUMULATE IN THE FOOD CHAIN OR WHICH CAUSE SIGNIFICANT SUBLETHAL OR LETHAL EFFECT ON THOSE RESOURCES.

Explanation of Policy

Hazardous wastes are unwanted by-products of manufacturing processes and are generally characterized as being flammable, corrosive, reactive, or toxic. More specifically, hazardous waste is defined in Environmental Conservation Law [§27-0901(3)] as "waste or combination of wastes which because of its quantity, concentration, or physical, chemical or infectious characteristics may: (1) cause, or significantly contribute to, an increase in mortality or an increase in serious irreversible, or incapacitating reversible illness; or (2) pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, transported, or otherwise managed." A list of hazardous wastes (NYCRR Part 366) will be adopted by DEC within 6 months after EPA formally adopts its list.

The handling (storage, transport, treatment and disposal) of the materials included on this list is being strictly regulated in New York State to prevent their entry or introduction into the environment, particularly into the state's air, land and waters. Such controls should effectively minimize possible contamination of and bio-accumulation in the state's coastal fish and wildlife resources at levels that cause mortality or create physiological and behavioral disorders.

Other pollutants are those conventional wastes generated from point and non-point sources and not identified as hazardous wastes but controlled through other state laws cited below.⁷⁹

POLICY 9: EXPAND RECREATIONAL USE OF FISH AND WILDLIFE RESOURCES IN COASTAL AREAS BY INCREASING ACCESS TO EXISTING RESOURCES, SUPPLEMENTING EXISTING STOCKS, AND DEVELOPING NEW RESOURCES.

Explanation of Policy

Recreational uses of coastal fish and wildlife resources include consumptive uses such as fishing and hunting, and non-consumptive uses such as wildlife photography, bird watching, and nature study.

Any efforts to increase recreational use of these resources will be made in a manner which ensures the protection of fish and wildlife resources in marine and freshwater coastal areas, which takes into consideration other activities dependent on these resources. Also, such efforts must be done in accordance with existing state law and in keeping with sound management considerations. Such considerations include biology of the species, carrying capacity of the resources, public demand, costs and available technology.

The following additional guidelines should be considered by state and federal agencies as they determine the

⁷⁹ https://dos.ny.gov/system/files/documents/2023/04/revised-nys-cmp-2023_0.pdf

consistency of their proposed action with the above policy:

1. Consideration should be made by federal and state agencies as to whether an action will impede existing or future utilization of the state's recreational fish and wildlife resources.
2. Efforts to increase access to recreational fish and wildlife resources should not lead to overutilization of that resource or cause impairment of the habitat. Sometimes such impairment can be more subtle than actual physical damage to the habitat. For example, increased human presence can deter animals from using the habitat area.
3. The impacts of increasing access to recreational fish and wildlife resources should be determined on a case-by-case basis, consulting the significant habitat narrative (see Policy 7) and/or conferring with a trained fish and wildlife biologist.
4. Any public or private sector initiatives to supplement existing stocks (e.g., stocking a stream with fish reared in a hatchery) or develop new resources (e.g., creating private fee-hunting or fee-fishing facilities) must be done in accord with existing state law.

POLICY 10: FURTHER DEVELOP COMMERCIAL FINFISH, SHELLFISH, AND CRUSTACEAN RESOURCES IN THE COASTAL AREA BY ENCOURAGING THE CONSTRUCTION OF NEW, OR IMPROVEMENT OF EXISTING ON-SHORE COMMERCIAL FISHING FACILITIES, INCREASING MARKETING OF THE STATE'S SEAFOOD PRODUCTS, MAINTAINING ADEQUATE STOCKS, AND EXPANDING AQUACULTURE FACILITIES.

Explanation of Policy

Commercial fishery development activities must occur within the context of sound fishery management principals developed and enforced within the state's waters by the New York State Department of Environmental Conservation and the management plans developed by the Regional Fisheries Management Councils (Mid-Atlantic and New England) and enforced by the U.S. National Marine Fisheries Service within the Fishery Conservation Zone. (The Fishery Conservation Zone is the area of coastal waters extending from the three-mile state waters boundary to the 200-mile offshore boundary of the U.S. waters. The Conservation Zone is authorized by the U.S. Fishery Conservation and Management Act of 1976.) Sound resource management considerations include optimum sustained yield levels developed for specific commercial fish species, harvest restrictions imposed by state and federal governments, and the economic, political (uses conflicts), and technological constraints to utilizing these resources.

The following additional guidelines should be considered by state and federal agencies as they determine the consistency of their proposed action with the above policy:

1. A public agency's commercial fishing development initiative should not preempt or displace private sector initiative.
2. A public agency's efforts to expand existing or create new on-shore commercial fishing support facilities should be directed towards unmet development needs rather than merely displacing existing commercial fishing activities from a nearby port. This may be accomplished

by taking into consideration existing state or regional commercial fishing development plans.

3. Consideration should be made by state and federal agencies whether an action will impede existing utilization or future development of the state's commercial fishing resources.
4. Commercial fishing development efforts should be made in a manner which ensures the maintenance and protection of the renewable fishery resources.

This policy is of particular importance to Charter boat and fishing guide operations, mariculture and aquaculture activities, and wholesale and retail fish stores, which are permitted uses in the Village's Waterfront District.

FLOODING AND EROSION HAZARDS POLICIES

POLICY 11: BUILDINGS AND OTHER STRUCTURES WILL BE SITED IN THE COASTAL AREA SO AS TO MINIMIZE DAMAGE TO PROPERTY AND THE ENDANGERING OF HUMAN LIVES CAUSED BY FLOODING AND EROSION.

Explanation of Policy

On coastal lands identified as coastal erosion hazard areas, buildings and similar structures shall be set back from the shoreline a distance sufficient to minimize damage from erosion unless no reasonable prudent alternative site is available as in the case of piers, docks, and other structures necessary to gain access to coastal waters to be able to function. The extent of the setback will be calculated, taking into account the rate at which land is receding due to erosion and the protection provided by existing erosion protection structures, as well as by natural protective features such as beaches, sandbars, spits, shoals, barrier islands, bay barriers, nearshore areas, bluffs, and wetlands. The only new structure allowed in coastal erosion hazard areas is a moveable structure as defined in 6 NYCRR Part 505.2(x). Prior to its construction, an erosion hazard areas permit must be approved for the structure. Existing non-conforming structures located in coastal erosion hazard areas may be only minimally enlarged.

In coastal lands identified as being subject to high velocity waters caused by hurricane or other storm wave wash - a coastal high hazard area - walled and roofed buildings or fuel storage tanks shall be sited landward of mean high tide, and no mobile home shall be sited in such area. In coastal lands identified as floodways, no mobile homes shall be sited other than in existing mobile home parks.

Where human lives may be endangered by major coastal storms, all necessary emergency preparedness measures should be taken, including disaster preparedness planning.

POLICY 12: ACTIVITIES OR DEVELOPMENT IN THE COASTAL AREA WILL BE UNDERTAKEN SO AS TO MINIMIZE DAMAGE TO NATURAL RESOURCES AND PROPERTY FROM FLOODING AND EROSION BY PROTECTING NATURAL PROTECTIVE FEATURES INCLUDING BEACHES, DUNES, BARRIER ISLANDS AND BLUFFS.

Explanation of Policy

Beaches, dunes, barrier islands, bluffs, and other natural protective features help safeguard coastal lands and property from damage, as well as reduce the danger to human life, resulting from flooding and erosion. Excavation of coastal features, improperly designed structures, inadequate site planning, or other similar

actions which fail to recognize their fragile nature and high protective values, lead to the weakening or destruction of those landforms. Activities or development in, or in proximity to, natural protective features must ensure that all such adverse actions are minimized. Primary dunes will be protected from all encroachments that could impair their natural protective capacity.

POLICY 13: THE CONSTRUCTION OR RECONSTRUCTION OF EROSION PROTECTION STRUCTURES SHALL BE UNDERTAKEN ONLY IF THEY HAVE A REASONABLE PROBABILITY OF CONTROLLING EROSION FOR AT LEAST THIRTY YEARS AS DEMONSTRATED IN DESIGN AND CONSTRUCTION STANDARDS AND/OR ASSURED MAINTENANCE OR REPLACEMENT PROGRAMS.

Explanation of Policy

Erosion protection structures are widely used throughout the state's coastal area. However, because of improper design, construction and maintenance standards, many fail to give the protection which they are presumed to provide. As a result, development is sited in areas where it is subject to damage or loss due to erosion. This policy will help ensure the reduction of such damage or loss.

POLICY 14: ACTIVITIES AND DEVELOPMENT, INCLUDING THE CONSTRUCTION OR RECONSTRUCTION OF EROSION PROTECTION STRUCTURES, SHALL BE UNDERTAKEN SO THAT THERE WILL BE NO MEASURABLE INCREASE IN EROSION OR FLOODING AT THE SITE OF SUCH ACTIVITIES OR DEVELOPMENT, OR AT OTHER LOCATIONS.

Explanation of Policy

Erosion and flooding are processes which occur naturally. However, by our actions, humans can increase the severity and adverse effects of those processes, causing damage to, or loss of property, and endangering human lives. Those actions include: the use of erosion protection structures such as groins, or the use of impermeable docks which block the littoral transport of sediment to adjacent shorelands, thus increasing their rate of recession; the failure to observe proper drainage or land restoration practices, thereby causing runoff and the erosion and weakening of shorelands; and the placing of structures in identified floodways so that the base flood level is increased causing damage to otherwise hazard-free areas.

POLICY 15: MINING, EXCAVATION OR DREDGING IN COASTAL WATERS SHALL NOT SIGNIFICANTLY INTERFERE WITH THE NATURAL COASTAL PROCESSES WHICH SUPPLY BEACH MATERIALS TO LAND ADJACENT TO SUCH WATERS AND SHALL BE UNDERTAKEN IN A MANNER WHICH WILL NOT CAUSE AN INCREASE IN EROSION OF SUCH LAND.

Explanation of Policy

Coastal processes, including the movement of beach materials by water, and any mining, excavation or dredging in nearshore or offshore waters which changes the supply and net flow of such materials can deprive shorelands of their natural regenerative powers. Such mining, excavation and dredging should be accomplished in a manner so as not to cause a reduction of supply, and thus an increase of erosion, to such shorelands. Offshore mining is a future alternative option to land mining for sand and gravel deposits which are needed to support building and other industries.

POLICY 16: PUBLIC FUNDS SHALL ONLY BE USED FOR EROSION PROTECTIVE STRUCTURES WHERE NECESSARY TO PROTECT HUMAN LIFE, AND NEW DEVELOPMENT WHICH REQUIRES A LOCATION WITHIN OR ADJACENT TO AN EROSION HAZARD AREA

TO BE ABLE TO FUNCTION, OR EXISTING DEVELOPMENT; AND ONLY WHERE THE PUBLIC BENEFITS OUTWEIGH THE LONG TERM MONETARY AND OTHER COSTS INCLUDING THE POTENTIAL FOR INCREASING EROSION AND ADVERSE EFFECTS ON NATURAL PROTECTIVE FEATURES.

Explanation of Policy

Public funds are used for a variety of purposes on the state's shorelines. This policy recognizes the public need for the protection of human life and existing investment in development or new development which requires a location in proximity to the coastal area or in adjacent waters to be able to function. However, it also recognizes the adverse impacts of such activities and development on the rate of erosion and on natural protective features and requires that careful analysis be made of such benefits and long-term costs prior to expending public funds.

POLICY 17: NON-STRUCTURAL MEASURES TO MINIMIZE DAMAGE TO NATURAL RESOURCES AND PROPERTY FROM FLOODING AND EROSION SHALL BE USED WHENEVER POSSIBLE.

Explanation of Policy

This policy recognizes both the potential adverse impacts of flooding and erosion upon development and upon natural protective features in the coastal area, as well as the costs of protection against those hazards which structural measures entail.

"Non-structural measures" shall include, but not be limited to: (1) within coastal erosion hazard areas identified under Section 0104 of Coastal Erosion Hazard Areas law (Environmental Conservation Law Article 34), and subject to the permit requirements on all regulated activities and development established under that law, (a) the use of minimum setbacks as provided for in Section 0108 of Environmental Conservation Law Article 34; and (b) the strengthening of coastal landforms by the planting of appropriate vegetation on dunes and bluffs, the installation of sand fencing on dunes, the reshaping of bluffs to achieve an appropriate angle of repose so as to reduce the potential for slumping and to permit the planting of stabilization vegetation, and the installation of drainage systems on bluffs to reduce runoff and internal seepage of waters which erode or weaken the landforms; and (2) within identified flood hazard areas, (a) the avoidance of risk or damage from flooding by the siting of buildings outside the hazard area, and (b) the flood-proofing of buildings or their elevation above the base flood level.

This policy shall apply to the planning, siting, and design of proposed activities and development, including measures to protect existing activities and development. To ascertain consistency with the policy, it must be determined if anyone, or a combination of, non-structural measures would afford the degree of protection appropriate both to the character and purpose of the activity or development, and to the hazard. If non-structural measures are determined to offer sufficient protection, then consistency with the policy would require the use of such measures, whenever possible.

In determining whether or not non-structural measures to protect against erosion or flooding will afford the degree of protection appropriate, an analysis, and if necessary, other materials such as plans or sketches of the activity or development, of the site and of the alternative protection measures should be prepared to allow an

assessment to be made.

GENERAL POLICY

POLICY 18: TO SAFEGUARD THE VITAL ECONOMIC, SOCIAL AND ENVIRONMENTAL INTERESTS OF THE STATE AND OF ITS CITIZENS, PROPOSED MAJOR ACTIONS IN THE COASTAL AREA MUST GIVE FULL CONSIDERATION TO THOSE INTERESTS, AND TO THE SAFEGUARDS WHICH THE STATE HAS ESTABLISHED TO PROTECT VALUABLE COASTAL RESOURCE AREAS.

Explanation of Policy

Proposed major actions may be undertaken in the coastal area if they will not significantly impair valuable coastal waters and resources, thus frustrating the achievement of the purposes of the safeguards which the state has established to protect those waters and resources. Proposed actions must take into account the social, cultural, economic and environmental interests of the state and its citizens in such matters that would affect natural resources, water levels and flows, shoreline damage, hydro-electric power generation, and recreation.

PUBLIC ACCESS POLICIES

POLICY 19: PROTECT, MAINTAIN, AND INCREASE THE LEVEL AND TYPES OF ACCESS TO PUBLIC WATER RELATED RECREATION RESOURCES AND FACILITIES.

Explanation of Policy

This policy calls for achieving balance among the following factors: the level of access to a resource or facility, the capacity of a resource or facility, and the protection of natural resources. The imbalance among these factors is the most significant in the state's urban areas. Because this is often due to access-related problems, priority will be given to improving physical access to existing and potential coastal recreation sites within the heavily populated urban coastal areas of the state and to increasing the ability of urban residents to get to coastal recreation areas by improved public transportation. The particular water related recreation resources and facilities which will receive priority for improved access are public beaches, boating facilities, fishing areas and waterfront parks. In addition, because of the greater competition for waterfront locations within urban areas, the Coastal Management Program will encourage mixed use areas and multiple use of facilities to improve access. Specific sites requiring access improvements and the relative priority the program will accord to each will be identified in the Public Access Planning Process.

The following guidelines will be used in determining the consistency of a proposed action with this policy:

1. The existing access from adjacent or proximate public lands or facilities to public water related recreation resources and facilities shall not be reduced, nor shall the possibility of increasing access in the future from adjacent or proximate public lands or facilities to public water related recreation resources and facilities be eliminated, unless in the latter case, estimates of future use of these resources and facilities are too low to justify maintaining or providing increased public access, or unless such actions are found to be necessary by the public body having jurisdiction over such access as the result of a reasonable justification of the need to meet system-wide objectives.

The following is an explanation of the terms used in the above guidelines:

- a. Access - the ability and right of the public to reach and use public coastal lands and waters.
- b. Public water related recreation resources or facilities - all public lands or facilities that are suitable for passive or active recreation that requires either water or a waterfront location or is enhanced by a waterfront location.
- c. Public lands or facilities - lands or facilities held by state or local government in fee simple or less-than-fee simple ownership and to which the public has access or could have access, including underwater lands and the foreshore.
- d. A reduction in the existing level of public access - includes, but is not limited to, the following:
 - (1) The number of parking spaces at a public water-related recreation resource or facility is significantly reduced.
 - (2) The service level of public transportation to a public water-related recreation resource or facility is significantly reduced during peak season use and such reduction cannot be reasonably justified in terms of meeting system-wide objectives.
 - (3) Pedestrian access is diminished or eliminated because of hazardous crossings required at new or altered transportation facilities, electric power transmission lines, or similar linear facilities.
 - (4) There are substantial increases in the following: already existing special fares (not to include regular fares in any instance) of public transportation to a public water-related recreation resource or facility; and/or admission fees to such a resource or facility except where the public body having jurisdiction over such fares determines that such substantial fare increases are necessary and an analysis shows that such increases will significantly reduce usage by individuals or families and incomes below the state government established poverty level.
- e. An elimination of the possibility of increasing public access in the future includes, but is not limited to, the following:
 - (5) Construction of public facilities which physically prevent the provision, except at great expense, of convenient public access to public water-related recreation resources and facilities
 - (6) Sale, lease, or other transfer of public lands that could provide public access to a public water-related recreation resource or facility
 - (7) Construction of private facilities which physically prevent the provision of convenient public access to public water-related recreation resources or facilities from public lands and facilities

2. Any proposed project to increase public access to public water-related recreation resources and facilities shall be analyzed according to the following factors:
 - a. The level of access to be provided should be in accord with estimated public use. If not, the proposed level of access to be provided shall be deemed inconsistent with the policy.
 - b. The level of access to be provided shall not cause a degree of use which would exceed the physical capability of the resource or facility. If this were determined to be the case, the proposed level of access to be provided shall be deemed inconsistent with the policy.
3. The state will not undertake or fund any project which increases access to a water-related resource or facility that is not open to all members of the public.
4. In their plans and programs for increasing public access to public water-related resources and facilities, state agencies shall give priority in the following order to projects located: within the boundaries of the Federal-Aid Metropolitan Urban Area and served by public transportation, within the boundaries of the Federal-Aid Metropolitan urban area but not served by public transportation; outside the defined Urban Area boundary and served by public transportation; and outside the defined Urban Area boundary but not served by public transportation.

POLICY 20: ACCESS TO THE PUBLICLY-OWNED FORESHORE AND TO LANDS IMMEDIATELY ADJACENT TO THE FORESHORE OR THE WATER'S EDGE THAT ARE PUBLICLY-OWNED SHALL BE PROVIDED AND IT SHALL BE PROVIDED IN A MANNER COMPATIBLE WITH ADJOINING USES.

Explanation of Policy

In coastal areas where there are little or no recreation facilities providing specific water-related recreational activities, access to the publicly-owned lands of the coast at large should be provided for numerous activities and pursuits which require only minimal facilities for their enjoyment. Such access would provide for walking along a beach or a city waterfront or to a vantage point from which to view the seashore. Similar activities requiring access would include bicycling, bird watching, photography, nature study, beachcombing, fishing and hunting.

For those activities, there are several methods of providing access which will receive priority attention of the Coastal Management Program. These include: the development of a coastal trails system; the provision of access across transportation facilities to the coast; the improvement of access to waterfronts in urban areas; and the promotion of mixed and multi-use development.

While such publicly-owned lands referenced in the policy shall be retained in public ownership, traditional sales of easements on lands underwater to adjacent onshore property owners are consistent with this policy, provided such easements do not substantially interfere with continued public use of the public lands on which the easement is granted. Also, public use of such publicly owned underwater lands and lands immediately adjacent to the shore shall be discouraged where such use would be inappropriate for reasons of public safety, military security, or the protection of fragile coastal resources.

The regulation of projects and structures, proposed to be constructed in or over lands underwater, is necessary to responsibly manage such lands, to protect vital assets held in the name of the people of the state, to guarantee common law and sovereign rights, and to ensure that waterfront owners' reasonable exercise of riparian rights and access to navigable waters shall be consistent with the public interest in reasonable use and responsible management of waterways and such public lands for the purposes of navigation, commerce, fishing, bathing, recreation, environmental and aesthetic protection, and access to the navigable waters and lands underwater of the state.

The following guidelines will be used in determining the consistency of a proposed action with this policy:

1. Existing access from adjacent or proximate public lands or facilities to existing public coastal lands and/or waters shall not be reduced, nor shall the possibility of increasing access in the future from adjacent or nearby public lands or facilities to public coastal lands and/or waters be eliminated, unless such actions are demonstrated to be of overriding regional or statewide public benefit or, in the latter case, estimates of future use of these lands and waters are too low to justify maintaining or providing increased access.

The following is an explanation of the terms used in the above guidelines:

- a. (See definitions under first policy of "access", and "public lands or facilities").
 - b. A reduction in the existing or anticipated level of public access - includes, but is not limited, to the following:
 - (1) Pedestrian access is diminished or eliminated because of hazardous crossings required at new or altered transportation facilities, electric power transmission lines, or similar linear facilities.
 - (2) Pedestrian access is diminished or blocked completely by public or private development.
 - c. An elimination of the possibility of increasing public access in the future - includes, but is not limited to, the following:
 - (1) Construction of public facilities which physically prevent the provision, except at great expense, of convenient public access to public coastal lands and/or waters
 - (2) Sale, lease, or other conveyance of public lands that could provide public access to public coastal lands and/or waters
 - (3) Construction of private facilities which physically prevent the provision of convenient public access to public coastal lands and/or waters from public lands and facilities
2. The existing level of public access within public coastal lands or waters shall not be reduced or eliminated.

- a. A reduction or elimination in the existing level of public access - includes, but is not limited to, the following:
 - (1) Access is reduced or eliminated because of hazardous crossings required at new or altered transportation facilities, electric power transmission lines, or similar linear facilities
 - (2) Access is reduced or blocked completely by any public developments
3. Public access from the nearest public roadway to the shoreline and along the coast shall be provided by new land use or development, except where (a) it is inconsistent with public safety, military security, or the protection of identified fragile coastal resources; (b) adequate access exists within one-half mile; or (c) agriculture would be adversely affected. Such access shall not be required to be open to public use until a public agency or private association agrees to accept responsibility for maintenance and liability of the access way.
4. The state will not undertake or directly fund any project which increases access to a water-related resource or facility that is not open to all members of the public.
5. In their plans and programs for increasing public access, state agencies shall give priority in the following order to projects located: within the boundaries of the Federal-Aid Metropolitan Urban Area and served by public transportation; within the Federal-Aid Metropolitan Urban Area but not served by public transportation; outside the defined Urban Area boundary and served by public transportation; and outside the defined Urban Area boundary but not served by public transportation.
6. Proposals for increased public access to coastal lands and waters shall be analyzed according to the following factors:
 - a. The level of access to be provided should be in accord with estimated public use. If not, the proposed level of access to be provided shall be deemed inconsistent with the policy.
 - b. The level of access to be provided shall not cause a degree of use which would exceed the physical capability of the coastal lands or waters. If this were determined to be the case, the proposed level of access to be provided shall be deemed inconsistent with the policy.
7. In making any grant, lease, permit, or other conveyance of land now or formerly underwater, there shall be reserved such interests or attached such conditions to preserve the public interest in the use of state-owned lands underwater and waterways for navigation, commerce, fishing, bathing, recreation, environmental protection, and access to the navigable waters of the state. In particular, the granting of publicly owned underwater or formerly underwater lands to private entities will be limited to exceptional circumstances only.

