

YCC COLLABORATIONS: Enhancing Lake Communities and Protecting Lakes



Whitney Baker
Program Director

30 Mile River Watershed Association (30 Mile)



**Thompson Lake
Environmental
Association**

Jim Skinner
YCC Board of Directors

Thompson Lake Environmental Association (TLEA)

What is a Youth Conservation Corps?



- Summer youth employment program for local students.
- YCC crews install erosion control practices on lakefront properties that reduce sources of pollution to lakes.
- Working with private landowners, businesses, lake associations, private homeowner and road associations, and municipalities.
- Provide a low-cost option for landowners that want to make lake-friendly improvements to their property.

Stormwater Best Management Practices (BMPs)



BEST MANAGEMENT PRACTICES

KEEPING LAKES HEALTHY: BMP VIDEO SERIES

Installing a Rain Garden

[WATCH VIDEO](#)

Installing a Vegetative Buffer

[WATCH VIDEO](#)

Installing Infiltration Steps

[WATCH VIDEO](#)

Installing Rubber Razors

[WATCH VIDEO](#)

BEST MANAGEMENT PRACTICES (BMPs) PUT TOGETHER BY THE PORTLAND WATER DISTRICT:

- [Dripline Trench](#)
- [Dry Wells](#)
- [Erosion Control Mix](#)
- [Infiltration Steps](#); [Infiltration Trench](#)
- [Lake Shoreline Riprap](#)
- [Live Staking](#)
- [Open Top Culvert](#)

NATIVE PLANT LISTS BASED ON SITE CONDITIONS (PORTLAND WATER DISTRICT):

- [Shady and Wet Soil Conditions](#)
- [Part Sun and Wet Soil Conditions](#)
- [Sunny and Wet Soil Conditions](#)
- [Shady and Dry Soil Conditions](#)
- [Part Sun and Dry Soil Conditions](#)
- [Sunny and Dry Soil Conditions](#)

Organizations with YCC:

- **30 Mile River Watershed** (~20 lakes/ponds)
- **7 Lakes Alliance** (10+ Belgrade Lakes/ponds)
- **Acton/Shapleigh YCC** (Square, Mousam, Goose, and Loon)
- **Acton Wakefield Watersheds Alliance**
(9 lakes in the upper Saco/salmon falls river watersheds)
- **China Region Lakes Alliance** (China, Three Mile, & Webber)
- **Friends of the Cobbossee Watershed** (~20 lakes/ponds)
- **Midcoast Conservancy** (Damariscotta Lake)
- **Thompson Lake Environmental Association** (Thompson Lake)

**68+ lakes & ponds
served by YCC**

YCC Work Group meets
annually w/ DEP staff



Maine DEP's Permit by Rule Exemption YCC Pilot Project

What is Maine DEP's Pilot Project?

- Streamlined process for small projects with low risk of environmental impacts and with water quality benefits.
- Alternative for certain de minimis activities (see list of BMPs).
- No PBR required.
- Project information submitted to DEP through Survey 123 form.
- Two-year pilot project with DEP oversight.
- Currently open to the following active YCC groups in the State:

Acton-Shapleigh YCC
Acton-Wakefield Watersheds Alliance
7 Lakes Alliance
China Region Lakes Alliance
Midcoast Conservancy
Friends of the Cobbossee Watershed
30 Mile River Watershed Association

Questions?

Please get in touch.

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Maine Department of Environmental Protection

Youth Conservation Corp Pilot Project



What you need to know



Eligible BMPs

Buffer Planting

Point plantings of non-invasive (preferably native) vegetation. **Add specifications for width/number of plants/amount of fill.**



Refer to DEP's Conservation Practices for Homeowners fact sheets for information on appropriate materials and installation:

<https://www.maine.gov/dep/land/watershed/materials.html>

Erosion Control Mulch (ECM)

Application of coarse type of mulch (typically, 3-4 inches deep) to cover areas of bare soil .



Path and Trail Stabilization

Define and stabilize narrow, preferably meandering, paths and trails. Does not include infiltration steps.



Runoff Diverters

Includes open-top culverts, rubber razors, water bars, and broad-based dips.



