

Repair of the Universally Accessible New Haven River Fishing Platform at Eagle Park
 Bristol, Vermont
 9/27/2021

Alternative		Objectives					Initial Opinion of Probable Construction Cost	Recommended for Implementation	Notes
ID	Description	Repair platform and walkway	Make platform more flood resilient	Make walkway more flood resilient	Minimize future maintenance needs	Simplify future flood recovery work			
0	Do nothing	NO	NO	NO	no	NO	\$0	No	Site is damaged and not sustainable. Walkway needs good foundation to resist future floods. Platform needs repairs.
1	Repair broken brackets on platform	YES	yes	N/A	yes	yes	\$5846.50	<u>Yes</u>	One bracket damaged in flood and needs repair. Perhaps drill rods in deeper.
2	Retrofit railings to be removable	N/A	YES	N/A	yes	yes	\$8,000 to \$9,000	<u>Yes</u>	This will reduce maintenance needs and reduce stress on platform during future flooding and ice out.
3	Retrofit railings to be foldable	N/A	yes	N/A	yes	yes	N/A	No	Concerned that hinges will be weak point and could lose a piece of the railing. Would need to remove at least one section given railing geometry.
4	Brace boulders, wall, and platform together	N/A	yes	N/A	no	no	\$20,000 to \$25,000	No	Bracket acted as release so platform not fully damaged. Better than linking all platform components and boulders into one rigid structure where complete failure could take place.
5	Install concrete foundation with haunches for walkway	yes	N/A	yes	yes	no	\$85,000 to \$110,000	No	Although an improvement to the current walkway with no foundation, undermining could take place. The use of concrete would make it hard to conduct a simple repair in the future.
6	Install helical piles, pressure treated wood base, and matching trex treads	YES	N/A	YES	yes	YES	\$85,000 to \$110,000	No	Prefer not to have pressure treated wood near the river for water quality concerns.
7	Install helical piles, aluminum tubing base, and matching trex treads	YES	N/A	YES	yes	YES	\$90,000 to \$120,000	<u>Yes</u>	This is the best solution as the foundation would be very resilient to flooding for small price increase. Fine-tune boulders along edge of walkway and fill with some cobble for mobility safety.