NEW YORK STATE

Department of Environmental Conservation

Water Quality Improvement Projects and Non-Ag Nonpoint Source Planning and MS4 Mapping Grant

Division of Water

MAY 2025

Division of Water Grant Programs

$1.7 Billion
Provided to Water Quality Implementation Projects Since 1997

$9 Million
Provided to Support Planning Efforts Since 2019

2,156
Grants Awarded

Non-Agricultural Nonpoint Source Planning & MS4 Mapping Grant (NPG)

Nonpoint Source Planning Grant (NPG) Overview

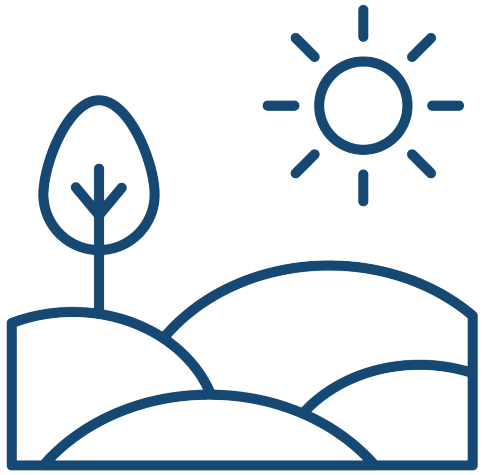
- Competitive, statewide planning grant to help pay for:
  - Planning reports, such as engineering feasibility studies, needed for implementation projects
  - Municipal Separate Storm Sewer System (MS4) stormwater system mapping
- $3 million awarded in 2024 for 38 projects
- Funding is provided through the NYS Environmental Protection Fund

Application Information – Planning Reports

Eligible Applicants:

- Municipalities
- Soil and water conservation districts

Maximum Applications: 5 per round



Application period:

- May – July in the Consolidated Funding Application (CFA)

Maximum available funding: (dependent on project type)

- $50,000 - $75,000

Match requirements:

- 10% of requested funding

2024 Eligible Planning Report Types

- Decentralized Wastewater Treatment Facilities for Failing On-Site Treatment Systems
- Green Infrastructure
- Stormwater Retrofits
- Streambank/Shoreline Stabilization
- Comprehensive Stream Corridor Assessment
- Stream Sediment and Debris Management Plan
- In-Waterbody Controls for Nutrients
- Bathing Beach Restoration
- Stream Culvert Repair and Replacement
- Berm Removal
- Floodplain Creation/Restoration/Reconnection
- Wetland Creation/Restoration
- Coastal Storm Erosion Risk Management
- Winter Road Maintenance
- Dam Safety Repair/Rehabilitation and Dam Removal

Application Information – MS4 Mapping

Eligible Applicants:

- Municipalities regulated by the MS4 General Permit
- Soil and water conservation districts on behalf of regulated MS4 Operators

Maximum Applications: 1 per round

Application period:

- Early May – July in the Consolidated Funding Application (CFA)

Maximum available funding: (dependent on project type)

- $60,000 - $400,000

Match requirements:

- 10% of requested funding

Application Information – MS4 Mapping

- Final deliverables:
  - Final map product
  - Final summary report
- Applicants encouraged to cooperate with other regulated municipal MS4 operators
- Mapping must meet MS4 permit requirements
- Must create, use, or expand on GIS mapping
- Basic mapping must be done before other mapping

Water Quality Improvement Projects (WQIP)

Water Quality Improvement Project Overview

Overview:

- Competitive, statewide implementation grant
- Projects that:
  - Improve water quality or habitat
  - Promotes flood risk reduction, restoration, and enhanced flood and climate resiliency
  - Protects a drinking water source
- Over $220 million awarded in 2024 for 127 projects

Funding Sources:

- Clean Water Infrastructure Act
- Environmental Protection Fund
- 2022 Clean Water, Clean Air, Green Jobs Environmental Bond Act
- Federal Watershed Specific Funding

Application Information

Eligible Applicants:

- Municipalities, including municipal corporations and Indian Nations
- Soil and water conservation districts
- Not-for-profit corporations can apply for:
  - Land Acquisition for Source Water Protection
  - Dam Safety Repair/Rehabilitation and Dam Removal
  - Aquatic Connectivity Restoration
  - Marine District Habitat Restoration
  - Fish and Wildlife Habitat Restoration

Application period:

- May – July in the CFA

Maximum available funding:

- $100,000 - $15 million (Depending on project type)

Match requirements:

- 25% of requested funds

2024 Eligible Project Types

- Wastewater Treatment Improvement
- Non-Ag Nonpoint Source
- Vacuum Truck in MS4 Areas
- Land Acquisition for Source Water Protection
- Salt Storage and Road Salt Reduction
- Dam Safety: Rehab or Removal
- Aquatic Connectivity Restoration
- Marine District Habitat Restoration
- Fish and Wildlife Habitat Restoration

Technical Assistance

Community Assistance Team (CATS)

Community Assistance Teams work with municipalities to help them access water infrastructure funding, with a focus on small, rural, and disadvantaged communities.

