

Time to Protect Forest Streams

Over 40 years ago, Congress passed the Clean Water Act to restore and maintain the "integrity of our nation's waters" by preventing and controlling pollution. A system was put in place to prevent and reduce stormwater runoff from cities, towns, industries and construction sites from dumping straight into rivers. Yet, one big runoff source is still overlooked—forest road runoff.

WHY IS STORMWATER RUNOFF FROM FOREST ROADS A PROBLEM?

One reason: sediment (aka dirt)—and lots of it. It washes off of roads regularly during storms or in big wipe-out events (i.e., when a culvert plugs). Forest streams that should be cold, clear, and pristine become murky with sediment. This harms:

- **Drinking water:** Sediment interferes with treatment processes leading to increased costs, or water suppliers are forced to use other sources.
- Fish health: Young fish still developing in spawning gravels can be smothered by sediment. Habitat quality can be severely degraded by sedimentation.
- Temperature: Sediment can change dimensions of streams, making them wider or deeper, which in turn increases stream temperatures and hurts fish.



Large road failures can dump truckloads of dirt into creeks—smothering salmon eggs.



Unmaintained roads funnel sediment straight into mountain streams.

MANY SOURCES CONFIRM THE PROBLEM:

- EPA: Identifies sediment as one of the top ten causes of river and stream impairments—while excess streambed sediments (and nutrients) have the highest impact on biological condition (U.S. EPA 2009).
- National Marine Fisheries Service: "The magnitude of existing road impacts on watersheds and streams on federal lands in the Pacific Northwest may equal or exceed the effect of all other activities combined" (NMFS 2015).
- **U.S. Forest Service:** Sediment is one of the most significant water quality problems on national forests (*USFS 2000*).



WHAT'S THE SOLUTION?



Properly protecting slopes prevents roads from washing out in a storm.

A national program, like other stormwater programs, with the goal of reducing water quality impacts from all forest roads—regardless of age of the road, location or land ownership—is necessary. Congress directed EPA in 1987 to deal with stormwater in phases. It is now time to address forest road stormwater. Though some states have mechanisms in place, the

standards vary greatly and are ineffective because the problem persists. EPA's oversight is crucial.

WHAT SHOULD A NATIONAL REGULATORY PROGRAM INCLUDE?

The goal is to protect clean water. To do that, at minimum, EPA's program should require forest road managers to:

- 1) Identify the problems through an inventory of all roads (i.e. including unauthorized, unused, legacy and temporary roads).
- **2) Create a plan for action** that includes a schedule to fix the problems.
- **3) Meet performance metrics** set by EPA that protect water quality.

- 4) Be accountable through regular reporting, monitoring, direct oversight, and enforcement.
- 5) Adjust course through adaptive management when goals are not met.

WHAT'S NEXT?

EPA is under a court order to determine by May 26, 2016 whether it needs to regulate stormwater runoff from forest roads. After May 26th, the agency will either move forward with developing a program to protect streams or decide not to act, and sediment will continue to be a problem.

Currently, EPA is asking for information on existing programs, additional measures to provide more clean water protections, definitions of forest roads, and elements of a successful program. The comment deadline is February 12, 2016. The Federal Register Notice is at: http://tinyurl.com/nmyopmg.



Best management practices include weedfree mulch and screens to keep sediment from entering streams.