Roof Dripline Trench/Drywell

Installation of crushed stone trench along roof drip edge or drywell at gutter downspout. Should not extend beyond necessary area.



Rain Gardens

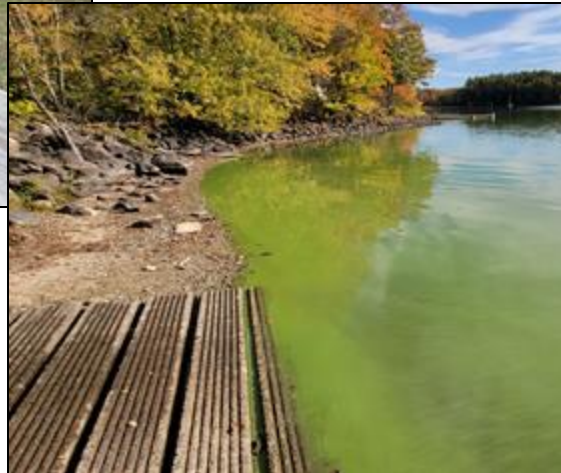
Bowl-shaped depression (typically 20-30% of drainage area) that is planted with non-invasive vegetation.



Important Note: BMP's not listed above are not eligible for this pilot projects, such as riprap and infiltration steps.

YCC Goals

#1: Low-cost erosion prevention for landowners



Prevent erosion



Reduce amount of polluted runoff and phosphorus entering lakes & streams



Help protect water quality!

YCC Goals

#2: Youth Education & Employment

Seasonal employment for local youth (age ~16-22)

Fun, outdoor work in beautiful lake settings

Gain understanding of water quality issues and threats to our lakes

Hands-on and meaningful experience

Provides a valuable service for our lake communities



YCC Goals

#3: Support other watershed initiatives

LakeSmart Team? ...YCC crew installs BMPs recommended to landowners during a LakeSmart evaluation.

Recent Watershed Survey? ...YCC program provides technical assistance and BMP installation to address identified erosion sites.

319 Grant Project? ...incentivize landowner YCC participation to address erosion sites; source of local match.

YCC Goals

#4: Awareness

- Landowners are examples of good lake stewards
- Projects draw attention – opportunity for education/outreach
- YCC crew members often live on the lake, too – educate family and neighbors
- Overall increased visibility for your organization/mission