RECREATION POLICIES

POLICY 21: WATER DEPENDENT AND WATER ENHANCED RECREATION WILL BE ENCOURAGED AND FACILITATED, AND WILL BE GIVEN PRIORITY OVER NON-WATER-RELATED USES ALONG THE COAST.

Explanation of Policy

Water-related recreation includes such obviously water dependent activities as boating, swimming, and fishing as well as certain activities which are enhanced by a coastal location and increase the general public's access to the coast such as pedestrian and bicycle trails, picnic areas, scenic overlooks and passive recreation areas that take advantage of coastal scenery.

Provided the development of water-related recreation is consistent with the preservation and enhancement of such important coastal resources as fish and wildlife habitats, aesthetically significant areas, historic and cultural resources, agriculture and significant mineral and fossil deposits, and provided demand exists, water-related recreation development is to be increased and such uses shall have a higher priority than any non-coastal dependent uses, including non-water-related recreation uses. In addition, water dependent recreation uses shall have a higher priority over water-enhanced recreation use. Determining a priority among coastal dependent uses will require a case-by-case analysis.

Among priority areas for increasing water-related recreation opportunities are those areas where access to the recreation opportunities of the coast can be provided by new or existing public transportation services and those areas where the use of the shore is severely restricted by highways, railroads, industry, or other forms of existing intensive land use or development. The Department of State, working with the Office of Parks, Recreation, and Historic Preservation and with local governments, will identify communities whose use of the shore has been so restricted and those sites shoreward of such developments which are suitable for recreation and can be made accessible. Priority shall be given to recreational development of such lands.

The siting or design of new public development in a manner which would result in a barrier to the recreational use of a major portion of a community's shore should be avoided as much as practicable.

Among the types of water dependent recreation, provision of adequate boating services to meet future demand is to be encouraged by this Program. The siting of boating facilities must be consistent with preservation and enhancement of other coastal resources and with their capacity to accommodate demand. The provision of new public boating facilities is essential in meeting this demand, but such public actions should avoid competition with private boating development. Boating facilities will, as appropriate, include parking, park-like surroundings, toilet facilities, and pump out facilities. Harbors of Refuge are particularly needed along Lake Erie and Lake Ontario. There is a need for a better positional pattern of boating facilities to correct problems of overused, insufficient, or improperly sited facilities.

Water-related off-road recreational vehicle use is an acceptable activity; provided no adverse environmental impacts occur. Where adverse environmental impact will occur, mitigating measures will be implemented, where practicable to minimize such adverse impacts. If acceptable mitigation is not practicable, prohibition of the use by off-road recreational vehicles will be posted and enforced. Ground water contamination presents a threat to Fire Island National Seashore water resources.

POLICY 22: DEVELOPMENT WHEN LOCATED ADJACENT TO THE SHORE WILL PROVIDE FOR WATER-RELATED RECREATION WHENEVER SUCH USE IS COMPATIBLE WITH REASONABLY ANTICIPATED DEMAND FOR SUCH ACTIVITIES, AND IS COMPATIBLE WITH THE PRIMARY PURPOSE OF THE DEVELOPMENT.

Explanation of Policy

Many developments present practical opportunities for providing recreation facilities as an additional use of the site or facility. Therefore, whenever developments are located adjacent to the shore they should to the fullest extent permitted by existing law provide for some form of water-related recreation use unless there are compelling reasons why any form of such recreation would not be compatible with the development, or a reasonable demand for public use cannot be foreseen.

The types of development which can generally provide water-related recreation as a multiple use include, but are not limited to:

- parks
- highways
- power plants
- utility transmission rights of way
- sewage treatment facilities
- mental health facilities*
- hospitals*
- prisons*
- schools, universities*
- military facilities*
- nature preserves*
- large residential subdivisions (50 units)
- shopping centers
- office buildings

** The types of recreation uses likely to be compatible with these facilities are limited to the more passive forms, such as trails or fishing access. In some cases, land areas not directly or immediately needed by the facility could be used for recreation.*

Prior to taking action relative to any development, state agencies should consult with the State Office of Parks, Recreation, and Historic Preservation, and if there is an approved local waterfront program, with the municipality in which the development is to locate, to determine appropriate recreation uses. The agency should provide OPRHP and the municipality with the opportunity to participate in project planning.

Appropriate recreational uses which do not require any substantial additional construction shall be provided at the expense of the project sponsor provided the cost does not exceed 2% of total project cost.

In determining whether compelling reasons exist which would make inadvisable recreation as a multiple use, safety considerations should reflect a recognition that some risk is acceptable in the use of recreation facilities.

Whenever a proposed development would be consistent with CMP policies and the development could, through the provision of recreation and other multiple uses, significantly increase public use of the shore, then such development should be encouraged to locate adjacent to the shore (this situation would generally only apply within the more developed portions of urban areas).

HISTORIC AND SCENIC RESOURCES POLICIES

POLICY 23: PROTECT, ENHANCE AND RESTORE STRUCTURES, DISTRICTS, AREAS OR SITES THAT ARE OF SIGNIFICANCE IN THE HISTORY, ARCHITECTURE, ARCHAEOLOGY OR CULTURE OF THE STATE, ITS COMMUNITIES, OR THE NATION.

Explanation of Policy

Among the most valuable of the state's man-made resources are those structures or areas which are of historic, archaeological, or cultural significance. The protection of these structures must involve a recognition of their importance by all agencies and the ability to identify and describe them. Protection must include concern not just with specific sites but with areas of significance, and with the area around specific sites. The policy is not to be construed as a passive mandate but must include active efforts, when appropriate, to restore or revitalize through adaptive reuse. While the program is concerned with the preservation of all such resources within the coastal boundary, it will actively promote the preservation of historic and cultural resources which have a coastal relationship.

The structures, districts, areas or sites that are of significance in the history, architecture, archaeology or culture of the state, its communities, or the Nation comprise the following resources:

1. A resource, which is in a federal or state park established, among other reasons, to protect and preserve the resource
2. A resource on, nominated to be on, or determined eligible to be on the National or State Registers of Historic Places
3. A resource on or nominated to be on the State Nature and Historic Preserve Trust
4. An archaeological resource which is on the State Department of Education's inventory of archaeological sites
5. A local landmark, park, or locally designated historic district which is located within the boundary of an approved local waterfront revitalization program
6. A resource that is a significant component of an Urban Cultural Park

All practicable means to protect structures, districts, areas or sites that are of significance in the history, architecture, archaeology or culture of the state, its communities or the Nation shall be deemed to include the consideration and adoption of any techniques, measures, or controls to prevent a significant adverse change to such significant structures, districts, areas or sites. A significant adverse change includes but is not limited to:

1. Alteration of or addition to one or more of the architectural, structural, ornamental or functional features of a building, structure, or site that is a recognized historic, cultural, or archaeological resource, or component thereof. Such features are defined as encompassing the style and general arrangement of the exterior of a structure and any original or historically significant interior features including type, color and texture of building materials, entry ways and doors, fenestration, lighting fixtures, roofing, sculpture and carving, steps, rails, fencing, windows, vents and other openings, grillwork, signs, canopies, and other appurtenant fixtures and, in addition, all buildings, structures, outbuildings, walks, fences, steps, topographical features, earthworks, paving and signs located on the designated resource property. (To the extent they are relevant, the Secretary of the Interior's "Standards for Rehabilitation and Guidelines for Rehabilitating Historic Buildings" shall be adhered to.)
2. Demolition or removal in full or part of a building, structure, or earthworks that is a recognized historic, cultural, or archaeological resource or component thereof, to include all those features described in (a) above plus any other appurtenant fixtures associated with a building, structure or earthwork.
3. All proposed actions within 500 feet of the perimeter of the property boundary of the historic, architectural, cultural, or archaeological resource and all actions within an historic district that would be incompatible with the objective of preserving the quality and integrity of the resource. Primary considerations to be used in making judgment about compatibility should focus on the visual and location relationship between the proposed action and the special character of the historic, cultural, or archaeological resource. Compatibility between the proposed action and the resource means that the general appearance of the resource should be reflected in the architectural style, design material, scale, proportion, composition, mass, line, color, texture, detail, setback, landscaping and related items of the proposed actions. With historic districts, this would include infrastructure improvements or changes, such as street and sidewalk paving, street furniture and lighting.

This policy shall not be construed to prevent the construction, reconstruction, alteration, or demolition of any building, structure, earthworks, or component thereof of a recognized historic, cultural or archaeological resource which has been officially certified as being imminently dangerous to life or public health. Nor shall the policy be construed to prevent the ordinary maintenance, repair, or proper restoration according to the U.S. Department of Interior's "Standards for Rehabilitation and Guidelines for Rehabilitating Historic Buildings" of any building, structure, site or earthwork, or component thereof of a recognized historic, cultural or archaeological resource which does not involve a significant adverse change to the resource, as defined above.

POLICY 24: PREVENT IMPAIRMENT OF SCENIC RESOURCES OF STATEWIDE SIGNIFICANCE.

Explanation of Policy:

The Coastal Management Program will identify on the coastal area map scenic resources of statewide significance. The following general criteria will be combined to determine significance:

Quality	<p>The basic elements of design (i.e., two-dimensional line, three-dimensional form, texture and color) combine to create all high-quality landscapes. The water, landforms, and human-made components of scenic coastal landscapes exhibit a variety of line, form, texture and color. This variety is not, however, so great as to be chaotic. Scenic coastal landscapes also exhibit unity of components. This unity is not, however, so complete as to be monotonous. Example: The Thousand Islands where the mix of water, land, vegetative and human-made components creates interesting variety, while the organization of these same components creates satisfying unity.</p> <p>Often, high quality landscapes contain striking contrasts between lines, forms, textures and colors. Example: A waterfall where horizontal and vertical lines and smooth and turbulent textures meet in dramatic juxtaposition.</p> <p>Finally, high quality landscapes are generally free of discordant features, such as structures or other elements which are inappropriate in terms of siting, form, scale, and/or materials.</p>
Uniqueness	The uniqueness of high-quality landscapes is determined by the frequency of occurrence of similar resources in a region of the state or beyond.
Public Accessibility	A scenic resource of significance must be visually and, where appropriate, physically accessible to the public.
Public Recognition	Widespread recognition of a scenic resource is not a characteristic intrinsic to the resource. It does, however, demonstrate people's appreciation of the resource for its visual, as well as evocative, qualities. Public recognition serves to reinforce analytic conclusions about the significance of a resource.

When considering a proposed action, agencies shall first determine whether the action could affect a scenic resource of statewide significance. This determination would involve: 1) a review of the coastal area map to ascertain if it shows an identified scenic resource which could be affected by the proposed action, and 2) a review of the types of activities proposed to determine if they would be likely to impair the scenic beauty of an identified resource. Impairment will include: (i) the irreversible modification of geologic forms; the destruction or removal of vegetation; the modification, destruction, or removal of structures, whenever the geologic forms, vegetation or structures are significant to the scenic quality of an identified resource; and (ii) the addition of structures which because of siting or scale will reduce identified views or which because of scale, form, or materials will diminish the scenic quality of an identified resource.

The following siting and facility-related guidelines are to be used to achieve this policy, recognizing that each development situation is unique and that the guidelines will have to be applied accordingly.

Guidelines include:

1. siting structures and other development such as highways, power lines, and signs, back from shorelines or in other inconspicuous locations to maintain the attractive quality of the shoreline and

to retain views to and from the shore;

2. clustering or orienting structures to retain views, save open space and provide visual organization to a development;
3. incorporating sound, existing structures (especially historic buildings) into the overall development scheme;
4. removing deteriorated and/or degrading elements;
5. maintaining or restoring the original land form, except when changes screen unattractive elements and/or add appropriate interest;
6. maintaining or adding vegetation to provide interest, encourage the presence of wildlife, blend structures into the site, and obscure unattractive elements, except when selective clearing removes unsightly, diseased or hazardous vegetation and when selective clearing creates views of coastal waters;
7. using appropriate materials, in addition to vegetation, to screen unattractive elements;
8. using appropriate scales, forms and materials to ensure that buildings and other structures are compatible with and add interest to the landscape.

Maintaining the visual integrity and aesthetic scenic quality of the Catskill/Olana Scenic Area of Statewide Significance (SASS) is of utmost importance to the Village of Catskill. A list of preliminary identified resources appears in the Appendices.

POLICY 25: PROTECT, RESTORE OR ENHANCE NATURAL AND MAN-MADE RESOURCES WHICH ARE NOT IDENTIFIED AS BEING OF STATEWIDE SIGNIFICANCE, BUT WHICH CONTRIBUTE TO THE OVERALL SCENIC QUALITY OF THE COASTAL AREA.

Explanation of Policy

When considering a proposed action which would not affect a scenic resource of statewide significance, agencies shall ensure that the action would be undertaken so as to protect, restore or enhance the overall scenic quality of the coastal area. Activities which could impair or further degrade scenic quality are the same as those cited under the previous policy, i.e., modification of natural landforms, removal of vegetation, etc. However, the effects of these activities would not be considered as serious for the general coastal area as for significant scenic areas.

The siting and design guidelines listed under the previous policy should be considered for proposed actions in the general coastal area. More emphasis may need to be placed on removal of existing elements, especially those which degrade, and on addition of new elements or other changes which enhance. Removal of vegetation at key points to improve visual access to coastal waters is one such change which might be expected to enhance scenic quality.

AGRICULTURAL LANDS POLICY

POLICY 26: CONSERVE AND PROTECT AGRICULTURAL LANDS IN THE STATE'S COASTAL AREA.

Explanation of Policy

The first step in conserving agricultural lands is the identification of such lands. The Department of State is mapping all important agricultural lands within the State's coastal area. The following criteria have been used to prepare the maps, and the mapped information will be incorporated in the New York State Coastal Resources Inventory and on the Coastal Area Map.

Land meeting any of the following criteria is being mapped:

1. Land which meets the definition of the U.S. Department of Agriculture as being prime farmland, unique farmland, or farmland of statewide importance.
 - a. Prime farmland is defined by USDA Soil Conservation Service in CRF #7 Agriculture Part 657.5(a), January 1979. A list of the soil associations that meet this definition has been prepared for each coastal county.
 - b. Unique farmland is defined by USDASCS in CRF #7 Agriculture Part 657.5(b). In the coastal area of New York State all fruit and vegetable farming meets the terms of the definition.
 - c. Farmland of Statewide importance is defined by USDASCS in CRF #7 Agriculture Part 656.5(c). Lists of soil associations which constitute farmland of statewide importance have been prepared for each coastal county.
2. Active farmland within Agricultural Districts. The maps of each Agricultural District show land committed by farmers. This is the land that will be mapped as active farmland. The district boundary will also be shown.
3. Areas identified as having high economic viability for farming. Any farm not identified above in 1 and/or 2, and which is located in an area identified as having "high viability" on the map entitled "Economic Viability of Farm Areas" prepared by the Office of Planning Coordination in May 1969. This would be the basis for initial identification of areas having high economic viability for farming. Areas will be added and/or deleted based on comments from the agricultural community.
4. Areas adjacent to land identified above in 1, when are being farmed and are part of a farm with identified important agricultural lands.
5. Prime farmland, unique farmland, and farmland of statewide significance will not be identified as important agricultural land whenever it occurs as parcels of land less than 25 acres in size and these small parcels are not within a mile of areas of active farming.

Given the Program's application to a narrow strip of land, implementing a policy of promoting agricultural use of land must, to be practical, concentrate on controlling the replacement of agricultural land uses with non-

agricultural land use as the result of some public action. The many other factors such as markets, taxes, and regulations, which influence the viability of agriculture in a given area, can only be addressed on a Statewide or national basis.

The Program policy requires a concern for the loss of any important agricultural land. However, the primary concern must be with the loss of agricultural land when that loss would have a significant effect on an agricultural area's ability to continue to exist, to prosper, and even to expand. A series of determinations are necessary to establish whether a public action is consistent with the conservation and protection of agricultural lands, or whether it is likely to be harmful to the health of an agricultural area. In brief, these determinations are as follows: First, it must be determined whether a proposed public action would result in the loss of important agricultural lands as mapped on the Coastal Inventory. If it would not result, either directly or indirectly, in the loss of identified important agricultural lands, then the action is consistent with the policy on agriculture. If it is determined that the action would result in a loss of identified important agricultural lands, but that loss would not have an adverse effect of the viability of agriculture in the surrounding area, then the action may also be consistent with this policy. However, in that case, the action must be undertaken in a manner that would minimize the loss of important farmland. If the action is determined to result in a significant loss of important agricultural land, that is if the loss is to a degree sufficient to adversely affect surrounding agriculture's viability -- its ability to continue to exist, to prosper, and even to expand -- then the action is not consistent with this agriculture policy.

The following guidelines define more fully what must be considered in making the above determinations:

1. A public action would be likely to significantly impair the viability of an agricultural area in which identified important agricultural lands are located if:
 - a. The action would occur on identified important agricultural land and would:
 - (1) Consume more than 10% of the land of an active farm 1 containing such identified important agricultural lands
 - (2) Consume a total of 100 acres or more of identified important agricultural land,Or
 - (3) Divide an active farm with identified important agricultural land into two or more parts, thus impeding efficient farm operation
 - b. The action would result in environmental changes which may reduce the productivity or adversely affect the quality of the product of any identified important agricultural lands.
 - c. The action would create real estate market conditions favorable to the conversion of large areas of identified important agricultural land to non- agricultural uses. Such conditions may be created by:
 - (1) Public water or sewer facilities to serve non-farm structures.

- (2) Transportation, improvements, except for maintenance of, and safety improvements to, existing facilities that serve non-farm or non-farm related development
 - (3) Major non-agribusiness commercial development adjacent to identified agricultural lands
 - (4) Major public institutions
 - (5) Residential uses other than farm dwellings
 - (6) Any change in land use regulations applying to agricultural land which would encourage or allow uses incompatible with the agricultural use of the land
- 2. The following types of facilities and activities should not be construed as having adverse effects on the preservation of agricultural land:
 - a. Farm dwellings, barns, silos, and other accessory uses and structures incidental to agricultural production or necessary for farm family supplemental income.
 - b. Agribusiness development, which includes the entire structure of local support services and commercial enterprises necessary to maintain an agricultural operation, e.g., milk hauler, grain dealer, farm machinery dealer, veterinarian, food processing plants.
- 3. In determining whether an action that would result in the loss of farmland is of overriding regional or statewide benefit, the following factors should be considered:
 - a. For an action to be considered overriding, it must be shown to provide significantly greater benefits to the region or state than are provided by the affected agricultural area (not merely the land directly affected by the action). In determining the benefits of the affected agriculture to the region or state, consideration must be given to its social and cultural value, its economic viability, its environmental benefits, its existing and potential contribution to food or fiber production in the state and any state food policy, as well as its direct economic benefits.
 - (1) An agricultural area is an area predominantly in farming and in which the farms produce similar products and/or rely on the same agribusiness support services and are to be a significant degree economically interdependent. At a minimum, this area should consist of at least 500 acres of identified important agriculture land. For the purpose of analyzing impacts of any action on agriculture, the boundary of such area need not be restricted to land within the coastal boundary. If the affected agricultural lands lie within an agricultural district then, at a minimum, the agricultural area should include the entire agricultural district.
 - (2) In determining the benefits of an agricultural area, its relationship to agricultural lands outside the area should also be considered.
 - (3) The estimate of the economic viability of the affected agricultural area should be based on an assessment of:

- i. soil resources, topography, conditions of climate and water resources
 - ii. availability of agribusiness and other support services, and the level and condition of investments in farm real estate, livestock, and equipment
 - iii. the level of farming skills as evidenced by income obtained, yield estimates for crops, and costs being experienced with the present types and conditions of buildings, equipment, and cropland
 - iv. use of new technology and the rates at which new technology is adopted
 - v. competition from substitute products and other farming regions and trends in total demand for given products
 - vi. patterns of farm ownership for their effect on farm efficiency and the likelihood that farms will remain in use
- (4) The estimate of the social and cultural value of farming in the area should be based on an analysis of:
 - i. the history of farming in the area
 - ii. the length of time farms have remained in one family
 - iii. the degree to which farmers in the area share a cultural or ethnic heritage
 - iv. the extent to which products are sold and consumed locally
 - v. the degree to which a specific crop(s) has become identified with a community
- (5) An estimate of the environmental benefits of the affected agriculture should be based on analysis of:
 - i. the extent to which the affected agriculture as currently practiced provides a habitat or food for wildlife
 - ii. the extent to which a farm landscape adds to the visual quality of an area
 - iii. any regional or local open space plans, and degree to which the open space contributes to air quality
 - iv. the degree to which the affected agriculture does, or could, contribute to the establishment of a clear edge between rural and urban development
- 4. Whenever a proposed action is determined to have an insignificant adverse effect on identified important agricultural land or whenever it is permitted to substantially hinder the achievement of the policy according to DOS regulations, Part 600, or as a result of the findings of an EIS, then the required minimization should be undertaken in the following manner:
 - a. The proposed action shall, to the extent practicable, be sited on any land not identified as important agricultural, or, if it must be sited on identified important agricultural land, sited to avoid classes of agricultural land according to the following priority:

- (1) prime farmland in orchards or vineyards
 - (2) unique farmland in orchard or vineyards
 - (3) other prime farmland in active farming
 - (4) other unique farmland
 - (5) farmland of statewide importance in active farming.
 - (6) active farmland identified as having high economic viability
 - (7) prime farmland not being farmed
 - (8) farmland of statewide importance not being farmed
- b. To the extent practicable, agricultural use of identified important agricultural land not directly necessary for the operation of the proposed non-agricultural action should be provided for through such means as lease arrangements with farmers, direct undertaking of agriculture, or sale of surplus land to farmers. Agricultural use of such land shall have priority over any other proposed multiple use of the land.

ENERGY AND ICE MANAGEMENT POLICIES

POLICY 27: DECISIONS ON THE SITING AND CONSTRUCTION OF MAJOR ENERGY FACILITIES IN THE COASTAL AREA WILL BE BASED ON PUBLIC ENERGY NEEDS, COMPATIBILITY OF SUCH FACILITIES WITH THE ENVIRONMENT, AND THE FACILITY'S NEED FOR A SHOREFRONT LOCATION.

Explanation of Policy

New York's overall annual energy demand has begun to flatten over time, in part due to the success of state and utility energy efficiency programs. However, peak load (the highest amount of energy consumption in a given year) has continued to increase at a more rapid pace. Renewable power sources—hydro, solar, wind, and other carbon-free solutions—also continue to grow as a share of the total energy produced in the state. Significant investments in the billions of dollars are needed to replace New York's aging electric transmission and distribution infrastructure just to meet currently projected energy demand. To respond to these significant shifts in the state's energy infrastructure, state energy policies are being designed to maintain energy system reliability during peak load in ways that improve the grid's overall system efficiency, from both energy transmission and capital investment perspectives.

The New York State energy planning process provides a comprehensive framework for improving the state's energy system, addressing issues such as environmental impacts, resiliency, and affordability. Key areas of focus for New York's energy planning and implementation policies include integration of renewable energy generation; local energy generation that can foster both economic prosperity and environmental stewardship; seeking innovative energy solutions across the state's public facilities and operations; increasing energy efficiency; and decreasing greenhouse gas emissions. New York's energy policy is also central to how the state

responds to the challenges presented by a changing climate. New York State's energy planning recognizes that extreme weather events demand more resilient energy infrastructure, and that climate change presents both challenges and opportunities to lead and innovate.

