

FY26 WORKPLAN AND BUDGET

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Applicant:
Stony Brook Research Foundation

Submitted by:
PEP Management Conference

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Peconic Estuary Partnership FY26 Workplan – Stony Brook
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I. INTRODUCTION

The Peconic Estuary is one of 28 estuaries in the country designated by U.S. Environmental Protection Agency as an “estuary of national significance” under Section 320 of the Federal Clean Water Act. The National Estuary Program (NEP) was established to protect and restore nationally significant estuaries threatened or impaired by pollution, development, and overuse. The Peconic Estuary was formally accepted as part of the NEP in 1992. Officially commenced in 1993, the Peconic Estuary Program includes numerous stakeholders, representing citizen and environmental groups, businesses and industries, academic institutions, and local, county, state and federal governments. The EPA, New York State Department of Environmental Conservation (NYSDEC) and the Suffolk County Department of Health Services (SCDHS) are the sponsoring government agencies for the program. Stony Brook University is the host entity and this grant commences October 1, 2026.

The PEP 2020 Comprehensive Conservation Management Plan (CCMP) guides the priorities of the organization and as such all projects and plans detailed in this workplan relate directly to the actions established to achieve our four goals: strong partnerships and engagement, clean waters, resilient communities prepared, and a healthy ecosystem with abundant, diverse wildlife.

Overall Funding Sources

The core FY26 budget reflects the following sources of funding:

EPA FY26 Base Funding:	\$850,000.00*
Non-Federal Match:	\$850,000.00**
Total:	\$1,700,000.00

Resources Requested

The total Section 320 funds requested in this NEP grant to Stony Brook University is \$709,500 which will be matched at the required 1:1 rate, making the full budget of the Stony Brook award \$1,419,000.

*EPA FY26 Base funding will be provided to Suffolk County Department of Health Services (SCDHS) in the amount of \$140,000 which will be matched at the required 1:1 rate, making the full budget of the Suffolk County award \$280,000. This award is submitted as a separate application.

**The non-Federal match is provided by NYSDEC, The Town of Southampton, and SCDHS. New York State, Suffolk County, and other partners are expected to provide significant support above and beyond the committed match in the budget table in support of Peconic Estuary Partnership goals and objectives.

II. SUMMARY OF FY25 ACCOMPLISHMENTS

Operational Accomplishments

The PEP program office is growing, and PEP hired a Grant Manager and a Nutrient Reduction Educator and has hired new staff to fill the Outreach Assistant and Project Manager positions during this period using IJJA funds. The following operational ongoing and updates occurred:

- Tracking System <https://portal.gss.stonybrook.edu/ccmp/>
- PEP Data Hubs: <https://data.gss.stonybrook.edu/organization/pep;>
- PEP Communication Strategy - Complete
- PEP Finance Strategy – Complete
- CCMP five-year review – Complete
- Vulnerability Assessment update and alignment – in process

PEP Committees

- The PEP committees held the following meetings:
- PEP Policy Committee October 29, 2026 (Joint MC and PC meeting), April 29, 2026. Minutes and agendas can be found [here](#).
- PEP Management Committee October 29, 2026 (Joint MC and PC meeting), January 14, 2026, April 15, 2026 Minutes and agendas can be found [here](#).
- PEP Technical Advisory Committee consists of representatives from agencies and entities dealing in technical issues as it relates to the Peconic Estuary. February 4th, April 8th, August 19th Minutes and agendas can be found [here](#).
- PEP Natural Resources Sub Committee February 5, 2025, August 20, 2025; January 7, 2026, (NRSC) meeting agendas and minutes can be found [here](#).
- PEP Local Government Committee: December 10, 2025, March 11, 2026
- PEP Citizens' Advisory Committee: January 7, 2026, March 4, 2026
- Peconic Bay Scallop Technical Advisory Committee: July 16, 2025
- Agriculture Workgroup: February 25, 2025

Clean Waters for ecosystem health and safe recreation

- PEP continues to support the SCDHS and USGS water quality monitoring systems including Suffolk County Department of Health Service [Bathing Beach](#) and [Surface water](#); USGS continuous water quality monitoring at [Peconic River Station](#); [Shelter Island Station](#); [Orient Harbor Station](#). Nitrogen Atmospheric Deposition Monitoring Program results are here [\(NADP\)](#). PEP launched the PEP Long Island Water Quality App (Downloadable on iOS platforms [here](#).)
- PEP continues to monitor the oil injection Permeable Reactive Barrier (PRB) in Three Mile Harbor at Tanbark Creek in East Hampton. All reports can be found [here](#). [The USGS-PEP Solute Transport Modeling Project](#) is finalizing the dashboard for public use. PEP continues to support the Suffolk County Reclaim Our Water [Initiative](#) which provides increased protection of water resources. The Initiative used existing legal framework and County and Town grant and loan opportunities to assist homeowners in upgrading to Innovative and Alternative On-Site Wastewater Treatment

Systems ([I/A OWTS](#)) . PEP is partnering with Suffolk County to host and lead outreach events to promote the I/A OWTS program and disseminate information about the financial programs available. PEP is finalizing the research on microplastics in the Peconics with the identification of polymers, additives, and pigments that can potentially tell us product source of microplastics. [Identification of microplastic pollution](#) is complete, the most recent report found [here](#).

- [HABs in the Peconic Estuary Priority Embayments](#) - PEP continues to work with the Gobler lab at Stony Brook to develop end points for Nitrogen and HABs species. Year 4 of study completed in summer of 2025, most recent reports can be found [here](#). Ashawagh Hall Stormwater Abatement Project in East Hampton was initiated. Request for proposal found [here](#).

Healthy Ecosystems with Abundant Diverse Wildlife

Eelgrass

- PEP continues to collaborate with eelgrass experts from across the Northeast to develop a regional approach to eelgrass restoration while acting with local conditions and data. The TAC agreed to change the method of annual survey and the [Quality Assurance Project Plan](#) is complete. PEP finalized six new SeagrassNET Sites (based off [2024 Aerial Flyovers](#)): Bullhead Bay, Sag Harbor, Cedar Point, Coecles Harbor, Napeague Harbor, Orient Point. The Seagrass Monitoring Strategy can be found [here](#). Partnership with citizen science seagrass monitoring groups at additional sites in Lake Montauk, East Hampton, and Southampton: Concerned Citizens of Montauk, Peconic Bay Keeper, South Fork Sea Farmers & Springs School. Protocol can be found [here](#). Regionally, PEP is collaborating with partners to coordinate seagrass monitoring, restoration, and research throughout the Northeast including other National Estuary Programs to create a seagrass workgroup to discuss all NEP work and future program plans relating to seagrass. Most recent updates on this work can be found [here](#). PEP is continuing the processing of aerial imaging and radon tracing for groundwater refugia areas in the Peconic Estuary to identify areas for potential future restoration in mapped groundwater refugia areas. This is based on the success of the Coastal Watershed Grant project - most recent reports can be found [here](#).

Aquatic Connectivity

- The annual diadromous fish monitoring at Grangebél Park and the Byron Young Fish Pass occurs March 2026-June 2026. QAPP for this project can be found [here](#). Fish pass work at Upper Mills Dam has experienced severe delays due to the Land Use Agreement with the Town of Riverhead and the Long Island Power Authority. PEP is actively looking for funding sources to create the fish passage. eDNA pilot study for alewife and American eels with NYSDEC are underway with sampling from February 2026 to June 2026; validate citizen science and determine passage of diadromous fish throughout the Peconic River System. A draft of the sampling plan can be found [here](#). An “elevator” has been constructed and PEP is working with the Town of Riverhead and NYSDEC on appropriate siting and monitoring for next year. This is in response to a 2024 glass eel-kill that occurred in Grangebél Park.

Wetland Project Progress

- The Shelter Island wetland assessment project has successfully been awarded to a team to carry out the work. The RFP can be found [here](#). PEP has continued its partnership with stakeholders of

East Hampton Town’s **Accabonac Harbor**. We are working to **restore 140 acres of [salt marsh in Accabonac Harbor](#)**. Outreach on this project has continued as PEP has participated in Accabonac Protection Committee meetings, assisted in fieldwork led by US Fish and Wildlife Service and The Nature Conservancy to survey for Saltmarsh Sparrows and attended training workshops. The **Paul [Stoutenburgh Habitat Restoration Project](#)** aims to **restore six acres of salt marsh** and has completed an assessment of the hydrology of the southwest portion of the Paul Stoutenburgh Preserve. Engineering plans were completed and permits drafted for the town to correct the culvert to repair hydrologic flow to restore wetland area. The wetland restoration at **Indian Island is complete and restored 56 acres** on Terry’s Creek.

Wildlife Conservation Initiatives

- The Horseshoe Crab Action Plan was finalized and approved by PEP Committees. The suggested action plan can be found [here](#). Diamondback Terrapin work conducted under the 2023 PEP Mini Grant for satellite tagging of horseshoe crabs and diamondback terrapins was completed and the report can be found [here](#). A continuation of this work was proposed and approved by the Management Committee, the proposal can be found [here](#). The completion of the 2025 River Otter surveys conducted by Seatuck Environmental were approved by the TAC and monitoring will occur every five years. The final report and otter sighting map can be found [here](#). The Otter map [here](#). The project Sea Turtles and SAV Interactions is still underway, the most recent report can be found [here](#).

Research

- The Ecosystem-Based Model of the Peconic Estuary has been severely delayed due to staffing issues. This will continue in April 2026 and updates on this project can be found [here](#). The PEP Aquaculture Impact Study Phase I is complete and final reporting is underway [here](#). Phase II involves the investigation of aquaculture operations and their effect on invertebrates, sediment analysis, and discreet microenvironments in and around aquaculture operations. Phase II has completed the lab portion of the study and aims to continue the study with field experimentation and analysis. Link to Phase II presentation can be found [here](#).

Resilient Communities

- Shoreline Adaptation Initiative & Work Group: In partnership with New York Sea Grant (NYSG), PEP program office is co-chairing [an innovative and collaborative initiative](#) devoted to moving Long Island forward in the realm of living shoreline implementation and nature-based adaptations. This is a series of 1:1 information-gathering interviews with town planning departments, elected officials, and permitting entities. Progress is underway on a needs assessment and set of recommendations. The initiative began the contracting process with the Virginia Institute of Marine Science to adapt the established [Shoreline Management Model](#) used in the permitting process in Maryland to the Peconic estuary.
- PEP and New York Sea Grant partnered to advance the Shoreline Adaptation Initiative & Work Group by coordinating with towns, state agencies, contractors, and homeowners to streamline permitting, improve access to funding, and expand awareness of state programs supporting shoreline adaptation. Additionally, The *Peconic Estuary Shoreline Adaptation Viability Assessment* identified a clear set of needs, regulatory challenges, and opportunities to

strengthen shoreline adaptation. The assessment directly informed the development of several next-stage resources that will support municipalities, contractors, and homeowners. The Viability Assessment does the following:

- o Synthesis of stakeholder needs and challenges
- o Recommendations based on research, existing resources, and regional precedent
- o Next steps for regulatory and technical support development
- o Process maps outlining shoreline regulation across all jurisdictions and six townships
- The Peconic Estuary Shoreline Site Suitability Model Contracting Phase; the Partnership with the Virginia Institute of Marine Science (VIMS) to address data gaps in permitting, the PEP Hardened Shoreline Assessment Ground Truthing Completed; Final Report [here](#). The PEP Critical Lands Protection Strategy 2026 Update: Website interface drafted; tool to be developed with local government staff for highest impact.

Strong Partnerships and Engagement

- PEP staff has continued local and regional partnerships including the Atlantic Coast Joint Venture (ACJV) [Saltmarsh Sparrow restoration priority planning](#), Coastal Habitat and Resources Restoration and Management ([CHaRRM](#)) facilitating collaboration and communication among the mid-Atlantic coastal management stakeholders. PEP is also coordinating with other National Estuary Programs, the National Parks Service, and EPA on a regional effort to protect and restore seagrass.
- [The Long Island Watershed Program \(LIWP\)](#) (formerly the Long Island Nitrogen Action Plan; LINAP), PEP has partnered on an island-wide estuary program and collaborative outreach effort. This includes LIWP, the Long Island Sound Study, The New York State South Shore Estuary Reserve, and PEP. Aligned outreach messaging targeted to nitrogen reduction and clean water and health habitats on Long Island has led to a greater understanding of these issues. Through this partnership, PEP's long-running [Homeowner Rewards Program](#), has been expanded throughout Long Island. The Long Island Garden Reward Program expands to the other watersheds on Long Island using NYS and other funding.
- PEP participates in the Seatuck's [Long Island Diadromous Fish Work Group](#) along with other diadromous fish experts in order to discuss activities as it relates to diadromous fish on Long Island, as well as Seatuck's Beach Nesting Birds Workgroup. The Peconic Estuary Horseshoe Crab Workgroup was convened in 2024 to develop a draft [Horseshoe Crab Action Plan](#) to advance horseshoe crab conservation in the Peconic Estuary. PEP is an advisory member of the [Preserve Plum Island Coalition](#) and the [Peconic Estuary Protection Committee](#), an advisory member of the [Collaborative for the Earth at Stony Brook University](#), and served on the Suffolk County Working Waterfront Committee, and the Long Island Watershed Acton Plan planning committee.
- [Suffolk Alliance of Pollinators \(SAP\)](#): SAP is a coalition of local groups making Suffolk County a greener pollinator corridor through good gardening practices.
- [Suffolk County Hazardous Mitigation Steering Committee](#): Since the beginning of 2026, PEP has participated in the SC Hazardous Mitigation Steering Committee bi-monthly meetings. This group is tasked with developing a hazardous mitigation plan for Suffolk County in regard to emergency response protocols.