CATs provides:

- Consultations about eligibility and program benefits
- Support in listing your project on the Intended Use Plan (IUP)
- Guidance on state and federal public funding requirements
- Connections to other potentially relevant state agencies and funding sources

Scan to Connect with EFC

- Request a meeting
- Signup for emails to learn about local outreach events and the latest funding opportunities
- Register for our monthly virtual Q&A sessions

https://efc.ny.gov/cat

Contact (518) 402-7081 or efc.dl.CommunityAssistance@efc.ny.gov

Web Resources

WQIP on the web:

https://dec.ny.gov/get-involved/grant-applications/wqip-program

NPG on the web:

https://dec.ny.gov/get-involved/grant-applications/non-agricultural-nonpoint-source-planning-ms4-mapping-grant

Contact Information

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Water Assessment and Implementation
NYS DEC

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General Contact: dowgrants@dec.ny.gov

Department of Environmental Conservation

MUNICIPAL INFRASTRUCTURE
"PROJECT PLANNING & IMPLEMENTATION"
Analysis of an award-winning project

Carrie Tuttle -Development Authority of the North Country
-Chief Operating Officer
-PhD, PE, CSP

Mark Hall -Adirondack Park Agency Board Member (2020)
-Certified IIA, C, & D Water Operator (2008)
-Former Fine Town Supervisor (2007-2015)

NEW YORK RURAL WATER ASSOCIATION

May 8, 2025

Adirondack Park Agency Planning Forum

TOWN OF FINE

PROJECT LIFE CYCLE

Start Early : Plan for 2-5 years from concept to construction

- Concept
- Scoping
- Engineering Procurement (RFP)
- Preliminary Engineering Report (PER)
- District Formation
- Design
- Permitting
- Easements
- Bidding
- Construction
- Close-Out

- Identify Funding Strategy/Schedule
  - EFC/DWSRF
    - Grants are available to develop PER
  - ESD/CFA
  - DASNY/SAM
  - NBRC
  - USDA Rural Development/RUS
  - CDBG
- Submit Grant Applications
- Execute Grant Agreements
- Short-Term/Long-Term Financing Plan

Step 1:

Project Initiation

Identify Problems / System Needs / Community Needs

- Document all Issues, Needs, Improvements Requested
  - Service Area Needs
    - Unserved areas
    - Critical Users
  - Water Quality
    - Contaminated private wells
    - Regulatory compliance with existing municipal supply
  - Capacity
    - More demand than existing supply can provide
  - Distribution System
    - Frequent breaks
    - Undersized supply lines for demand/low pressure
  - Storage
  - Economic development

Considerations

Are regional/shared service solutions an option?

Talk to your neighbors; do they have a similar problem that could be solved with a regional solution?

Think big

Imagine you have one bite at the apple to solve your infrastructure problems

Is District Expansion or Increased usage possible in the Future?

It’s hard to go back and add more scope, it’s easier to downsize or split project

Down the road projects can be phased, or down-sized to maintain feasibility

Step 2:

Assemble Project Team

- Municipal Staff
  - Town Supervisor & One Board Member
  - Water/Wastewater Operator(s)
  - DPW/Highway Superintendent
  - Clerk/Treasurer/Bookkeeper
  - Planner (if available)
- Consultant Team
  - Engineer
  - Project Manager
  - Fiscal Coordination
  - Legal/Attorney
- Regulatory Agencies (Resource)
- Funding Agencies (Resource)

Step 3:

Consulting Engineer Selection

- Develop Request for Proposals (RFP's) for Preliminary Engineering Report (PER)
  - ➢ Meet Funding Agency requirements
  - ➢ Pre-proposal walk-thru with interested firms

- Engineer Selection
  - ➢ Select committee to review engineering proposals
    - ✓ Elected Officials
    - ✓ Operators
    - ✓ Any other interested parties
  - ➢ Evaluate based on pre-determined weighted criteria
    - ✓ Project Approach
    - ✓ Engineering Firm Reputation
      - ❑ Project Team Qualifications
      - ❑ Previous experience with firm
    - ✓ Report Cost

Step 4: Educate Your Board & Rate Payers

Public Presentations –Explain Realities

- Why is this project necessary?
- What will happen if the project isn't completed?
- Why does the project have to be this size?
- What if some customers don't want municipal water? Will they still have to pay?
- Will there be water meters?
- An uneducated public/board can be a show-stopper if district formation is required for the project

Bottom Line…

How much is this going to cost me?