A determination of public need for energy is the first step in the process for siting new facilities. The directives for determining this need are contained primarily in Article 6 of the New York State Energy Law. That Article requires the preparation of a State Energy Plan. With respect to transmission lines and the siting of major electric generating facilities, Articles 7 and 10 of the state's Public Service Law require additional forecasts and establish the basis for determining the compatibility of these facilities with the environment and the necessity for providing additional electric capacity. The policies derived from the siting regulations under these Articles are entirely consistent with the general coastal zone policies derived from other laws, particularly the regulations promulgated pursuant to the Waterfront Revitalization of Coastal Areas and Inland Waterways Law. That law is used for the purposes of ensuring consistency with the Coastal Management Program.

The Department of State will present testimony for the record during relevant certification proceedings under Articles 7 and 10 of the Public Service Law when appropriate; and use the state SEQR and DOS regulations to ensure that decisions regarding other proposed energy facilities (not subject to Articles 7 and 10 of the Public Service Law) that would affect the coastal area are consistent with coastal policies.

POLICY 28: ICE MANAGEMENT PRACTICES SHALL NOT INTERFERE WITH THE PRODUCTION OF HYDROELECTRIC POWER, DAMAGE SIGNIFICANT FISH AND WILDLIFE AND THEIR HABITATS, OR INCREASE SHORELINE EROSION OR FLOODING.

Explanation of Policy

Prior to undertaking actions required for ice management, an assessment must be made of the potential effects of such actions upon the production of hydro-electric power, fish and wildlife and their habitats as will be identified in the Coastal Area Maps, flood levels and damage, rates of shoreline erosion damage, and upon natural protective features.

Following such an examination, adequate methods of avoidance or mitigation of such potential effects must be utilized if the proposed action is to be implemented.

POLICY 29: THE DEVELOPMENT OF OFFSHORE USES AND RESOURCES, INCLUDING RENEWABLE ENERGY RESOURCES, SHALL ACCOMMODATE NEW YORK'S LONG-STANDING OCEAN AND GREAT LAKES INDUSTRIES, SUCH AS COMMERCIAL AND RECREATIONAL FISHING AND MARITIME COMMERCE, AND THE ECOLOGICAL FUNCTIONS OF HABITATS IMPORTANT TO NEW YORK.

Explanation of Policy

The science of ecosystem connections between the coastal zone and offshore areas is increasingly better understood. The offshore environment is an ongoing focus of policy development at national, regional, and state levels. Within this context, New York seeks to accommodate longstanding offshore industries, such as commercial and recreational fishing and maritime commerce, while at the same time ensuring the ecological functioning of habitats important to New York, as the state considers the need for new offshore resource development and uses to occur.

While New York State has jurisdiction in its offshore waters, matters pertaining to the OCS are under the jurisdiction of the federal government. However, offshore resource development and other uses on the OCS may affect coastal resources and uses important to New York. Consequently, the Department of State actively participates in OCS planning and decision-making processes pursuant to the federal Outer Continental Shelf Lands Act and the Deepwater Port Act, among other federal statutes, and reviews and voices the state's concerns about federal OCS activities, licenses, permits, lease sales, plans, and other uses and activities. The federal government increasingly has invited state participation in offshore planning and decision-making processes. New York will continue to review and analyze federal licensing and permitting activities for federal consistency, including activities in offshore areas outside New York's coastal zone. Proponents of offshore activities should use available offshore data to identify and reduce the potential effects on New York's coastal resources, activities and uses. Project proponents should consider the compatibility with, and seek to accommodate, the existing presence of resources, activities and uses that are important to the coastal area of New York State.

In addition to the development of energy resources and the siting of energy facilities, offshore uses of particular concern to New York State because of their potential effects on state coastal uses and resources include, but are not limited to: fisheries management; aquaculture; sand and gravel mining; military readiness training and related exercises; changes or upgrades to established navigation patterns and infrastructure, including the re-routing of existing navigation lanes and the location, placement or removal of navigation devices which are not part of the routine operations under the Aids to Navigation (ATON) program; permits for deepwater ports; the identification of interim or permanent open-water dredged material disposal sites; the intentional submergence of vessels and other structures, including for the purpose of creating artificial reefs; the creation of human-made islands, tidal barriers, or the installation of other fixed structures; scientific research activities; and exploration and identification of potential resources for extraction, such as biopharmaceutical products.

In its review of proposed activities, licenses, permits, lease sales and plans in the Atlantic OCS and New York State coastal waters, the Department of State works with state and federal agencies to considers a number of factors, including but not limited to: the potential effects upon maritime traffic, including navigational safety leading into and from New York's ports; the potential for increased port development and economic activity; aspects of national security; the effects on important finfish, crustaceans, shellfish, seabirds, marine mammals, and other wildlife populations and their spawning, wintering, and foraging habitats and migrating corridors; impacts on biological communities and biodiversity; ecological functioning of ecosystems; economic and other effects upon commercial and recreational fishing activities; impacts upon tourism and public recreational resources and opportunities along the coasts and offshore; the potential for geo-hazards; water quality; and overall effects on the resilience of New York's coastal uses and resources.

Of special significance, New York State recognizes the need to develop energy resources, particularly those that contribute to achieving the state's energy goals, including greenhouse gas reduction. It also recognizes that any energy development may have reasonably foreseeable effects on existing coastal uses and resources. Among the various energy resources under consideration for development are those which may be found in offshore waters within the state's territorial limit or the Atlantic Outer Continental Shelf (OCS). There are currently no active licenses, permits, lease sales or plans for oil and gas exploration or production in the waters offshore New York State.

The state encourages the responsible development of renewable energy resources. Wind, wave, tidal, and water current resources located offshore New York are an increasing focus of development interest, which may continue to grow as projects become more technologically feasible. Offshore renewable wind energy development is a use which depends on the utilization of resources found in coastal waters. The state recognizes offshore projects directly interconnected to the New York electrical grid as qualifying for eligibility as a dependent use at the same level as though the facility were located within the state.

WATER AND AIR RESOURCES POLICIES

POLICY 30: MUNICIPAL, INDUSTRIAL, AND COMMERCIAL DISCHARGE OF POLLUTANTS, INCLUDING BUT NOT LIMITED TO, TOXIC AND HAZARDOUS SUBSTANCES, INTO COASTAL WATERS WILL CONFORM TO STATE AND NATIONAL WATER QUALITY STANDARDS.

Explanation of Policy

Municipal, industrial and commercial discharges include not only "end-of-the pipe" discharges into surface and groundwater but also plant site runoff, leaching, spillages, sludge and other waste disposal, and drainage from raw material storage sites. Also, the regulated industrial discharges are both those which directly empty into receiving coastal waters and those which pass through the municipal treatment systems before reaching the state's waterways.

POLICY 31: STATE COASTAL AREA POLICIES AND MANAGEMENT OBJECTIVES OF APPROVED LOCAL WATERFRONT REVITALIZATION PROGRAMS WILL BE CONSIDERED WHILE REVIEWING COASTAL WATER CLASSIFICATIONS AND WHILE MODIFYING WATER QUALITY STANDARDS; HOWEVER, THOSE WATERS ALREADY OVERBURDENED WITH CONTAMINANTS WILL BE RECOGNIZED AS BEING A DEVELOPMENT CONSTRAINT.

Explanation of Policy

Pursuant to the Federal Clean Water Act of 1977 (PL 95-217) the state has classified its coastal and other waters in accordance with considerations of best usage in the interest of the public and has adopted water quality standards for each class of waters. These classifications and standards are reviewable at least every three years for possible revision or amendment. Local Waterfront Revitalization Programs and state coastal management policies shall be factored into the review process for coastal waters. However, such consideration shall not affect any water pollution control requirement established by the state pursuant to the federal Clean Water Act.

The state has identified certain stream segments as being either "water quality limiting" or "effluent limiting." Waters not meeting state standards and which would not be expected to meet these standards even after applying "best practicable treatment" to effluent discharges are classified as "water quality limiting". Those segments meeting standards or those expected to meet them after application of "best practicable treatment" are classified as "effluent limiting," and all new waste discharges must receive "best practicable treatment." However, along stream segments classified as "water quality limiting", waste treatment beyond "best practicable treatment" would be required, and costs of applying such additional treatment may be prohibitive for new development.

POLICY 32: ENCOURAGE THE USE OF ALTERNATIVE OR INNOVATIVE SANITARY WASTE SYSTEMS IN SMALL COMMUNITIES WHERE THE COSTS OF CONVENTIONAL FACILITIES ARE UNREASONABLY HIGH, GIVEN THE SIZE OF THE EXISTING TAX BASE OF THESE COMMUNITIES.

Explanation of Policy

Alternative systems include individual septic tanks and other subsurface disposal systems, dual systems, small systems serving clusters of households or commercial users, and pressure or vacuum sewers. These types of systems are often more cost effective in smaller, less densely populated communities and for which conventional facilities are too expensive.

POLICY 33: BEST MANAGEMENT PRACTICES WILL BE USED TO ENSURE THE CONTROL OF STORMWATER RUNOFF AND COMBINED SEWER OVERFLOWS DRAINING INTO COASTAL WATERS.

Explanation of Policy

Best management practices include both structural and non-structural methods of preventing or mitigating pollution caused by the discharge of stormwater runoff and combined sewer overflows. At present, structural approaches to controlling stormwater runoff (e.g., construction of retention basins) and combined sewer overflows (e.g., replacement of combined system with separate sanitary and stormwater collection systems) are not economically feasible. Proposed amendments to the Clean Water Act, however, will authorize funding to address combined sewer overflows in areas where they create severe water quality impacts. Until funding for such projects becomes available, non-structural approaches (e.g., improved street cleaning, reduced use of road salt) will be encouraged.

POLICY 34: DISCHARGE OF WASTE MATERIALS INTO COASTAL WATERS FROM VESSELS SUBJECT TO STATE JURISDICTION WILL BE LIMITED SO AS TO PROTECT SIGNIFICANT FISH AND WILDLIFE HABITATS, RECREATIONAL AREAS AND WATER SUPPLY AREAS.

Explanation of Policy

All untreated sanitary waste from vessels is prohibited from being discharged into the state's coastal waters. Where coastal resources or activities require greater protection than afforded by this requirement the state may designate vessel waste no discharge zones. Within these no discharge zones the discharge of all vessel waste whether treated or not is prohibited. A determination from EPA that an adequate number of vessel waste pump out stations exists is necessary before the state can designate a no discharge zone. The state prepared a Clean Vessel Act Plan which identifies the coastal waters for which no discharge zones are needed, and the number of vessel waste pump outs required to obtain the determination from EPA. The discharge of other wastes from vessels is limited by state law.

POLICY 35: DREDGING AND FILLING IN COASTAL WATERS AND DISPOSAL OF DREDGED MATERIAL WILL BE UNDERTAKEN IN A MANNER THAT MEETS EXISTING STATE DREDGING PERMIT REQUIREMENTS, AND PROTECTS SIGNIFICANT FISH AND WILDLIFE HABITATS, SCENIC RESOURCES, NATURAL PROTECTIVE FEATURES, IMPORTANT AGRICULTURAL LANDS, AND WETLANDS.

Explanation of Policy

Dredging, filling, and dredge material disposal are activities that are needed for waterfront revitalization and development, such as maintaining navigation channels at sufficient depths, pollutant removal, and other coastal management needs. Such projects, however, may adversely affect water quality, fish and wildlife habitats, wetlands, and other important coastal resources. Often these adverse effects can be minimized through careful design and timing of the dredging or filling activities, proper siting of dredged material disposal sites, and the beneficial use of dredged material. Such projects shall only be permitted if they satisfactorily demonstrate that these anticipated adverse effects have been reduced to levels which satisfy state permit standards set forth in regulations developed pursuant to Environmental Conservation Law, (Articles 15, 24, 25, and 34), and are consistent with policies pertaining to the protection and use of coastal resources (State Coastal Management policies 7, 15, 19, 20, 24, 26, and 44).

POLICY 36: ACTIVITIES RELATED TO THE SHIPMENT AND STORAGE OF PETROLEUM AND OTHER HAZARDOUS MATERIALS WILL BE CONDUCTED IN A MANNER THAT WILL PREVENT OR AT LEAST MINIMIZE SPILLS INTO COASTAL WATERS; ALL PRACTICABLE EFFORTS WILL BE UNDERTAKEN TO EXPEDITE THE CLEANUP OF SUCH DISCHARGES; AND RESTITUTION FOR DAMAGES WILL BE REQUIRED WHEN THESE SPILLS OCCUR.

Explanation of Policy

See Policy 39 for definition of hazardous materials.

POLICY 37: BEST MANAGEMENT PRACTICES WILL BE UTILIZED TO MINIMIZE THE NON-POINT DISCHARGE OF EXCESS NUTRIENTS, ORGANICS AND ERODED SOILS INTO COASTAL WATERS.

Explanation of Policy

Best management practices used to reduce these sources of pollution could include, but are not limited to, encouraging organic farming and pest management principles, soil erosion control practices, and surface drainage control techniques.

POLICY 38: THE QUALITY AND QUANTITY OF SURFACE WATER AND GROUNDWATER SUPPLIES, WILL BE CONSERVED AND PROTECTED, PARTICULARLY WHERE SUCH WATERS CONSTITUTE THE PRIMARY OR SOLE SOURCE OF WATER SUPPLY.

Explanation of Policy

Surface and groundwater are the principal sources of drinking water in the state, and therefore must be protected. Since Long Island's groundwater supply has been designated a "primary source aquifer," all actions must be reviewed relative to their impacts on Long Island's groundwater aquifers.

POLICY 39: THE TRANSPORT, STORAGE, TREATMENT AND DISPOSAL OF SOLID WASTES, PARTICULARLY HAZARDOUS WASTES, WITHIN COASTAL AREAS WILL BE CONDUCTED IN SUCH A MANNER SO AS TO PROTECT GROUNDWATER AND SURFACE WATER SUPPLIES, SIGNIFICANT FISH AND WILDLIFE HABITATS, RECREATION AREAS, IMPORTANT AGRICULTURAL LAND, AND SCENIC RESOURCES.

Explanation of Policy

The definitions of terms “solid wastes” and “solid waste management facilities” are taken from the New York's Solid Waste Management Act (Environmental Conservation Law, Article 27). Solid wastes include sludge from air or water pollution control facilities, demolition and construction debris and industrial and commercial wastes.

Hazardous wastes are unwanted byproducts of manufacturing processes and are generally characterized as being flammable, corrosive, reactive, or toxic. More specifically, hazardous waste is defined in Environmental Conservation Law (Section 27-0901[3]), as “waste or combination of wastes which because of its quantity, concentration, or physical, chemical or infectious characteristics may: 1) cause, or significantly contribute to an increase in mortality or an increase in serious irreversible or incapacitating reversible illness; or 2) pose a substantial present or potential hazard to human health or the environment when improperly treated, stored, disposed, transported or otherwise managed.” A list of hazardous wastes (NYCRR Part 366) will be adopted by DEC within 6 months after EPA formally adopts its list.

Examples of solid waste management facilities include resource recovery facilities, sanitary landfills and solid waste reduction facilities. Although a fundamental problem associated with the disposal and treatment of solid wastes is the contamination of water resources, other related problems may include: filling of wetlands and littoral areas, atmospheric loading, and degradation of scenic resources.

POLICY 40: EFFLUENT DISCHARGED FROM MAJOR STEAM ELECTRIC GENERATING AND INDUSTRIAL FACILITIES INTO COASTAL WATERS WILL NOT BE UNDULY INJURIOUS TO FISH AND WILDLIFE AND SHALL CONFORM TO STATE WATER QUALITY STANDARDS.

Explanation of Policy

The State Board on Electric Generation Siting and the Environment must consider a number of factors when reviewing a proposed site for facility construction. One of these factors is that the facility shall “not discharge any effluent that will be unduly injurious to the propagation and protection of fish and wildlife, the industrial development of the state, the public health, and public enjoyment of the receiving waters.” The effect of thermal discharges on water quality and aquatic organisms is considered by the siting board when evaluating any applicant's request to construct a new steam electric generating facility.

POLICY 41: LAND USE OR DEVELOPMENT IN THE COASTAL AREA WILL NOT CAUSE NATIONAL OR STATE AIR QUALITY STANDARDS TO BE VIOLATED.

Explanation of Policy

New York's Coastal Management Program incorporates the air quality policies and programs developed for the state by the Department of Environmental Conservation pursuant to the Clean Air Act and state laws on air quality. The requirements of the Clean Air Act are the minimum air quality control requirements applicable within the coastal area.

To the extent possible, the State Implementation Plan will be consistent with coastal lands and water use

policies. Conversely, coastal management guidelines and program decisions with regard to land and water use and any recommendations with regard to specific sites for major new or expanded industrial, energy, transportation, or commercial facilities will reflect an assessment of their compliance with the air quality requirements of the State Implementation Plan.

The Department of Environmental Conservation will allocate substantial resources to develop a regulatory and management program to identify and eliminate toxic discharges into the atmosphere. The state's Coastal Management Program will assist in coordinating major toxic control programming efforts in the coastal regions and in supporting research on the multi-media nature of toxics and their economic and environmental effects on coastal resources.

POLICY 42: COASTAL MANAGEMENT POLICIES WILL BE CONSIDERED IF THE STATE RECLASSIFIES LAND AREAS PURSUANT TO THE PREVENTION OF SIGNIFICANT DETERIORATION REGULATIONS OF THE FEDERAL CLEAN AIR ACT.

Explanation of Policy

The policies of the state and local coastal management programs concerning proposed land and water uses and the protection and preservation of special management areas will be taken into account prior to any action to change prevention of significant deterioration land classifications in coastal regions or adjacent areas. In addition, the Department of State will provide the Department of Environmental Conservation with recommendations for proposed prevention of significant deterioration land classification designations based upon state and local coastal management programs.

POLICY 43: LAND USE OR DEVELOPMENT IN THE COASTAL AREA MUST NOT CAUSE THE GENERATION OF SIGNIFICANT AMOUNTS OF ACID RAIN PRECURSORS: NITRATES AND SULFATES.

Explanation of Policy

The New York Coastal Management Program incorporates the state's policies on acid rain. As such, the Coastal Management Program will assist in the state's efforts to control acid rain. These efforts to control acid rain will enhance the continued viability of coastal fisheries, wildlife, agricultural, scenic and water resources.

WETLANDS POLICY

POLICY 44: PRESERVE AND PROTECT TIDAL AND FRESHWATER WETLANDS AND PRESERVE THE BENEFITS DERIVED FROM THESE AREAS.

Explanation of Policy

Tidal wetlands include the following ecological zones: coastal fresh marsh, intertidal marsh, coastal shoals, bars and flats, littoral zone, high marsh or salt meadow, and formerly connected tidal wetlands. These tidal wetland areas are officially delineated on the Department of Environmental Conservation's Tidal Wetlands Inventory Map.

Freshwater wetlands include marshes, swamps, bogs, and flats supporting aquatic and semiaquatic vegetation and other wetlands so defined in the NYS Freshwater Wetlands Act and the NYS Protection of Waters Act

(Water Resources Law, Environmental Conservation Law Article 15).

The benefits derived from the preservation of tidal and freshwater wetlands include but are not limited to:

- habitat for wildlife and fish, including a substantial portion of the state's commercial fin and shellfish varieties; and contribution to associated aquatic food chains
- erosion, flood and storm control
- natural pollution treatment
- groundwater protection
- recreational opportunities
- educational and scientific opportunities
- aesthetic open space in many otherwise densely developed areas.



Source: Catskill BOA Nomination

4 Proposed Land and Water Uses and Proposed Projects

This section provides an explanation of proposed land and water uses for the Waterfront Revitalization Area (WRA), accompanied by a list of potential projects.

4.1 Proposed Land Uses

Future land uses will be an extension of current land uses, as illustrated in **Figure 4. Existing Land Use Map**. No new land uses are proposed for the implementation of this Local Waterfront Revitalization Program (LWRP). However, opportunities to expand water-dependent or water-enhanced uses on existing public and private lands will be pursued where feasible.

The Village of Catskill aims to increase the acreage in the WRA that is used for community and public services. The Village will seek to acquire vacant and underutilized land near water resources and existing public facilities. The land would be converted into community use land with recreational opportunities and public access for water-dependent and water-enhanced uses.

For all other land uses in the WRA, the Village intends to encourage the preservation of existing uses. Any changes to future land use will be informed by the Village's Zoning code.

4.2 Proposed Water Uses

Water uses will continue to focus on recreation, including boating and fishing. No new water uses are proposed for this LWRP at this time. However, opportunities to expand water-dependent uses on existing public and private lands will be pursued during the implementation of the LWRP.

4.3 Proposed Projects

The following projects have been identified and prioritized based on the LWRP vision (Introduction) and policies (Section 3), the needs identified in the LWRP Inventory (Section 2), and input from the public and Waterfront Advisory Committee (WAC) (Section 7).

These projects seek to restore and revitalize underutilized waterfront sites, improve existing public recreation facilities and provide additional public access to the waterfront area, link public sites along the waterfront, and enhance the village's economy.

Projects have been categorized into the following three topic areas:

- Parks, Recreation, and Public Access
- Development
- Flooding and Erosion


Additional details are provided for projects identified by the WAC as first priorities, including project location, cost estimates, potential funding sources, relevant LWRP policies, and concept designs, where relevant.⁸⁰

⁸⁰ Per LWRP Guidance materials 2022

PARK, RECREATION, AND PUBLIC ACCESS PROJECTS

Access to parks, open space, and recreational areas enhances the livability of a community and contributes to the well-being of its residents. The projects identified in this section will enhance existing and develop new waterfront parks and facilities to provide greater public access to the Catskill Creek and Hudson River. The projects will serve visitors and residents alike and increase the potential to expand recreation-based businesses within the village.