Conferences

- PEP staff attended several regional and local conferences including [Long Island Natural History Conference](#): and presented two posters on active fish passage in the Peconics and PEP’s seagrass management strategy. Zosterapalooza, an EPA-led regional seagrass conference, where our work with the University of Maryland was presented. Our work on initiatives to further engage other NEPs for increased collaboration and streamlined goals for seagrass management across NEPs on 3/25 and 3/26/2026. The ANEP TECH TRANSFER in Mobile Alabama occurred 11/11-11/14 2025 and the annual EPA-NEP meeting was March 17-18/2026. RAE Living Shoreline Summit: October 28-30th 2025. Accabonac Workshops: co-lead with The Nature Conservancy May 15-16th 2025 focused on engaging regulators in better understanding current scientific thinking regarding salt marsh stressors, impairments, and remedies. Mashomack Preserve two workshops lead by The Nature Conservancy, funded by the RAE Coastal Watershed Grant held Sept 11-12, 2025 and January 7-8, 2026.

2025 PEP Mini Grants – Peconic Estuary Partnership

- PEP launched the [2025 Mini Grant program](#) to implement projects that assists in accomplishing PEP’s 2020 Comprehensive Conservation Management Plan (CCMP) goal of Clean Waters for Ecosystem Health and Safe Recreation. The program staff has successfully advertised, received applications, formed a review committee, and scored applications for the 2025 Mini Grant Program. Winners were selected in December 2025, as follows:
 - Peconic River Litter Trap - **Peconic Baykeeper**
 - Creating an on-farm weather monitoring network to improve agricultural stewardship - **Cornell Cooperative Extension of Suffolk County, Agricultural Stewardship Program**
 - Green Infrastructure Installation: Stormwater Abatement at the East End of Harding Terrace (NB-2) to Protect Little Northwest Creek - **Ninevah Beach Property Owners' Association (NBPOA)**

Community Science Long Island Webinar Series 2026

- PEP has partnered with Long Island Sound Partnership, New York Sea Grant, South Shore Estuary Reserve, and the Seatuck Environmental Association to host the [Community Science Webinar Series](#). Community Science Long Island is an outreach series aimed at raising awareness for citizen science opportunities on Long Island and the importance of those projects in supporting research and local environmental management efforts.

Winter Walk Series with Peconic Estuary Partnership and Peconic Baykeeper 2025/26

- The Peconic Estuary Partnership and Peconic Baykeeper hosted our fourth annual [Winter Walk Series](#). Nature walks were held on December 12th at Montauk Point Trails, East Hampton, January 10th at Laurel Lake Preserve, Mattituck, March 27th Long Pond Greenbelt, Southampton, and March 14th Mashomack Preserve, Shelter Island.

PEP Citizens’ Advisory Committee Albany Education Day

- [PEP CAC](#) held their third annual Albany Education Day in February 2026. The purpose of this trip was to bring passionate stakeholders to meet with NYS representatives and DEC in Albany in

order to discuss the importance of the Peconic Estuary and Watershed, and the environment within our watershed.

Nitrogen Reduction Outreach

- PEP continues outreach to the public to [educate them on septic improvement](#), and encourage them to use available funding to upgrade their septic systems. PEP’s water quality outreach specialist holds continual presentations to civic and homeowner groups throughout the Estuary, informing homeowners on why they should upgrade and how to utilize grant funding to do so. During 2025, PEP Septic Improvement Outreach efforts reached 12,511 residents through post cards, and 360 people attended the 9 total presentations.

Homeowner Rewards Program

- The Peconic Estuary Partnership provides the [Homeowner Rewards Program](#), a unique opportunity for people who live within the Peconic Estuary watershed by providing up to \$500 to homeowners who replace turf and pavement with green alternatives. This includes rain barrels, rain gardens, and native plant gardens. PEP’s Homeowner Rewards Program will open for applications on March 16, 2026. During 2025, 23 homeowners received reimbursement through the program. In total, 3,580 sqft of native plant/rain gardens were installed and 7 rain barrels.

River Herring and Eel Survey

- The annual [Long Island Volunteer River Herring & Eel Survey](#) is one of Long Island’s longest running community science projects. The survey, organized by PEP, Seatuck, the Long Island Sound Study, and South Shore Estuary Reserve – aims to find the waterways where “remnant” runs of river herring still exist and then to monitor the size and timing of those runs. PEP held training events for several community groups willing to participate in the program. March 28th at The Mattituck-Laurel Library with Turtleback Environmental Education Center and March 23 at Big Reed Pond with Concerned Citizens of Montauk and Third House Nature Center.

Horseshoe Crab Monitoring at Squire’s Pond

- Each spring, Atlantic Horseshoe Crabs, *Limulus polyphemus*, come to shore during the new and full moon high tide in the evening to spawn. PEP is part of the [Horseshoe Crab Monitoring Network](#) hosting a monitoring site at Squires Pond at the end of East Landing Road in Hampton Bays. Info gathered by volunteers helps scientists learn more about the population by measuring size and tagging used to assess the status of horseshoe crabs in NY State, and will help determine the management and conservation of this important species.

Long Island Wildlife Monitoring Network

- PEP continued the highly successful citizen science partnership between Seatuck Environmental and PEP, the [Long Island Wildlife Monitoring Network](#). This initiative has held training, workshops, and led citizen science with partners throughout the PEP watershed. PEP initiated the creation of the Long Island Wildlife Monitoring Network in 2020 to make it easier for partners to collaborate and avoid overlap, and for the public to become aware of all the efforts going on around Long Island and to get involved with multiple citizen science programs.

General Events

- Since October 1, 2025 various events have been held including the following:
- [Spooky Stroll with PEP & PBK](#), Saturday, October 18, 2025 1, Hubbard County Park
- [Broad Cove Recreation Day with PLT](#), Saturday, November 15, 2025

- 2026 Montauk School Science Fair, Friday, February 6, 2026

III. PEP FY2026 Workplan

CCMP Goals

Strong Partnerships, Resilient Communities, Clean Water, and a Healthy Ecosystem are the four pillars of our foundation, The CCMP lays out 8 Objectives and 35 Actions that will guide PEP and our partners to address the challenges facing our watershed.

Budget and Staff Elements

Program Office Staff

The following outlines FY26 \$320 budget requests to support the Peconic Estuary Partnership Office to implement the CCMP. Costs include salary and fringe.

Program Office Staff Total EPA Cost: \$432,582 (total other sources: \$533,500)

Executive Director - Joyce Novak, PhD

Location: Suffolk County Department of Health Services, 300 Center Drive, Room 250S, Riverhead, NY
Responsibilities: Provides overall leadership to the program office, management and administration to the Program on behalf of the Management Conference.

Grants Manager - Jill Moretto

Location: Suffolk County Department of Health Services, 300 Center Drive, Room 250S, Riverhead, NY
Responsibilities: Manage Federal and Local Government Grants, track deliverables, invoices, and subawards.

Natural Resources Program Manager - Marissa Velasquez

Location: New York State Department of Environmental Conservation, Marine Resources Headquarters 123 Kings Park Blvd. (Nissequogue River State Park) Kings Park, NY
Responsibilities: Lead existing and develop new natural resource related projects in the watershed and acts as support for a variety of other projects carried out by the program office. Works closely with NYS DEC to coordinate habitat and wildlife related projects and PEP administrative tasks.

Communication and Outreach Manager - Valerie Virgona

Location: Suffolk County Department of Health Services, 300 Center Drive, Room 250S, Riverhead, NY
Responsibilities: Lead existing and develop new outreach and education activities for PEP focusing on the four goals laid out in the 2020 CCMP. Works closely with Stony Brook Research Foundation to coordinate activities in support of PEP.

Coastal Resilience and Communities Coordinator - Jade Blennau

Location: Suffolk County Department of Health Services, 300 Center Drive, Room 250S, Riverhead, NY
Responsibilities: Coordinates PEP watershed resilience initiatives including wetland restoration projects. Builds partnerships with the PEP local communities to foster a stronger understanding of the estuarine challenges and assist local governments in finding solutions.

Water Quality Outreach – Rachel Friedman (NYS & Local Government Funds)

Location: Suffolk County Department of Health Services, 300 Center Drive, Room 250S, Riverhead, NY
Responsibilities: Assist the Outreach Coordinator with communication around nutrient reduction. Help

to coordinate civic engagement about septic improvement and fertilizer use. Develop materials for distribution specifically focused on septic improvement and fertilizer reduction. Develop social media campaigns and update website regularly.

Budget Summary

Table 1: PEP EPA Budget Summary (Budget Details listed on page 42)

Item	FY26 Request	Notes
Personnel (salary & fringe)	\$ 432,582	See Budget Details on page 47
Travel	\$13,899	See Travel section on page 45
Equipment	\$0	
Supplies	\$1,053	Field supplies, field gear and office supplies
Contract	\$0	
Other	\$120,500	Website, CCMP Tracking System and GIS technical services, vessel and bus time at SBU, program Eval, office phone, printing, Mini-Grants, & internal SBU subaward to Shipley Lab
Total Direct	\$568,034	
Indirect (26%)	\$141,966	<i>IDC on direct charges @26% on all program office costs and the first \$50,000 of subawards</i>
Total EPA §320 Request	\$710,000	
NYSDEC Match	\$500,000	
East End Town Match	\$210,000	
TOTAL EPA §320 AWARD	\$1,420,000	
Suffolk County EPA §320 Funds Request	\$140,000	These funds will be detailed on the Suffolk County Grant Application for FY26
Suffolk County Match	\$140,000	This match will be detailed on the Suffolk County Grant Application for FY26
Total Project Cost	\$1,700,000	

FY26 Workplan

This workplan includes all projects which PEP plans to be involved with in the coming fiscal year. Projects that are funded under the Investment and Infrastructure and Jobs Act (IIJA; formerly referred to as Bipartisan Infrastructure Law or BIL) will be included in this workplan but no details will be provided. Full details of the IIJA projects will be included in the previously approved IIJA workplans, formerly referred

to as BIL workplans (IJJAYR12, IJJAYR2, etc) and approved by the PEP Management Conference. Each of these projects supports PEP’s 2020 CCMP, which also highlights PEP’s role as an active partner with other government agencies and nonprofits working in the Peconic.

Our continued focus on partnership results in some of PEP’s staff time focusing on supporting projects directed and funded by partners. In these cases, PEP staff is responsible for providing technical expertise, coordinating projects, and facilitation of collaboration as needed.

New FY26 §320 projects are identified in Table 2 with funding sources clarified; projects that are receiving new annual funding and are also ongoing are denoted with an asterisk in table 2. Ongoing projects that use previous years’ (FY22-FY25) funding and staff time for FY26 are identified in Table 3. The projects approved by the PEP Management Conference to be funded with the IJJA funding are identified in Table 4; while these funds are tracked under a separate agreement with EPA, they use current staff time and are therefore listed in our annual workplan.

Table 2: Summary of New Projects (FY26) including relevant CCMP Action

Project	CCMP Action	Primary Funding Body	PEP Role	Funding requested from FY26 §320 award
PEP Outreach	Actions 6,7,8 & 9	EPA/NYS/Local Government	Lead	Staff Time*
Mini-Grant Program	Goal: Clean Waters	EPA	Lead	\$94,500*
Terrapin SoMAS	Action 34	EPA	Support	\$22,000
Terrapin –CCE	Action 34	NYS (\$90,359)	Support	Staff Time
Water Quality Report 2027	Actions 17	NYS (\$35,000)	Lead	Staff Time*
SeagrassNET Monitoring	Action 30	NYS (\$75,000)	Lead	Staff Time*
Seagrass Aerial Imagery 2027	Acton 30	NYS (\$81,358)	Lead	Staff Time
Seagrass restoration pilot-monitoring yr 1	Action 30	NYS (\$22,000)	Support	Staff Time
Alewife Monitoring	Acton 29	NYS (\$15,120)	Co-lead	Staff Time*
HABs Priority Project Year 4	Action 19	NYS FY25 (\$120,000)	Support	Staff Time*
Clam Monitoring EH	Action 7,34, 35	Local Govt (\$45,500)	Lead	Staff Time

Communication Videos/photos	Action 6	Local Government (\$9,450)	Co-Lead	Staff Time
Project	CCMP Action	Primary Funding Body	PEP Role	Funding requested from FY26 §320 award
Paddle Event-Shelter Island	Action 6	Local Government (\$3,780)	Lead	Staff Time
South Fork Natural History Museum – school education programming	Action 5	Local Government (\$33,000)	Support	Staff Time
PRFCT Earth-professional education & Living Lands Program yr 2	Action 5, 18 & 20	Local Government (\$88,000)	Support	Staff Time*
Update Clean Water Website	Actions 6 & 17	Local Government (\$14,490)	Support	Staff Time
CAST-Permeable Pavement	Actions 6 & 21	Local Government (\$25,200)	Co-Lead	Staff Time
Litter Keeper	Action 22	Local Government (\$51,700)	Support	Staff Time
Mapping SGD Phase I - processing TIR imagery	Actions 18, 20, 21 & 30	Local Government (\$18,700)	Support	Staff Time
Three Mile Harbor PRB Monitoring at Tanbark Creek-year 5	Actions 5 & 18	Local Government (\$75,000)	Support	Staff Time*