Step 5:

Preliminary Engineering Report (PER)

- A Preliminary Engineering Report is prepared as a planning document that outlines both the Technical and Financial needs for a project. There is funding available for the PER.

  PER Reports Identify:
  - Existing Conditions
  - Facility Capacity
  - Proposed Project Scope defined with:
    - -Analysis
    - -Conclusions
    - -Recommendations
    - -Preliminary Cost Estimates
    - -Budget
  - Alternatives Considered
  - Health and Sanitary Standards

- The PER is CRITICAL!

  Municipal Officials and their Operators must all devote time with their Engineering Team to develop a strong and accurate document for both funding and project basis.

The PER is required to be eligible for financing assistance

Step 6:

Develop a Funding Strategy

- Objective: Accomplish as many of your project needs as possible with the lowest possible impact to your rate payers
  - To do this, you need experts on your team that understand funding sources
  - You may have the best project in the world but if you can't afford it, then it won't make it to implementation
  - Sometimes a larger project, instead of multiple smaller projects, opens the door to larger sources of funding
- Funding cycles are typically annual, and vary based on the source of funding
  - It may take 2 or more years to apply for and obtain funding to move your project forward.

Step 7:

Improve Your Odds

Shovel Ready Projects Have a Better Chance of Funding

- Agreements for Professional Services
- Preliminary Engineering
- District Formation
- Bond Resolution
- State Environmental Quality Review (SEQR)
- State Historic Preservation Office Review (SHPO)

❑ Final Design
❑ Permitting (APA, DEC)
❑ Regulatory Approval (DOH, DOT)
❑ Easements

Step 8:

FINANCING

- **BONDING** for financing public improvements pays the cost of capital improvements. Bonds are subject to a permissive referendum which must be adopted by a two-thirds vote of the entire board. (4 of 5 members must approve)

- **BOND ANTICIPATION NOTE (BAN)** The BAN fills the gap between project award and short-term financing.

- **SHORT-TERM FINANCING** applications are submitted with completed bond resolution, district formation documents, intermunicipal agreements, SEQR, SHPO, SERP, and NYS Comptroller documents.

- **PERMANENT FINANCING** is submitted with the Engineers "Certification of Completion" after the construction phase is complete. This process usually takes 3 months after physical project completion occurs.

STEP 9:

Other Considerations

- Water Law (Creation or Updates)
- Intermunicipal Agreements
- District Creation / Expansion (Map, Plan, & Report)
- Eminent Domain Condemnation
- Easements (Time consuming and difficult)
- Permits
  - Adirondack Park Agency (APA), NYS DEC Water Withdrawal, NYS DEC SPDES Discharge, NYS DOT Highway Work, NYS Historic Preservation (SHPO), US Army Corps of Engineers (USACE), State Environmental Quality Review (SEQR), State Environmental Review (SERP), State Comptrollers approval?
- Regulatory Approval
  - NYS Health Department
- GIS Mapping
- Water Meters
- Groundwater Exploration Vs Surface Water

STEP 10:

Design, Plans, Specifications, & Bidding

- Details Matter!
- Time invested at this phase will reduce costs, change orders, confusion, & contractor misunderstandings
- Equipment Standardization resolution for efficiency, economy, compatibility and spare part inventory reduction
    - Analyzers
    - Hydrants
    - Valves
    - Meters
- Best Value Purchases

  A local law that provides for analyzing purchases in terms of both cost and quality to improve the procurement process based on documented criteria
    - Maintenance cost
    - Maintenance contractors & Response Times
    - Product Durability
    - Replacement parts availability
    - Product Performance & Life
    - Quality of Craftsmanship

STEP 11:

Construction

Get Ready, Project starts moving fast!

- A competent “Clerk of the Works” to document
- Project Team meetings
- Strategy to deal with Changes & Change Orders
  -Delays cost money
- Operators should be involved during construction
  -Is Temporary Treatment needed
- As-Built Drawing must be prepared as construction progresses

STEP 12:

Project Closeout

- As-Built Drawing must be verified after construction is complete.
- Engineer to provide “Certification of Completion”
- Update GIS Mapping
- Organize and secure all project documentation
  -Keep all records permanently

STAR LAKE STATISTICS

Town of Fine -St. Lawrence County
Wholly within NYS Adirondack Park

Town of Fine Population: (2020) 1304
Star Lake Population: (2020) 800 + seasonal population
Newton Falls Population: (2020) 400