First Priority Parks, Recreation and Public Access Projects

1 Upgrade Facilities at Dutchman’s Landing Park
Project Description
<p>Dutchman’s Landing Park is one of the jewels of the Catskill’s waterfront. The Village of Catskill owns Dutchman’s Landing Park and has committed resources to significantly improve the parking lot at the park for maximum efficiency and increased capacity to serve both the Dutchman’s Landing Park and the nearby Historic Catskill Point. The Village would like to build on this investment by updating park facilities to serve the increasing number of users of the park.</p>
 
<p><i>Dutchman’s Landing Park: Gazebo and Band Pavilion</i></p>
<p>This project will revitalize Dutchman’s Landing Park by developing a Park Facility Improvement Plan and implementing the Plan’s recommendations to renovate and upgrade existing facilities and equipment to better serve the needs of the community.</p>
<p>Proposed improvements include:</p>
<ul style="list-style-type: none">• Rehabilitate existing boat launches• Build ADA compliant canoe and kayak launch to be located at Water Street on Catskill Creek• Renovate Dutchman’s Galley kitchen• Design and install a dining pavilion, location to be determined as part of the development of the Park Facility Improvement Plan• Upgrade existing bathrooms

	<ul style="list-style-type: none"> • Restore existing gazebo • Update playground equipment, and • Add ADA accessible walking paths
Project Location	Dutchman's Landing, 1 Main Street
Estimated Cost	Cost estimates will be prepared as part of the Park Facility Improvement Plan. The cost for the ADA EZLAUNCH Small Craft Launch is estimated at \$80,000.
Potential Funding Sources	NYS DOS EPF LWRP, NYS OPRHP, Greene County
Related LWRP Policies	1, 2, 5, 9, 19, 20, 21, 22
Benefits	Upgrading the facilities at Dutchman's Landing Park will increase the quality of life for village residents and increase economic activity in the downtown through increased visitor spending. Constructing a fully accessible canoe and kayak launch on the creek will increase access to the waterways for people with disabilities.
Timeframe	Six months for the preparation of a Park Facility Improvement Plan for Dutchman's Landing, including public participation. An implementation schedule will be developed as part of the Plan. The village owns the sites for improvements.
Regulatory Requirements	<p>Relevant permits/approvals will be identified prior to construction. Specifically, Army Corps of Engineers Section 10 Authorization and applicable New York State DEC Permits and DOS Concurrence will be required for components of this project:</p> <ul style="list-style-type: none"> • Rehabilitation of existing boat launches • Build ADA compliant canoe and kayak launch to be located at Water Street on Catskill Creek

Project Description

The village-owned former park is located at 506 Main Street. The park, which overlooks Catskill Creek and was formerly a dog park, includes a picnic area and agility course. During the LWRP public engagement process, the community identified that the park is often muddy and the surrounding steep slopes make the site difficult to access. As a result, community residents don’t feel comfortable using the park or bringing their canine companions to use the agility course.



Existing conditions at the former Park for Paws

This project proposes the preparation of a Park Facility Improvement Plan that will identify the necessary improvements to the former Park for Paws site including, but not limited to, improving access and installing an underdrain system with overlying topsoil and seeding to create a more useable surface. Improvements to the park will allow for people to safely access and use the waterfront park that provides residents and visitors with visual access to Catskill Creek, informal fishing opportunities (no dock) and opportunities for walking, picnicking, and enjoying nature.

Project Location	506 Main Street
Estimated Cost	\$20,000 for Phase 1: Park Facility Improvement Plan
Potential Funding Sources	NYS DOS EPF LWRP, NYS OPRHP
LWRP Policies	1, 2, 5, 9, 18, 19, 20, 21, 22
Benefits	Enhanced visual access to Catskill Creek, enhanced user safety.

Timeframe	Three months to prepare Park Facility Improvement Plan for Park for Paws, including public participation. An implementation schedule will be developed as part of the Plan. The Village of Catskill owns the site for improvements.
Regulatory Requirements	Relevant permits/approvals will be identified as part of the Park Facility Improvement Plan and again prior to redevelopment/construction.

3

Conduct a Study to Evaluate Transient Boater Dock Space

Project Description

Transient boaters that arrive by boat for less than a day are ideal visitors to the village in that they don't increase vehicular traffic or create a need for parking spaces. Existing marinas provide dock spaces for transient boaters, but it is unknown if the number of spaces is adequate or if more boaters would be enticed to stop and visit the village's shops, restaurants, and arts facilities if more dock space were available.

This project includes conducting a survey of the marinas and reviewing published studies to determine if more dock space would be beneficial for the village. The study would also identify potential areas where more docks could be installed and determine if public-for-fee docking facilities would be beneficial for the village.

Project Location	Catskill WRA
Estimated Cost	TBD
Potential Funding Sources	NYSDOS EPF LWRP
LWRP Policies	1, 2, 5, 11, 21, 22
Benefits	Improve quality of life for village residents but will also indirectly impact economic activity in the Downtown through increased tourism and visitor spending.
Timeframe	Six months to complete a Study to Evaluate Transient Dock Space.
Regulatory Requirements	N/A

Project Description

The Historic Catskill Point (Dutchman's Landing) is owned by Greene County and includes an open-air cobblestone plaza, a waterfront park overlooking the Hudson River and Catskill Creek, and floating docks. The Point also includes two restored 19th-century buildings: the Freightmasters Building, that has been converted into a maritime museum, and a 125-year-old Historic Warehouse that is available for private event rentals. Greene County is currently upgrading components at the Historic Catskill Point for the purpose of growing economic development and enhancing flood resiliency.



Existing conditions at Catskill Point / Dutchman's Landing

This project proposes that the village work in partnership with Greene County to design and implement improvements to the waterfront park including upgrades to the existing shoreline, wood deck, and boardwalk and stabilization of the county-owned historical warehouse. Greene County has committed \$1.25 million toward project implementation.

Project Location	Historic Catskill Point, Main Street
Estimated Cost	\$1.25 million for Phase 1
Potential Funding Sources	Greene County, NYS OPRHP EPF, NYS DOS EPF LWRP (would require the County to partner with the Village of Catskill)
LWRP Policies	1, 2, 4, 5, 19, 20, 21, 22, 23, 24
Benefits	Enhance flood resiliency, preserve historic structure, improve quality of life for residents, increase tourism opportunities, advance economic development.
Timeframe	One year to implement proposed improvements.

Regulatory Requirements	SEQRA, other permits/regulatory approvals will be identified in advance of construction. The property is owned by Greene County.
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Additional Parks, Recreation and Public Access Projects

5. Redevelop vacant and underutilized waterfront properties

As part of the 2017 Catskill Brownfield Opportunity Area (BOA) Nomination, the village identified several vacant, abandoned, or underutilized properties along Catskill Creek, including strategic sites for redevelopment. This list and the BOA recommendations were reconfirmed during the development of this LWRP (**Table 6**).

This project will support the implementation the BOA redevelopment recommendations and sub-area concept plans for vacant and underutilized waterfront properties. The goal of the project is to acquire and/or support the redevelopment of these sites in order to protect or expand water-related uses and public access points. Complementary actions could include acquiring additional conservation easements, protecting riparian habitats, and expanding the forest preserve for better fishing access. This project would create additional opportunities for visual and physical access to Catskill's waterfront, expand recreation opportunities for visitors and residents, and increase the potential to grow recreation-based businesses in the village.

The redevelopment of vacant properties adjacent to the LUMBERYARD, sub-area 2 in the Catskill BOA study, is included separately as project 12.



Redevelopment concept plan for the Forlini and Atlantic Mills properties, 2017 Catskill BOA Study

6. Create new pocket parks along Catskill Creek

Village owned land at the Creek-side ends of Greene and Bronson Streets present the opportunity to create pocket parks for additional recreational opportunities and public access to Catskill Creek. The desire to increase visual access and establish new pocket parks along Catskill Creek was supported by the community during the public engagement process.

Approximately 0.31 acres is available at the end of Greene Street and 0.07 acres at the end of Bronson Street for the creation of a small park with benches, attractive landscaping, and signage that would allow visitors to experience Catskill Creek. Greene Street Park could be made suitable for fishing and kayak launches. The project will include surveying to establish property boundaries and the development of design plans for the parks.

Initial concept plans for new pocket parks are provided below.



Conceptual plan for Greene Street



Conceptual plan for Bronson Street

DEVELOPMENT PROJECTS

A primary driver of Catskill's economy is tourism. The Village is dependent on its restaurants, retail, and commercial businesses to provide jobs for residents and generate the tax base which partially supports critical public services. To remain sustainable, downtown businesses must cater to the needs of residents, as well as tourists, during the entirety of the year, not only the summer months.

The proposed development projects will help to:

- Transform deteriorated and underutilized waterfront areas for commercial, recreation and cultural uses;
- Expand and enhance multimodal linkages between the waterfront, downtown, and existing tourism assets;
- Restore and protect the water quality and environmental resources of the Catskill WRA; and
- Preserve and promote the Village's cultural heritage and historic assets.

First Priority Development Projects

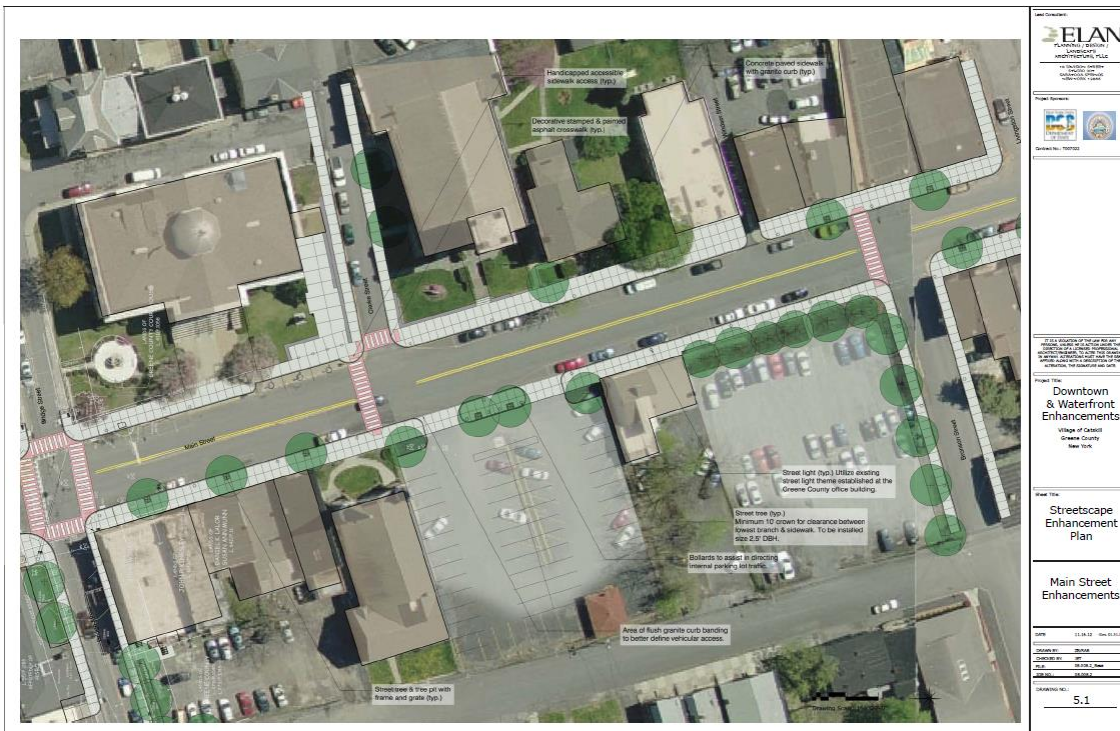
7	Implement Streetscape Enhancements
Project Description	
<p>The project builds on the 2013 <i>Summary Design Report, Downtown & Waterfront Enhancement Report</i>, prepared by Greene County Economic Development, Tourism and Planning, which advanced the design of several concepts presented in the Downtown and Waterfront Revitalization Strategy. The goal of the Summary Design Report was to provide improved access to and around Catskill Creek waterfront and to strengthen connections to Downtown and Main Street. The suggested improvements address access, safety, aesthetics, and walkability.</p>	
<p>This project will implement streetscape enhancements in downtown Catskill along Main Street and Bridge Street, including along the Uncle Sam Bridge.</p>	
<p><u>Main Street</u>: The Main Street Streetscape Enhancement area is located between Bridge and Bronson Streets. The Main Street project area connects directly to Bridge Street, and therefore, it is recommended that many of the same materials and themes be used to unify the two areas. Currently, Main Street has large, out of scale, and infrequently spaced cobra head streetlights. These lights will be removed and replaced with pedestrian scale period style lighting which is more in keeping with the scale and charm of the village. The existing concrete paved sidewalks and granite curbs will be replaced, and crosswalks will be handicap accessible and enhanced with imprinted and colored asphalt to further delineate pedestrian routing. Finally, new tree plantings will be located along the western side of the roadway. A conceptual plan, which would be further refined through the development of</p>	

construction documents, is presented below. This project will include the development of construction documents and actual construction.

Bridge Street: To encourage pedestrian travel between the Downtown and the waterfront, the following enhancements are recommended for the Bridge St. corridor: installation of imprinted and colored asphalt crosswalks at intersections to reinforce the pedestrian presence, installation of handicap accessible sidewalks, and replacement of the current cable/wire hanger system light pole at the northwest corner of Bridge and Main Street with a new period style traffic pole which will reduce visual clutter, and support the stabled period style lighting theme.

The sidewalks and curbs are also recommended to be replaced with new concrete sidewalks and granite curbs to rejuvenate the visual quality of the area. Street trees and plantings are proposed to be installed along the corridor to increase traffic calming and soften the harshness of the predominantly open area dominated by hard surfaces such as concrete and asphalt. ADA accessible sidewalk will be provided across Hill Street. This project will be to develop construction documents and actual construction of the improvements.

Project Location	Main and Bridge Street, including Uncle Sam Bridge
Estimated Cost	Cost estimates to be prepared as part of Streetscape Enhancement Plan
Potential Funding Sources	NYSDOS EPF LWRP, NYS HCR Main Street Program
LWRP Policies	1, 2, 4, 5
Benefits	Improve quality of life for residents, increase tourism opportunities, advance economic development.
Timeframe	Estimated one year to prepare Streetscape Enhancement Plan, including public participation. Implementation schedule provided as part of plan.
Regulatory Requirements	SEQRA, other permits/regulatory approvals will be identified in advance of construction. The Village has jurisdiction over the project.
Project Concepts	



Main Street Enhancements



Bridge Street Enhancements

From Summary Design Report, Downtown & Waterfront Enhancements, September 20, 2013

Project Description

The ideal “Complete Street” with accommodations for pedestrians, bicyclists, transit, and automobiles. Courtesy of AARP Bulletin.

“Complete Streets” are streets for everyone. Complete Streets enable safe access for all users, including pedestrians, bicyclists, motorists and transit riders of all ages and abilities. The Village has an overall Complete Streets plan outlined in its *Comprehensive Plan*, adopted in February 2020. The importance of Complete Streets including an enhanced sidewalk system was reaffirmed by the community during the LWRP planning process.

This project would develop a Complete Streets policy that encourages the community to take into consideration the safety needs of all users including motorists, pedestrians, bicyclists, those with mobility impairments, students, the elderly, and transit riders when improvements are made to local roadways. The Village’s Street system would be analyzed to identify improvements that can be made with the goal of achieving Complete Streets standards wherever possible. The project would then invest in a variety of complete streets enhancements. Potential project elements include:

- walkability and safety enhancements for people of all ages and abilities
- improved and expanded sidewalks from Main Street to connect all local anchors, including Dutchman’s Landing, and neighborhoods
- targeted traffic calming measures on Main Street such as creative crosswalks, lane markings, and placement of public art
- streetscape enhancements such as undergrounding of overhead utilities, facade improvements, building retrofits, and period lighting on Main Street, West Bridge Street, and other areas as needed
- bicycle improvements, focusing on routes to and from the waterfront, parks, and schools
- green infrastructure such as trees and bioswales that create more attractive, comfortable urban climates while reducing stormwater runoff and improving air quality

Project Location	Catskill WRA
Estimated Cost	N/A
Potential Funding Sources	NYS DOT
LWRP Policies	1, 2, 4, 5
Benefits	The project will connect the waterfront, recreational resources, downtown, and neighborhoods through pedestrian and bicycle infrastructure improvements on village streets and trails. It would enhance pedestrian and cyclist safety while incorporating sustainability, accessibility, and safe routes to school best practices.
Timeframe	Complete Streets policy to be adopted in 2026
Regulatory Requirements	No regulatory requirements to adopt Complete Streets policy. SEQRA, other permits/regulatory approvals will be identified in advance of implementation. The project would focus on village-owned roads.

9

Advance Pedestrian Connections to Hudson River Skywalk

Project Description

This project seeks to capitalize on the Hudson River Skywalk, the Thomas Cole House, and a vacant village-owned parcel with Hudson River access to create a comprehensive tourist route and community space with frontage on two bodies of water: the Hudson River and the Catskill Creek.

The project would link the Hudson River Skywalk to the downtown waterfront by creating a well-marked route through village streets to the Greenway Trail and Dutchman's Landing. The route would begin where the Skywalk ends at the Thomas Cole House and follow the sidewalks on Spring Street, Day Street, Woodland Avenue, William Street, and Prospect Avenue where it turns toward the Hudson River on the village easement through the St. Anthony's Friary property. Here the route would follow the Greenway Trail, which takes hikers to the river's edge and on to Dutchman's Landing Park. This route had previously been designated part of the Catskill Walking Tour. The project would also enhance a vacant village-owned area on the waterfront where the route connects to Dutchman's Landing Park.

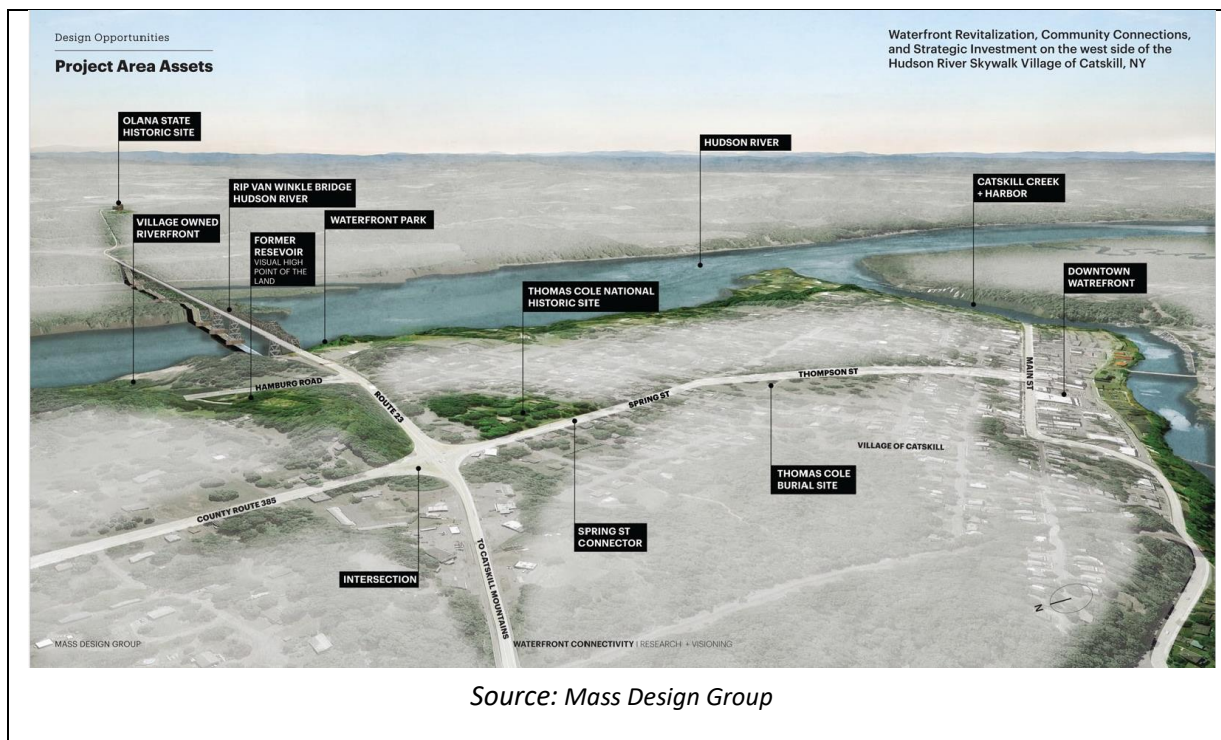
The project would include design, permitting, and ultimately construction. The design phase would entail a site investigation, feasibility study, and community conversations to develop a community-supported concept design. The implementation phase is expected to include sidewalk improvements

and crosswalks on village-owned streets, including those for ADA accessibility where possible; scenic gateway amenities at the NYS Route 23 intersection; trail improvements; signage and route markings; and improvements to vacant village land on the waterfront.

Providing safe pedestrian connections between the Skywalk and downtown Catskill was identified as a priority during public outreach for the LWRP and Catskill BOA. Skywalk and Thomas Cole House visitors are often from cities and expect walkable destinations. The project will funnel growing numbers of tourists at the Thomas Cole Site and Hudson River Skywalk straight to Main Street businesses. Additionally, creating safe, walkable connections will reduce car-dependence for residents, helping to reduce emissions and improve livability.

Project Concepts





Project Location	NYS Route 23 intersection, Spring Street, Day Street, Woodland Avenue, William Street, Prospect Avenue, Greenway Trail, Dutchman's Landing area
Estimated Cost	\$500,00 to \$2,000,000
Potential Funding Sources	NYS DOT
LWRP Policies	1, 4, 5, 9
Benefits	Improved pedestrian safety, enhanced tourism, connection between cultural and historic assets and the downtown waterfront.
Timeframe	The sites included in this project are ready for development and permits. Once permits are in place, construction could be complete in approximately 24 months.
Regulatory Requirements	TBD. The project is located primarily on village roads, easements, and properties. Partnership with Greene County (Spring Street) and NYS DOT (Route 23 intersection) would be necessary.

Project Description

This project would explore transportation options (shuttle, trolley) to connect visitors from the waterfront to the downtown, Route 9W shopping areas, and local cultural, historic and natural tourism assets. Specifically, the village would explore purchasing/renting a shuttle bus, hiring drivers, and establishing a system for either on-call or schedule transportation from the harbor area, including Dutchman's Landing, to the downtown and Route 9W shopping areas. The shuttle could capture the business of transient boaters by providing them with access to the village's shopping areas to restock supplies.



Project Location	Waterfront, downtown, Route 9W and tourist destinations
Estimated Cost	\$20,000 – 50,000
Potential Funding Sources	NYS DOT, NYS DOS EPF LWRP
LWRP Policies	1, 19
Benefits	Connect visitors from the waterfront to downtown Catskill, improve quality of life for residents and visitors, advance economic development.
Timeframe	Estimate six months to appoint committee, explore options, and determine preferred option.
Regulatory Requirements	N/A

Project Description

The Village of Catskill will continue combined sewer outflow (CSO) elimination by separating storm and sanitary sewers to protect water quality in the Catskill Creek and Hudson River.

CSO systems are designed to collect stormwater and wastewater in the same pipe. During dry weather, these pipes transport wastewater to a treatment plant, where it is treated to strict standards before being discharged to a creek or river. During periods of intense rainfall, however, the combined wastewater and stormwater volume in combined sewer systems can exceed the pipe's capacity.

The Village of Catskill once had 25 CSOs and aggressive efforts at elimination through separating sanitary and storm sewer lines has reduced that number to four active, permitted CSOs. The village's efforts have also significantly reduced flow to the treatment plant, which increases its capacity to support new development.

This project would eliminate the remaining four CSOs.

Project Location	WRA wide
Estimated Cost	\$2.9 million
Potential Funding Sources	NYS Clean Water, Clean Air and Green Jobs Environmental Bond Act, NYS DEC, NYS Environmental Facilities Corporation (EFC) Water Infrastructure Improvement (WIA) and Intermunicipal Grants (IMG) programs
LWRP Policies	33, 34
Benefits	Manage stormwater runoff, reduce potential flood risk, and improve water quality.
Timeframe	Long-term. Dependent on grant cycles.
Regulatory Requirements	Required permits will be identified as part of project development.

Additional Development Projects

12. Redevelopment of LUMBERYARD waterfront area

The former Dunn Builder's Supply property on Catskill Creek was purchased in 2015 by a non-profit organization and partially redeveloped. The building at Sixty-two Water Street is now a state-of-the-art black box theater with housing for artists in residence, and a courtyard with bar and gallery space known as the LUMBERYARD. The property owner has expressed interest in collaborating with the village to redevelop the remaining waterfront properties to create a vibrant activity hub for the region.