*indicates projects that are ongoing but receive new funding in FY26

Table 3: Summary of Ongoing projects and CCMP Actions

Description	CCMP Action	Primary Funding Body	PEP Role	Funding requested from previous 320 award
<i>Goal: Strong Partnerships</i>				
PEP Outreach	Actions 6,7,8 & 9	EPA/NYS/Local Government	Lead	Staff Time
Recreational Map	Action 8	Local Government (\$32,392)	PEP	Staff Time

Mini-Grant FY25	Goal: Clean Water	EPA; Local Government (\$56,500)	Lead	Staff Time
CCMP Aligned Fellowship	CCMP All	Local Government (\$6,500)	Support	Staff Time
Description	CCMP Action	Primary Funding Body	PEP Role	Funding requested from previous 320 award
<i>Goal: Resilient Communities</i>				
Shoreline Adaptation Site Suitability Model	Action 11	NYS FY24 (\$114,122)	Lead	Staff Time
Shoreline Adaptation Initiative	Action 11	\$110,311 Total; EPA FY22 (\$15,278); NYSFY19 (\$46,742; FY21 (\$40,291); Local Government FY22 (\$8,000)	Co-Lead	Staff Time
CLPS Update and Education	Action 11	Staff Time	Lead	Staff Time
Peconic Land Trust Broad Cove Master Plan	Action 12	NYS FY24 (\$89,100) Phase 1: IJJA2 workplan (\$150,000) Phase 2: IJJA Y3 workplan (\$150,000)	Co-Lead	Staff Time
MARCO – Mid-Atlantic Carbon Project	Action 13	Staff Time	Support	Staff Time
<i>Goal: Clean Waters</i>				
Continuous Water Quality Monitoring (USGS)	Action 16	NYSFY18(\$164,504); Suffolk County (\$150,000); USGS	Lead	Staff Time
Water Quality Monitoring Collaborative	Action 17	EPA	Lead	Staff Time
Peconic Estuary Solute Transport Model	Action 17	NYSDEC	Support	Staff Time
LI Watershed Action Plan	Action 17	NYSDEC	Support	Staff Time
Lake Montauk Stormwater Management Plan	Action 18	Local Government (\$134,000)	Lead	Staff Time
SC Subwatershed Wastewater Plan	Action 18	Suffolk County	Support	Staff Time

HABs Priority Embayments Project (Year 3)	Action 19	NYSFY24 (\$119,957)	Support	Staff Time
PEPC	Action 21	Local Governments (\$56,000)	Support	Staff Time
Microplastics in the PE	Action 22	NYS22 (\$120,744); EEEEI (\$75,000)	Support	Staff Time
Description	CCMP Action	Primary Funding Body	PEP Role	Funding requested from previous 320 award
<i>Goal: Healthy Habitats</i>				
Ecosystem-Based Model of the Peconic Estuary	Action 23	NYSFY19 (\$200,000)	Support	Staff time
Peconic River Fish Pass – Upper Mills	Action 29	Suffolk County; NYSDEC, LIPA/PSE&G LIPA	Lead	Staff Time
Alewife Monitoring on the Peconic River	Action 29	NYSFY25 (\$12,000)	Lead	Staff Time
eDNA Monitoring of Diadromous Fish in the Peconic River System	Action 29	NYS (\$15,000)	Co-Lead	Staff Time
Alewife Creek Fish Pass	Action 29	Southampton Town	Support	Staff Time
Eelpass Installation at Bridal Falls Grangebel	Action 29	Local Governments FY23 (\$1,966)	Lead	Staff Time
Peconic SAV Coordination and Strategy Development	Action 30	Local Government FY23 (\$85,000)	Lead	Staff Time
Sea Turtle interaction with SAV in the Peconics	Action 30	Local Governments (\$100,000)	Lead	Staff Time
Facilitate Narrow River Wetland Restoration	Action 31	Ducks Unlimited, Town Southold, NYDEC	Support	Staff Time
Accabonac Harbor Saltmarsh Complex Restoration	Action 31	SC Capital budget total (\$150,000) SC Capital 2022 budget: (\$100,000); SC Capital budget 2018 (\$50,000)	Lead	Staff Time
Shelter Island Wetland Assessment & Planning	Actions 31 & 32	NYSFY24 (\$100,000)	Support	Staff Time
Aquaculture Impacts Study	Action 34	NYSFY23 (\$150,000)	Lead	Staff Time

FY26 Projects

CCMP GOAL: STRONG PARTNERSHIP AND ENGAGEMENT

ACTION 2: Maintain the CCMP Tracking System on PEP Website to report progress in implementing CCMP actions.

Performance Measure: Management of web-based CCMP Tracking System within three years of the final Revised CCMP.

CCMP Tracking System Management-Annual Management and GIS Updates

New/On-going

- a. **Estimated Budget:** FY26 \$12,000
- b. **Partners and their roles:** PEP (Lead); Stony Brook
- c. **Description and Objectives:** To continue to facilitate implementation of the 2020 CCMP, PEP will retain the services of the Geospatial Institute at Stony Brook University to update the tracking system and provide ongoing GIS to support the Program Office.
- d. **Outputs and Deliverables:** Maintenance of the on-line tool for tracking CCMP success. Up-to-date maps of program work products.
- e. **Estimated Milestones:** Annual updates with project maps provided as needed.
- f. **Long Term Outcomes:** PEP staff, our Management Conference and all partners will be able to easily track progress of all goals and actions of the CCMP and retain an online geospatial tool for telling the story of the estuary.
- g. **Clean Water Act Core Programs:** N/A
- h. **External Constraints:** N/A

Objective B (Overarching Priority Objective): Empower local communities to support estuary health

ACTION 6: Increase community members' awareness of the Peconic Estuary, key issues relating to the CCMP's Goals, and PEP as a resource to help them address the issues.

ACTION 7: Involve community members in citizen science programs to cultivate personal connections to the Peconic Estuary and inspire positive behavioral change to support Estuary health;

ACTION 8: Conduct outreach events and programs that engage community members in learning about the Peconic Estuary and taking action to support Estuary health;

Performance Measures: Includes all listed.

PEP Outreach

New & Ongoing

- a. **Estimated Budget:** Staff Time
- b. **Partners and their roles:** PEP
- c. **Description and Objectives:** Continued maintenance and creation of new partnerships as appropriate that expand outreach efforts, CCMP related information dissemination, and

maintaining and developing digital outreach activities and initiatives.

- d. **Outputs and Deliverables:** Based on the Communication Strategy and annual strategy development and implementation of social media and digital communication and outreach materials including up to four PEP Newsletters per year, PEP website, and beach clean-up.
- e. **Estimated Milestones:** CAC meetings (up to four)
- f. **Long Term Outcomes:** To achieve Objective B of the 2020 CCMP and empower communities to support estuary health
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

PEPC	Action 21	Local Governments (\$56,000)	Support	Staff Time
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PEP Outreach – Nutrient Reduction Concentration

New & Ongoing

- a. **Estimated Budget:** \$ 38,078 (local government) \$68,750 (NYS)
- b. **Partners and their roles:** PEP (lead), all towns and villages
- c. **Description and Objectives:** Carry out community meetings with civic associations and other community groups to discuss septic improvement and fertilizer reduction. Create content for social media and website about nutrient reduction, update social media and website regularly, content for PEP Newsletter.
 - Long Island Estuary Program Coordination
 - PEP Citizens’ Advisory Committee Albany Education Day
 - Nitrogen Reduction Outreach
 - Earth Day Alewife Walk with PEP and PBK
 - Homeowner Rewards Program
 - River Herring and Eel Survey
 - Long Island Wildlife Monitoring Network
 - Horseshoe Crab Monitoring
 - International Coastal Cleanup Day
 - A Day in the Life of the Peconic River
- d. **Outputs and Deliverables:** social media and digital communication and outreach materials, PEP Newsletter, PEP website content
- e. **Estimated Milestones:** at least one meeting per month, two Newsletters annually, and weekly nutrient focused social media post
- f. **Long Term Outcomes:** A more informed community base and nutrient reduction
- g. **Clean Water Act Core Programs:** Nutrient Reduction; Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs), Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** scheduling for community groups can be challenging

Communication Strategy Implementation

Ongoing

- a. **Estimated Budget:** \$100,000 (FY23-East End Economic and Environmental Institute-EEEEI)
- b. **Partners and their roles:** PEP (Lead); CAC
- c. **Description and Objectives:** The Communication Strategy will enable the program to most

effectively communicate science, ensure our communities are aware of issues facing the estuary, empower local governments to make positive changes in their municipalities, and highlight the work of the PEP. Strategy was approved by Management Conference in April 2026 and PEP Program office will work to implement the strategy under this workplan.

- d. **Outputs and Deliverables:** Strategy Document [completed](#).
- e. **Estimated Milestones:** Quarterly CAC meetings to guide this process
- f. **Long Term Outcomes:** More engaged communities and empowered local governments
- g. **Clean Water Act Core Programs:** N/A
- h. **External Constraints:** N/A

Recreational Map

Ongoing

- a. **Estimated Budget:** \$32,392 (FY25 workplan-Local Government)
- b. **Partners and their roles:** PEP (Lead), Local Governments
- c. **Description and Objectives:** To create a map of recreational access points within the Peconics.
- d. **Outputs and Deliverables:** The creation of a GIS map documenting location points for the public to recreate. The various activities allowed at each location will be included.
- e. **Estimated Milestones:** Fall 2027 contractor hired and project initiated
- f. **Long Term Outcomes:** More engaged communities and safe recreational opportunities.
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

PEP CCMP-Based Mini Grant Program

Ongoing

- a. **Estimated Budget:** \$125,000 (EP FY22 7 FY24), \$50,000 (Local Government FY22&FY24)
- b. **Partners and their roles:** PEP (Lead); Ninevah Beach Property Owners' Association, Cornell Cooperative Extension of Suffolk County, Agricultural Stewardship Program, Peconic Baykeeper, Local Governments.
- c. **Description and Objectives:** Three mini-grants were awarded in FY25 (using funds from FY22), Ninevah Beach Property Owners' Association (NBPOA) with Green Infrastructure Installation: Stormwater Abatement at the East End of Harding Terrace (NB-2) to Protect Little Northwest Creek, Cornell Cooperative Extension of Suffolk County, Agricultural Stewardship Program with Creating an on-farm weather monitoring network to improve agricultural Stewardship and Peconic Baykeeper with Peconic River Litter Trap
- d. **Outputs and Deliverables:** Seven projects in the watershed that work toward the completion of the 2020 CCMP.
- e. **Estimated Milestones:** Completion of seven projects and presentation to PEP Committees.
- f. **Long Term Outcomes:** More engaged communities that are working toward clean water and a healthier estuary.
Clean Water Act Core Programs: All
External Constraints: N/A

Communication Videos and Photos

New / Ongoing

- a. **Estimated Budget:** Staff Time, Local Government (FY26 \$9,450)

- b. **Partners and their roles:** PEP, Local Governments
- c. **Description and Objectives:** Create photo and video media to assist with implementation of Communication Strategy and continuous outreach for PEP projects.
- d. **Outputs and Deliverables:** Final Video and Photo deliverables
- e. **Estimated Milestones:** PEP office receives final edited photo and video, implementation within outreach to expand general education and knowledge of PEP projects.
- f. **Long Term Outcomes:** For use in outreach to the public
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

Paddle Event-Shelter Island

New

- a. **Estimated Budget:** Staff Time, Local Government (\$3,780)
- b. **Partners and their roles:** PEP, Local Governments
- c. **Description and Objectives:** PEP to host a kayak event in Shelter Island waters.
- d. **Outputs and Deliverables:** Hiring a kayak rental company, hiring a guide, and holding event.
- e. **Estimated Milestones:** holding kayak event
- f. **Long Term Outcomes:** Expanded knowledge and enjoyment of Shelter Island waters.
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

CCMP Aligned Fellowship Project

New & Ongoing-New Funding and Research Topic annually

- a. **Estimated Budget:** Staff time (\$6,000 Local government)
- b. **Partners and their roles:** PEP (Lead); Stony Brook SoMAS
- c. **Description and Objectives:** In FY21 PEP initiated the first PEP Fellowship with the Stony Brook University Marine Conservation and Policy Program. This fellowship is a competitive award open to students currently enrolled in this Graduate Program and requires project proposals to assist PEP with working toward one of the 35 actions listed in the 2020 CCMP.
- d. **Outputs and Deliverables:** Completion partial of CCMP Actions and/or research priorities
- e. **Estimated Milestones:** Presentation to TAC Committee, Presentation to Local Government Committee, Presentation to Management and Policy Committee.
- f. **Long Term Outcomes:** Increasing the visibility of PEP in the emerging local academic community, educating students on the mission of PEP and the importance of a healthy estuary, implementation of the 2020 CCMP
- g. **Clean Water Act Core Programs:** TBD
- h. **External Constraints:** N/A

ACTION 5: Strengthen engagement with related initiatives led by other entities

South Fork Natural History Museum – School Education Programming

New

- a. **Estimated Budget:** Staff Time, Local Government (\$33,000)
- b. **Partners and their roles:** PEP, South Fork History Museum, Local Governments
- c. **Description and Objectives:** South Fork Natural History Museum will include education about

the Peconic Estuary and PEP projects to their programing.