YCC Program Overview

Thompson Lake Environmental Association



Thompson Lake
Environmental
Association

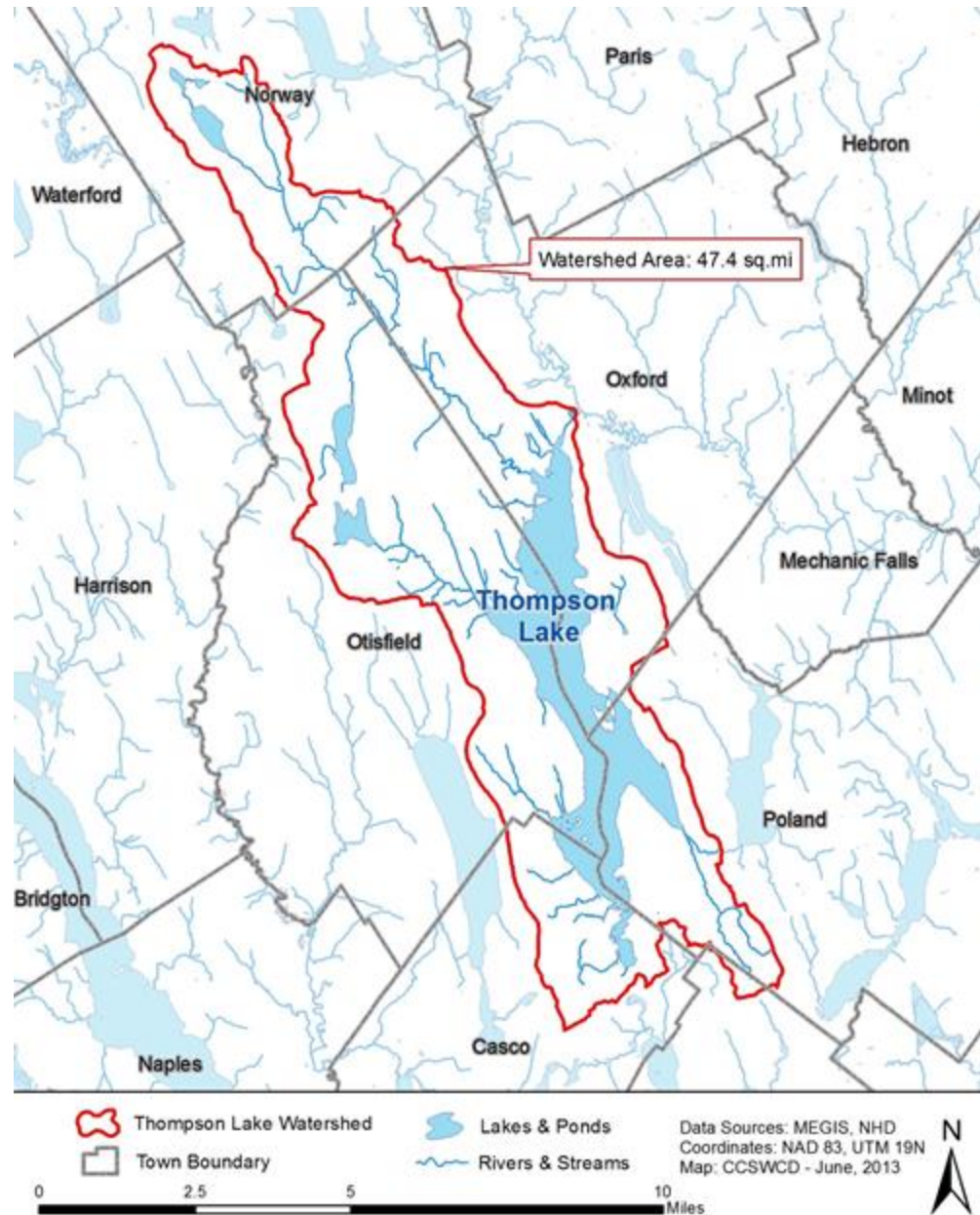
About TLEA and Thompson Lake

TLEA was Established in 1971, ~500 donating members today

Programs include water quality monitoring, milfoil management and IPP surveys, courtesy boat inspections, LakeSmart, and the Youth Conservation Corps

Thompson Lake is 4,000+ acres located in the towns of Oxford, Poland, Casco, and Otisfield in southwest Maine.

The watershed is 35 square miles across three counties: Androscoggin, Cumberland, and Oxford.



History of TLEA YCC program

Started in 2002 as part of a 319 watershed grant

17 years of YCC work, supported several phases of 319 watershed grants

stopped in 2018

2020 & 2021 - Hiatus during/following covid

2022 - First season back in action! 12 projects completed.

Started working collaboratively with YCC work group and other organizations to learn more and train staff.

Also became eligible for Maine DEP permit exemption program

Supervising board member and Project Director completed BAESC training

2023: ~12 new projects lined up for this season



Current YCC capacity / how the program is delivered

Self-funded program supported by ~500 individual members

Small YCC crew - 2 paid crew members & 1 paid Coordinator
Students, Oxford Hills Comprehensive High School
Teacher is YCC Project Coordinator in summer

Crew: 8 week season, 4 days/week, 8 hr/day

Project Coordinator: 10 week season, 5 days/week, 8 hr/day

~12-14 projects per season on average

Truck is rented for the YCC season

Complimentary evaluation & estimate w/ materials list

landowners pay for materials, and YCC labor billed hourly
(when supported by 319 grants, labor was free)

*New watershed survey complete in 2023 & WBPP in the works - YCC will support these efforts and future 319 grants - we hope to expand program to six crew members to support increased need.



Obstacles & Lessons learned

Hire applicants with landscaping/tool/ manual labor experience

Recent years - few applicants, increase hourly rates significantly in 2023

Board member collaboration is key

We can't fix everything! Know when to refer to a contractor for complex sites

Phased approach at some properties - we can't do it all at once!