This project would transform the three vacant waterfront parcels adjacent to the LUMBERYARD Production and Performance Space into a vibrant community focal point. The redeveloped parcels would feature ferry dockage linking downtown Catskill with neighboring riverfront communities, slips for small transient boaters who will then have easy access to Catskill's downtown shopping and eating destinations, and a Creekside Plaza for community use. The three small buildings with waterfront access could be suitable for retail, restaurant, and studio/office use. Any redevelopment of this area would consider sea-level rise.

The first step for this project is to partner with the LUMBERYARD to explore potential commercial uses for the three waterfront buildings. A project team that includes Greene County and the state will be needed to assist with the planning, permitting, and financial incentives in terms of grants and financing arrangements to entice developers to help complete this project.



Redevelopment Concept Plan for the LUMBERYARD area from the 2017 Catskill BOA Study

To advance the redevelopment process, the village will apply for co-funding through the NYS DOS Brownfield Opportunity Program to complete an Implementation Plan. The Implementation Plan will include site specific redevelopment strategies, priorities for redevelopment, site assessments, assembling a redevelopment portfolio, and marketing to attract investors.

As the project progresses, additional funding may be needed to support redevelopment of the property including public access points on Catskill Creek and connections to downtown.

This project was originally conceived in the Village of Catskill's *Downtown and Waterfront Revitalization Strategy*, 2010 and included in the village's Brownfield Opportunity Area Nomination, Phase II, 2017. The desire to pursue the project was reconfirmed through the LWRP planning process.

13. Relocate County Highway Facility

The Greene County Highway Facility is located on 241 West Main Street on prime waterfront property. Relocating the facility will require negotiations between the Village and the County, the identification of a more suitable location, and likely construction of a new highway facility as well as demolition or repurposing of the existing facility for a more suitable water dependent or water enhanced use.

14. Feasibility analysis to relocate Main Brothers Oil Company

Relocating the Main Brothers Oil Company, which also operates under the name Main Care Energy, facility including the large oil tanks will create the opportunity for an additional water-dependent use or water-enhanced use and public access at the Catskill Point. Currently these tanks are located at 15 Main Street, along the shoreline of Catskill Creek.



Existing Conditions: Main Care oil tanks along Main Street, near Historic Catskill Point

For the facility to be relocated, the Village of Catskill will have to work with Main Care to identify suitable relocation sites as well as funding to remove the existing oil tanks.

This project is to conduct a feasibility analysis to assist in identifying alternative locations for the business and outline a relocation process to ensure minimal disruption to the business. The village has had an initial discussion with Main Care to discuss possible relocation.

15. Design and install wayfinding signage to reinforce connections between waterfront and the downtown.

Wayfinding signage is a community asset that connects visitors to key destinations while improving the attractiveness of a place. To ensure that visitors and transient boaters who use the marinas are aware of and have easy access to the businesses along Main Street, signage and enhanced pedestrian connections are needed.



Existing Catskill Walking Tour Trailhead Sign at Dutchman's Landing Park

This project proposes that the Village of Catskill update its wayfinding signage to reinforce the pedestrian connection between the Dutchman's Landing Park, Catskill Creek waterfront, existing marinas and the downtown. The signage could indicate walk time rather than distance.

16. Design and implement gateway enhancements.

Gateways are areas where visitors experience a critical first impression of a community. Pleasing, welcoming gateways with quality landscaping and signage entice those travelling through to stop and explore.

This project would identify suitable locations for village gateway improvements and develop design concepts for implementation including signage and landscaping. The *Catskill Downtown and Waterfront Revitalization Strategy* identified the need for village gateway enhancements along Upper and Lower Main Street. Additional

potential gateway areas include the intersections of NY Routes 23 and Spring Street, Main Street, and NY Route 9W and NY Route 9W and Bridge Street. The value of these enhancements for improving public access and attracting business to the WRA was reconfirmed in the LWRP planning process.



Concept for Gateway Enhancement of Upper Main Street
Source: Catskill Downtown and Waterfront Revitalization Strategy

17. Update municipal water, stormwater and wastewater systems.

The Village has identified several improvements to the Village's water, stormwater and wastewater systems that will ensure future water quality, quantity, and system reliability.

Improvements to the water system include:

- upgrades to the distribution system including a new transmission line from the water source,
- a new pump station,
- a new storage tank closer to the actual service area, and
- a new ground water source.

Improvements to wastewater systems include evaluation options to Wastewater Pump Station 1 to address bends in the discharge piping that constrict the flow and reduce the efficiency of the pump station.

18. Participate in the NYS OPRHP Certified Local Government (CLG) program.

The Certified Local Government (CLG) Program encourages municipalities to enact laws that provide for local review of development proposals that impact historic buildings. By becoming a CLG, the Village of Catskill would be eligible for grant monies for property research and education about historic preservation.

FLOODING AND EROSION PROJECTS

The goal of the proposed projects identified in the Flooding and Erosion policy area is to decrease impacts of flooding and sea-level rise within the Catskill WRA.

First Priority Flooding and Erosion Projects

19 Shoreline Protection Measures along Catskill Creek	
Project Description	
<p>The NYS Department of Environmental Conservation (DEC) describes shoreline erosion as, “a natural process that occurs on lakes, streams, rivers and along the coast. It is the gradual, although sometimes rapid, removal of sediments from the shoreline. It is caused by a number of factors including storms, wave action, rain, ice, winds, runoff, and loss of trees and other vegetation.”</p> <p>The Village of Catskill recognizes that the deterioration of shoreline stabilization measures along Catskill Creek will have major impacts on the residential, commercial and public facilities located along the creek as well as deleterious effects on the village itself.</p> <p>The intent of this project is to develop and implement shoreline protection measures along Catskill Creek. Specifically, the village will develop a shoreline protection plan to develop potential repair/replacement scenarios, work with regulatory agencies to streamline the permitting process, and evaluate the need for the village management of the shoreline. Components include evaluation of non-structural measures as well such as relocating potentially affected infrastructure which may eliminate the need for shoreline alterations. Protection measures may include nature-based solutions or conventional shoreline armoring.</p>	
Project Location	Catskill Creek
Estimated Cost	Cost estimates would be prepared as part of shoreline protection plan.
Potential Funding Sources	NYS DOS EPF LWRP, NYS DEC, NYS Clean Water, Clean Air and Green Jobs Environmental Bond Act
LWRP Policies	13, 14
Benefits	Manage stormwater runoff and reduce potential flood risk.
Timeframe	Estimate one year to complete Phase 1 (evaluate and develop shoreline protection measures).

Regulatory Requirements	Required permits will be identified as part of shoreline protection plan.
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Additional Flooding and Erosion Projects

20. Implement incomplete village-wide actions recommended in the 2014 *Resilient Catskill* report

The 2014 *Resilient Catskill, Report of the Waterfront Resilience Task Force* includes recommendations to create a safer, more resilient and vibrant Catskill waterfront. Significant progress has been made on implementing the report's recommendations. This project would implement the remaining, incomplete, village-wide recommendations:

1. Design and install high-watermark signs in the waterfront area to educate the community about flood risk and sources of flood preparedness informational resources.
2. Invite agencies or experts to give public outreach presentations on storm preparedness and flood-mitigation options for families, businesses, institutions, structures and facilities, including funding opportunities when applicable.
3. On an annual basis, direct property owners and residents of current and projected future floodplains to the village's informational resources about flooding and emergency preparedness.
4. Support regular training for the village floodplain manager.
5. Integrate resilience considerations into municipal operations, including by
 - Incorporating phased adaptation of infrastructure to flooding and sea level rise capital improvement planning
 - Incorporating cost-benefit analyses and long-term flood risk due to sea level rise and stronger storms into asset design and the prioritization of strategies to manage key municipal assets.
 - Creating orientation materials on resilience for newly elected/appointed municipal representatives

21. Conduct neighborhood planning for sea level rise and future flooding

This project will develop and consider adaptation alternatives for eight neighborhoods along Catskill's waterfront (see map provided below). The neighborhoods are segments of the waterfront united by their physical conditions, uses, assets and populations.

The project would be to fund consultants to work with the public to determine preferred approaches to mitigate the impact of flooding in each neighborhood. For each neighborhood, the project would compile up-to-date sea level rise scenarios and present these to the public and neighborhood stakeholders to increase their understanding of the threat of future flooding and sea level rise. Socially vulnerable populations would be

kept informed and included in public discussions. Adaptation alternatives would be identified and discussed through a public engagement process. Engineering information would be gathered as needed to inform the adaptation concepts. The concepts would consider incorporating site-based recommendations provided for each neighborhood in the 2014 *Resilient Catskill* (Table 10). Once the neighborhood planning for sea level rise and future flooding study has been conducted, the village should review their existing zoning code to see if it needs to be updated.



Catskill's Waterfront Neighborhoods, 2014 *Resilient Catskill* Report

22. Increase flood resiliency of the Wastewater Treatment Plant Pump Stations 1 and 3.

As identified in its *Risk and Engineering Review of the Wastewater Treatment Plant and Pumping Stations*, and this LWRP, pump stations 1 and 3 are currently vulnerable to flooding. This project would implement the recommended improvements from the engineering review to increase the resiliency of the pump stations. Improvements would include:

- Pump Station 1 - rebuild and dry proof to a higher elevation, install automatic controls, and reconfigure the piping after the pump station to resolve several bends that restrict flow.
- Pump Station 3 – dry proof and elevate the structure including the first floor, access door, and surrounding ground surface

4.4 Implementation Matrix

The Village of Catskill has made a substantial commitment to the community, property owners and other stakeholders by undertaking the LWRP planning process. For this strong commitment to have a positive impact, it is critical for recommended action items to be implemented. To assist in the implementation, an Implementation Matrix was prepared. The matrix identifies a project champion, potential partners and funding sources, relative cost, and a general timeline for each recommended project.

The following time frames were assigned to each of the recommended projects:

- Immediate (Year 1)
- Short Term (Years 2-5)
- Long Term (Years 6-10)
- Ongoing

A copy of the matrix is included in the Appendices for ease of use.

Table 12. Catskill LWRP Implementation Matrix.

LWRP Projects, organized by topic area and priority		Project Champion	Potential Partners	Project Cost	Potential Funding Sources	Timeframe and Priority*			
						Immediate	Short-Term	Long-Term	Ongoing
Parks, Recreation and Public Access - First Priority Projects									
1	Upgrade facilities at Dutchman's Landing Park	Village	NYS DOS, NYS OPRHP, Greene County	\$\$	NYS DOS EPF LWRP, NYS OPRHP, Greene County	✓			
2	Improve the former waterfront “Park for Paws”	Village	Dog Park Committee,	\$	NYS DOS EPF LWRP, NYS OPRHP		✓		
3	Conduct a study to evaluate transient boater dock space	Village	Private marinas, Greene Co Econ Dev, Foreland, Lumberyard	\$	NYSDOS EPF LWRP		✓		
4	Improve Historic Catskill Point in partnership with Greene County	Greene Co	Village	\$\$\$	Greene County, NYS OPRHP EPF, NYS DOS EPF LWRP	✓			
Parks, Recreation and Public Access - Additional Projects									
5	Redevelop vacant and underutilized waterfront properties	Village	Greene Co., private property owners	\$\$\$	Greene County, NYS OPRHP EPF, NYS DOS EPF LWRP				✓

6	Create new pocket parks along Catskill Creek	Village	Private property owners, DEC, Greene SWC	\$\$	NYSDOS EPF LWRP		✓		
Development - First Priority Projects									
7	Implement streetscape enhancements	Village	NYS DOT, Smart Growth Program	\$\$	NYSDOS EPF LWRP, NYS HCR Main Street Program		✓		
8	Adopt and implement a Complete Streets policy	Village	NYS DOT, Smart Growth Program	\$\$	NYSDOS EPF LWRP, NYS DOT	✓			
9	Advance pedestrian connections to the Hudson River Skywalk.	Village	Village budget for sidewalks, NYS DOT	SS	NYSDOS EPF LWRP, NYS DOT		✓		
10	Transportation Connections Study	Village	Greene Local Development Corporation (GLDC), Greene Co Transit - willing to expand route.	\$	NYS DOT, NYS DOS EPF LWRP		✓		
11	Combined Sewer Overflow (CSO) elimination.	Village	Consulting firm, grants, DEC, EFC,	\$\$	NYS Environmental Bond Act, NYS DEC, NYS EFC (WIA and IMG programs)		✓		
Development - Additional Projects									
12	Redevelopment of LUMBERYARD waterfront area	Village	Private property owners, DOS BOA	\$\$\$	NYS DOS, Private, Greene County				✓
13	Relocate County highway facility	Greene Co	Village of Catskill, Greene County	\$\$	NYSDOS EPF LWRP		✓		
14	Feasibility analysis to relocate Main Brothers Oil Company	Village	Main Care	\$	NYSDOS EPF LWRP		✓		
15	Design and install wayfinding signage to reinforce connections between marinas and the downtown.	Village	Private businesses, Greene Co Chamber of Commerce	\$	NYSDOS EPF LWRP		✓		
16	Design and implement gateway enhancements.	Village	Cultivate Catskill, DOT, Bridge Authority	\$\$	NYSDOS EPF LWRP		✓		
17	Update municipal water, stormwater and wastewater systems.	Village	n/a	\$	NYSDOS EPF LWRP				✓

18	Participate in the NYS OPRHP Certified Local Government (CLG) program.	Village	OPRHP	\$	NYS OPRHP		✓		
Flooding and Erosion - First Priority Projects									
19	Shoreline protection measures along Catskill Creek.	Village	Greene Co SWCD, private property owners	\$\$	NYS DOS EPF LWRP, NYS DEC, NYS Environmental Bond Act	✓			
Flooding and Erosion - Additional Projects									
20	Implement incomplete village-wide actions recommended in the 2014 <i>Resilient Catskill report</i>	Village - Appt Committee	Climate Smart Committee	\$\$	NYS DOS, NYS DOS EPF LWRP, NYS DEC, NYS Environmental Bond Act				✓
21	Conduct neighborhood planning for sea level rise and future flooding	Village	Greene Co, Climate Smart Committee, Planning Board, Zoning Board	\$	NYS DOS EPF LWRP, NYS DEC, NYS Environmental Bond Act		✓		
22	Increase flood resiliency of the Wastewater Treatment Plant Pump Stations 1 and 3.	Village	Greene Co	\$\$	NYS Environmental Bond Act, NYS DEC, NYS EFC, NYSDOS EPF LWRP				✓



5 Local Implementation Techniques

This section of the Catskill Local Waterfront Revitalization Program (LWRP) details local laws and regulations that are necessary or recommended to support the implementation of the LWRP.

This section of the LWRP sets out laws and sections of the village code that relate to the LWRP Policies, and other village actions necessary to support the LWRP policies and implementation strategies. Means by which to implement the LWRP include:

- The enforcement of existing laws and regulations supporting the LWRP;
- Other Public and Private Actions Necessary to Implement the LWRP;
- Identifying a Local Management Structure Implementing the Approved LWRP;
- Guidelines for Notification and Review of State and Federal Agency Actions;
- Establishment of local review regulations that evaluate proposed projects for consistency with the LWRP policies; and
- Identification of financial resources available to fund projects and programs of the LWRP.

5.1 Necessary Local Laws and Regulations

Local laws and regulations are the basic means of enforcing provisions of the LWRP. The enforcement of these laws and regulations helps assure the long-term beneficial use of the waterfront.

EXISTING LAWS AND REGULATIONS NECESSARY FOR IMPLEMENTING THE LWRP

Village of Catskill Zoning Law

The Village of Catskill has a Zoning Law that was updated and revised in 2022, which regulates land use under a combination of traditional zoning provisions.

The purpose of the zoning regulations is to protect and enhance the physical and visual environment of the Village of Catskill and for the protection, control, order, safety, health, and well-being of people and property within the Village of Catskill. In addition, it is the general purpose of the Catskill Village Zoning Regulations that, in the interest of protecting and promoting the public health, safety, and well-being of people and property within the Village, the following additional purposes are to be provided for through implementation of the provisions of this local law:

1. The facilitation of the efficient and adequate provision of public facilities and services;
2. The provision of privacy for families;
3. The prevention and reduction of traffic congestion and provision of safe and adequate pedestrian and vehicular traffic access to uses generating large volumes of such traffic;
4. The maximum protection of residential areas;
5. Consideration of existing uses to minimize the number of non-conforming uses in the village.
6. The gradual elimination of non-conforming uses;
7. The protection of business areas by encouraging their use in the rendering of service to residents of the community and region, by discouraging their use for industrial purposes and by limiting the size of

buildings so as to prevent injury to business which would be caused by over-congestion of traffic and parking;

8. To protect, preserve, and enhance sensitive environmental areas, prevent soil erosion, sedimentation, and slope failure;
9. To prevent, to the maximum extent possible, the loss, alteration, or diminution of public views of the Hudson River and Catskill Creek and opposite shores;
10. To prevent activities that will cause water and air pollution;
11. To promote the policies and purposes of the "Catskill Local Waterfront Revitalization Program," including positive development and revitalization of certain areas of the Village's waterfront areas, while ensuring that such revitalization takes place in a manner which is sensitive to the Village's coastal and community resources;
12. To provide future generations of Village residents with a continuation of those elements and resources of the Village that serve to create a distinct community character and strong sense of place for its residents; and
13. To encourage an economic stimulus of the Village by providing the standards and procedures for well-designed, comprehensively planned development that achieves a high standard of site planning and architectural design throughout the Village.
14. Maintenance of historic character, property value, and tourism potential through the containment of sprawl, prohibition of indiscriminate lighting, signage, and incompatible new construction and preservation of historic buildings.
15. Preventing or reducing the harmful secondary effects of adult entertainment uses through least restrictive alternatives.
16. Safe provision of personal wireless services, or functional equivalent services, and telecommunication towers consistent with applicable federal and state regulations, while at the same protecting natural features and aesthetic character of the village.

This Zoning Law is intended to implement the Vision of the Village of Catskill's Comprehensive Plan, which is to help Catskill realize the community's visions for the future and to guide growth in a manner that fosters orderly, coordinated and beneficial development that will continue to make Catskill an attractive place to raise a family, visit and do business.

There are eight zoning districts included within the Village of Catskill's WRA:

One-Family Residence (R-1) – The purpose of this district is to maintain residential areas that are less densely settled and scaled for larger lot sizes often located adjacent to the river where shoreline protection is considered.

General Residence (R-2) - The purpose of this district is to maintain the Village's more densely settled residential areas that provide a variety of housing options while preserving the historic scale and character of the Village.

Commercial Residence (R-3) - The purpose of this district is to provide for a variety of residential, retail and service uses at a higher density which is protective of the existing development pattern, walkable scale and traditional residential character of the neighborhoods and gateway corridors.

Central Commercial (CC) - The purpose of this district is to encourage a vibrant mix of compatible uses in the Village central business area of Main, West Bridge, Bridge Streets with development considerations that preserve the traditional aesthetic character of the Village and promote an interactive, walkable environment for residents and visitors.

Commercial (C-1) – The purpose of this district is to encourage a variety of commercial development options.

General Commercial District (C-2) – The purpose of this district is to provide for less dense commercial development near the railroad line.

Waterfront District (WD) – It is the purpose of the Waterfront District to afford priority to compatible, well-designed water dependent uses, achieve suitable public access to the coastal area considering surrounding uses, control development, and protect and enhance the corridor's natural and cultural resources. Further, it is the purpose of the Waterfront District to provide opportunities for more permanent public views and compatible access to Catskill Creek while considering the impacts of public access on immediately surrounding land uses, and to implement the policies and purposes of the Village of Catskill LWRP.

Waterfront Overlay District (WOD) - It is the purpose of the Waterfront Overlay District to afford priority to waterfront-compatible, well-designed uses, achieve public access to the coastal area, control development, and protect and enhance the Hudson River waterfront's natural, scenic, and cultural resources. Further, it is the purpose of the Waterfront Overlay District to provide opportunities for permanent public views and access to the Hudson River and to implement the policies and purposes of the Village of Catskill LWRP.

Generally, each zoning ordinance can be characterized as cumulative, meaning that uses permitted in one district are permitted in subsequent districts. More details are provided in Section 2 of the LWRP.

The Village Zoning Law includes Site Plan Review by the Planning Board. The purpose of the Site Plan Review is to evaluate various land uses that may cause a conflict with coastal area policies, natural site conditions, existing development, and community character, thereby minimizing the adverse effects concerning the health, safety, and general welfare of Village residents.⁸¹

Section 4.3.3 states that Site Plan Review and approval by the Planning Board shall be required prior to commencement of new building construction, expansion in exterior building dimensions, or a change in use for all uses in all districts, except for (1) Home Occupation or Professional Office where permitted, which involves no new construction or expansion, (2) keeping livestock, not for commercial gain and where permitted, and truck farming, (3) accessory structures where permitted, and (4) permitted municipal uses.

Site plan review and approval will not be required for proposed actions involving normal and routine building maintenance, unless the Village Code Enforcement Officer determines that such proposed activity is of such a

⁸¹ Village of Catskill Zoning Regulations

nature that site plan review should occur and would serve to benefit the public interest of the Village and of the neighborhood where such activity is proposed.

Article 5 of the Village's Zoning Regulations discusses the review process for historic properties. The purpose of this review process is to conserve, protect, enhance, and preserve historic sites which are listed on, contribute to, nominated for or eligible for inclusion on the National, State or County Registers of Historic Places or have been identified by the Village of Catskill as being historically significant and/or locally important. The Planning Board shall review historic properties prior to the issuance of a building permit, demolition permit, certificate of occupancy, addition or reduction of existing square footage, alteration of windows, doors, siding, facade, or other exterior historical details. The Planning Board shall also review the development of any properties which are substantially contiguous to, or across the street from, a herein identified historic property, provided that the proposed development is first time construction or a change of use, and not the alteration of, or addition to, an existing structure.

To administer the code, the Village established a Zoning Board of Appeals (ZBA) and a Planning Board. The ZBA has appellate jurisdiction (i.e., variance requests and appeals) for all matters pertaining to the zoning ordinance and the Planning Board has jurisdiction for all matters pursuant to Site Plan Review, Special Permits, and Subdivisions.

Amendments to Zoning Laws

The Village of Catskill recently adopted a revised zoning and subdivision law in 2023. Any future zoning laws in the Village will be formulated or amended to ensure consistency with the LWRP and the HMP. These zoning laws would potentially include regulations related to siting and site plan review, integrating green infrastructure practices, flooding and erosion control, protecting natural and scenic resources, and preserving cultural and historic resources.

Supplementary Regulations

Article 4.18 of the Village of Catskill's Zoning Ordinance discusses the regulations for Solar Panels under the Supplementary Regulations section. The village is concerned with the aesthetic and placement of solar panels within the Village.

Subdivision Law

The Board of Trustees is to require every owner of real property in the village who subdivides real property to seek and obtain the approval of the Planning Board for that subdivision and to file the map and record of the subdivision in the office of the County Clerk of Greene County. The regulations are intended to provide for the orderly growth and development of the village and to assure the preservation of the environmental aesthetics and assets of the village, as well as the comfort, convenience, safety, and health and welfare of the residents and property owners of the village, their families, and their guests.