- d. **Outputs and Deliverables:** Teaching plan including Peconic estuary education, education to the public. Over 800 students engaged in the watershed.
- e. **Estimated Milestones:** lesson plans, field educations days, new partnership.
- f. **Long Term Outcomes:** Expanded knowledge of Peconic Estuary
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

ACTION 5: Strengthen engagement with related initiatives led by other entities

ACTION 18: Implement science-based approaches for monitoring and reducing nutrient pollution

ACTION 20: Conduct analysis to understand the sources of toxic contaminants and implement measures to reduce their impacts

PRFCT Earth- Professional Education & Living Lands Program Year 2

New/Ongoing

- a. **Estimated Budget:** Staff Time, Local Government (\$88,000)
- b. **Partners and their roles:** PEP, PRFCT Earth Project, Local Governments
- c. **Description and Objectives:** The Living lands program will run for a second year in partnership with the PRFCT Earth Project. This program meets people where they live, provides materials and education about chemical free landscaping and nutrient reduction on their property. The Professional education is a new endeavor with Stony Brook Southampton Campus and the FoodLab to provide adult continuing education aimed at landscape professionals and municipal maintenance crews.
- d. **Outputs and Deliverables:** Living Lands: 20 community meetings and educational materials; Professional Education: certificate program for continuing professional development at Stony Brook University.
- e. **Estimated Milestones:** community meetings and annual report.
- f. **Long Term Outcomes:** A more educated population, reduced acreage of private property that uses pesticides and fertilizers, educated practitioners.
- g. **Clean Water Act Core Programs:** Nutrient reduction
- h. **External Constraints:** N/A

Update Clean Water Website

New

- a. **Estimated Budget:** Staff Time, Local Government (\$14,490)
- b. **Partners and their roles:** PEP, Local Governments, Group for the East End
- c. **Description and Objectives:** Update the central website with information on septic improvement efforts and opportunities.
- d. **Outputs and Deliverables:** Updated website
- e. **Estimated Milestones:** Completion of website
- f. **Long Term Outcomes:** Better public understanding of septic improvement, and one central place to refer them to.
- g. **Clean Water Act Core Programs:** Nutrient Reducation
- h. **External Constraints:** N/A

ACTION 8: Conduct outreach events and programs that engage community members in learning about

the Peconic Estuary and taking action to support estuary health.

ACTION 22: Assess marine debris in the Peconic Estuary and develop plans to address problems that are found.

Litter Keeper

New

- a. **Estimated Budget:** Staff Time, Local Government (\$51,700)
- b. **Partners and their roles:** PEP, Peconic Baykeeper (lead), Town of Riverhead, Local Governments
- c. **Description and Objectives:** Marine debris is a serious concern in the nation’s waterways including the Peconic Estuary System. According to their estimates, 2,200 kg of this total volume is derived from the Peconic River. The versatility and cheap production cost of plastic has made it ubiquitous in the natural world, where it often makes its way into aquatic systems via stormwater. The EPA’s Escaped Trash Risk map, also highlights the Peconic River. This map attributes the system with high estimated litter densities of which over 80% is floatable. While point sources of marine debris contamination in the Peconic Estuary are unknown and nonpoint sources of contamination are difficult to mitigate, the estuary’s tributaries present opportunities to target floating debris, particularly debris resistant to biodegradation, before it enters the wider estuary system. Being the largest tributary of the Peconic Estuary with a highly developed commercial district near its endpoint, downtown Riverhead presents an ideal location to intercept floating waste from the Peconic River before it reaches further into the estuary. To mitigate this issue, Peconic Baykeeper, in partnership with PEP and the Town of Riverhead, proposes the purchase and installation of a “Bandalong Bandit” trash interceptor to be installed in the vicinity of Grangebél Park in downtown Riverhead.
- d. **Outputs and Deliverables:** Litter trap installation, remote monitoring camera installation, regular cleaning of litter trap, educational signage and unveiling event.
- e. **Estimated Milestones:** Installation of litter trap, unveiling event for litter trap.
- f. **Long Term Outcomes:** Reduction of marine debris, and better public understanding of this issue. This project will naturally generate partnerships and outreach as Peconic Baykeeper engages with the local community in Downtown Riverhead while providing opportunities for the community to take action to support the health of the estuary.
- g. **Clean Water Act Core Programs:** All
- h. **External Constraints:** N/A

ACTION 33 Implement living shoreline projects, monitor for ecological and financial benefits, and use model projects to ed

Objective C: Help local communities to take meaningful, well-informed action to prepare for and adapt to climate change impacts in the Peconic Estuary

ACTION 11 Provide tools and assistance to local government to mitigate and adapt to the impacts of climate change

ACTION 12 Mitigate climate change through coastal ecosystem management

Shoreline Adaptation Initiative

Ongoing

- a. **Estimated Budget:** EPA \$110,311; EPA (FY22 \$15,278); NYS (FY19 \$46,742; FY21 \$40,291); Local Government (FY22 \$8,000), Staff Time
- b. **Partners and their roles:** PEP (Lead); Sea Grant (co-Lead); NYS (Funding Body); Local Governments (Funding Body)
- c. **Description and Objectives:** The Shoreline Adaptation Initiative synthesizes information to

create resources and draft policy/process changes to align decision-making, goals, and interpretation of shoreline policies in the Peconic Estuary. Continued coordination of subgroups organized to advise PEP shoreline project priorities and tool development. Address current challenges related to thoughtful shoreline decision making within the Peconic Estuary.

- d. **Outputs and Deliverables:** Continued meetings with stakeholder groups, draft the documentation of regulatory agencies, property owners, & implementer’s shoreline permitting experiences to collaboratively find meaningful solutions. Outreach materials for each audience suggesting opportunities to better navigate process. [The initiative](#) finalized a [Peconic Estuary Shoreline Adaptation Viability Assessment](#), Literature Review, Outreach materials including fact sheets, Technical Resource Recommendations, and next steps. Virginia Institute of Marine Science will adapt the [Shoreline Management Model](#) used in Maryland to the Peconic estuary. This uses physical data for viable shoreline adaptation site suitability recommendations. This will be validated against local permit code. The Shoreline Adaptation Initiative works with SoMAS Geospatial Center to SAV mapping and hardened shoreline assessments to create a shoreline inventory for model use.
- e. **Estimated Milestones:** Coordination of three meetings per year with each permitting entity and a yearly educational workshop with all agency stakeholders.
- f. **Long Term Outcomes:** State and local governments coordinating to prioritize natural shorelines. Communities informed about shoreline adaptation issues and the value of natural shorelines. Develop technical tools to inform shoreline decision making.
- g. **Clean Water Act Core Programs:** Protecting Wetlands
- h. **External Constraints:** N/A

VIMS Model

Ongoing

- a. **Estimated Budget:** NYS FY 24: \$36,758 (VIMS); NYS 24: \$56,220 (SBU Geospatial)
- b. **Partners and their roles:** PEP (Lead); Virginia Institute of Marine Science (Lead); Stony Brook University Geospatial Center (Lead) New York State (Funder)
- c. **Description and Objectives:** This project is a result of the Sea Grant work carried out under the previous NYS award to develop workgroups which identified the need for shoreline modeling. The creation of a shoreline adaptation inventory and development of the PEP Shoreline Adaptation Site Suitability Model. Geospatial center will deliver geospatial datasets depicting the up-to-date coastal conditions and characteristics of the shoreline in the Peconic Estuary. This work will provide the geospatial information necessary to complete the [Shoreline Management Model \(SMM\)](#) developed by research teams at the Virginia Institute of Marine Science (VIMS). This will be used to inform decision-making by local managers in the State of NY. This geospatial data task recommends strategies for tidal shoreline erosion mitigation and shows users where a nature-based solution may be suitable. Stakeholder need for this model was documented through the work of the Shoreline Adaptation Initiative (PEP & NY Sea Grant Shoreline Project 2022) as available technical resources were identified as a major hurdle in the implementation of nature-based solutions.
- d. **Outputs and Deliverables:** Adaptation of the established Shoreline Management Model. The model will be developed alongside the program office and stakeholders gathered through the shoreline adaptation initiative. Model data will be input and validated alongside regulators for viable recommendations.
- e. **Estimated Milestones:** Information sharing at workshop and established workgroup meetings.
- f. **Long Term Outcomes:** Technical resource to facilitate State, County, and local governments working together to make decisions about shoreline adaptation and planning that prioritizes conserving natural shorelines. A more informed public on adaptation issues and the value and

importance of natural shorelines.

- g. **Clean Water Act Core Programs:** Preserving wetlands
- h. **External Constraints:** N/A

ACTION 10 Incorporate climate change considerations into new and existing projects of PEP and partner organizations

Continue to distribute information and tools developed in the Peconic Estuary Critical Lands Protection Strategy and Action Plan to municipalities within the watershed and work with the East End Towns.

Ongoing

- a. **Estimated Budget:** Staff time
 - b. **Partners and their roles:** PEP (Lead Partner), Local Governments, NY Sea Grant
 - c. **Description and Objectives:** PEP will update to the Peconic Estuary Critical Lands Protection Strategy to adhere to EPA Funding Guidance which requires the Peconic Estuary Partnership carry out a Coastal Vulnerability Assessment and Action Plan. PEP plans to update the existing tool with new data for land use, flooding, groundwater, and acquisitions to assist East End municipalities with planning decisions related to coastal protection. See [here for the existing CLPS story map and tool](#). PEP also plans to work with East End municipalities to develop model codes that will help increase coastal defense on the East End.
 - d. **Outputs and Deliverables:** Development of model codes and implementation of strategies in the Peconic Estuary Resilience Action Plan
 - e. **Estimated Milestones:**
 - f. Finalize CLPS update, begin to develop draft model codes for local implementation.
 - g. **Clean Water Act Core Programs:** N/A
 - h. **External Constraints:** N/A
- ACTION 13:** Collaborate on coastal and ocean acidification monitoring and research

Broad Cove Master Plan & Facilitator: Peconic Land Trust

Ongoing

- a. **Estimated Budget: \$70,000 Master Plan \$10,000 Facilitator**
- b. **Partners and their roles:** Peconic Land Trust (Property Owner), PEP (Partner), NYSDEC, Long Island Invasive Management Area (Project Partner)
- c. **Description:** Located at 40.9343657N -72.6235418W, Broad Cove, a 100-acre waterfront parcel on Flanders Bay in Aquebogue, a hamlet in the Town of Riverhead. The land, a former duck farm, long sought after for conservation, is now available for passive recreation, while also providing shoreline resiliency, wildlife habitat, and water quality protection in this part of the Peconic Bay Estuary. Flanders Bay East/Center and Tributaries) (<https://www.dec.ny.gov/chemical/31290.html>), has a nitrogen TMDL in place (https://www.dec.ny.gov/docs/water_pdf/tmdl/nitrpecn1.pdf), and this sub-watershed is a potential
- d. **Objectives:** Increased safe shoreline and water access; increased community knowledge natural shoreline flood protection, enhanced ecological community.
- e. **Outputs and Deliverables:** **Community meetings**, Master plan, and implementation of one plan feature prioritized by stakeholders.
- f. **Estimated Milestones:** The Peconic Land Trust will lead this project, master plan developed, and facilitator used for community engagement
- g. **Long Term Outcomes** This project is located between Meetinghouse and Terry's Creek, both

listed as impaired waterbodies on the NYSDEC Priority Waterbodies List.

- h. **External Constraints:** N/A

Shelter Island Wetland Assessment and Concept Plan

Ongoing

- a. **Estimated Budget:** NYFY24 (\$100,000)
- b. **Partners and their roles:** PEP (Co-lead), TBD (Co-lead), NYSDEC (Lead Partner)
- c. **Description and Objectives:** There has been a rapid loss of Shelter Island’s marsh islands in numerous creeks, including Dickerson Creek, Gardiner Creek and Hay Beach Pond. Additionally, the Long Island Wetlands Trends Analysis indicated Shelter Island has lost 45% of its overall marsh area from 1974 to 2005 and 20 wetland complexes were classified as “at risk” (>10% marsh loss). There is a need to assess the areas with large marsh loss and then develop restoration strategies, where appropriate. This has been assessed as a Tier 1 project in accordance with the Peconic Estuary Partnership’s 2020 Habitat Plan.
- d. **Estimated Milestones:** Identify, map, and assess current wetland extent. Conceptual designs for 3 priority wetland restoration sites.
- e. **Long Term Outcome:** Coordination of stakeholders group to guide project planning, creation of a desk-based assessment utilizing aerial imaging, shapefiles, and other mapping techniques to determine the status of the Shelter Island wetlands, and comprehensive field assessment of the wetlands
- f. **Clean Water Act Core Programs:** N/A
- g. **External Constraints:** N/A

Mid-Atlantic Regional Council on the Ocean (MARCO) – Mid-Atlantic Carbon Project

New

- a. **Estimated Budget:** Staff time
- b. **Partners and their roles:** PEP (Supporting Partner), NYSDEC (Lead Partner)
- c. **Description and Objectives:** MARCO has a new work group focusing on enhanced marine carbon dioxide removal (mCDR), coastal blue carbon accounting, and nature-based solutions to coastal ocean carbon uptake. Partnering with researchers at the Virginia Institute of Marine Science (VIMS) to compile existing data on Blue Carbon stocks in the Mid-Atlantic.
- d. **Outputs and Deliverables:** Collaborative document for the Mid-Atlantic Region.
- e. **Estimated Milestones:** Monthly meetings
- f. **Long Term Outcome:** A cohesive and collaborative approach to carbon removal using nature based solutions and working in tandem with regional partners and best scientific information available. Regional adoption of recommendations from the NY OA Task Force as appropriate for the watershed.
- g. **Clean Water Act Core Programs:** N/A
- h. **External Constraints:** N/A

CCMP GOAL: CLEAN WATERS

Objective D: Protect areas with clean water from degradation.

ACTION 16: Identify areas of clean water quality and deliver information that local governments and others can use to protect those areas.

