CONSERVATION MATTERS ARTICLE 11/2/13

STORMWATER – HUGE PROBLEM OR VALUABLE RESOURCE? (Pemi Watershed)

If you're interested in clean water, the topic of stormwater and its by-product stormwater runoff cannot be ignored. Nothing good comes from stormwater runoff. As it washes over the landscape it brings with it pretty much everything in its path – pesticides, fertilizer, oil, salt, and other pathogens. According to the state, stormwater runoff accounts for about 80% of the impairments listed in its surface water health reports. Runoff finds it way quickly into streams and rivers and days/weeks later will be in the Atlantic having served no purpose other than polluting. We are fortunate to live in small towns surrounded by sizeable undeveloped areas where as much as 50% of our rainfall infiltrates into the ground. If we look ahead a decade, growth/development in the region will reduce our "water infiltration areas" advantage. Development creates impervious surfaces (paved, built, or otherwise altered areas where water cannot infiltrate), prevents natural recharge and reduces groundwater recharge rates. This has been magnified by the apparent change in our climate which has produced more intense storms and accelerated runoff. The implications are:

- Increased frequency and magnitude of downstream flooding due to rapid runoff of stormwater.
- Reduced base-flow in streams between rainy periods due to less recharge from groundwater which normally feeds streams during limited rainfall periods. This can reduce the waste assimilation capacity of rivers, increasing wastewater treatment costs.
- Declining water quality due to wash-off of pollutants deposited on roads, parking lots, etc.
- Increased water temperature due to loss of vegetative cover; heat build-up on artificial surfaces increasing runoff temperatures reaching streams.

Water quality-quantity is tied to the economic future of our towns, businesses, and tourism. How do we plan for healthy, sustainable lakes, rivers , and drinking water? The members of the Pemi River Local Advisory Committee (PRLAC) advocate treating stormwater as a valuable resource. So how do we shift stormwater runoff from a major liability to an in-ground environmental asset? Some thoughts:

- Look around your property for water runoff escape routes. Consider use of a rain barrel or small rain garden to capture/ infiltrate runoff.
- Encourage your town to adopt Low Impact Development (LID) approaches to future building/development. These techniques achieve proven results.
- Towns can/should consider stormwater runoff a key element of its development review process. The basic concept is that stormwater runoff be maintained at or below pre-development levels.
- As a last resort, creation of a so-called "Stormwater Utility" which, phased in over time, would make land owners responsible for costs associated with runoff originating from their property.

A comprehensive watershed-based strategy that equally distributes the responsibility and cost of stormwater management across all users is essential to restoring and protecting the state's water resources. We are not in crisis on this issue today in our area. That is a positive and a negative. The negative is that there is little pressure to anticipate what is coming and begin to take action to deal with it now. For more details on this and other river related issues we invite you to look at our 2013 Pemi River Management Plan which can be accessed on our website http://www.lakesrpc.org/PRLAC/plan.html . Scroll down to Pemi River Manaagement Plan. PRLAC meets most months on the last Tuesday of the month, from 7-9 PM; locations vary. To become involved call Max Stamp, 744-8223 or Dave

Jeffers, 279-8171.

On behalf of PRLAC members – Max Stamp, PRLAC Chair