Flood Damage Prevention Law

It is the purpose of this local law to promote public health, safety, and general welfare, and to minimize public and private losses due to flood conditions in specific areas by provisions designed to:

1. regulate uses which are dangerous to health, safety and property due to water or erosion hazards, or which result in damaging increases in erosion or in flood heights or velocities;
2. require that uses vulnerable to floods, including facilities which serve such uses, be protected against flood damage at the time of initial construction;
3. control the alteration of natural floodplains, stream channels, and natural protective barriers which are involved in the accommodation of flood waters;
4. control filling, grading, dredging and other development which may increase erosion or flood damages;
5. regulate the construction of flood barriers which will unnaturally divert flood waters or which may increase flood hazards to other lands, and;
6. qualify and maintain for participation in the National Flood Insurance Program.

NEW LAWS AND REGULATIONS NECESSARY FOR IMPLEMENTING THE LWRP

Local LWRP Waterfront Consistency Review Law

Actions to be directly undertaken, funded, or permitted within the Catskill WRA must be consistent with the policies set forth in the Village of Catskill LWRP. The Catskill Waterfront Consistency Review Law provides the framework for the Village of Catskill to consider policies and purposes contained in the LWRP when reviewing its actions, and to assure that such actions are consistent with the intent of the LWRP. A Waterfront Assessment Form is part of the law and helps in assessing the impact of an action on the waterfront. The Waterfront Consistency Review Law and Waterfront Assessment Form can be found in the Appendices.

Laws to Implement Harbor Management Plan

There are currently no new water uses proposed by the LWRP or HMP. Should new water uses be proposed in the future for the harbor area, a local law or ordinance would be adopted to support these uses. The law could be a standalone law or could be adopted as an amendment to an existing law or groups of laws (e.g., zoning ordinances).

5.2 Other Public and Private Actions

The Village of Catskill will partner with several public and private entities to implement the policies and projects described in this LWRP. The entities include:

- Empire State Development
- Greene County
- Greene County Department of Planning and Economic Development

- Greene County Industrial Development Authority
- Greene Land Trust
- Greene County Regional Chamber of Commerce
- Greene County Soil and Water Conservation District
- Hudson River Valley Greenway
- New York 211 Helpline
- NYS Department of Environmental Conservation (DEC)
- NYS Department of Health (DOH)
- NYS Department of State (DOS)
- NYS Department of Transportation (DOT)
- NYS Division of Homeland Security & Emergency Services (DHSES)
- NYS Environmental Facilities Corporation (NYSEFC)
- NYS Office of Parks, Recreation & Historic Preservation (OPRHP)
- NYS Volunteer Organizations Active in Disaster (VOAD)
- Riverkeeper
- US Army Corps of Engineers
- US Department of Agriculture
- Village of Catskill

5.3 Local Management Structure

LOCAL MANAGEMENT STRUCTURE FOR IMPLEMENTING THE APPROVED LWRP

All state actions proposed within the Village of Catskill WRA shall be reviewed for consistency with the policies of the LWRP and HMP, and in accordance with the guidelines established by the New York State Department of State. A number of village agencies or local officials are responsible for management and coordination of the LWRP and are directly involved in ensuring that consistency reviews are completed for projects within the WRA. These agencies or officials, with their responsibilities are:

President - The President of the Village will provide overall management of the LWRP and the Harbor Management Plan. The President, with support of the Village Board, will apply for funding to implement project and programs identified in the LWRP and HMP.

Code Enforcement Office - The Code Enforcement Officer shall be responsible for overall implementation and coordination of the LWRP. In performing this task, the Code Enforcement Officer shall:

1. Inform the Village Board of Trustees on implementation, priorities, work assignments, timetables, and budgetary requirements of the LWRP.
2. Make applications for funding from state, federal, or other sources to finance projects under the LWRP.

3. Coordinate and oversee liaison between village agencies and departments, to further implementation of the LWRP.
4. The Code Enforcement Officer will also coordinate with NYS Department of State (DOS) regarding consistency review for actions by state or federal agencies. Coordination shall include providing an informal opinion on the proposed action to DOS, at DOS's request, within 15 days of said request, regardless of any requirement for a local consistency decision.
5. Prepare an annual report on progress achieved and problems encountered in implementing the LWRP and recommend actions necessary for further implementation to the appropriate Village Board of Trustees.
6. Perform other functions regarding the waterfront revitalization area and direct such actions or projects as are necessary, or as the Village Board of Trustees may deem appropriate, to implement the LWRP.
7. Issue summons for violations of the Village of Catskill Waterfront Consistency Review Law.

Village Clerk - Correspondence, communications, and record keeping for Village government actions pertaining to the implementation of the LWRP and HMP will be the responsibility of the Village Clerk. Applicants can obtain waterfront assessment forms from the Village Clerk's office.

Village Board of Trustees - The Village Board will prepare, or cause to prepare, applications for funding from state, federal, or other sources to finance projects under the LWRP. The Village Board will coordinate review of actions in the village's waterfront area for consistency with the LWRP, and will advise, assist and make consistency recommendations to other Village departments in the implementation of the LWRP, its policies and projects, as well as coordinate with the New York State Department of State regarding consistency review of actions by federal agencies and with state agencies regarding consistency review of their actions.

GUIDELINES FOR NOTIFICATION AND REVIEW OF STATE AGENCY ACTIONS WHERE LOCAL WATERFRONT REVITALIZATION PROGRAMS ARE IN EFFECT

I. Purpose of Guidelines

- A. The Waterfront Revitalization of Coastal Areas and Inland Waterways Act (the Act) (Article 42 of the Executive Law) and the Department of State's regulations (19 NYCRR Part 600) require certain state agency actions identified by the Secretary of State to be consistent to the maximum extent practicable with the policies and purposes of the approved Village of Catskill LWRP. These guidelines are intended to assist state agencies in meeting that statutory consistency obligation.
- B. The Act also requires that state agencies provide timely notice to the Village of Catskill whenever an identified action will occur within an area covered by the Village of Catskill LWRP. These guidelines describe a process for complying with this notification requirement. They also provide procedures to assist local governments in carrying out their review responsibilities in a timely manner.

- C. The Secretary of State is required by the Act to confer with state agencies and the Village of Catskill when notified by the Village that a proposed state agency action may conflict with the policies and purposes of its approved LWRP. These guidelines establish a procedure for resolving such conflicts.

II. Definitions

- A. Action means:
 - 1. A "Type 1" or "Unlisted" action as defined by the State Environmental Quality Review Act (SEQRA);
 - 2. Occurring within the boundaries of the approved Catskill LWRP; and
 - 3. Being taken pursuant to a state agency program or activity that has been identified by the Secretary of State as likely to affect the policies and purposes of the Village of Catskill LWRP.
- B. Consistent to the maximum extent practicable means that an action will not substantially hinder the achievement of any of the policies and purposes of the approved Village of Catskill LWRP and, whenever practicable, will advance one or more of such policies. If an action will substantially hinder any of the policies or purposes of the approved Village of Catskill LWRP, then the action must be one:
 - 1. For which no reasonable alternatives exist that would avoid or overcome any substantial hindrance;
 - 2. That will minimize all adverse effects on the policies or purposes of the Village of Catskill LWRP to the maximum extent practicable; and
 - 3. That will result in an overriding regional or statewide public benefit.
- C. Local Waterfront Revitalization Program or LWRP means the Village of Catskill LWRP locally adopted by the Village of Catskill and approved by the Secretary of State pursuant to Executive Law, Article 42; which program contains policies on the management of land, water and man-made resources, proposed land uses and specific projects that are essential to program implementation.
- D. Municipal chief executive officer is the President of the Village of Catskill.
- E. Local Program/LWRP coordinator is the Code Enforcement Officer, who is responsible for the preliminary review of proposed actions within the waterfront area for consistency with the approved LWRP and consistency recommendations for the final determination of consistency that will be made by the Village of Catskill.

III. Notification Procedure

- A. When a state agency is considering an action as described above, the state agency shall notify the Village of Catskill.

- B. Notification of a proposed action by a state agency:
 - 1. Shall fully describe the nature and location of the action;
 - 2. Shall be accomplished by use of existing state agency notification procedures, or through an alternative procedure agreed upon by the state agency and Village;
 - 3. Should be provided to the Village Code Enforcement Officer as early in the planning stages of the action as possible, but in any event at least thirty (30) days prior to the agency's decision on the action. The timely filing of a copy of a completed Waterfront Assessment Form (WAF) with the Village President should be considered adequate notification of a proposed action.
- C. If the proposed action will require the preparation of a draft environmental impact statement (EIS), the filing of this draft EIS with the Village Clerk can serve as the state agency's notification to the Village of Catskill.

IV. Local Government Review Procedure

- A. Upon receipt of notification from a state agency, the Village will be responsible for evaluating a proposed action against the policies and purposes of its approved LWRP. Upon request of the Village Code Enforcement Officer, the state agency should promptly provide the Village with whatever additional information is available that will assist the Village of Catskill in evaluating the proposed action.
- B. If the Village cannot identify any conflicts between the proposed action and the applicable policies and purposes of its approved LWRP, it should inform the state agency in writing of its finding. Upon receipt of the Village of Catskill's finding, the state agency may proceed with its consideration of the proposed action in accordance with 19 NYCRR Part 600.
- C. If the Village of Catskill does not notify the state agency in writing of its finding within the established review period, the state agency may then presume that the proposed action does not conflict with the policies and purposes of the approved Village of Catskill LWRP.
- D. If the Village Board notifies the state agency in writing that the proposed action does conflict with the policies and/or purposes of its approved LWRP, the state agency shall not proceed with its consideration of, or decision on, the proposed action as long as the Resolution of Conflicts procedure established in V. Resolution of Conflicts below shall apply. The Village of Catskill shall forward a copy of the identified conflicts to the Secretary of State at the time when the state agency is notified. In notifying the state agency, the Village Board shall identify the specific policies and purposes of the LWRP with which the proposed action conflicts.

V. Resolution of Conflicts

- A. The following procedure applies whenever the Village of Catskill has notified the Secretary of State and state agency that a proposed action conflicts with the policies and purposes of its approved LWRP:
1. Upon receipt of notification from the Village Board that a proposed action conflicts with its approved LWRP, the state agency should contact the Village Code Enforcement Officer to discuss the content of the identified conflicts and the means for resolving them. A meeting of the State agency and Village of Catskill representatives may be necessary to discuss and resolve the identified conflicts. This discussion should take place within 30 days of the receipt of a conflict notification from the Village Board.
 2. If the discussion between the Village of Catskill representatives and the state agency results in the resolution of the identified conflicts, then, within seven (7) days of the discussion, the Village shall notify the state agency in writing, with a copy forwarded to the Secretary of State, that all of the identified conflicts have been resolved. The state agency can then proceed with its consideration of the proposed action in accordance with 19 NYCRR Part 600.
 3. If the consultation between the Village of Catskill representatives and the state agency does not lead to the resolution of the identified conflicts, either party may request, in writing, the assistance of the Secretary of State to resolve any or all of the identified conflicts. This request must be received by the Secretary within fifteen (15) days following the discussion between the Village of Catskill and the state agency. The party requesting the assistance of the Secretary of State shall forward a copy of their request to the other party.
 4. Within thirty (30) days following the receipt of a request for assistance, the Secretary or a Department of State official or employee designated by the Secretary, will discuss the identified conflicts and circumstances preventing their resolution with appropriate representatives from the state agency and the Village of Catskill.
 5. If agreement among all parties cannot be reached during this discussion, the Secretary shall, within fifteen (15) days, notify both parties of his/her findings and recommendations.
 6. The state agency shall not proceed with its consideration of, or decision on, the proposed action as long as the foregoing Resolution of Conflicts procedures shall apply.

PROCEDURAL GUIDELINES FOR COORDINATING NYS DEPARTMENT OF STATE (DOS) AND LWRP CONSISTENCY REVIEW OF FEDERAL AGENCY ACTIONS

I. Federal Agency Activities

- A. After acknowledging the receipt of a consistency determination and supporting documentation from a federal agency, DOS will forward copies of the determination and other descriptive information on the proposed federal activity to the Village Code Enforcement Officer and other interested parties.
- B. This notification will indicate the date by which all comments and recommendations must be submitted to DOS and will identify the Department's principal reviewer for the proposed federal activity.
- C. The review period will be about twenty-five (25) days. If comments and recommendations are not received by the date indicated in the notification, DOS will presume that the municipality has "no opinion" on the consistency of the proposed federal activity with the LWRP policies.
- D. If DOS does not fully concur with and/or has any questions on the comments and recommendations submitted by the municipality, DOS will contact the municipality to discuss any differences of opinion or questions prior to agreeing or disagreeing with the federal agency's consistency determination on the proposed federal activity.
- E. A copy of DOS' "concurrence" or "objection" letter to the federal agency will be forwarded to the Village Code Enforcement Officer.

II. Activities Requiring Federal Licenses, Permits, and Other Regulatory Approvals

- A. DOS will acknowledge the receipt of an applicant's consistency certification and application materials. At that time, DOS will forward a copy of the submitted documentation to the Village Code Enforcement Officer and will identify the Department's principal reviewer for the proposed federal activity.
- B. Within thirty (30) days of receiving such information, Village Code Enforcement Officer will contact the principal reviewer for DOS to discuss: (a) the need to request additional information for review purposes; and (b) any possible problems pertaining to the consistency of a proposed federal activity with the LWRP policies.
- C. When DOS and the Village Code Enforcement Officer agree that additional information is necessary, DOS will request the applicant to provide the information. A copy of this information will be provided to the Village Code Enforcement Officer upon receipt.
- D. Within thirty (30) days of receiving the requested information or discussing possible problems of a proposed federal activity with the principal reviewer for DOS, whichever is later, the Village Code

Enforcement Officer will notify DOS of the reasons why a proposed federal activity may be inconsistent or consistent with the LWRP policies.

- E. After the notification, the Village Code Enforcement Officer will submit the municipality's written comments and recommendations on a proposed federal activity to DOS before or at the conclusion of the official public comment period. If such comments and recommendations are not forwarded to DOS by the end of the public comment period, DOS will presume that the municipality has "no opinion" on the consistency of the proposed federal activity with the LWRP policies.
- F. If DOS does not fully concur with and/or has any questions on the comments and recommendations submitted by the municipality on a proposed federal activity, DOS will contact the Village Code Enforcement Officer to discuss any differences of opinion prior to issuing a letter of "concurrence" or "objection" to the applicant.
- G. A copy of DOS' "concurrence" or "objection" letter to the applicant will be forwarded to the Village Code Enforcement Officer.

III. Federal Financial Assistance to State and Local Governments

- A. Upon receiving notification of a proposed federal financial assistance, DOS will request information on the federal financial assistance from the applicant for consistency review purposes. As appropriate, DOS will also request the applicant to provide a copy of the application documentation to the Village Code Enforcement Officer. A copy of this letter will be forwarded to the Village Code Enforcement Officer and will serve as notification that the proposed federal financial assistance may be subject to review.
- B. DOS will acknowledge the receipt of the requested information and provide a copy of this acknowledgement to the Village Code Enforcement Officer. DOS may, at this time, request the applicant to submit additional information for review purposes.
- C. The review period will conclude thirty (30) days after the date on DOS's letter of acknowledgement or the receipt of requested additional information, whichever is later. The review period may be extended for major federal financial assistance.
- D. The Village Code Enforcement Officer must submit the municipality's comments and recommendations on the proposed federal financial assistance to DOS within twenty days (or other time agreed to by DOS and the Village Code Enforcement Officer) from the start of the review period. If comments and recommendations are not received within this period, DOS will presume that the municipality has "no opinion" on the consistency of the proposed federal financial assistance with the LWRP policies.
- E. If DOS does not fully concur with and/or has any questions on the comments and recommendations submitted by the municipality, DOS will contact the Village Code Enforcement Officer to discuss any differences of opinion or questions prior to notifying the applicant of DOS' consistency decision.

- F. A copy of DOS's consistency decision letter to the applicant will be forwarded to the Village Code Enforcement Officer.

5.4 Financial Resources

The implementation of the projects set forth in this LWRP will require a combination of public and private funds.

LOCAL GOVERNMENT FUNDING SOURCES TO IMPLEMENT THE LWRP

An obligation of Village funds may be necessary for completion of proposed improvements including the development and enhancement of parks, streetscape and infrastructure improvements, and marketing and planning.

Greene County – The Village of Catskill will coordinate with County Departments and agencies to implement the LWRP, including efforts related to planning, water quality, watershed protection, soil and water conservation, historic and cultural preservation, community education and outreach, and emergency services.

Greene County Center for Regional Growth (GCCRG) – Provides businesses with technical assistance and education regarding the application of grants and identifying financial resources for business creation or expansion.

STATE FUNDING SOURCES TO IMPLEMENT THE LWRP

Catskill will seek state funding for the implementation of the LWRP where additional support is needed beyond private and local funding.

NYS Clean Water, Clean Air and Green Jobs Environmental Bond Act – Provides funding to support new and expanded projects across the State to safeguard drinking water sources, reduce pollution, and protect communities and natural resources from climate change. Includes \$150 million in funding for the development of easements. Funding is distributed through various state agencies and programs.

NYS Department of Environmental Conservation (DEC) – Provides funding programs for environmental protection including projects that improve water quality, public health, and natural habitats. Grant programs for municipalities and not-for-profits include:

Water Quality Improvement Project (WQIP) Program- Reimbursement grant program for projects that reduce polluted runoff, improve water quality and restore habitat.

Environmental Justice Community Impact Grant Program - Provides community-based organizations with funding for environmental and public health concerns.

NYS DEC/EFC Wastewater Infrastructure Engineering Planning Grant (EPG) – Provides funding for the preparation of an engineering report including planning activities to determine the scope of water quality issues, evaluation of alternatives, and the recommendation of a capital improvement project.

Climate Smart Communities (CSC) Grant Program - Provides 50/50 matching grants to cities, towns, villages and counties of the State of New York and boroughs of New York City for eligible climate adaptation and mitigation projects.

Nonpoint Source Implementation Grants Program - Provides grants for up to fifty percent (50%) of the cost of eligible nonpoint source water pollution assessment, planning and abatement projects.

Occasionally, grants from the EPF are available through DEC for the prevention and control of invasive species.

NYS Department of State (DOS) - Provides assistance through the **Brownfield Opportunity Areas (BOA) Program** for communities to undertake activities resulting in neighborhood revitalization strategies for areas affected by brownfields or economic distress. The program enables communities to assemble effective strategies to return dormant sites and areas back to productive uses. In addition, pursuant to Title 11 of the Environmental Protection Act, the DOS administers grants from the **New York State Environmental Protection Fund (EPF)** for the implementation of LWRPs.

NYS Office of Parks, Recreation and Historic Preservation (OPRHP) - Administers grants from the **New York State Environmental Protection Fund (EPF)** for park, recreation and historic preservation projects, pursuant to Title 9 of the Environmental Protection Act.

NYS Empire State Development Corporation (ESD) - Program grants and loans are available as incentives to attract commercial development and may be applicable to brownfields development. The Economic Development Fund is the primary funding program. Also funding for Feasibility Studies for economic development projects.

NYS Environmental Facilities Corporation – Supports projects that utilize unique stormwater infrastructure design and create cutting-edge green technologies through the Green Infrastructure Grant Program (GIGP).

The State Revolving Fund Program - One of the largest environmental infrastructure financing programs in the nation. Three primary loans are available through EFC: Bond-Funded Loans, Financial Hardship Loans (including interest-free, long-term) and Interest-Free Short-Term (up to two years).

FEDERAL FUNDING SOURCES TO IMPLEMENT THE LWRP

Federal funding may be leveraged for LWRP projects including efforts to improve infrastructure, amenities and resilience.

Clean Water State Revolving Fund for Water Pollution Control – Federal-to-state financing is available to respond to non-point source pollution projects. Non-point source refers to water pollution from diffuse

sources that are not directly related to a piped discharge. Examples include remediation of contamination from leaking underground storage tanks or collection and treatment of road runoff, and water body restoration such as stream bank stabilization, drainage erosion and sediment control, and fertilizer/pesticide control.

Federal Emergency Management Agency – Helps communities implement hazard mitigation measures following a Presidential major disaster declaration through the **Hazard Mitigation Grant Program**, administered by the NYS Office of Emergency Management.

U.S. Department of Agriculture (USDA) – Rural Development assistance program provides loans, grants, and loan guarantees for housing, community facilities, business guarantees, and public utilities and services. Under the Rural Utilities Service program, funds are available to public entities and nonprofit corporations to build, repair, and improve public water and waste water collection and treatment systems.

NYS and U.S. Departments of Transportation (DOT) - Grants and loans may be available pursuant to the DOT **Transportation Alternatives Program (TAP)**, formerly ISTEA (Industrial Access Program Chap 54 of Laws of 1985-appropriations bill); the **Highway Safety Improvement Program**, which can be used for road safety improvements including cycling and/or pedestrian trails development.

U.S. Department of Commerce Economic Development Administration (USEDA) – Provides grants to assist with economic development projects.

U.S. Department of Housing and Urban Development (HUD) - Provides direct funding through the **Community Development Block Grant (CDBG)** for activities that support the reuse of industrial sites. CDBG funds are used for grants, loans, loan guarantees and technical assistance activities. Formally a Federal program, New York State has been administering the program since 2000.

U.S. Department of the Interior – Allocates funding to states through the **Land and Water Conservation Fund** for land acquisition and development of outdoor recreation.

5.5 Summary Chart of Legislation and other Actions Implementing the LWRP Policies

Table 13. Local Laws Implementing LWRP Policies

LWRP Policies	Implementing Legislation
Development Policies 1 – 6	Village of Catskill Zoning Regulations Article 3 District Regulations, Village of Catskill Subdivision Law
Fish & Wildlife Policies 7 – 10	Village of Catskill Zoning Regulations Article 3.3 Waterfront District Additional Regulations, Article 3.4 Waterfront Overlay District Additional Regulations
Flooding & Erosion Policies 11 – 17	Village of Catskill Zoning Regulations Article 3.3 Waterfront District Additional Regulations
General Policy 18	Village of Catskill Zoning Regulations Article 1 Authority and Purposes, Village of Catskill Subdivision Law
Public Access Policies 19 & 20	Village of Catskill Zoning Regulations Article 3.3 Waterfront District Additional Regulations, Article 3.4 Waterfront Overlay District Additional Regulations, Article 4.3 Site Plan Review by the Planning Board
Recreation Policies 21 & 22	Village of Catskill Zoning Regulations Article 3 District Regulations, Article 3.3 Waterfront District Additional Regulations, Article 3.4 Waterfront Overlay District Additional Regulations
Historic Resource and Visual Quality Policies 23– 25	Village of Catskill Zoning Regulations Article 1 Authority and Purpose, Article 3.3 Waterfront District Additional Regulations, Article 3.4 Waterfront Overlay District Additional Regulations, Article 5 Review of Historic Properties
Agricultural Lands Policy 26	N/A
Energy & Ice Management Policies 27 – 29	Village of Catskill Zoning Regulations Article 4.18 Solar Panels
Water & Air Resources Policies 30 – 44	Village of Catskill Zoning Regulations Article 1 Authority and Purpose, Article 3.3 Waterfront District Additional Regulations, Article 3.4 Waterfront Overlay District Additional Regulations, Village of Catskill Subdivision Law



Photo: Catskill Creek

6 State and Federal Actions and Programs Likely to Affect Implementation

State and federal actions will affect and be affected by implementation of the Local Waterfront Revitalization Program (LWRP). Under state Law and the U.S. Coastal Zone Management Act, certain state and federal actions within or affecting the local Waterfront Revitalization Area (WRA) must be consistent, or consistent to the maximum extent practicable, with the enforceable policies and purposes of the LWRP. This consistency requirement makes the LWRP a unique, intergovernmental mechanism for setting policy and making decisions, and helps to prevent detrimental actions from occurring and future options from being needlessly foreclosed. At the same time, the active participation of state and federal agencies is also likely to be necessary to implement specific provisions of the LWRP.