	Service Connections Prior	2020	
Star Lake Water District:	365	389	+24
Woodhaven Star Lake Water District:	28	58	+30
Newton Falls Water District:	114	114	
	507	**561**	

Increase of 54 Service Connections

	Prior	**2020**
Filtration Capacity (gpm):	100	300
Peak Usage Run time (hours):	24	10
Peak Usage (gallons):	150,000	

DEC Water Withdrawal permitted (daily): 195,000

User Costs $540.00 / EDU Annually

Town of Fine = 108,123 acres
52.7% State owned

Where Star Lake started 2012

-Undersized DE Filtration System

-Seasonal Peak Demand Issues

-Leaking Storage Tank

-Deteriorating AC Water Mains

-Treated Water used to Irrigate Municipal Golf Course

-Neighboring Town System Issues

CRITICAL USERS

- The Clifton-Fine Central School and the Clifton-Fine Rural Emergency Hospital only had a single one-way avenue for water delivery.
  - C-F School -250 Students
  - C-F Hospital -90 Employees

- Any disruption of service between the water storage tank and the facility would leave them without water until repairs were made.

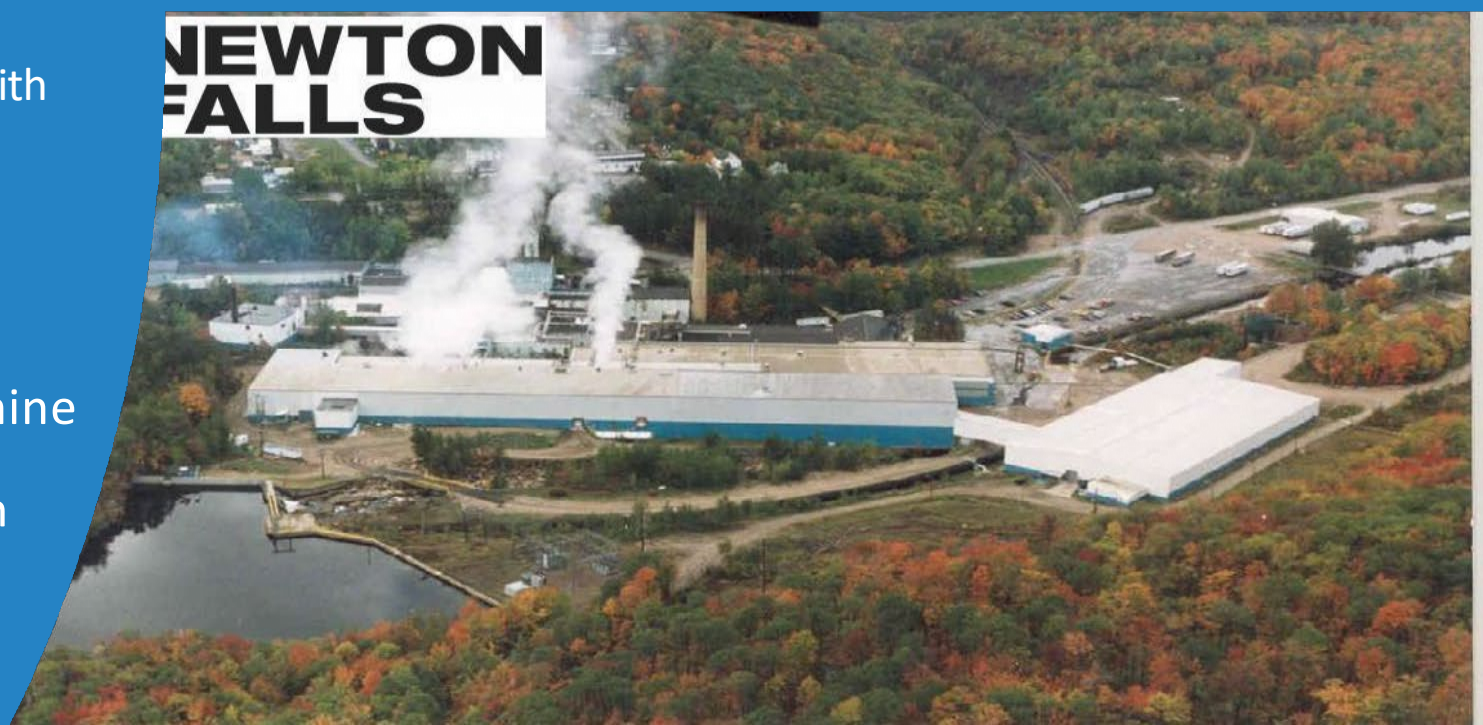
CRITICAL USERS

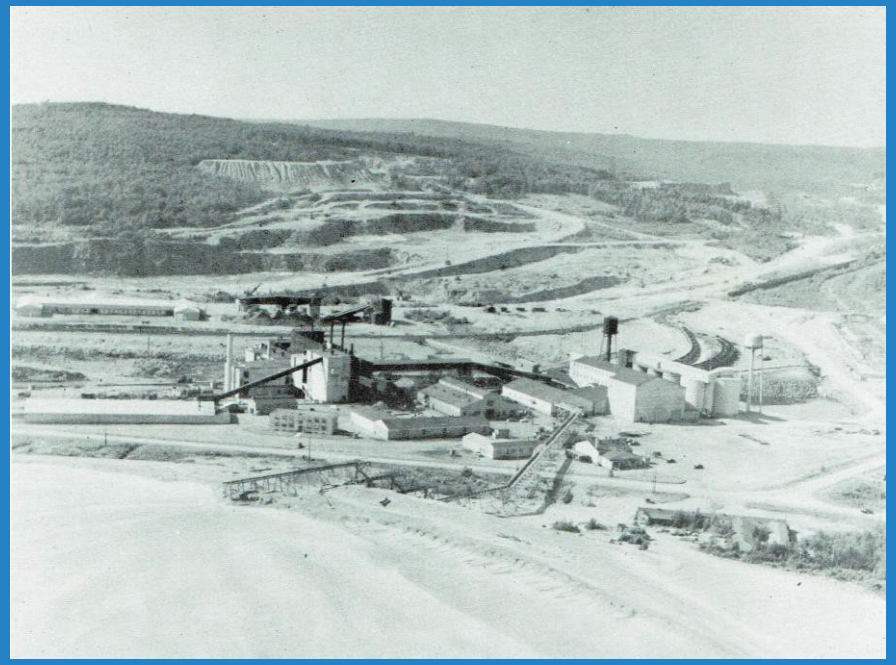
- The Newton Falls Paper Mill closed in 2010, after over 100+ years of operations. Over 100 jobs were lost in the community.

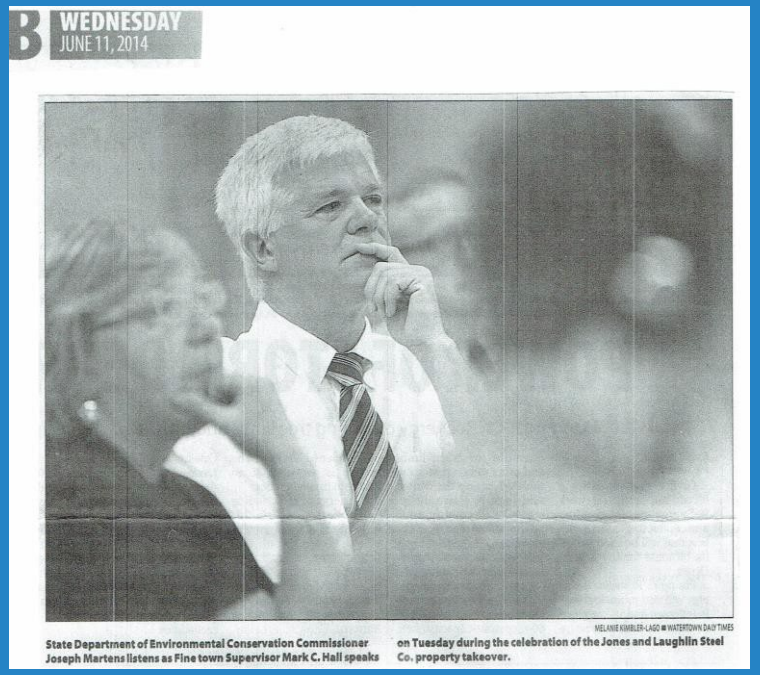
- The Newton Falls Water District was severely impacted by the loss of its single largest infrastructure customer, causing numerous issues that degrade water quality.

  - Source water from the Oswegatchie River with the reduction in volume of usage resulted in Disinfection Byproduct violations.

- With APA Industrial Land Use Classified properties totaling over 3,000-acres between the former Benson Mines Iron Ore open pit mine and the NF Paper Mill properties within the water distribution system, we needed to plan for potential increased user needs.