How to deal with shoreline stabilizations projects

Project planning with limited use of power tools



Helpful Tips

Develop a preferred contractor & material supplier list

If hiring a Project Director without experience - understand training needs and establish a relationship with experts for guidance.

Remember that this is NOT a money-making program.

YCC is a long-term commitment providing visibility to your organization, awareness about NPS threats, and a valuable low-cost service to the landowners that need it most.

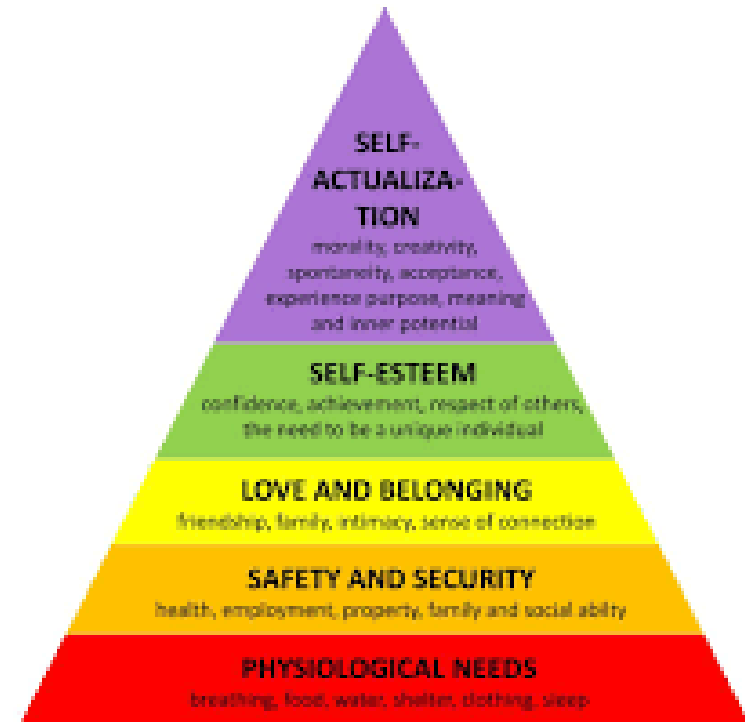
Identify person on your board that will support the YCC

Assess your organization and watershed NEEDS so that you obtain maximum buy-in across all levels of your organization and supporting landowners/members.

Other

Contact Jim Skinner for example job descriptions for YCC Crew members & Project Director positions

Policy effort needed to include other shoreline stabilization methods in the permit exempt program, and training for how to install.



YCC Program Overview



30 Mile River Watershed Association

Working as a community for clean and healthy waters

Founded in **2008**, 30 Mile is a public-private collaboration of seven rural towns, nine lake associations and two land trusts.

Coalition Members Lake Associations

- Androscoggin Lake Improvement Corporation
- Basin-David-Tilton Ponds Association
- Echo Lake Association
- Flying Pond Improvement Association
- Greater Minnehonk Lake Association
- Kimball Pond Association
- Lovejoy Pond Improvement Association
- Parker Pond Association
- Pocasset Lake Association