6.1 State Actions and Programs Which Should Be Undertaken in a Manner Consistent With the LWRP

Pursuant to the State Waterfront Revitalization of Coastal Areas and Inland Waterways Act (Executive Law, Article 42), the Secretary of State notifies affected state agencies of those agency actions and programs that are to be undertaken in a manner consistent with approved LWRPs. The following list of state actions and programs is that list. The State Waterfront Revitalization of Coastal Areas and Inland Waterways Act requires that an LWRP identifies those elements of the program that can be implemented by the local government, unaided, and those that can only be implemented with the aid of other levels of government or other agencies. Such statement shall include those permit, license, certification or approval programs; grant, loan subsidy or other funding assistance programs; facilities construction, and planning programs that may affect the achievement of the LWRP.

OFFICE FOR THE AGING

- 1.00 Funding and/or approval programs for the establishment of new or expanded facilities providing various services for the elderly.

DEPARTMENT OF AGRICULTURE AND MARKETS

- 1.00 Agricultural Districts Program
- 2.00 Rural Development Program
- 3.00 Farm Worker Services Program
- 4.00 Permit and approval programs:
 - 4.01 Custom Slaughters/Processor Permit
 - 4.02 Processing Plant License
 - 4.03 Refrigerated Warehouse and/or Locker Plant License
- 5.00 Farmland Protection Implementation Grant
- 6.00 Agricultural Nonpoint Source Abatement and Control Program

DIVISION OF ALCOHOLIC BEVERAGE CONTROL/STATE LIQUOR AUTHORITY

- 1.00 Permit and Approval Programs:
 - 1.01 Ball Park - Stadium License
 - 1.02 Bottle Club License
 - 1.03 Bottling Permits

- 1.04 Brewer's Licenses and Permits
- 1.05 Brewer's Retail Beer License
- 1.06 Catering Establishment Liquor License
- 1.07 Cider Producer's and Wholesaler's Licenses
- 1.08 Club Beer, Liquor, and Wine Licenses
- 1.09 Distiller's Licenses
- 1.10 Drug Store, Eating Place, and Grocery Store Beer Licenses
- 1.11 Farm Winery and Winery Licenses
- 1.12 Hotel Beer, Wine, and Liquor Licenses
- 1.13 Industrial Alcohol Manufacturer's Permits
- 1.14 Liquor Store License
- 1.15 On-Premises Liquor Licenses
- 1.16 Plenary Permit (Miscellaneous-Annual)
- 1.17 Summer Beer and Liquor Licenses
- 1.18 Tavern/Restaurant and Restaurant Wine Licenses
- 1.19 Vessel Beer and Liquor Licenses
- 1.20 Warehouse Permit
- 1.21 Wine Store License
- 1.22 Winter Beer and Liquor Licenses
- 1.23 Wholesale Beer, Wine, and Liquor Licenses

OFFICE OF ALCOHOLISM AND SUBSTANCE ABUSE SERVICES

- 1.00 Facilities, construction, rehabilitation, expansion, or demolition or the funding of such activities.
- 2.00 Permit and approval programs:
 - 2.01 Certificate of approval (Substance Abuse Services Program)
- 3.00 Permit and approval:
 - 3.01 Letter Approval for Certificate of Need
 - 3.02 Operating Certificate (Alcoholism Facility)
 - 3.03 Operating Certificate (Community Residence)

- 3.04 Operating Certificate (Outpatient Facility)
- 3.05 Operating Certificate (Sobering-Up Station)

COUNCIL ON THE ARTS

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Architecture and environmental arts program

OFFICE OF CHILDREN AND FAMILY SERVICES

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Homeless Housing and Assistance Program
- 3.00 Permit and approval programs:
 - 3.01 Certificate of Incorporation (Adult Residential Care Facilities)
 - 3.02 Operating Certificate (Children's Services)
 - 3.03 Operating Certificate (Enriched Housing Program)
 - 3.04 Operating Certificate (Home for Adults)
 - 3.05 Operating Certificate (Proprietary Home)
 - 3.06 Operating Certificate (Public Home)
 - 3.07 Operating Certificate (Special Care Home)
 - 3.08 Permit to Operate a Day Care Center

DEPARTMENT OF CORRECTIONS AND COMMUNITY SUPERVISION

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities

DORMITORY AUTHORITY OF THE STATE OF NEW YORK

- 1.00 Financing of higher education and health care facilities
- 2.00 Planning and design services assistance program

EDUCATION DEPARTMENT

- 1.00 Facilities construction, rehabilitation, expansion, demolition or the funding of such activities

- 2.00 Permit and approval programs:
 - 2.01 Certification of Incorporation (Regents Charter)
 - 2.02 Private Business School Registration
 - 2.03 Private School License
 - 2.04 Registered Manufacturer of Drugs and/or Devices
 - 2.05 Registered Pharmacy Certificate
 - 2.06 Registered Wholesale of Drugs and/or Devices
 - 2.07 Registered Wholesaler-Repacker of Drugs and/or Devices
 - 2.08 Storekeeper's Certificate
- 3.00 Administration of Article 5, Section 233 of the Educational Law regarding the removal of archaeological and paleontological objects under the waters of the state

OFFICE OF EMERGENCY MANAGEMENT

- hazard identification,
- loss prevention, planning, training, operational response to emergencies,
- technical support, and disaster recovery assistance.

EMPIRE STATE DEVELOPMENT/ EMPIRE STATE DEVELOPMENT CORPORATION

- 1.00 Preparation or revision of statewide or specific plans to address state economic development needs
- 2.00 Allocation of the state tax-free bonding reserve

ENERGY RESEARCH AND DEVELOPMENT AUTHORITY

- 1.00 Issuance of revenue bonds to finance pollution abatement modifications in power-generation facilities and various energy projects
- 2.00 New Construction Program – provide assistance to incorporate energy-efficiency measures into the design, construction and operation of new and substantially renovated buildings
- 3.00 Existing Facilities Program – offers incentives for a variety of energy projects

DEPARTMENT OF ENVIRONMENTAL CONSERVATION

- 1.00 Acquisition, disposition, lease, grant of easement, and other activities related to the management of lands under the jurisdiction of the Department

- 2.00 Classification of Waters Program; classification of land areas under the Clean Air Act
- 3.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 4.00 Financial assistance/grant programs:
 - 4.01 Capital projects for limiting air pollution
 - 4.02 Cleanup of toxic waste dumps
 - 4.03 Flood control, beach erosion, and other water resource projects
 - 4.04 Operating aid to municipal wastewater treatment facilities
 - 4.05 Resource recovery and solid waste management capital projects
 - 4.06 Wastewater treatment facilities
- 6.00 Implementation of the Environmental Quality Bond Act of 1972, including:
 - (a) Water Quality Improvement Projects
 - (b) Land Preservation and Improvement Projects including Wetland Preservation and Restoration Projects, Unique Area Preservation Projects, Metropolitan Parks Projects, Open Space Preservation Projects, and Waterways Projects
- 7.00 Marine Finfish and Shellfish Programs
- 9.00 Permit and approval programs

Air Resources

- 9.01 Certificate of Approval for Air Pollution Episode Action Plan
- 9.02 Certificate of Compliance for Tax Relief – Air Pollution Control Facility
- 9.03 Certificate to Operate: Stationary Combustion Installation; Incinerator; process, exhaust or Ventilation System
- 9.04 Permit for Burial of Radioactive Material
- 9.05 Permit for Discharge of Radioactive Material to Sanitary Sewer
- 9.06 Permit for Restricted Burning
- 9.07 Permit to Construct; a Stationary Combustion Installation; Incinerator; Indirect Source of Air Contamination; Process, Exhaust or Ventilation System

Construction Management

- 9.08 Approval of Plans and Specifications for Wastewater Treatment Facilities

Fish and Wildlife

- 9.09 Certificate to Possess and Sell Hatchery Trout in New York State

- 9.10 Commercial Inland Fisheries Licenses
- 9.11 Fishing Preserve License
- 9.12 Fur Breeder's License
- 9.13 Game Dealer's License
- 9.14 Licenses to breed Domestic Game Animals
- 9.15 License to Possess and Sell Live Game
- 9.16 Permit to Import, Transport and/or Export under Section 184.1 (11-0511)
- 9.17 Permit to Raise and Sell trout
- 9.18 Private Bass Hatchery Permit
- 9.19 Shooting Preserve Licenses
- 9.20 Taxidermy License
- 9.21 Permit – Article 15, (Protection of Water) – Dredge and Deposit Material in a Waterway
- 9.22 Permit – Article 15, (Protection of Water) – Stream Bed or Bank Disturbances
- 9.23 Permit – Article 24, (Freshwater Wetlands)

Hazardous Substances

- 9.24 Permit to Use Chemicals for the Control or Elimination of Aquatic Insects
- 9.25 Permit to Use Chemicals for the Control or Elimination of Aquatic Vegetation
- 9.26 Permit to Use Chemicals for the Control or Elimination of Undesirable Fish

Lands and Forest

- 9.27 Certificate of Environmental Safety (Liquid Natural Gas/Liquid Petroleum Gas)
- 9.28 Floating Object Permit
- 9.29 Marine Regatta Permit
- 9.30 Navigation Aid Permit

Marine Resources

- 9.31 Digger's Permit (Shellfish)
- 9.32 License of Menhaden Fishing Vessel
- 9.33 License for Non Resident Food Fishing Vessel
- 9.34 Non Resident Lobster Permit

- 9.35 Marine Hatchery and/or Off Bottom Culture Shellfish Permits
- 9.36 Permits to Take Blue Claw Crabs
- 9.37 Permit to Use Pond or Trap Net
- 9.38 Resident Commercial Lobster Permit
- 9.39 Shellfish Bed Permit
- 9.40 Shellfish Shipper's Permits
- 9.41 Special Permit to Take Surf Clams from Waters other than the Atlantic Ocean
- 9.42 Permit – Article 25, (Tidal Wetlands)

Mineral Resources

- 9.43 Mining Permit
- 9.44 Permit to Plug and Abandon (a non-commercial, oil, gas or solution mining well)
- 9.45 Underground Storage Permit (Gas)
- 9.46 Well Drilling Permit (Oil, Gas and Solution Salt Mining)

Solid Wastes

- 9.47 Permit to Construct and/or operate a Solid Waste Management Facility
- 9.48 Septic Tank Cleaner and Industrial Waste Collector Permit

Water Resources

- 9.49 Approval of Plans for Wastewater Disposal Systems
- 9.50 Certificate of Approval of Realty Subdivision Plans
- 9.51 Certificate of Compliance (Industrial Wastewater Treatment Facility)
- 9.52 Letters of Certification for Major Onshore Petroleum Facility Oil Spill Prevention and Control Plan
- 9.53 Permit Article 36 (Construction in Flood Hazard Areas)
- 9.54 Permit for State Agency Activities for Development in Coastal Erosion Hazards Areas
- 9.55 Permit for State Agency Activities for Development in Coastal Erosion Hazards Areas
- 9.56 State Pollutant Discharge Elimination System (SPDES) Permit
- 9.57 Approval – Drainage Improvement District
- 9.58 Approval – Water (Diversion for Power)
- 9.59 Approval of Well System and Permit to Operate

- 9.60 Permit – Article 15, (Protection of Water) – Dam
- 9.61 Permit – Article 15, Title 15 (Water Supply)
- 9.62 River Improvement District Permits
- 9.63 River Regulatory District approvals
- 9.64 Well Drilling Certificate of Registration
- 9.65 401 Water Quality Certification
- 10.00 Preparation and revision of Air Pollution State Implementation Plan
- 11.00 Preparation and revision of Continuous Executive Program Plan
- 12.00 Preparation and revision of Statewide Environmental Plan
- 13.00 Protection of Natural and Man-made Beauty Program
- 14.00 Urban Fisheries Program
- 15.00 Urban Forestry Program
- 16.00 Urban Wildlife Program

ENVIRONMENTAL FACILITIES CORPORATION

- 1.0 Financing program for pollution control facilities for industrial firms and small businesses

DEPARTMENT OF FINANCIAL SERVICES (DEPARTMENT OF BANKING)

- 1.00 Permit and approval programs:
 - 1.01 Authorization Certificate (Bank Branch)
 - 1.02 Authorization Certificate (Bank Change of Location)
 - 1.03 Authorization Certificate (Bank Charter)
 - 1.04 Authorization Certificate (Credit Union Change of Location)
 - 1.05 Authorization Certificate (Credit Union Charter)
 - 1.06 Authorization Certificate (Credit Union Station)
 - 1.07 Authorization Certificate (Foreign Banking Corporation Change of Location)
 - 1.08 Authorization Certificate (Foreign Banking Corp. Public Accommodations Office)
 - 1.09 Authorization Certificate (Investment Company Branch)
 - 1.10 Authorization Certificate (Investment Company Change of Location)

- 1.11 Authorization Certificate (Investment Company Charter)
- 1.12 Authorization Certificate (Licensed Lender Change of Location)
- 1.13 Authorization Certificate (Mutual Trust Company Charter)
- 1.14 Authorization Certificate (Private Banker Charter)
- 1.15 Authorization Certificate (Public Accommodation Office – Banks)
- 1.16 Authorization Certificate (Safe Deposit Company Branch)
- 1.17 Authorization Certificate (Safe Deposit Company Change of Location)
- 1.18 Authorization Certificate (Safe Deposit Company Charter)
- 1.19 Authorization Certificate (Savings Bank Charter)
- 1.20 Authorization Certificate (Savings Bank DeNovo Branch Office)
- 1.21 Authorization Certificate (Savings Bank Public Accommodations Office)
- 1.22 Authorization Certificate (Savings and Loan Association Branch)
- 1.23 Authorization Certificate (Savings and Loan Association Change of Location)
- 1.24 Authorization Certificate (Savings and Loan Association Charter)
- 1.25 Authorization Certificate (Subsidiary Trust Company Charter)
- 1.26 Authorization Certificate (Trust Company Branch)
- 1.27 Authorization Certificate (Trust Company – Change of Location)
- 1.28 Authorization Certificate (Trust Company Charter)
- 1.29 Authorization Certificate (Trust Company Public Accommodations Office)
- 1.30 Authorization to Establish a Life Insurance Agency
- 1.31 License as a Licensed Lender
- 1.32 License for a Foreign Banking Corporation Branch

OFFICE OF GENERAL SERVICES

- 1.00 Administration of the Public Lands Law for acquisition and disposition of lands, grants of land and grants of easement of land under water, issuance of licenses for removal of materials from lands under water, and oil and gas leases for exploration and development.
- 2.00 Administration of Article 4 B, Public Buildings Law, in regard to the protection and management of State historic and cultural properties and State uses of buildings of historic, architectural or cultural significance.

- 3.00 Facilities construction, rehabilitation, expansion, or demolition
- 4.00 Administration of Article 5, Section 233, Subsection 5 of the Education Law on removal of archaeological and paleontological objects under the waters of the State
- 5.00 Administration of Article 3, Section 32 of the Navigation Law regarding location of structures in or on navigable waters
- 6.00 Section 334 of the State Real Estate Law regarding subdivision of waterfront properties on navigable waters to include the location of riparian lines

DEPARTMENT OF HEALTH

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Permit and approval programs:
 - 2.01 Approval of Completed Works for Public Water Supply Improvements
 - 2.02 Approval of Plans for Public Water Supply Improvements.
 - 2.03 Certificate of Need (Health Related Facility except Hospitals)
 - 2.04 Certificate of Need (Hospitals)
 - 2.05 Operating Certificate (Diagnostic and Treatment Center)
 - 2.06 Operating Certificate (Health Related Facility)
 - 2.07 Operating Certificate (Hospice)
 - 2.08 Operating Certificate (Hospital)
 - 2.09 Operating Certificate (Nursing Home)
 - 2.10 Shared Health Facility Registration Certificate

DIVISION OF HOMES AND COMMUNITY RENEWAL and its subsidiaries and affiliates

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Financial assistance/grant programs:
 - 2.01 Federal Housing Assistance Payments Programs (Section 8 Programs)
 - 2.02 Housing Development Fund Programs
 - 2.03 Neighborhood Preservation Companies Program
 - 2.04 Public Housing Programs
 - 2.05 Rural Initiatives Grant Program

- 2.06 Rural Preservation Companies Program
- 2.07 Rural Rental Assistance Program
- 2.08 Special Needs Demonstration Projects
- 2.09 Urban Initiatives Grant Program
- 2.10 Urban Renewal Programs
- 3.00 Preparation and implementation of plans to address housing and community renewal needs

OFFICE OF MENTAL HEALTH

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Permit and approval programs:
 - 2.01 Operating Certificate (Community Residence)
 - 2.02 Operating Certificate (Family Care Homes)
 - 2.03 Operating Certificate (Inpatient Facility)
 - 2.04 Operating Certificate (Outpatient Facility)

DIVISION OF MILITARY AND NAVAL AFFAIRS

- 1.00 Preparation and implementation of the State Disaster Preparedness Plan

NATURAL HERITAGE TRUST

- 1.00 Funding program for natural heritage institutions

OFFICE OF PARKS, RECREATION, AND HISTORIC PRESERVATION (including Regional State Park Commission)

- 1.00 Acquisition, disposition, lease, grant of easement, or other activities related to the management of land under the jurisdiction of the Office
- 2.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 3.00 Funding program for recreational boating, safety, and enforcement
- 4.00 Funding program for state and local historic preservation projects
- 5.00 Land and Water Conservation Fund programs
- 6.00 Nomination of properties to the Federal and/or State Register of Historic Places

- 7.00 Permit and approval programs:
 - 7.01 Floating Objects Permit
 - 7.02 Marine Regatta Permit
 - 7.03 Navigation Aide Permit
 - 7.04 Posting of Signs Outside State Parks
- 8.00 Preparation and revision of the Statewide Comprehensive Outdoor Recreation Plan, the Statewide Comprehensive Historic Preservation Plan, and other plans for public access, recreation, historic preservation or related purposes.
- 9.00 Recreation services program
- 10.00 Urban Cultural Parks Program
- 11.00 Planning, construction, rehabilitation, expansion, demolition or the funding of such activities and/or projects funded through the Environmental Protection Fund (Environmental Protection Act of 1993) or Clean Water/Clean Air Bond Act of 1996

OFFICE FOR PEOPLE WITH DEVELOPMENTAL DISABILITIES

- 1.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities
- 2.00 Permit and approval programs:
 - 2.01 Establishment and Construction Prior Approval
 - 2.02 Operating Certificate Community Residence
 - 2.03 Outpatient Facility Operating Certificate

POWER AUTHORITY OF THE STATE OF NEW YORK

- 1.00 Acquisition, disposition, lease, grant of easement, and other activities related to the management of land under the jurisdiction of the Authority
- 2.00 Facilities construction, rehabilitation, expansion, or demolition

NEW YORK STATE SCIENCE AND TECHNOLOGY FOUNDATION

- 1.00 Corporation for Innovation Development Program
- 2.00 Center for Advanced Technology Program

DEPARTMENT OF STATE

- 1.00 Appalachian Regional Development Program
- 2.00 Coastal Management Program
 - 2.10 Planning, construction, rehabilitation, expansion, demolition or the funding of such activities and/or projects funded through the Environmental Protection Fund (Environmental Protection Act of 1993) or Clean Water/Clean Air Bond Act of 1996
- 3.00 Community Services Block Grant Program
- 4.00 Permit and approval programs:
 - 4.01 Billiard Room License
 - 4.02 Cemetery Operator
 - 4.03 Uniform Fire Prevention and Building Code

STATE UNIVERSITY CONSTRUCTION FUND

- 1.0 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities

STATE UNIVERSITY OF NEW YORK

- 1.00 Acquisition, disposition, lease, grant of easement, and other activities related to the management of land under the jurisdiction of the University
- 2.00 Facilities construction, rehabilitation, expansion, or demolition or the funding of such activities

DEPARTMENT OF TRANSPORTATION

- 1.00 Acquisition, disposition, lease, grant of easement, and other activities related to the management of land under the jurisdiction of the Department
- 2.00 Construction, rehabilitation, expansion, or demolition of facilities, including but not limited to:
 - (a) Highways and parkways
 - (b) Bridges on the state highways system
 - (c) Highway and parkway maintenance facilities
 - (d) Rail facilities
- 3.00 Financial assistance/grant programs:

- 3.01 Funding programs for construction/reconstruction and reconditioning/preservation of municipal streets and highways (excluding routine maintenance and minor rehabilitation)
- 3.02 Funding programs for development of the ports of Albany, Buffalo, Oswego, Ogdensburg and New York
- 3.03 Funding programs for rehabilitation and replacement of municipal bridges
- 3.04 Subsidies program for marginal branch lines abandoned by Conrail
- 3.05 Subsidies program for passenger rail service
- 4.00 Permits and approval programs:
 - 4.01 Approval of applications for airport improvements (construction projects)
 - 4.02 Approval of municipal applications for Section 18 Rural and Small Urban Transit Assistance Grants (construction projects)
 - 4.03 Approval of municipal or regional transportation authority applications for funds for design, construction and rehabilitation of omnibus maintenance and storage facilities
 - 4.04 Approval of municipal or regional transportation authority applications for funds for design and construction of rapid transit facilities
 - 4.05 Certificate of Convenience and Necessity to Operate a Railroad
 - 4.06 Highway Work Permits
 - 4.07 License to Operate Major Petroleum Facilities
 - 4.08 Outdoor Advertising Permit (for off premises advertising signs adjacent to interstate and primary highway)
 - 4.09 Real Property Division Permit for Use of State-Owned Property
- 5.00 Preparation or revision of the Statewide Master Plan for Transportation and sub-area or special plans and studies related to the transportation needs of the state
- 6.00 Water Operation and Maintenance Program Activities related to the containment of petroleum spills and development of an emergency oil spill control network

DIVISION OF YOUTH

- 1.0 Facilities construction, rehabilitation, expansion, or demolition or the funding for approval of such activities

6.2 Federal Activities Affecting Land and Water Uses and Natural Resources in the Coastal Zone of New York State

Note: This LWRP's list of the federal agency activities is identical to the most recent version of the Table 3 list in the New York State Coastal Management Program as approved by the federal Office for Coastal Management on May 7, 2017. Please contact the New York State Department of State, Office of Planning and Development, at (518) 474-6000, for any updates to New York State Coastal Management Program Table 3 federal agency activities list that may have occurred post-approval of this LWRP.

This list has been prepared in accordance with the consistency provisions of the federal Coastal Zone Management Act and implementing regulations in 15 CFR Part 930. It is not exhaustive of all activities subject to the consistency provisions of the federal Coastal Zone Management Act, implementing regulations in 15 CFR Part 930, and the New York Coastal Management Program. It includes activities requiring:

1. the submission of consistency determinations by federal agencies;
2. the submission of consistency certifications by entities other than federal agencies; and
3. the submission of necessary data and information to the New York State Department of State, in accordance with 15 CFR Part 930, Subparts C, D, E, F and I, and the New York Coastal Management Program.