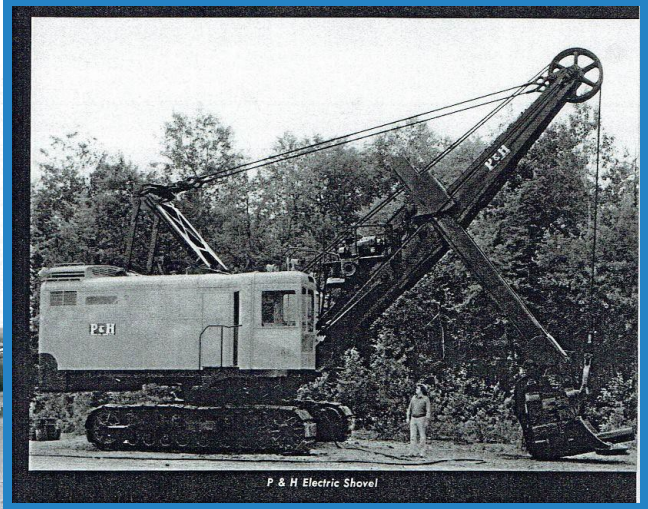
B WEDNESDAY
JUNE 11, 2014

MELANIE KIMBLER-LAGO ■ WATERTOWN DAILY TIMES

State Department of Environmental Conservation Commissioner Joseph Martens listens as Fine town Supervisor Mark C. Hall speaks on Tuesday during the celebration of the Jones and Laughlin Steel Co. property takeover.

FOUR MIGHTY UNITS of diesel power pull the ore train. Usual consist on this run is 65 to 70 cars, each loaded with about 55 tons of ore. Picking its way out of Benson Mines yard, train is seen here at start of its daily run to Watertown, then on to the Central's Belle Isle yard.

January, 1953 CONTINUED ON NEXT PAGE Page 5



P & H Electric Shovel

THE STAR LAKE PER CONCLUDED:

August 2013

1) Many system components were original to 1950's construction.
2) Explore a potential groundwater source vs existing surface water.
3) Existing (1990) diatomaceous earth filtration is deficient meeting peak demand.
4) Filter effluent turbidity had exceeded standards, resulting in violations.
5) A State of Emergency had been declared to restrict water use when demand exceeded filtration capabilities.
6) Current 200,000-gallon welded tank had multiple leaks.
7) Existing asbestos-cement water mains had deteriorated.
8) Treatment system does not have back up power.
9) District expansion to include un-served areas would create a "loop" and provide critical users like the hospital and school multiple avenues for water delivery.
10) Examine the regional needs and explore interconnecting with two adjacent water systems to create long-term benefits and cost savings.
11) Grant and low-interest loan funding criteria have minimum user cost obligation and metering requirements.

STAR LAKE FUNDING:

1. The completed Star Lake Preliminary Engineering Report was submitted to NYS Environmental Facilities Corporation (EFC) for funding by the Drinking Water State Revolving Fund (DWSRF) in December 2013.
   - -EFC's Intended Use Plan (IUP) Project Priority Ranking Score was 140 points.
   - -Subsidized Funding for this round was 130 points.
   - -Our scoring included 25 points for consolidating water systems.

2) The Town also applied for EFC Hardship Financing in December 2013 because the Median Household Income was under the established threshold. The project was awarded a $2,000,000 grant along with $5,308,000 interest-free financing for 30-years in April 2015.

3) A State and Municipal (SAM) Grant of $100,000 was also awarded.