Performance Measure: Annual review of water quality data and water quality monitoring programs with assessment and recommendation regarding changes to water quality data collection in order to adequately monitor all waterbodies in the Estuary.

ACTION 18: Implement science-based approaches for monitoring and reducing nutrient pollution.

Performance Measure: Work in conjunction with our partners to contribute to the NYSDEC effort to centralize water quality data with the creation of a portal to allow all interested stakeholders, such as local monitoring groups, non-profits, or governmental agencies, to share water-quality monitoring data through the Long Island Water Quality Information Data System (LIQWIDS).

Continuous Water Quality Monitoring

New & Ongoing

- a. **Estimated Budget:** \$180,000 (NYS)
- b. **Partners and their roles:** United States Geological Survey (USGS) (Lead Partner and Contracting Entity), PEP (Co-Lead), NYSDEC (Funding Entity), Suffolk County (Funding Entity)
- c. **Description and Objectives:** USGS maintains three continuous water quality monitoring stations in the Peconic Estuary, [Peconic River](#), [Orient](#), and [Shelter Island](#). These three monitoring stations complement the periodic sampling conducted by SCDHS. The stations provide high frequency measurements of key water quality parameters to allow long-term trend assessment.
- d. **Outputs and Deliverables:** USGS produces daily data reports, real-time data downloadable via the internet, incorporated by PEP staff into State of the Bays Report and used by researchers and partner other agencies.
- e. **Estimated Milestones:** Annual review with USGS and PEP. PEP Water Monitoring collaborative provides input to effectiveness and use of data.
- f. **Long Term Outcomes:** Water quality data will be used to assess environmental conditions in the Peconic Estuary and refine management programs as necessary. Based on water quality data, priority projects and research initiatives can be identified and the PEP can continue its success in efforts to protect and restore the Estuary.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A

Water Quality Annual Report

New/Ongoing

- a. **Estimated Budget:** FY26 \$35,000
- b. **Partners and their roles:** Stony Brook (Gobler Lab) (lead), Stony Brook SoMAS Geospatial Center (lead), PEP
- c. **Description and Objectives:** The development of an annual water quality report that links to the water quality app that delivers easy to understand results to the public to enhance the ability of municipalities to make management decisions.
- d. **Outputs and Deliverables:** Annual report
- e. **Estimated Milestones:** Data collection and collation and then report release.
- f. **Long Term Outcomes:** A more informed public and local governments.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals.
- h. **External Constraints:** N/A

Water Quality App and Data Platform

Ongoing

- a. **Estimated Budget:** \$27,720 (Local Government FY24).

- b. **Partners and their roles:** Stony Brook Geospatial Center, Suffolk County, USGS, and NYSDEC
- c. **Description and Objectives:** The development of an application to get water quality data easily from a phone, tablet or computer app. This will be an outreach tool used for teaching and community engagement as well as a way to share important water quality data. HABs will also be included in the App and will serve as a public outreach tool for HAB waters and human health.
- d. **Outputs and Deliverables:** An app that is user friendly and helps people make more informed decisions.
- e. **Estimated Milestones:** Data collection and collation and then app development and release.
- f. **Long Term Outcomes:** Water quality data will be used for citizens, local governments, community civic associations and schools to make better decisions about local water usage. Create a more informed watershed population.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals;
- h. **External Constraints:** N/A

Objective E: Increase understanding of nutrient pollution in groundwater and surface waters, and decrease negative impacts from legacy, current, and future nutrient inputs.

ACTION 17: Plan science-based approaches for monitoring and reducing nutrient pollution

Performance Measure: Collaborate with the NYSDEC to compile and update a database of completed nitrogen management projects within the Peconic Estuary watershed to guide current and future nitrogen management actions. Utilize database to track nitrogen reduction efforts within the watershed.

Long Island Watershed Action Plan (formerly Nitrogen Action Plan (LINAP))

New & Ongoing

- a. **Estimated Budget:** Staff time
- b. **Partners and their roles:** NYSDEC (Lead) and the Long Island Regional Planning Council (LIRPC), in partnership with numerous local governments and interested organizations on Long Island, Long Island Sound Study and the NYS South Shore Estuary Reserve. PEP (Supporting Partner)
- c. **Description and Objectives:** The Long Island Watershed Action Plan works to determine ecological targets and strategies to meet them. PEP and NYSDEC developed a Cross-walk document outlining specific actions where we can coordinate and future actions. As this partnership has grown, we worked together to expand the PEP Homeowner Rewards Program throughout Long Island (Long Island Garden Rewards Program), common messaging for fertilizer usage on Long Island, and streamlined nutrient reduction efforts.
- d. **Outputs and Deliverables:** Long Island Watershed Plan
- e. **Estimated Milestones:** Monthly calls/and or meetings between PEP and LINAP; participation in visioning meetings to develop the watershed plan.
- f. **Long Term Outcomes:** Streamlined plan that avoids duplication of efforts by partners and achieves a more efficient way forward for achieving nitrogen reduction goals and watershed protection in the Peconic watershed.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A

Performance Measure: Completion of the Peconic Estuary Solute Transport Model analysis to

understand historical nitrogen loading and to develop management strategies based on future scenarios.

Peconic Estuary Solute Transport Model

Ongoing

- a. **Estimated Budget:** Staff time, NYS 2015 Budget: \$750,000
- b. **Partners and their roles:** USGS (Contracting Entity), PEP (Supporting Partner), NYSDEC (Funding Entity)
- c. **Deliverables and Objectives:** Develop a solute transport model to be used in conjunction with the results of the Nitrogen Load Model to establish updated load reduction goals for non-point source loads.
- d. **Outputs and Deliverables:** A USGS report will document model development as well as analytical results for a limited set of representative wastewater management scenarios. The report will be designed with the dual purposes of 1) documenting the models and methods developed as part of the USGS investigation and 2) providing a detailed description of surface-water loading rates under changing land-based nitrogen-input conditions. Numerical models and data used to represent nitrogen source terms will be publicly disseminated as a separate web-hosted USGS dashboard, in accordance with USGS policies. PEP staff acts as project manager, coordinating all meetings and working in conjunction with the TAC on technical review of the body of work. PEP staff organize quarterly progress meetings, distribute summary minutes and work with USGS to gather the necessary data inputs for the model.
- e. **Estimated Milestones:** Modeling was due to be completed in FY22. Final product now due in 2025.
- f. **Long Term Outcome:** Reduce nitrogen loads to the Peconic Estuary towards attainment of the Peconic Estuary TMDL and ensure a healthy and productive estuarine ecosystem.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads.
- h. **External Constraints:** This project has experienced severe delays. Covid 19 caused a one-year delay followed by additional delays as the USGS worked to align this project with a Long Island-wide endeavor. PEP is waiting on the final report and dashboard tool to allow for easy use of the data by local municipalities.

ACTION 18: Implement science-based approaches for monitoring and reducing nutrient pollution.

Performance Measure: Phased Implementation of the Suffolk County Subwatershed Wastewater Plan to abate septic-related current and future nitrogen loading.

Three Mile Harbor PRB Monitoring at Tanbark Creek

New and Ongoing

- a. **Estimated Budget:** FY26 \$75,000; \$75,000 (FY25 Local Governments)
- b. **Partners and their roles:** East Hampton and Cornell Cooperative Extension (lead); PEP (Supporting Partner).
- c. **Description and Objectives:** In 2022, with New York State funds, the Town of East Hampton and Cornell Cooperative Extension installed a pilot oil injection Permeable Reactive Barrier (PRB) in Three Mile Harbor at Tanbark Creek. PEP has committed to funding five years of monitoring to assess success in nitrogen reduction at the immediate pore water monitoring wells and measure nitrogen reduction. A monitoring plan was developed prior to sampling.
- d. **Outputs and Deliverables:** Sampling will continue to occur at the frequency and location identified in the monitoring plan and nitrogen reduction will be assessed.

- e. **Estimated Milestones:** Quarterly calls/ and or meetings between PEP, East Hampton, and CCE.
- f. **Long Term Outcomes:** An understanding of the success of oil-injection PRBs.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs); Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A

Lake Montauk Stormwater Management Plan

Ongoing

- a. **Estimated Budget:** \$134,000 (Local Government funds)
- b. **Partners and their roles:** PEP (Lead); East Hampton (Funding Body)
- c. **Description and Objectives:** PEP will work with a consultant on stormwater abatement work in the Lake Montauk area of East Hampton.
- d. **Outputs and Deliverables:** Stormwater abatement work within the Lake Montauk area.
- e. **Estimated Milestones:** annual reporting, presentation to East Hampton community and committees
- f. **Long Term Outcomes:** A more informed community about the issues surrounding stormwater control. Actual increased flood control at the location.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** This project has experienced delays due to initial site selection. PEP continues to work with East Hampton to identify a site to complete this project.

Mapping SGD Phase 1- Processing TIR Imagery

New-Ongoing

- a. **Estimated Budget:** \$18,700 (Local Government funds)
- b. **Partners and their roles:** PEP (Lead); Old Dominion University (Co-lead); Stony Brook University (Partner)
- c. **Description and Objectives:** PEP will continue to support the work of researchers at Old Dominion University to continue mapping and producing TIR imagery for the remainder (Eastern half) of the Peconic Estuary. These TIR images will highlight areas of groundwater refugia through radon tracing, utilizing aerial imagery.
- d. **Outputs and Deliverables:** TIR imagery for the Eastern half of the Peconic Estuary; quarterly meetings and annual reports; final presentations to committees and local government groups.
- e. **Estimated Milestones:** Imagery of groundwater refugia pockets in the Peconic Estuary.
- f. **Long Term Outcomes:** Utilize the TIR imagery and coordinate with seagrass restorative planting efforts to look at the interaction between cooler water pockets and seagrass survival.
- g. **Clean Water Act Core Programs:** Identify areas of groundwater refugia; protection of large aquatic ecosystems
- h. **External Constraints:** none

Action 18: Implement science-based approaches for monitoring and reducing nutrient pollution.

Objective F- Reduce current and future inputs of toxins, pathogens, and marine debris into groundwater and surface waters, and to minimize their impacts.

Action 20: Conduct analysis to understand the source of toxic contaminants and implement measures to reduce their impact.

Action 21: Expand non-point source subwatershed management plans to all pathogen-impaired waterbodies and continue to use existing plans

Objective H- Restore and protect key habitats and species diversity in the Peconic Estuary and its watershed.

Action 30: Monitor and protect existing eelgrass beds; where appropriate, restore and expand eelgrass beds

Suffolk County Subwatersheds Wastewater Plan (SWP)

Ongoing

- a. **Estimated Budget:** Staff time
- b. **Partners and their roles:** Suffolk County Department of Health Services (funding agency), Long Island Sound Study, South Shore Estuary Reserve, PEP (Supporting Partner).
- c. **Description and Objectives:** The purpose of the SWP is to provide a wastewater management plan specific to all parcels within the priority subwatersheds of Suffolk County in order to meet the County’s first order of nitrogen load reduction goals for surface water restoration and the protection of groundwater and drinking water. In FY21, PEP established priority embayments to move forward the Water Quality strategy goals and based them off of the SWP priority areas.
- d. **Outputs and Deliverables:** PEP will continue to work with Suffolk County to identify communities in the high need area (Level 1) to focus PEP efforts for Septic Improvement and other nutrient reduction plans.
- e. **Estimated Milestones:** Quarterly calls/ and or meetings between PEP and Suffolk County.
- f. **Long Term Outcomes:** Streamlined plan that avoids duplication of efforts by partners and achieves a more efficient way forward for achieving nitrogen reduction goals in the Peconic watershed.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A
- i. **Performance Measure:** Increase funding and expanded outreach for PEP’s Homeowner Rewards Program, which provides financial incentives for homeowners to install rain gardens, native plantings, and/or rain barrels on their properties that benefit the environment.

Non-Point Source Reduction for Schools, Community Groups, and Homes

Ongoing

- a. **Estimated Budget:** FY24 \$15,000 (EPA), FY24 \$10,000 Local Government, (Local Government FY23 \$24,000)
- b. **Partners and their roles:** PEP (Lead); LINAP; LISS; SSER, Center for Advocacy and Support (CAST)
- c. **Description and Objectives:** For many years, The [Peconic Estuary Partnership \(PEP\) Homeowner Rewards Program](#) has provided financial rewards for homeowners, who live within the Peconic Estuary watershed, to add rain gardens, native plantings, and/or rain barrels to their properties. Simultaneously, the program educates the community about the benefits of rain gardens, rain barrels, and native plants for nitrogen reduction, stormwater pollution reduction, and other ecosystem benefits. In FY21, PEP began working with the NYS Long Island Watershed Action Plan, the Long Island Sound Study (LISS), and the NYS South Shore Estuary Reserve (SSER) to streamline our messaging about fertilizer use across Long Island. In FY23 and FY24 PEP worked with the Center for Advocacy, Support and Transformation (CAST) to install a native plant garden and install educational signs.