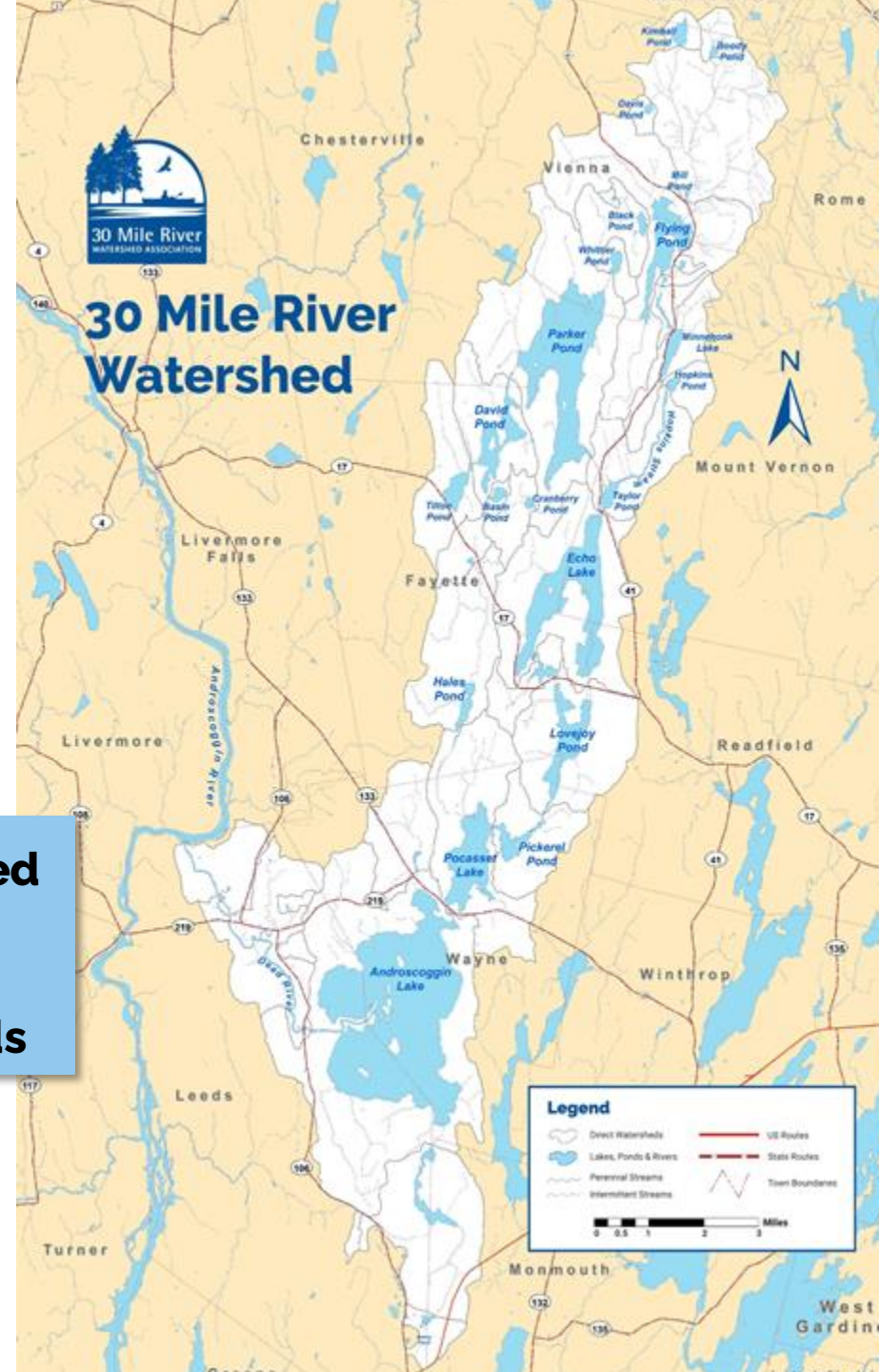
Municipalities

- Chesterville
- Fayette
- Leeds
- Mount Vernon
- Readfield
- Vienna
- Wayne

Land Trusts

- 7 Lakes Alliance
- Kennebec Land Trust

90 mi² watershed
10 towns
3 counties
20+ lakes & ponds



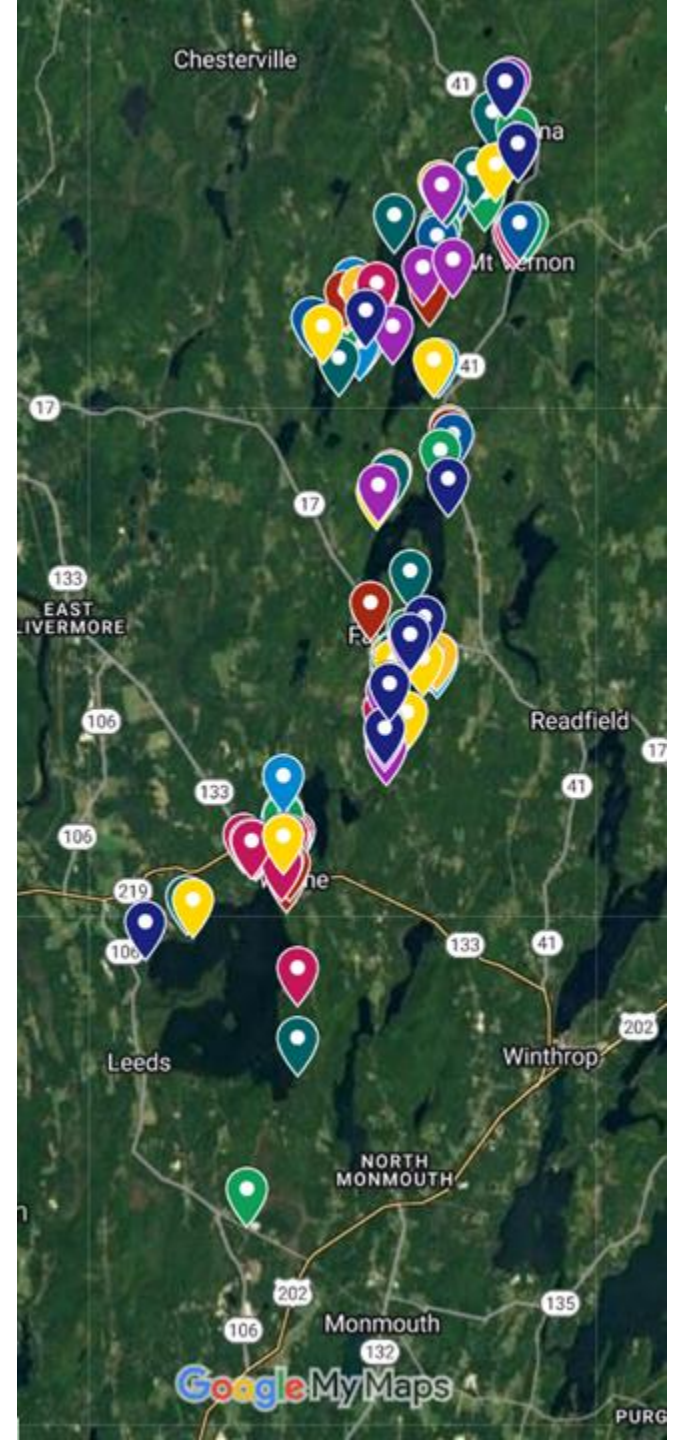


YCC | Youth Conservation Corps

For Lake-Friendly Landscapes
Stopping soil pollution for cleaner lakes



132 projects
on 11 lakes and ponds in 10 years



30 Mile's YCC Program ...the early years

First YCC crew in **2011**

Foundation grants to get started

Purchased and donated tools

Technical expertise provided by KCSWCD staff
(project plans, material and costs estimates)

Truck/trailer donated for YCC season

Landowner paid for cost of **materials only**
- YCC labor was free

3-5 crew members, including a crew leader



Today...

- 3-4 crew members, led by a crew leader
- Complete 10-14 projects per season
- 6 weeks per season, 3 days/week
- Technical assistance and project planning now in-house by year-round staff



Landowners hosting YCC crew receive...

- Free site visits & on-site recommendations from 30 Mile technical staff
- A complimentary project plan, materials lists, and cost estimate
- Permitting assistance / waived permitting fees
- Cost-sharing with 30 Mile to significantly reduce labor expenses
 - landowner pays 25% of labor cost billed at a daily rate

Obstacles & Lessons Learned:



- **Early on-**

- Funding & local support
- Prioritizing meaningful projects that have impact
- Finding staff/subcontractors with the technical expertise to implement the correct BMPs and well executed installation