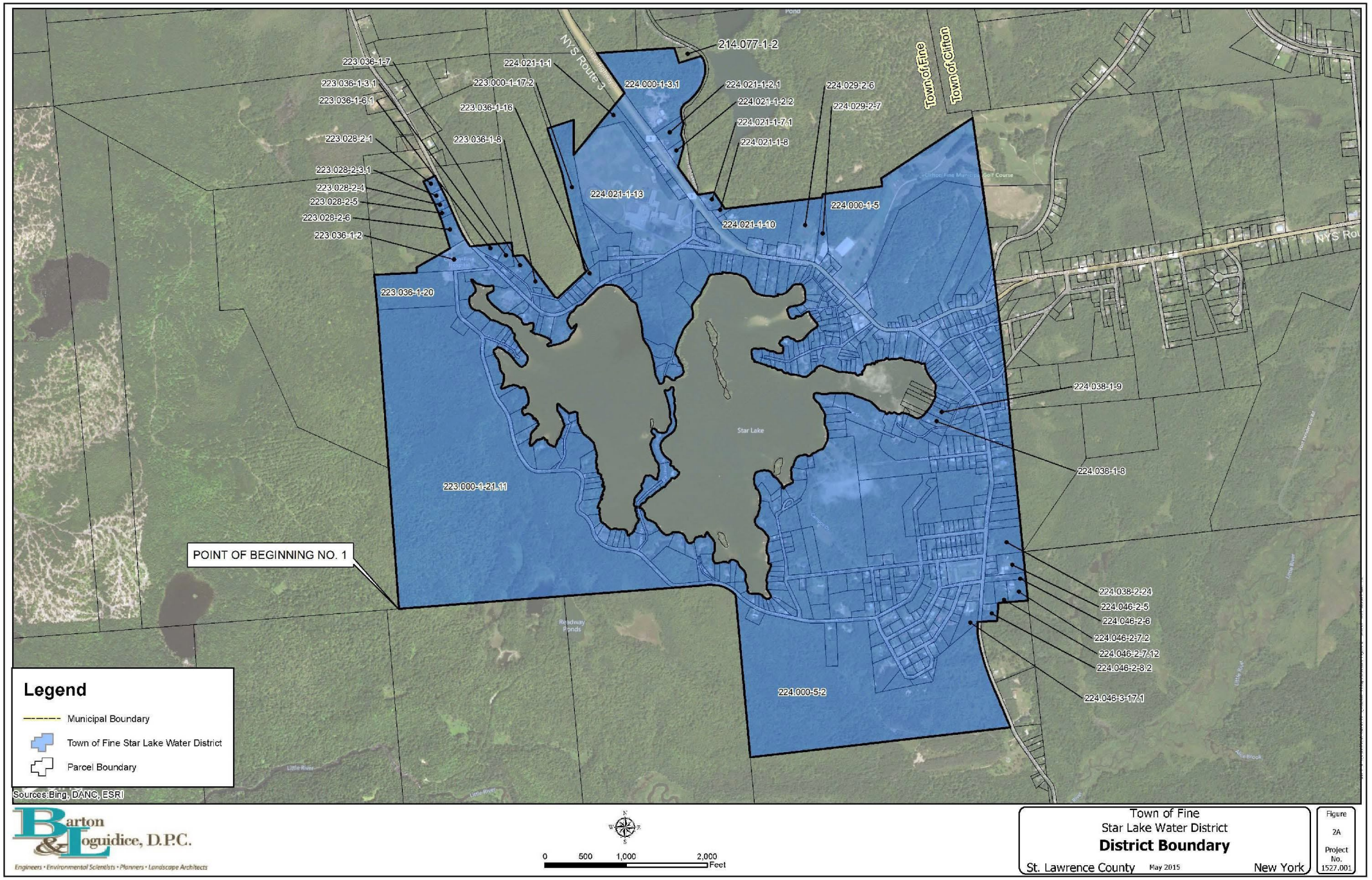
4) Additional Funding of $1,000,000 was provided via the EFC's NYS Water Infrastructure Improvement Act (WIIA).

5) Funding for the Star Lake project totaled **$8,408,000**.

6) The phase II Newton Falls interconnection project funding included a $2,340,000 EFC NYS Water Improvement Act (WIIA) grant and **$1,160,000** interest-free 30-year financing.

7) A $400,000 Department of State (DOS) Local Government Efficiency Grant brought the phase II total to **$3,900,000**.

The combined project total was **$12,308,000**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224.046-2-6
224.046-2-7.2
224.046-2-7.12
224.046-2-8.2
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NYS Route 3
Town of Fine
Town of Clifton
Star Lake
POINT OF BEGINNING NO. 1
Legend
Municipal Boundary
Town of Fine Star Lake Water District
Parcel Boundary
Sources:Bing, DANC, ESRI
0 500 1,000 2,000 Feet
Barton & Loguidice, D.P.C.
Engineers • Environmental Scientists • Planners • Landscape Architects
Town of Fine
Star Lake Water District
District Boundary
St. Lawrence County May 2015 New York
Figure 2A
Project No. 1527.001

