



SHORELINE STABILIZATION

This is a supplement to the Citizen’s Guide which provides basic information about Adirondack Park Agency regulations.

STRUCTURE SETBACKS APPLY TO RETAINING WALLS, INCLUDING RIP RAP:

Section 806(2) of the Adirondack Park Agency Act requires that all structures over 100 square feet in size (except docks and boathouses) be set back a designated distance from the mean high water mark of all lakes and ponds and navigable rivers and streams. The setback depends on the land use area:

Land Use Area	APA Act Setback Distance	Designated River Setback	
		Scenic	Recreational
Hamlet	50 feet	50 feet	50 feet
Moderate Intensity Use	50 feet	50 feet	50 feet
Low Intensity Use	75 feet	250 feet	150 feet
Rural Use	75 feet	250 feet	150 feet
Resource Management	100 feet	250 feet	150 feet

A variance is required for new retaining walls which exceed 100 square feet in size and are to be constructed within the setback area [APA Act §806(3)]. However, the Agency will not require a variance if the retaining wall (including rip rap) meets the following definition [9 NYCRR §575.4(f)]:

A retaining wall which is constructed of dry laid stone or untreated natural logs, and is smaller than 200 square feet in size, and does not exceed two feet in height above the mean high water mark, shall not be subject to the applicable shoreline setback requirements and variance procedures, provided that it:

- (1) is designed to control an on-going erosion problem,
- (2) is limited to the area necessary to control such erosion, and
- (3) follows the existing natural elevation and contour of the shoreline.

“Retaining wall” is defined in §570.3 (ac) of Agency Rules and Regulations as a “permanent structure of cribbing, wood, masonry, stone, concrete or other material that supports a mass of soil”; thus, rip rap constitutes a retaining wall. Retaining walls shall be measured either in elevation (face) view or plan (top) view, whichever is larger [§575.4 (e)].

Pursuant to §802(67) of the APA Act, the installation of a retaining wall or rip rap along shoreline is also a “watershed management project” which requires a permit from the Agency, unless a permit is required from the NYS Department of Environmental Conservation. The watershed management project may be eligible for a general permit from the Agency (currently under development) provided the project design meets certain criteria, but a variance will still be required if the structure does not comply with the setbacks and other regulatory limitations noted above. A project undertaken by a municipality involving the stabilization of a public road by installation of rip rap is considered maintenance of the road itself and is not subject to Agency permit requirements unless wetlands are involved or affected. Also, the installation of rip rap under such circumstances is not subject to the variance criteria set forth in §806 of the Adirondack Park Agency Act.

SHORELINE VEGETATION CUTTING

Shoreline cutting is restricted under the APA Act [806(3)]: within 6 feet of the mean high water mark, no vegetation may be removed, except 30% of the lot width of an individual shoreline lot may be clear of vegetation; this limitation applies to all vegetation, including shrubs, bushes and herbaceous plants such as grasses. Within 35 feet of the mean high water mark, not more than 30% of the trees larger than 6 inches in diameter at breast height may be cut. Proposed retaining wall construction and rip rap installation projects must comply with all shoreline cutting requirements. In designated river areas, the cutting limitations are more restrictive.

If a proposal requires vegetation removal in excess of the minimum shoreline cutting restrictions, a variance from the Adirondack Park Agency will be required. If the proposal involves freshwater wetlands or a river designated as a Wild, Scenic, or a Recreational River, then an Agency permit will likely be required and additional restrictions may apply.

SHORELINE STABILIZATION OPTIONS

Whether or not an Agency permit and/or variance are required for a shoreline stabilization project, landowners should employ the least structural or “softest” approach available to address existing shoreline erosion problems. Hardened shorelines are only a temporary fix for erosion problems, which are usually caused by the removal of shoreline and riparian vegetation. The character of the natural shoreline and riparian zones should be retained or restored whenever possible. Currently, the Agency recognizes the following four basic approaches to addressing shoreline erosion problems, ranked in order of preference, with the first option being the most desirable.

1. **Non-structural**: simplest, cheapest, and most effective where problems are minor and the land is least disturbed; may include simply re-planting native vegetation within the eroded area.
2. **Bioengineering**: uses vegetation, both through plantings and for structural purposes, to provide stability and resistance in light to moderate wave action. Includes live staking, brush layering, and brush matting
3. **Biotechnical**: combines bioengineering approaches with some degree of structural design where higher wave energy exists and/or severe erosion has occurred. Includes matting or vegetated gabion walls or mattresses, vegetated cribbing, vegetated rip rap, or keyed native toe-boulders.
4. **Structural**: expensive, requires maintenance, and causes the most severe environmental impacts. Under conditions of extreme wave energy or severe erosion, structures may be required; they can include structures like bulkheads, revetments, cribs, and gabions made of native stone or timber.

Additional guidance may be found in “The Shoreline Stabilization Handbook” by Northwest Regional Planning Commission, 7 Lake Street, Suite 201, St. Albans, Vermont 05478. <http://www.nrpcvt.com/publications.html>

Please be aware that this flyer is only intended to provide general information regarding Agency jurisdiction. If an Agency permit or variance is required (or if the property has previously been subject to Agency review) then other restrictions may apply.