I. **Activities Undertaken Directly by or on Behalf of Federal Agencies**

The following activities, undertaken directly by or on behalf of the identified federal agencies, are subject to the consistency provisions of the Coastal Zone Management Act, its implementing regulations in 15 CFR Part 930, Subpart C, and the New York Coastal Management Program.

Department of Commerce, National Marine Fisheries Service:

- Fisheries Management Plans

Department of Defense, Army Corps of Engineers:

- Proposed authorizations for dredging, channel improvement, breakwaters, other navigational works, erosion control structures, beach replenishment, dams or flood control works, ice management practices and activities, and other projects with the potential to impact coastal lands and waters.
- Land acquisition for spoil disposal or other purposes.
- Selection of open water disposal sites.

Department of Defense, Air Force, Army and Navy:

- Location, design, and acquisition of new or expanded defense installations (active or reserve status, including associated housing, transportation or other facilities).
- Plans, procedures and facilities for handling or storage use zones.
- Establishment of impact, compatibility or restricted use zones.

Department of Energy:

- Prohibition orders.

General Services Administration:

- Acquisition, location and design of proposed federal government property or buildings, whether leased or owned by the federal government.

Department of Interior, Fish and Wildlife Service:

- Management of National Wildlife refuges and proposed acquisitions.

Department of Interior, National Park Service:

- National Park and Seashore management and proposed acquisitions.

Department of Interior, Bureau of Ocean Energy Management

- OCS lease sale activities including tract selection, lease sale stipulations, etc.

Department of Homeland Security, Coast Guard:

- Location and design, construction or enlargement of Coast Guard stations, bases, and lighthouses.
- Location, placement or removal of navigation devices which are not part of the routine operations under the Aids to Navigation Program (ATON).
- Expansion, abandonment, designation or anchorages, lightering areas or shipping lanes and ice management practices and activities.

Department of Transportation, Federal Aviation Administration:

- Location and design, construction, maintenance, and demolition of Federal aids to air navigation.

Department of Transportation, St. Lawrence Seaway Development Corporation:

- Acquisition, location, design, improvement and construction of new and existing facilities for the operation of the Seaway, including traffic safety, traffic control and length of navigation season.

Department of Transportation, Federal Highway Administration:

- Highway construction

II. Federal Licenses and Permits and Other Forms of Approval or Authorization

The following activities, requiring permits, licenses, or other forms of authorization or approval from federal agencies, are subject to the consistency provisions of the Coastal Zone Management Act, its implementing regulations in 15 CFR Part 930, Subpart D, and the New York Coastal Management Program.

Department of Defense, Army Corps of Engineers:

- Construction of dams, dikes or ditches across navigable waters, or obstruction or alteration of navigable waters required under Sections 9 and 10 of the Rivers and Harbors Act of 1899 (33 U.S.C. 401, 403).
- Establishment of harbor lines pursuant to Section 11 of the Rivers and Harbors Act of 1899 (33 U.S.C. 404, 405).

- Occupation of seawall, bulkhead, jetty, dike, levee, wharf, pier, or other work built by the U.S. pursuant to Section 14 of the Rivers and Harbors Act of 1899 (33 U.S.C. 408).
- Approval of plans for improvements made at private expense under USACE supervision pursuant to the Rivers and Harbors Act of 1902 (33 U.S.C. 565).
- Disposal of dredged spoils into the waters of the U.S., pursuant to the Clean Water Act, Section 404 (33 U.S.C. 1344).
- All actions for which permits are required pursuant to Section 103 of the Marine Protection, Research and Sanctuaries Act of 1972 (33 U.S.C. 1413).
- Construction of artificial islands and fixed structures in Long Island Sound pursuant to Section 4 (f) of the River and Harbors Act of 1912 (33 U.S.C.).

Department of Energy, Federal Energy Regulatory Commission:

- Licenses for non-federal hydroelectric projects and primary transmission lines under Sections 3 (11), 4 (e) and 15 of the Federal Power Act (16 U.S.C. 796 (11), 797 (11) and 808).
- Orders for interconnection of electric transmission facilities under Section 202 (b) of the Federal Power Act (15 U.S.C. 824 a (b)).
- Certificates for the construction and operation of interstate natural gas pipeline facilities, including both pipelines and terminal facilities under Section 7 (c) of the Natural Gas Act (15 U.S.C. 717 f (c)).
- Permission and approval for the abandonment of natural gas pipeline facilities under Section 7(b) of the Natural Gas Act (15 U.S.C. 717 f (b)).

Department of Energy, Economic Regulatory Commission:

- Regulation of gas pipelines, and licensing of import or export of natural gas pursuant to the Natural Gas Act (15 U.S.C. 717) and the Energy Reorganization Act of 1974.
- Exemptions from prohibition orders.

Environmental Protection Agency:

- NPDES permits and other permits for Federal installations, discharges in contiguous zones and ocean waters, sludge runoff and aquaculture permits pursuant to Sections 401, 402, 403, 405, and 318 of the Federal Water Pollution Control Act of 1972 (33 U.S.C. 1341, 1342, 1343, and 1328).
- Permits pursuant to the Resources Recovery and Conservation Act of 1976.
- Permits pursuant to the underground injection Control program under Section 1424 of the Safe Water Drinking Water Act (42 U.S.C. 300 h-c).
- Permits pursuant to the Clean Air Act of 1976 (42 U.S.C. 1857).

Department of Interior, Fish and Wildlife Services:

- Endangered species permits pursuant to the Endangered Species Act (16 U.S.C. 153 (a)).

Department of Interior, Bureau of Ocean Energy Management:

- Permits to drill, rights of use and easements for construction and maintenance of pipelines, gathering and flow lines and associated structures pursuant to 43 U.S.C. 1334, exploration

and development plans, and any other permits or authorizations granted for activities described in detail in OCS exploration, development, and production plans.

- Permits required for pipelines crossing federal lands, including OCS lands, and associated activities pursuant to the OCS Lands Act (43 U.S.C. 1334) and 43 U.S.C. 931 (c) and 20 U.S.C. 185.

Surface Transportation Board:

- Authority to abandon railway lines (to the extent that the abandonment involves removal of trackage and disposition of right-of-way); authority to construct railroads; authority to construct slurry pipelines.

Nuclear Regulatory Commission:

- Licensing and certification of the siting, construction, and operation of nuclear power plants, pursuant to Atomic Energy Act of 1954, Title II of the Energy Reorganization Act of 1974 and the National Environmental Policy Act of 1969.

Department of Transportation:

- Construction or modification of bridges, causeways or pipelines over navigable waters pursuant to 49 U.S.C. 1455.
- Permits for Deepwater Ports pursuant to the Deepwater Ports Act of 1974 (33 U.S.C. 1501).

Department of Transportation, Federal Aviation Administration:

- Permits and licenses for construction, operation or alteration of airports.

III. Federal Financial Assistance to State and Local Governments

The following activities, involving financial assistance from federal agencies to state and local governments, are subject to the consistency provisions of the Coastal Zone Management Act, its implementing regulations in 15CFR Part 930, Subpart F, and the New York Coastal Management Program. When these activities involve financial assistance for entities other than state and local governments, the activities are subject to the consistency provisions of 15 CFR Part 930, Subpart C.

Department of Agriculture

10.068 Rural Clean Water Program

10.409 Irrigation, Drainage, and Other Soil and Water Conservation Loans

10.410 Low to Moderate Income Housing Loans

10.411 Rural Housing Site Loans

10.413 Recreation Facility Loans

10.414 Resource Conservation and Development Loans

10.415 Rural Rental Housing Loans

10.416 Soil and Water Loans

10.418 Water and Waste Disposal Systems for Rural Communities

10.419 Watershed Protection and Flood Prevention Loans

10.422 Business and Industrial Loans

10.423 Community Facilities Loans

- 10.424 Industrial Development Grants
- 10.426 Area Development Assistance Planning Grants
- 10.429 Above Moderate-Income Housing Loans
- 10.430 Energy Impacted Area Development Assistance Program
- 10.901 Resource Conservation and Development
- 10.902 Soil and Water Conservation
- 10.904 Watershed Protection and Flood Prevention
- 10.906 River Basin Surveys and Investigations

Department of Commerce

- 11.300 Economic Development - Grants and Loans for Public Works and Development Facilities
- 11.301 Economic Development - Business Development Assistance
- 11.302 Economic Development - Support for Planning Organizations
- 11.304 Economic Development - State and Local Economic Development Planning
- 11.305 Economic Development - State and Local Economic Development Planning
- 11.307 Special Economic Development and Adjustment Assistance Program - Long Term Economic Deterioration
- 11.308 Grants to States for Supplemental and Basic Funding of Titles I, II, III, IV, and V Activities
- 11.405 Anadromous and Great Lakes Fisheries Conservation
- 11.407 Commercial Fisheries Research and Development
- 11.417 Sea Grant Support
- 11.427 Fisheries Development and Utilization Research and Demonstration Grants and Cooperative Agreements Program
- 11.501 Development and Promotion of Ports and Intermodal Transportation
- 11.509 Development and Promotion of Domestic Water-borne Transport Systems

Department of Housing and Urban Development

- 14. 112 Mortgage Insurance - Construction or Substantial Rehabilitation of Condominium Projects
- 14. 115 Mortgage Insurance - Development of Sales Type Cooperative Projects
- 14. 117 Mortgage Insurance - Homes
- 14. 124 Mortgage Insurance - Investor Sponsored Cooperative Housing
- 14. 125 Mortgage Insurance - Land Development and New Communities
- 14. 126 Mortgage Insurance - Manages ant Type Cooperative Projects
- 14. 127 Mortgage Insurance - Mobile Home Parks
- 14. 218 Community Development Block Grants/Entitlement Grants
- 14. 219 Community Development Block Grants/Small Cities Program
- 14. 221 Urban Development Action Grants
- 14. 223 Indian Community Development Block Grant Program

Department of the Interior

- 15.400 Outdoor Recreation - Acquisition, Development and Planning
- 15.402 Outdoor Recreation - Technical Assistance
- 15.403 Disposal of Federal Surplus Real Property for Parks, Recreation, and Historic Monuments
- 15.411 Historic Preservation Grants-In-Aid
- 15.417 Urban Park and Recreation Recovery Program

- 15.600 Anadromous Fish Conservation
- 15.605 Fish Restoration
- 15.611 Wildlife Restoration
- 15.613 Marine Mammal Grant Program
- 15.802 Minerals Discovery Loan Program
- 15.950 National Water Research and Development Program
- 15.951 Water Resources Research and Technology - Assistance to State Institutes
- 15.952 Water Research and Technology-Matching Funds to State Institutes

Department of Transportation

- 20.102 Airport Development Aid Program
- 20.103 Airport Planning Grant Program
- 20.205 Highway Research, Planning, and Construction Railroad Rehabilitation and Improvement - Guarantee of Obligations
- 20.309 Railroad Rehabilitation and Improvement – Guarantee of Obligations
- 20.310 Railroad Rehabilitation and Improvement - Redeemable Preference Shares
- 20.506 Urban Mass Transportation Demonstration Grants
- 20.509 Public Transportation for Rural and Small Urban Areas

General Services Administration

- 39.002 Disposal of Federal Surplus Real Property

Community Services Administration

- 49.002 Community Action
- 49.011 Community Economic Development
- 49.013 State Economic Opportunity Offices
- 49.017 Rural Development Loan Fund
- 49.018 Housing and Community Development (Rural Housing)

Small Business Administration

- 59.012 Small Business Loans
- 59.013 State and Local Development Company Loans
- 59.024 Water Pollution Control Loans
- 59.025 Air Pollution Control Loans
- 59.031 Small Business Pollution Control Financing Guarantee

Environmental Protection Agency

- 66.001 Air Pollution Control Program Grants
- 66.418 Construction Grants for Wastewater Treatment Works
- 66.426 Water Pollution Control - State and Area-wide Water Quality Management Planning Agency
- 66.451 Solid and Hazardous Waste Management Program Support Grants
- 66.452 Solid Waste Management Demonstration Grants
- 66.600 Environmental Protection Consolidated Grants Program Support
- 66.800 Comprehensive Environmental Response, Compensation and Liability (Superfund)

Note: Numbers refer to the Catalog of Federal Domestic Assistance Programs, 1980 and its subsequent updates.

6.3 State Actions and Programs Likely to Affect Implementation

Part 6.3 provides a more focused and descriptive list of the preceding Part 6.1 listing under this LWRP Section 6, entitled “State Actions and Programs Likely to Affect Implementation.” It is recognized that a state agency’s ability to undertake these listed actions is subject to a variety of factors and considerations; that the consistency provisions of the approved LWRP may not apply; and, that the consistency requirements cannot be used to require a state agency to undertake an action it could not undertake pursuant to other provisions of law. Reference should be made to Section 2, Section 4, and Section 5, which discuss local goals, proposed projects, and local implementation techniques, including state assistance needed to implement the approved LWRP.

I. State Actions and Programs

DEPARTMENT OF ENVIRONMENTAL CONSERVATION

- Funding assistance with planning studies and/or design and construction of projects targeted to control the erosion of steep slopes in the Village’s waterfront area.
- Review and approval for septic system installation and replacement in areas without public septic systems of the waterfront, within Catskill.
- Implement and administer Article 24 of the State's Environmental Conservation Law for Catskill WRA wetlands areas.
- Map, adopt, and administer the State's Section 505 Coastal Erosion Control legislation.
- Technical assistance, review, and approval of park improvements.
- Technical assistance, review, and approval of public access improvements within the Village’s waterfront areas.

DIVISION OF HOMES AND COMMUNITY RENEWAL

- Funding and technical assistance with revitalization efforts in the Catskill WRA.

ENVIRONMENTAL FACILITIES CORPORATION

- Funding assistance for the planning, design and construction of sewer extensions or other improvement projects within the Catskill WRA.

DEPARTMENT OF STATE

- Funding and technical assistance for LWRP implementation of various planning, design and construction projects, as outlined in Section 4 of this Program.
- Funding assistance through the Environmental Protection Fund for park development and improvements.
- Funding and technical assistance through the Brownfield Opportunity Area Program for properties within the Catskill WRA.

NEW YORK STATE ENERGY RESEARCH AND DEVELOPMENT AUTHORITY

- Funding and technical assistance with energy efficiency studies and projects.

NEW YORK STATE DEPARTMENT OF TRANSPORTATION

- Provide improvements to South Main Street which will improve circulation and access for pedestrians and bicyclists.
- Provide traffic calming improvements to the South Main Street.

EMPIRE STATE DEVELOPMENT CORPORATION

- Assistance is needed for the preparation of economic feasibility studies for the reuse of various deteriorated and unutilized structures, with the siting or improvement of public facilities and with revitalization efforts within downtown Catskill.

OFFICE OF GENERAL SERVICES

- Prior to any development occurring in the water or on the immediate waterfront, OGS will be contacted for a determination of the state's interest in underwater or formerly underwater lands and for authorization to use and occupy such lands.

OFFICE OF PARKS, RECREATION, AND HISTORIC PRESERVATION

- Funding assistance for the planning, design and construction of expansion or improvement projects within the Catskill WRA.
- Funding approval under programs such as the Land and Water Conservation Fund and the Clean Water / Environmental Protection Fund for development of or improvements to waterfront parkland.
- Provide funding assistance to the Village of Catskill for the planning, development, construction, major renovation, or expansion of existing and planned recreational facilities located in or adjacent to waterfront area.

What's your VISION?

Write down 3 to 5 words for your vision for Catskill. Think about things like parks, recreation, businesses, the environment, etc. What makes Catskill great today and will make it great in the future?

Thriving
small
business
community

Walkable
Community

Jobs for
locals

Handicap
accessible

Keep it simple & easy to use
Keep it simple & easy to use
Keep it simple & easy to use

Keep it simple & easy to use
Keep it simple & easy to use
Keep it simple & easy to use

Keep it simple & easy to use
Keep it simple & easy to use
Keep it simple & easy to use

Keep it simple & easy to use
Keep it simple & easy to use
Keep it simple & easy to use

Celebrating
our heritage
as the
birthplace of
American art

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Proper
while
maintaining
our
diversity

Bring together
Catskill's
assets:
ART, NATURE
Historic Heritage

Commercial Dock
For Passenger
Vessels, Charter
Boats & Touring
Boats

Develop water
front by
watermen
(showcase our
waterfront)

Photo: Catskill LWRP Open House

7 Local Commitment and Consultation with other Affected Federal, State, Regional and Local Agencies

This section of the Local Waterfront Revitalization Program (LWRP) describes the efforts undertaken throughout the preparation of the LWRP to involve various community stakeholder groups using techniques such as Waterfront Advisory Committee (WAC) meetings, focus groups, stakeholder interviews, public community meetings, public information meetings, public hearings, and/or meetings with any other federal, state, regional, and/or municipal agencies.

7.1 Waterfront Advisory Committee

A WAC was created to guide the development of the Catskill LWRP. The WAC is comprised of representatives from the Village of Catskill, Greene County, local business owners, and residents. The WAC met to identify the Waterfront Revitalization Area (WRA) boundary, develop a vision statement, assist with preparation and facilitation of the Public Open House, review draft work products, and provide input on the direction of and recommendations for the LWRP.

Members of the Catskill WAC included:

- Lisa Cope, Village of Catskill, Village Clerk
- Joel DuBois, Greene County Soil & Water Conservation District, Executive Director
- Ben Fain, Red Barn in Hudson
- Stef Halmos, Foreland in Catskill
- JJ Kathe, UAlbany Graduate Student
- Joe Kozloski, Village of Catskill, Trustee
- Elliott Matos, Hudson Catskill Housing Coalition, Catskill Coordinator
- Sean Meagher, Creekside Restaurant/Hop-O- Nose Marina Catskill
- Jesse Moore, Business owner
- Lisa Pina, Village resident
- Nancy Richards, Village resident
- Mitchell Smith, Village resident
- Joy Wolf, Local artist

The Catskill WAC met on the following dates:

- Project Initiation Meeting, January 18, 2019
- WAC Meeting #1: March 11, 2019
- WAC Meeting #2: April 8, 2019
- WAC Meeting #3: May 13, 2019
- WAC Meeting #4: July 8, 2019
- WAC Meeting #5: August 12, 2019
- WAC Meeting #6: September 9, 2019
- WAC Meeting #7: October 21, 2019
- WAC Meeting #8: November 18, 2019
- WAC Meeting #9: December 9, 2019
- WAC Meeting #10: November 10, 2020
- WAC Meeting #11: January 19, 2022
- WAC Meeting #12: February 9, 2022
- WAC Meeting #13: July 12, 2022

- WAC Meeting #14: September 13, 2022
- WAC Meeting #15: November 1, 2022
- WAC Meeting #16: January 9, 2024

7.2 Local Consultation

In addition to regular WAC meetings, the Village hosted two Public Open Houses to discuss their vision for the community and identify potential projects.

OPEN HOUSE 1

The first Open House was held on June 27th, 2019, from 3:00 to 7:30 p.m. at the Catskill Senior Center. This informal event provided information about the program and sought public input on issues related to economic development, environmental issues, parks and recreation, and public access to the waterfront.

As part of the interactive event, attendees were also asked to identify their vision for Catskill in three to five words. Key phrases provided by the community included:

- Thriving small business community
- Walkable community
- Celebrating our heritage as the birthplace of American art
- Prosper while maintaining our diversity
- Jobs for locals
- Handicap accessible
- Rebranding image
- Bring together Catskill's assets: Art, nature, historic heritage
- Diversify the economy
- Commercial dock for passenger vessels, charter boats + river cargo boats.
- Find employment for your residents to stay
- Develop waterfront by lumberyard (showcase our waterfront)
- Heritage site, destination employment
- Keep it simple and nice like we always had & that's why I chose Catskill
- Honor creative economy, zone arts district, keep affordable spaces, improve education + community conversations
- We are economically and racially segregated - need to change!



Figure 21. Photos from Catskill LWRP Open House.



Open House attendees were also asked to identify issues and opportunities as they relate to the following three topic areas: Parks, Recreation, & Public Access, Business and Infrastructure, and Natural & Scenic Resources.

Opportunities

Key opportunities touched on several areas that would benefit the community if implemented. Several of the ideas presented to the WAC and the Village at the Open House contributed to the proposed projects in Section 4.

Suggestions identified for Parks, Recreation, & Public Access related to expanding water-dependent and water-enhanced recreational uses along the waterfront, adding green spaces and public parks, improving the walkability, and enhancing connections to natural amenities.

Business and Infrastructure opportunities focused on improvements that benefit the local infrastructure and economy. Infrastructure ideas included adding multimodal transportation options and enhancing the renewable energy options in the community. In terms of the local economy, creating incubator spaces, transforming underutilized spaces into new businesses, and adding more affordable shopping options were mentioned.

Key opportunities for Natural & Scenic Resources suggested at the open house related to recreational opportunities, such as having walking trails along the waterfront, expanding parks and open spaces, and protecting shorelines and coastal properties.

Issues

A goal of the Open House was to hear from community members about key issues they would like to see addressed by the LWRP. This offers an opportunity for the LWRP to address the issues that participants value most and make improvements that would improve the community overall.

Concerns identified by the Open House participants related to Parks, Recreation, & Public Access have to do with the aesthetic of the community, lack of dog-friendly places, lack of public walking spaces, and lack of public access along waterfront.

The key concerns identified by Open House participants related to Business & Infrastructure included parking, poor sidewalk conditions, a lack of green energy businesses, and the location of the water treatment plant.

Concerns related to Natural & Scenic Resources included climate change, rising water levels, and protecting the shoreline from commercial development.

OPEN HOUSE 2

To ensure the safety of community members during the Covid-19 pandemic, the second open house was held virtually using a survey-based platform. The virtual open house was held from May 27th to June 28th, 2022. The survey closing date was extended from June 13, 2022 to allow for more community participation. The virtual open house provided information about the LWRP and sought public input regarding the vision for the waterfront area. It highlighted a series of projects aimed at revitalizing lands along Catskill Creek, improving access to the waterfront, improving parks and playgrounds, and enhancing connections to downtown. During the open house, participants were welcomed to provide additional project ideas.



The online survey yielded 144 responses and gave respondents the opportunity to provide feedback on the proposed LWRP projects. All projects scored highly, with an average rating of 7.3 out of 10. The most highly rated projects focused on the environment and sustainability. Respondents also gave their feedback on the draft vision statement that was prepared by the WAC. Responses to the draft were largely positive, with 72% of respondents indicating a positive reaction to the draft vision statement. Respondents also had the opportunity to submit comments about the draft vision statement, which included ideas about improving the waterfront, making the village more walkable/bikeable, affordability, restaurants, public parks, and environmental initiatives.

VILLAGE BOARD OF TRUSTEES

The Village Board reviewed the draft LWRP and will be responsible for the final review and adoption of this important policy document for the Village.

7.3 Regional Consultation

In addition to local public engagement, the WAC consulted with regional organizations including the Greene County Planning Department and the Greene County Soil & Water Conservation District during the development of the LWRP.

STATE AGENCY/ORGANIZATION CONSULTATION

New York State Agencies and public benefit corporations, including the New York State Department of State (DOS), were actively involved in the development of the Catskill LWRP. The DOS is the primary sponsor of the Catskill LWRP and has provided oversight, direction, and technical assistance throughout the duration of the project.