CONSTRUCTION

-Phase I Star Lake Bids received April 2017

-Construction began November 2017

-Construction completed June 2020

-Filtration, Tank, Distribution piping

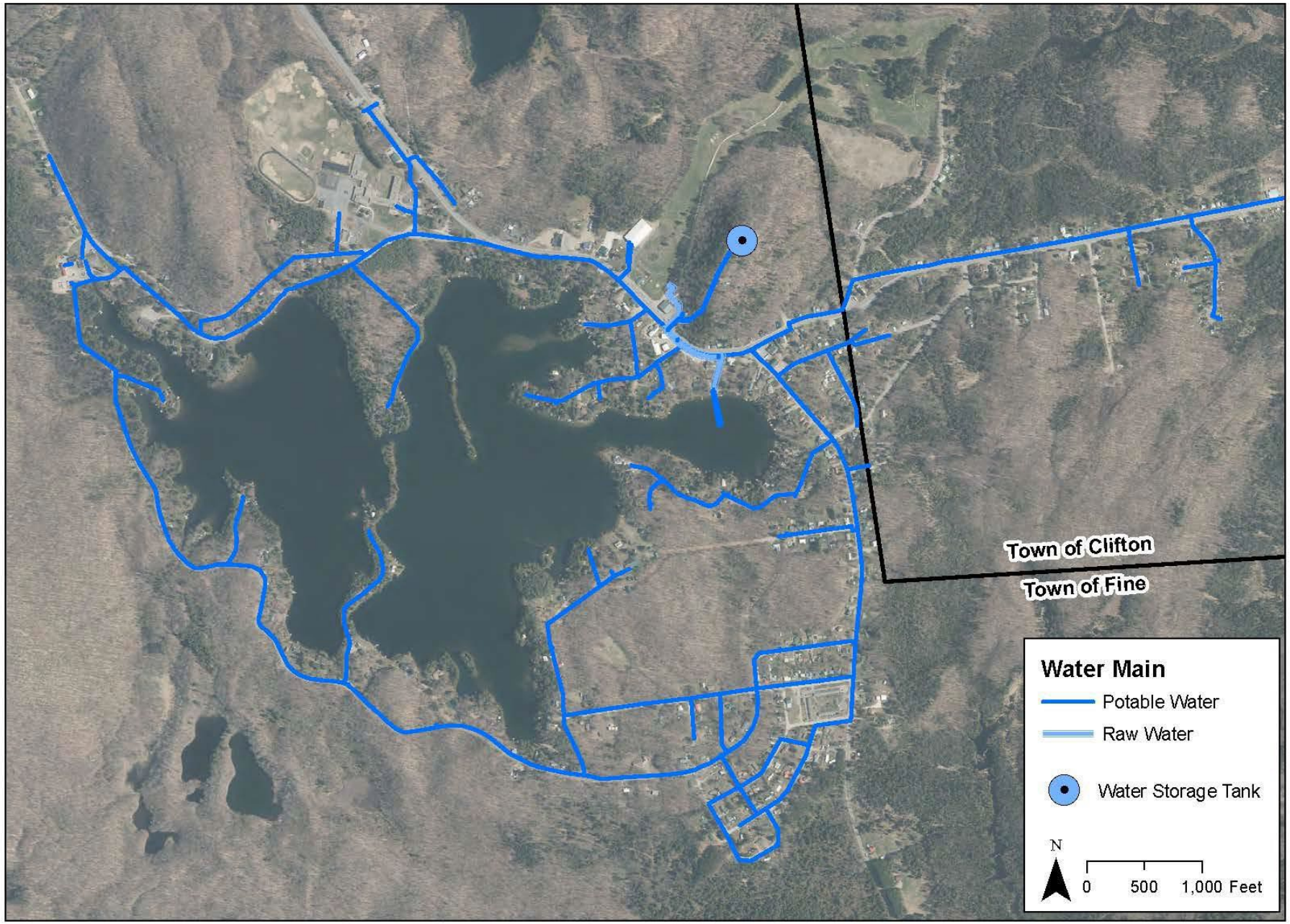
-Phase II Newton Falls began August 2019, Completed June 2020

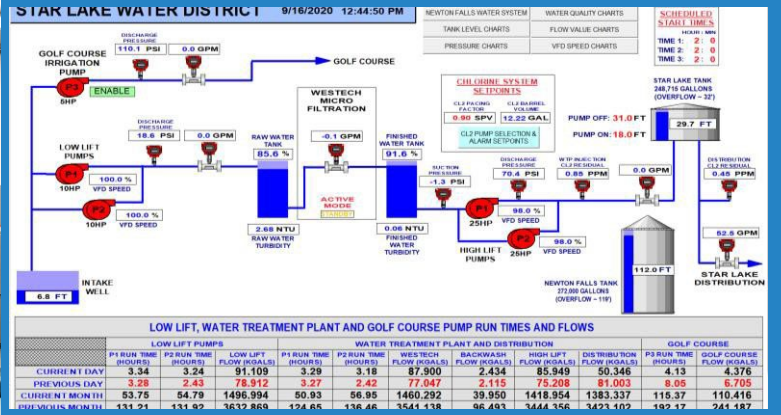
-Interconnection with Star Lake, hydrants, meter pits

Temporary Filtration Utilized

Star Lake Water District - Water Mains

SC 5/2/22





QUESTIONS

Dr. Carrie Tuttle - PhD, PE, CSP
Development Authority of the North Country

Chief Operating Officer ctuttle@danc.org

Mark Hall - NYS DOH Certified Water Operator
Adirondack Park Agency Commissioner

Star Lake Water Superintendent m.hall@slic.com