- d. **Outputs and Deliverables:** Installation and completion of sustainable landscaping projects on properties within the Peconic Estuary watershed.
- e. **Estimated Milestones:** Annual spring – fall season application period.
- f. **Long Term Outcomes:** Improve public’s understanding of benefits or sustainable landscaping and long-term and widespread behavior change favoring landscaping best management practices. Reductions in fertilizer use, pesticide use, water use, and the promotion of natural vegetation and benefits to pollinators and native fauna. Less fertilizer usage in the watershed, decreased stormwater runoff, and increased native plants and localized habitats.
- g. **Clean Water Act Core Programs:** Elements of this project prevent or mitigate the impacts of nutrient pollution; assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A

Center for Advocacy, Support, and Transformation (CAST) – Permeable Pavement

New

- a. Estimated Budget: \$25,200
- b. **Partners and their roles:** CAST (Lead), PEP (Lead)
- c. **Description and Objectives:** PEP is working with CAST to install permeable parking area at the CAST headquarters to address stormwater recharge and runoff.
- d. **Outputs and Deliverables:** Permeable parking Area implementation.
- e. **Estimated Milestones:** garden planting, signage installation, educational forums, permeable parking area completion.
- f. **Long Term Outcomes:** Decreased stormwater runoff
- g. **Clean Water Act Core Programs:** Elements of this project prevent or mitigate the impacts of nutrient pollution; assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** N/A

Action 19: Collate results of Harmful Algal Bloom (HAB) monitoring and deliver findings to support management decision making

Performance Measure: Implementation of the Suffolk County Harmful Algal Blooms Action Plan

HABs Priority Project

New and Ongoing

- a. **Estimated Budget:** \$120,000 (FY25 \$120,000 NYS) (FY24 \$119,957 NYS)
- b. **Partners and their roles:** PEP (Lead); Stony Brook (Lead); NYS (Funding Body), Local Government (Funding Body)
- c. **Description and Objectives:** In FY24 Stony Brook University completed the second year of study which has established a set of preliminary results for assessing the degree of nitrogen necessary to lessen the intensity of HAB events in priority Peconic Embayments. The HABs *Cochlodinium polykrikoides*, *Alexandrium*, and *Dinophysis acuminata* have recurred annually across the Peconic Estuary with intensities and impacts varying year-to-year. Continuing to investigate the role of nitrogen in different HAB species and the spatial and temporal availability will help estuary managers make more informed decisions about reducing nitrogen. This monitoring follows the recommendations of the 2017 Suffolk County HABs Action Plan
- d. **Outputs and Deliverables:** What level of nitrogen reduction will reduce HABs.

- e. **Estimated Milestones:** bi-annual reports and final report and presentations.
- f. **Long Term Outcomes:** A greater understanding of the drivers and dynamics of recurring HABs in the Peconic estuary.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** severe contracting delays with NYS funds due to PEP staff issues has led to delays in this project.

Objective F: Reduce current and future inputs of toxics, pathogens, and marine debris into groundwater and surface waters, and minimize their impacts

ACTION 21: Expand non-point source subwatershed management plans to all pathogen-impaired waterbodies and continue to use existing plans

Performance Measures: Development of strategies and outreach materials to help achieve stormwater reduction goals.

Performance Measure: Complete engineering designs, construction, and educational outreach for stormwater abatement at the Ashwagh Hall site.

Ashawagh Hall Stormwater Control

Ongoing

- a. **Estimated Budget:** \$110,000 (Local Government funds-FY25)
- b. **Partners and their roles:** PEP (Lead); East Hampton (Funding Body)
- c. **Description and Objectives:** PEP will work with a consultant to create a bioswale on the North side of the property, install permeable pavers, and install educational signs at the Ashawagh Community Hall in East Hampton.
- d. **Outputs and Deliverables:** Bioswale and permeable pavers installed and educational signage installed.
- e. **Estimated Milestones:** annual reporting, presentation to East Hampton community at Ashawagh Hall
- f. **Long Term Outcomes:** A more informed community about the issues surrounding stormwater control. Actual increased flood control at the location.
- g. **Clean Water Act Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them (TMDLs): Assessment of progress toward TMDL goals; refinement of implementation plan and TMDL goals for land-based loads; Elements of this project prevent or mitigate the impacts of nutrient pollution.
- h. **External Constraints:** none

Action 22: Assess Marine Debris in the Peconic Estuary and develop plans to address problems that are found.

Microplastics in the Peconic Estuary

Ongoing

- a. **Estimated Budget:** \$75,000 (EEEEI); \$120,744 (NYS funds)
- b. **Partners and their roles:** **Stony Brook (lead)** PEP (Partner), NYSDEC (Funding Entity), NYS Attorney General's office (Funding Entity).
- c. **Description and Objectives:** The identification of polymers, additives, and pigments can potentially tell us what the source of microplastic pollution in the environment is. Using a

- 3-dimensional chemical map will reveal certain particles beach debris.
- d. **Outputs and Deliverables: Source** identification of microplastic pollution in the Peconic Estuary.
 - e. **Estimated Milestones:** Quarterly reports and annual presentation to PEP Committees.
 - f. **Long Term Outcomes:** An understanding of the sources of microplastic pollution in the Peconic Bays to inform management decisions.
 - g. **Clean Water Core Programs:** Identifying Polluted Waters and Developing Plans to Restore Them.
 - h. **External Constraints:** NYS contract delays have led to project delays

CCMP GOAL: HEALTHY ECOSYSTEM WITH ABUNDANT, DIVERSE WILDLIFE

Objective G: Expand scientific understanding of the Peconic Estuary ecosystem and deliver information that supports management decision-making

ACTION 23: Conduct scientific studies to expand understanding of the Peconic Estuary ecosystem and support ecosystem-based management.

Performance Measure: Development of an ECOSIM model to characterize the estuarine food web and examine structural changes in ecosystem properties over time.

Performance Measure: Detailed spatial and temporal analysis of the Peconic Estuary trawl survey data to assess how species use the Estuary and how species and communities have responded to local and regional environmental changes over time.

Clam Sanctuary Monitoring in the Town of East Hampton

New

- a. **Estimated Budget:** \$45,500 (Local Government funds)
- b. **Partners and their roles:** PEP (Co-Lead); Stony Brook University (Co-Lead); East Hampton (Funding Body)
- c. **Description and Objectives:** PEP will work with Stony Brook University and hatchery staff at the Town of East Hampton, to assess the success of the town's decades long shellfish hatchery program. Researchers will monitor multiple locations where the town has planted clams, and determine parameters aligned with the monitoring protocol utilized in the NYS Long Island Shellfish Restoration Program.
- d. **Outputs and Deliverables:** Final reports and presentations; ability to present on findings to local shellfish workgroups in hopes to create spawner sanctuaries and assist in further development of monitoring programs throughout East End townships in the Peconic Estuary.
- e. **Estimated Milestones:** Annual reporting, presentation to the East Hampton Trustees and Water Quality Technical Advisory Committee. Presentation to PEP committees.
- f. **Long Term Outcomes:** Building capacity and providing skillsets to town employees to continue to monitor the success of a town-led program.
- g. **Clean Water Act Core Programs:** Monitoring shellfish
- h. **External Constraints:** none

Objective G: Expand scientific understanding of the Peconic Estuary ecosystem and deliver information that supports management decision-making.

Action 27: Facilitate spatial planning of the Peconic Estuary to help mitigate resource-use conflicts and ensure the protection of critical habitats.

Objective H: Restore and protect key habitats and species diversity in the Peconic Estuary and its watershed.

Action 35: Monitor results of shellfish restoration efforts, share findings, and encourage the creation of shellfish spawner sanctuaries.

Ecosystem-Based Model of the Peconic Estuary

Ongoing

- a. **Estimated Budget:** Staff time, \$200,000 NYS FY18 Funds
- b. **Partners and their roles:** PEP (Lead Partner), NYSDEC (Funding Entity), The Research Foundation at Stony Brook University (Contractor).
- c. **Description and Objectives:** Analyze spatial and temporal trends in the Peconic Estuary finfish trawl survey dataset and develop risk metrics from ecological relationships for the Peconic Estuary that examine whether local and regional environmental changes have increased the vulnerability of individual finfish and mobile invertebrate species, community assemblages, and ecosystem processes. ECOSIM is a quantitative modeling framework that can represent all major ecosystem functional groups and can be used to identify and assess structural changes in the ecosystem in response to environmental change. The proposed study will identify vulnerable species, critical habitats, and ecosystem properties within the Peconic Estuary. This information has direct application to decisions affecting the use, management, and conservation of the natural resources in the bay.
- d. **Outputs and Deliverables:** ECOSIM and ECOPATH Model, plan and facilitate meetings.
- e. **Estimated Milestones:** This project was delayed due to COVID-19. Originally due to begin in FY19, Stony Brook University was not able to begin this work until FY20. Model developed is anticipated to be complete by March 2024. Continued work to begin in May 2026.
- f. **Long Term Outcomes:** An understanding of the food web dynamics and organism/habitat interactions will allow for optimized planning for the Peconic Bays.
- g. **Clean Water Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External Constraints:** This project has experienced severe delay due to project staff vacancies.

ACTION 29: Maintain, restore, and enhance viable diadromous fish spawning and maturation habitat in the Peconic Estuary watershed.

Performance Measures: Restore and protect key habitats and species diversity in the Peconic Estuary and its watershed.

Performance Measure: Completion of the Woodhull Dam, Forge Road Dam, and Upper Mills Dam diadromous fish connectivity project on the Peconic River to restore 300 acres of habitat.

Complete design and construction of diadromous fish passage projects on the Peconic River Ongoing – details in project descriptions

- a. **Estimated Budget:** Staff time, Partner funds (details in project description section)
- b. **Partners & Roles:** PEP, Suffolk County, NYSDEC, East End towns and villages.
- c. **Description and Objectives:** Support fish passage construction in the Peconic River and its tributaries. During the upcoming year PEP and its partners are working towards opening up acres of freshwater spawning area to diadromous fish through the completion of fish passage projects. PEP will continue to support the design, permitting and construction of fish passage throughout the Peconic River. Descriptions, budgets, and anticipated external constraints for each project are listed below.
- d. **Outputs and Deliverables:** Successful completion of fish passage design, permitting and construction. Installation of eel pass at Grangebel Park.
- e. **Estimated Milestones:** Land Use Agreement for Upper Mills Fish Pass by Fall 2024, secure construction funds by June 2026.
- f. **Long Term Outcomes:** Restoring and strengthening ecosystem services, fish and wildlife of the Peconic Estuary will benefit from access to critical habitat, increased biodiversity and restoration

of historic food webs.

- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External Constraints:** This project has experienced severe delays due to the execution of a Land Use Agreement.

Eelpass at Bridal Falls in Grangebél Park, Riverhead

Ongoing

- a. **Estimated Budget:** \$1,966 (FY23 Local Government); Staff Time
- b. **Partners and their roles:** PEP (Lead); Suffolk County; Town of Riverhead, Seatuck Environmental, Long Island Diadromous Fish Workgroup
- c. **Description and Objectives:** American eel face a barrier from the Peconic River to the Little River which inhibits migration. This hopes to provide a temporary barrier crossing and plan for a more permanent solution.
- d. **Outputs and Deliverables:** A functioning eelpass at this location.
- e. **Estimated Milestones:** LI Diadromous Fish Workgroup meeting updates.
- f. **Long Term Outcomes:** A thriving American eel population in the Peconic River system
- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems
- h. **External Constraints:** N/A

Upper Mills Dam Fish Pass -Land Use Agreement

Ongoing

- a. **Estimated Budget:** Staff Time
- b. **Partners and their roles:** PEP (Lead); Suffolk County; Town of Riverhead, PSE&G/LIPA
- c. **Description and Objectives:** In FY21 the Engineering design and permitting was completed for the fish pass project at the Upper Mills Dam. This is a complicated site that will cross ownership boundaries between the Town of Riverhead, Suffolk County, and the power company PSE&G LIPA. During the course of this process, it was determined that before construction can begin, a land use agreement would need to be put in place so all parties are in agreement with the final installation of the fish ladder.
- d. **Outputs and Deliverables:** A signed land use agreement by all necessary parties.
- e. **Estimated Milestones:** PEP will carry out meetings as necessary and liaise with all entities to ensure this agreement moves forward.
- f. **Long Term Outcomes:** A legal agreement to allow for the construction of the fish ladder at Upper Mills
- g. **Clean Water Act Core Programs:** N/A
- h. **External Constraints:** N/A

Performance Measure: Completion of culvert improvements on Alewife Creek to enhance the largest alewife run on Long Island;

Performance Measure: Completion of priority diadromous fish habitat connectivity projects identified in the PEP Habitat Restoration Plan or Long Island Diadromous Fish Restoration Strategy, or through the Volunteer Alewife Monitoring Survey, in other areas of the Peconic watershed to restore additional habitat.

Complete design and construction of diadromous fish passage projects in other priority tributaries in the Peconic Estuary watershed

Ongoing – details in project descriptions

- a. **Estimated Budget:** Staff time, Partner funds (details in project description section)

- b. **Partners & Roles:** PEP, Suffolk County, NYSDEC, East End towns and villages.
- c. **Description and Objectives:** During the upcoming year PEP and its partners are working towards opening up acres of freshwater spawning area to diadromous fish through the completion of fish passage projects. PEP will continue to support the design, permitting and construction of fish in priority tributaries in the Peconic Estuary watershed. Descriptions, budgets, and anticipated external constraints for each project are listed below.
- d. **Outputs and Deliverables:** Successful completion of fish passage design, permitting and construction.
- e. **Estimated Milestones:** Meetings with partners to advance these projects.
- f. **Long Term Outcomes:** Restoring and strengthening ecosystem services, fish and wildlife of the Peconic Estuary will benefit from access to critical habitat, increased biodiversity and restoration of historic food webs.
- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External constraints:** Various constraints related to funding due to COVID19 and project details are outlined in the individual projects.