- **Ongoing-**

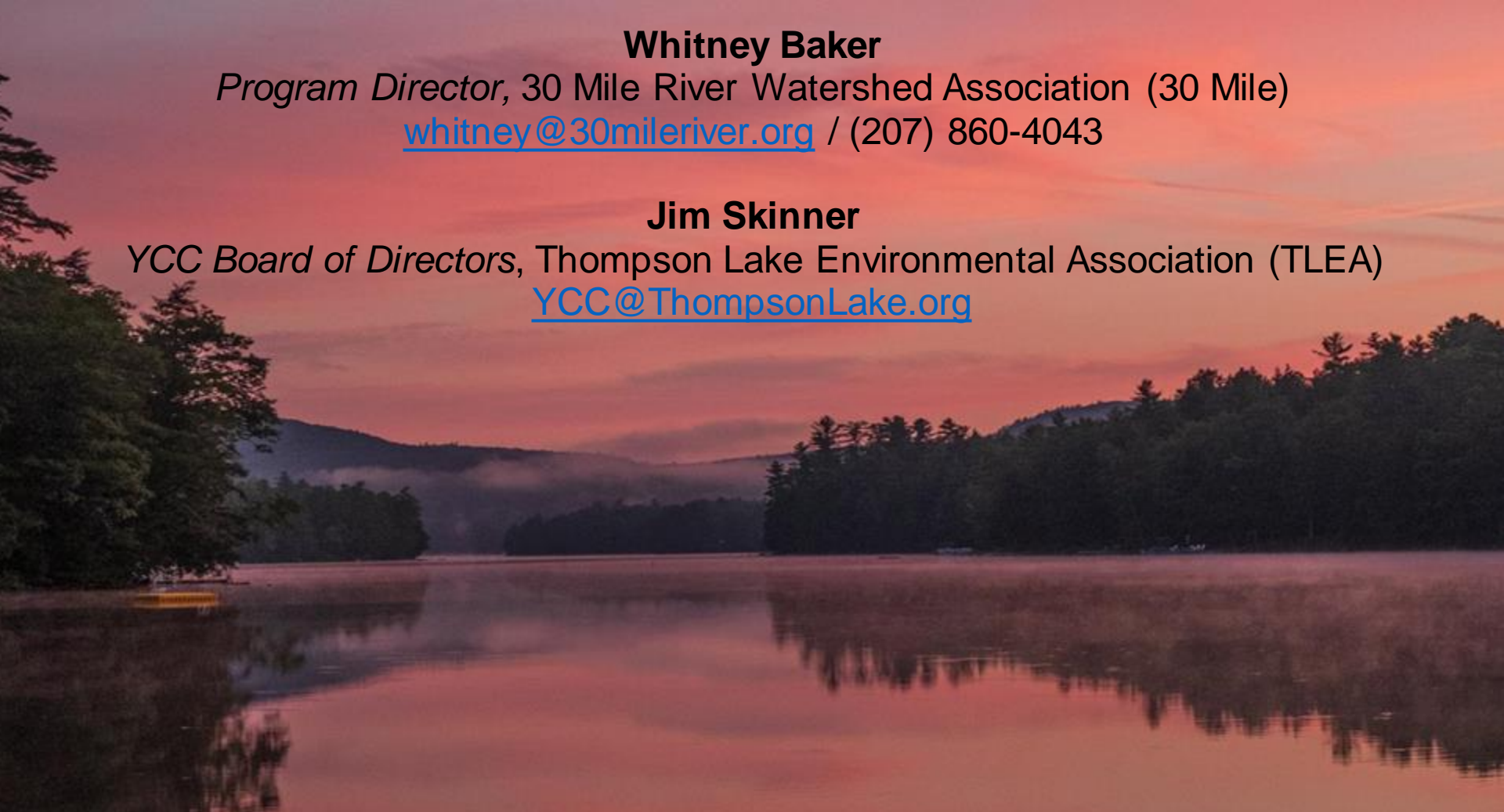
- Hiring/retaining crew members (following a 2-year break during covid)
- High-cost equipment needs (truck and trailer)
- Space for local material stock (less flexibility, good estimates)
- Complex projects - when to refer to a contractor, and then FINDING one
- Riprap / shoreline stabilization projects with new DEP policy
- Early planning & growing the program / staff





Helpful Tips:

- If starting new - reach out to active YCC organizations and the YCC work group!
- Plan early
- Hiring - find contacts at local high schools and college career centers to connect with qualified applicants
- Find a balance between completing a comprehensive fix with several BMPs & when to phase the work over more than one YCC season
- Maintain relationships with Town CEOs, Lake Associations, and Beach/Homeowner Associations to promote the program.



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Questions?