Alewife Creek –

Ongoing

- a. **Estimated Budget:** Staff time, \$410,000 NYS Climate Smart Communities Grant, \$410,000 Southampton Town Community Preservation Fund
- b. **Partners and Roles:** Town of Southampton (Lead), Diadromous Fish Work Group, PEP, NYS
- c. **Description and Objectives:** The Town of Southampton received a Climate Smart Communities Grant award to complete the engineering design and construction of the Alewife Creek Habitat Enhancement project which includes the right-sizing of the existing culvert under Noyack Road, reducing stormwater runoff and enhancing the ability of alewife to reach freshwater spawning habitat in Big Fresh Pond within the Town of Southampton. PEP will assist in guiding the design of the project. Culvert installation on Noyack Rd was completed in 2024. Ongoing discussions on the improvement of Alewife Creek will continue.
- d. **Outputs and Deliverables:** Retrofit of Noyack Rd culvert complete. Annual monitoring
- e. **Estimated Milestones:** Meetings with partners to advance these projects.
- f. **Long Term Outcomes:** Restoring and strengthening ecosystem services, fish and wildlife of the Alewife Creek area will benefit from access to critical habitat, increased biodiversity and restoration of historic food webs.
- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External Constraints:** none

Performance Measure: Development of an alewife survey to monitor the population and assess the success of fish connectivity projects.

Alewife Monitoring on the Peconic River

New & On-going

- a. **Estimated Budget:** \$12,000 (NYS) (NYSFY25 \$12,000; FY24 \$12,000); Staff time, Supply funds (EPA \$500 FY25)
- b. **Partners and Roles:** PEP (lead), NYSDEC, Suffolk County Community College, Hofstra, Peconic Baykeeper, Seatuck Environmental Association
- c. **Description and Objectives:** PEP completed an EPA and DEC approved QAPP for alewife monitoring in the Peconic watershed. This includes a coordinated effort to analyze video footage estimate alewife abundance. Additionally, we will continue to collect biological data (sex, size

and age) on the Peconic River alewife population with the assistance of partners and continue to promote and expand the Long Island Volunteer River Herring Survey. Abundance data will be used by the Peconic Estuary Partnership and our partners to evaluate the success of fish passage restoration efforts. Additionally, the data will be provided to the New York Department of Environmental Conservation and the Atlantic States Marine Fisheries Commission to aid in stock assessments and the management of alewife.

- d. **Outputs and Deliverables:** Annual alewife monitoring reports.
- e. **Estimated Milestones:** Annual alewife monitoring report winter 2023. Hold trainings in Winter 2026 for Volunteer River Herring Survey.
- f. **Long Term Outcomes:** Accurately track alewife abundance in the Peconic River, evaluate the success of fish passage restoration efforts and guide management of the species.
- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External Constraints:** N/A

eDNA Pilot Study to Monitor Diadromous Fish in the Peconic River System

New & On-going

- a. **Estimated Budget:** NYS (\$20,000), PEP Staff Time
- b. **Partners and Roles:** PEP (co-lead), NYSDEC
- c. **Description and Objectives:** PEP will be coordinating efforts in partnership with the marine fisheries division of the NYSDEC, to conduct a pilot study using eDNA methodologies to assess the populations of blue river herring and alewife within the Peconic River System. This project is the first step in hopes to validate sampling conducted by our citizen science partners, to investigate the utilization of constructed fish passes within the estuary's river systems, and to determine population dynamics of these species throughout the Peconic Estuary.
- d. **Outputs and Deliverables:** Assessment of eDNA as a tool for diadromous fish monitoring
- e. **Estimated Milestones:** Annual report of pilot study findings
- f. **Long Term Outcomes:** Utilize eDNA as a tool to determine presence, migration patterns, and potential abundance in the Peconic River Systems.
- g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
- h. **External Constraints:** N/A

Action 30: Monitor and protect existing eelgrass beds; where appropriate, restore and expand eelgrass beds

Performance Measure: Complete seagrass management strategy for the Peconic Estuary, and create a collaborative regional, NEP workgroup related to seagrass management and habitat maintenance/protection.

Peconic SAV Coordination and Strategy Development

Ongoing

- a. **Estimated Budget:** FY23 \$93,500 NYS Funds; Staff time; \$85,000 (FY23 Local Government funds)
- b. **Partners and their roles:** PEP (Lead Partner), (UMCES)
- c. **Description and Objectives:** Develop an SAV Management Strategy for PEP and Coordinate the North East Regional Collaborative for SAV management and preservation. Convene a PEP SAV workgroup and provide training to PEP and partners for emerging techniques of management and monitoring. Work with Dr Brad Peterson and Dr Joe Tamborski, co-recipients of the 2022 EPA Coastal Watershed Grant, as they develop results and use this for informed management decisions. Work with NYSDEC Eelgrass Coordinator to assist NYS in adherence of the Sea Grass

- Protection Act and the development of eelgrass management areas, as appropriate.
- d. **Outputs and Deliverables:** PEP Staff support, SAV Management Plan, SAV Workgroup, Training Materials, Regional Collaborative
 - e. **Estimated Milestones:** QAPP, Management Plan, Bi-Monthly meetings
 - f. **Long Term Outcomes:** Protection of existing eelgrass beds in the Peconic Estuary and expansion of eelgrass habitat, where feasible.
 - g. **Clean Water Act Core Programs:** protecting Large Aquatic Ecosystems.
 - h. **External Constraints:** N/A

Action 30: Monitor and protect existing eelgrass beds; where appropriate, restore and expand eelgrass beds

SeagrassNET in the Peconic Estuary

New

- a. **Estimated Budget:** \$75,000 (NYS FY25)
- b. **Partners and their role:** PEP (Co-lead), Stony Brook University (Co-lead), NYS (funding body)
- c. **Description and Objective:** Monitor a variety of seagrass beds throughout the Peconic Estuary by using the SeagrassNET protocol. PEP and partners are looking to develop a standardized, long-term data set to assess the health (annually) of seagrass beds in the Peconics.
- d. **Outputs and Deliverables:** Annual reports and presentation to PEP committees; contributing data sets to SeagrassNET, and NYS to assist with the development of future locations for Seagrass Management Areas.
- e. **Estimated Milestones:** Six established SeagrassNET sites in the Peconic Estuary. Annual monitoring to be conducted across all six locations.
- f. **Long Term Outcomes:** Contributing a large data set (overtime) through annual monitoring practices of various seagrass habitats throughout the Peconic Estuary.
- g. **Clean Water Act Core Programs:** Protecting Large Aquatic Ecosystems
- h. **External Constraints:** n/a

2027 SAV Aerial Flyovers

New

- a. **Estimated Budget:** \$81,358 (NYS)
- b. **Partners and their role:** PEP (lead), NYS (funding body), United States Geological Services (Partner), University of Rhode Island (Partner), Long Island Sound Partnership (Partner)
- c. **Description and Objective:** Complete and updated aerial survey of the Peconic Estuary for 2027.
- d. **Outputs and Deliverables:** Aerial map with ground-truthed areas to map and assess changes within seagrass habitats throughout the Peconic Estuary. GIS data layer that will be accessible to partners and the public and housed on the PEP GIS Data Hub.
- e. **Estimated Milestones:** Multi-year data to look at acreage changes in seagrass habitats
- f. **Long Term Outcomes:** Contributing a large data set (overtime) through annual monitoring practices of various seagrass habitats throughout the Peconic Estuary.
- g. **Clean Water Act Core Programs:** Protecting Large Aquatic Ecosystems
- h. **External Constraints:** n/a

Seagrass Restoration Pilot Monitoring – Year 1

New

- a. **Estimated Budget:** \$22,000
- b. **Partners and their role:** PEP (Co-lead), Stony Brook University (Co-lead), (funding body)
- c. **Description and Objective:** Monitor restoration success of seagrass planting efforts that came out of the RAE Coastal Watershed Grant.
- d. **Outputs and Deliverables:** Annual reports and presentations to committees, as well as regional seagrass workgroups.
- e. **Estimated Milestones:** Determination of restoration success rate of this planted seagrass area over a timeline of five years.
- f. **Long Term Outcomes:** Based on assessments observed through this monitoring plan, future expansion of this restoration practice could be utilized for seagrass throughout the Peconic Estuary
- g. **Clean Water Act Core Programs:** Protecting Large Aquatic Ecosystems
- h. **Performance Measurements:** Annual monitoring and annual reports discussing the success of restored seagrass plantings.
- i. **External Constraints:** n/a

Performance Measure: Complete construction of Narrow River/Broad Meadows Wetland Restoration
ACTION 31: Use available habitat quality assessment and resiliency tools to prioritize wetland restoration projects identified in the 2020 PEP Habitat Restoration Plan and implement the top projects.

Accabonac Harbor Saltmarsh complex Restoration

Ongoing

- a. **Estimated Budget:** \$180,000 (\$150,000 Suffolk County; \$30,000 The Nature Conservancy)
- b. **Partners and Roles:** PEP (project coordinator), Suffolk County (funder), TNC (funder and project lead), SMARTeams (contractor), Town of East Hampton (partner), and Accabonac Protection Committee (partner)
- c. **Description and Objectives:** The regional group of experts, Salt Marsh Adaptation & Resiliency Teams, or SMARTeams have piloted new techniques to address hydrologic dysfunction found within landscapes of salt marshes across the northeast region. This project will be amongst the first-of-its-kind restoration practice, with implications for marsh restoration approach across Suffolk County. PEP and Suffolk County Health Services is currently leading the next phase of design and permitting. This project will introduce an alternative to traditional high disturbance restoration to Peconic Estuary with a focus on designs based in historic farming legacy features in the landscape. The project will facilitate continued stakeholder engagement and education on this restoration approach that will allow for the implementation of these strategies on other properties as appropriate.
- d. **Outputs and Deliverables:** Expansion of conceptual designs to surrounding public lands of the marsh complex, permit-ready designs, and permitting as well as stakeholder engagement and education workshop that will align our resource managers with lessons learned across the region to advance large scale protection of wetland systems.
- e. **Estimated Milestones:** completed December 2025
- f. **Long Term Outcomes:** Enhancement of existing resources, coastal resilience, restoration of

degraded wetland.

g. **Clean Water Act Core Programs:** Wetland Protection

h. **External Constraints:** N/A

Performance Measure: Complete engineering designs for ongoing, priority wetland restoration project at Narrow River/Broad Meadows marsh.

Facilitate Narrow River Wetland Restoration Project

Ongoing

- a. **Estimated Budget:** Staff time
- b. **Partners and their roles:** PEP, NYSDEC (Co-Lead/property owner), Town of Southold (Co Lead/property owner), Ducks Unlimited (Co-Lead),
- c. **Description and Objectives:** In 2019 PEP completed a conceptual design plan for wetland restoration at Narrow River/Broad Meadows marsh. Narrow River is a tributary of the Peconic Bay and flows south from the Town's Whitcom Marsh Preserve under Route 25 and along the eastern side of Narrow River Rd in Orient, NY. NY State owns most of the properties on the east side of Narrow River Rd and the Town and County own farmland development rights on both sides of the road that includes tributaries to Narrow River. An earthen dam was constructed after the 1938 hurricane to prevent tidal flooding of the lands north of the dam. The western-most section of the dam blocked the tidal flow from Narrow River to the large meadow area north of the dam known as Broad Meadows and Whitcom Marsh Preserve north of Route 25. The dam was modified overtime to include culverts, but these culverts are no longer functioning as originally designed and allow very little water to drain to the south. Additionally, the wetlands north of the earthen dam and culvert to Whitcom Marsh Preserve, which were historically used for duck hunting, are currently choked with *Phragmites*. Remediation of the culvert and earthen dam is needed to improve the tidal exchange throughout the extent of the river and increase the salinity of the river. These actions will help to eradicate the *Phragmites* and will promote the reestablishment of native vegetation and important waterfowl and wading bird habitat. The potential extent of the restoration area is 80 acres.
- d. **Outputs and Deliverables:** Final engineering design, permitting, and implementation of wetland restoration at site
- e. **Estimated Milestones:** quarterly project meetings
- f. **Long Term Outcomes:** The benefits of habitat restoration efforts will be seen over a long period of time and will result in enhancement of existing resources and/or restoration of habitats that have been lost or degraded.
- g. **Clean Water Act Core Programs:** Wetland Protection
- h. **External Constraints:** Securing implementation funding could be a challenge due to the high cost of the project and the unique hydrology the project plan presents.

ACTION 33: Implement living shoreline projects, monitor for ecological and financial benefits, and use model projects to educate planners and homeowners on the benefits of living shorelines over hardened shorelines

Performance Measure: Dissemination of monitoring results from two pilot living shoreline projects;

Performance Measure: Development of user-friendly living shoreline guides for homeowners.

ACTION 34: Develop habitat protection and restoration strategies for key species in the Peconic Estuary and its watershed, including the river otter, diamondback terrapin, and horseshoe crab.

Performance Measure: Expansion of monitoring and research for river otters, diamondback terrapins and horseshoe crabs to understand habitat utilization and identify threats to these species.

Performance Measure: Development of estuary-wide habitat protection and restoration strategies for river otters, diamondback terrapins and horseshoe crabs

Diamondback Terrapins as Catalysts for Estuarine Conservation: Integrating Telemetry and Isotope Analysis to Advance Habitat Protection and Public Stewardship

New/Ongoing

- a. **Estimated Budget:** \$90,359 (NYS FY26); \$22,000 (EPAFY26) (NYSFY25 \$155,141)
- b. **Partners and their roles:** PEP (Lead), CCE (Lead), Stony Brook University (Co-lead), NYS (funding body), EPA (funding body)
- c. **Description and Objectives:** As a keystone species, terrapins help regulate coastal ecosystems and maintain salt marsh habitats by foraging on marsh periwinkles (*Littoraria irrorata*), which can overgraze grasses such as *Spartina alterniflora*. It has also been shown, through analysis of fecal samples, that terrapins forage on eelgrass (*Zostera marina*) and the attached epibiota, which can both facilitate seed dispersal and limit damage to the grass from grazers, a factor known to increase its susceptibility to disease. The loss of eelgrass meadows and salt marsh habitats has been a long-standing management concern for the Peconic Estuary Partnership (PEP). Therefore, confirming whether terrapins utilize and benefit from eelgrass habitats and *Spartina* would provide critical information to PEP and other stakeholders working to protect the estuary. This study will be conducted through comparative studies involving integrated telemetry and isotope analysis to determine movement patterns and terrapin interactions with habitat.
- d. **Outputs and Deliverables:** Annual reports and presentations, quarterly meetings and updates, all provided to PEP committees, NYSDEC, and EPA.
- e. **Estimated Milestones:** Annual reports and presentations; future protections for sentinel species and their habitats
- f. **Long Term Outcomes:** The benefits of habitat restoration and protection efforts will be seen over a long period of time and will result in enhancement of existing resources and/or restoration of habitats that have been lost or degraded.
- g. **Clean Water Act Core Programs:** n/a
- h. **External Constraints:** n/a

ACTION 34: Develop habitat protection and restoration strategies for key species in the Peconic Estuary and its watershed, including the river otter, diamondback terrapin, and horseshoe crab.

Performance Measure: Expansion of monitoring and research for river otters, diamondback terrapins and horseshoe crabs to understand habitat utilization and identify threats to these species.

Performance Measure: Development of estuary-wide habitat protection and restoration strategies for river otters, diamondback terrapins and horseshoe crabs

Continue to expand monitoring of key estuary species and convene a sub-workgroup to develop a habitat restoration and protection strategy for horseshoe crabs.

Ongoing

- a. **Estimated Budget:** Staff time
- b. **Partners and their roles:** PEP (Lead Partner), Seatuck Environmental Association (contractor), CCE, NYSDEC
- c. **Description and Objectives:** In FY21, the through the Long Island Wildlife Monitoring Network, PEP will continue to expand monitoring of key estuary species, including river otters, diamondback terrapins, and horseshoe crabs (see Outreach and Education Task 4). Additionally, Seatuck convened two meetings of the sub-workgroup of the NRS to identify current monitoring

gaps for horseshoe crabs and work on the development of an estuary-wide habitat restoration and protection strategy. The development of a strategy for horseshoe crabs has been identified as a priority by the NRS.

- d. **Outputs and Deliverables:** Increase monitoring for key estuary species and development of a habitat restoration and protection strategy for horseshoe crabs in the Peconic Estuary
- e. **Estimated Milestones:** Meetings with the horseshoe crab sub-workgroup and other relevant partners/stakeholders, as appropriate.
- f. **Long Term Outcomes:** The benefits of habitat restoration and protection efforts will be seen over a long period of time but will result in enhancement of existing resources and/or restoration of habitats that have been lost or degraded.
- g. **Clean Water Act Core Programs:** Wetland Protection
- h. **External Constraints:** N/A

Objective G Expand scientific understanding of the Peconic Estuary ecosystem and deliver information that supports management decision-making

Action 23. Conduct scientific studies to expand understanding of the Peconic Estuary ecosystem and support ecosystem-based management

Action 24. Review and update data for rare, protected and endangered species in the Peconic Estuary to support the development of protection strategies

Wildlife Conservation Initiative

Ongoing

- a. **Estimated Budget:** Staff Time; \$32,500 Local Government funding (FY24)
- b. **Partners and their roles:** PEP (Lead Partner), Seatuck Environmental Association, CCE, Stony Brook University, NYSDEC
- c. **Description and Objectives:** PEP will work with Seatuck to carry out 2023-2024 Otter monitoring and develop a conservation plan for otters in the Peconic watershed. The plan will work with NYSDEC and other partners to develop a series of actions and recommendations for otter conservation. This initiative will also see the coordination of a new Horseshoe crab conservation plan and Seatuck will develop a stakeholder group to work with Cornell Cooperative extension, Stony Brook University, NYSDEC and others to gather data and make initial recommendations for moving forward.
- d. **Outputs and Deliverables:** 2023-2024 otter monitoring results, otter conservation strategy, and horseshoe crab stakeholder group, initial horseshoe crab conservation recommendations for next steps.
- e. **Estimated Milestones:** Bi-monthly meetings for otter strategy development; quarterly meetings for horseshoe crab stakeholder coordination.
- f. **Long Term Outcomes:** The benefits of habitat restoration and protection efforts will be seen over a long period of time, but will result in enhancement of existing resources and/or restoration of habitats that have been lost or degraded.
- g. **Clean Water Act Core Programs:** N/A
- h. **External Constraints:** N/A

Objective G Expand scientific understanding of the Peconic Estuary ecosystem and deliver information that supports management decision-making

Action 23. Conduct scientific studies to expand understanding of the Peconic Estuary ecosystem and support ecosystem-based management

Action 24. Review and update data for rare, protected and endangered species in the Peconic Estuary to support the development of protection strategies

Sea Turtle interaction with SAV in the Peconics

Tracking post-release movement patterns of New York's rehabilitated sea turtles provides insights into their utilization of New York waters

New

- a. **Estimated Budget:** Staff time; \$73,600 (local government funding)
- b. **Partners and their roles:** New York Marine Rescue Center (Lead), PEP (Support); Local Governments (Funding Body)
- c. **Description and Objectives:** The aim of this project is to monitor the post-release movement patterns of sea turtles that have been rehabilitated at New York Marine Rescue Center (NYMRC) utilizing satellite tags. Using data obtained from these tags, we seek to further understand sea turtle utilization of New York waters and identify important potential habitats and foraging grounds for four species of turtle. This data will be able to address action items outlined within the Comprehensive Conservation and Management Plan (CCMP)
- d. **Outputs and Deliverables:** A final document and map-based tool to track interactions.
- e. **Estimated Milestones:** Quarterly meetings and final report
- f. **Long Term Outcomes:** Data collected from these tags support the rehabilitation efforts put forth by NYMRC and illustrate the post-release movement behavior of the once stranded sea turtles (Caillouet et al., 2016; Robinson et al., 2020). Data from these turtles provides crucial information on local foraging in New York state and federal waters in the late summer and fall.
- g. **Clean Water Act Core Programs:** Protecting large aquatic ecosystems
- h. **External Constraints:** N/A

Aquaculture Impacts Study (Phase 1)

Ongoing

- a. **Estimated Budget:** Phase I: \$150,505 (NYS PEP-EPF Funding FY23)
- b. **Partners and their roles:** PEP (Lead); Stony Brook ; NYS (Funding Body)
- c. **Description and Objectives:** Shellfish aquaculture, can provide a range of ecosystem services beyond food supply, such as creating habitat for fish species, augmenting the spawning potential of native shellfish populations, and improving water quality by increasing filter feeder abundance. However, to-date there has been no scientific investigations to evaluate the impact of aquaculture operation on ecosystem function and services in the Peconic Estuary. This is a two-part project. Shellfish aquaculture cages may act as artificial reefs, attracting greater numbers of fish than found on bare bottom, but there is currently no data on which species are attracted and to what density, nor an understanding of why fish utilize these structures (e.g., food source, shelter from predation or refuge from current flow). The proposed research will address critical questions raised by regulatory agencies and substantially advance the understanding of how aquaculture operations influence Peconic fish communities.
- d. **Outputs and Deliverables:** An understanding of the ecology surrounding oyster aquaculture equipment and effects these operations are having on the Bay.

- e. **Estimated Milestones:** One year report and presentation.
- f. **Long Term Outcomes:** A better understanding of aquaculture in the Peconic Bays;
- g. **Clean Water Act Core Programs:** Protecting large aquatic ecosystems.
- h. **External Constraints:** N/A

Aquaculture Impacts Study (Phase 2)

Ongoing

- a. **Estimated Budget:** \$150,000 (funding NYSFY23)
- b. **Partners and their roles:** PEP (Lead); Stony Brook; NYS (Funding Body)
- c. **Description and Objectives:** Building off of Phase I of this project, Phase II will involve the investigation of aquaculture cages and operations and their effect on invertebrates, sediment analysis, and discreet microenvironments in and around aquaculture operations. The data provided through this project will allow linking environmental conditions to oyster filter feeding behavior and oyster aquaculture productivity which will be useful for the aquaculture community. It will also quantitatively assess co-benefits of oyster aquaculture with respect to water quality improvements through removal of particles (including organic matter and nitrogen within) from the water column which is expected to vary between sites and operation types. Such information would be relevant to inform water quality improvement strategies and nutrient credit trading programs in which oyster growers would be compensated for the nutrient removal provided by their oysters in addition to bio-extraction through the oyster harvest. Information on the structure and composition of repacked organic material in combination with hydrodynamic models of the Peconic Estuary can be used to determine the likely fate of this material for different aquaculture locations and operation types.
- d. **Outputs and Deliverables:** An understanding of the ecology surrounding oyster aquaculture equipment and effects these operations are having on the Bay.
- e. **Estimated Milestones:** One year report and presentation.
- f. **Long Term Outcomes:** A better understanding of aquaculture in the Peconic Bays;
- g. **Clean Water Act Core Programs:** Protecting large aquatic ecosystems
- h. **External Constraints:** N/A

IV. BUDGET DETAILS

Resources Requested

The total requested in this PEP budget to Stony Brook is **\$710,000**. This grant will be complimented by a request for PEP support to Suffolk County Department of Health Services in the amount of **\$140,000** and together these two components make up the full Peconic Estuary Partnership FFY2026 workplan for a total grant request of \$850,000.

Non-Federal Match: NYSDEC (\$500,000) and Local Governments (\$210,000) will provide **\$710,000** for the Stony Brook RF grant application (CE 96247002). Suffolk County will provide **\$140,000** to match the grant application for Suffolk County Department of Health Services (CE-99200222-2).

Travel Costs

Table 5: Trips Anticipated for PEPFY2026

Date	Meeting/Event	Purpose	Destination	Number of Staff	Estimated Cost

Fall 2026	ANEP meeting	Fall	Tech Transfer	Corpus Christi, TX	4	\$8,000
March 2027	NEP-EPA		EPA HQ	Washington DC	2	\$4,000
April 2027	LI Natural History		Local Tech Transfer	Long Island	6	\$ 650
April 2027	Association of Science Communicators		Optimize Outreach	Raleigh, NC	3	\$4,000
10/1-9/30	Local Travel		Partnership	East End of Long Island	6	\$7,000

Table 6: Trips Taken During PEPFY2025

Date	Meeting/Event	Purpose	Destination	Number of Staff	Final Cost
November 2025	CERF	Conference	Virginia	2	\$4,000
March 2026	EPA-NEP	Tech Transfer	Washington, DC	2	\$3,000
February 2026	CAC Albany Education Trip	Education of representatives and DEC staff on PEP work	Albany, NY	4	\$700
March 2026	Zoosterapalooza	Zostera Tech Transfer Meeting	Boston, NY	1	\$700
Nov 2025	NEP Tech Transfer	Travel and hotel for NEP Tech Transfer	Mobile Alabama	2	\$5,000
Local Travel	Long Island,	Meetings, presentations, events	Long Island	6	\$8,000

Detailed Budget

Table 7: Detailed PEP FY26 Budget

Item	Detail	FY26 Request	Notes
Personnel	Salary & fringe	\$432,581	Executive Director, Natural Resources Program Manager, Outreach & Communication Manager, Grants Manager, Water Quality Outreach, and Coastal Resilience and Communities Coordinator
<i>Salary</i>	<i>\$316,909</i>		
<i>Fringe (36.5%)</i>	<i>\$115,672</i>		
Travel		\$13,899	See Travel section on page 45
Supplies		\$1,053	Supplies: items include office supplies, field gear for wetland assessment and restoration including boots, waders, etc, field gear for eelgrass survey (dive masks, wetsuits, fins, tank and gear rental, boat dry gear).
Other		\$120,500	
<i>Program Evaluation 2027</i>	<i>\$2,000</i>		Vessel time/bus use/materials
<i>PEP website/office printing/phone</i>	<i>\$6,500</i>		Costs related to website updates and maintenance, office printing, office phones
<i>PEP database - Geospatial Center tracking system maintenance, CCMP</i>	<i>\$12,000</i>		SoMAS Geospatial Center GIS services, server maintenance, and online tracking tool maintenance
<i>Printing, professional</i>	<i>\$2,500</i>		Professional printing of materials:
<i>Minigrant</i>	<i>\$75,500</i>		Mini-Grant Program-item included in total 'Other' request - IDC of 26% is included in the <i>Indirect</i> row. It will be three grants at \$25,166 each (entities TBD)
<i>Terrapin Work (Dr. Shipley, SBU internal, no IDC)</i>	<i>\$22,000</i>		Dr Shipley from SoMAS SBU will conduct fieldwork associated with the capture and biological sampling of Diamondback Terrapin including analysis, report writing, overall project management and implementation.
Total Direct		\$568,033	

Total Indirect (26%)		\$141,967	Subawards and contracts have 26% applied to the first \$50,000
Total EPA §320 Funds Request		\$710,000	
NYSDEC Match		\$500,000	
East End Town Match		\$210,000	
TOTAL Stony Brook EPA §320		\$1,420,000	
Suffolk County EPA §320 Funds		\$140,000	Funds detailed on Suffolk County Application FY24
Suffolk County Match		\$140,000	Match detailed Suffolk County Application FY24
Total EPA §320 Project Cost		1,700,000	