

STREAM ANALYSIS BY STREAM AND REACH

This section provides a short description of each stream and reach analyzed. Problems and proposed solutions are listed for each stream reach. Problems are in *italics*, solutions are indented and in normal typeface.

Since this section was originally written in 1993, some solutions have been implemented. Descriptions of these subsequent solutions are appended as NOTE:

COUNTYWIDE ISSUES¹

There are several aspects of habitat protection and restoration that are not limited to specific stream reaches. These aspects need to be addressed for all streams. One of the most important aspects of stream restoration is education. The educational process is vital to the protection and restoration of salmon habitat.

Introduction of non-native species in Wallowa County is subject to County Ordinance 93-001. Release of any non-native species is concurrence with County Commissioners.

Water Quantity

Water quantity problems are specific to reaches and listed under those reaches.

Tree density – In many areas the peak flows are a month earlier than historic USGS data.

There are more trees in some areas, and there are fewer trees in other areas.

Water Quality

Weeds/Erosion (Study, High Priority).--*Noxious, non-native weeds are present and scattered throughout the County. These weeds are highly competitive and can completely displace native plant populations. Many of these weeds have shallow root systems which do not provide soil stability. This can result in increased sedimentation. Invasive noxious weeds limit habitat biodiversity.*

Identify, map, and monitor noxious weeds on an ongoing basis. Use whatever combination of herbicides, biological, and mechanical controls as necessary to control or eradicate weeds.

Herbicides/Pesticides (High Priority).--*Herbicides and pesticides are necessary to control agricultural and forest weeds (as noted above) and pests. These agents can be harmful to fish and, in the case of pesticides, harmful to the fish food supply.*

Current regulations on herbicide and pesticide use should be followed (e.g., stream setbacks). Appropriate combinations of hand-sprayed application (as opposed to aerial spraying), biological control, and mechanical control should be used near riparian areas to keep the chemicals out of the water and surface runoff.

¹See also Watershed Management - Approaches to Implementing Solutions

Stream Structure

Stream structure problems are specific to reaches and listed under those reaches.

Substrate

Substrate problems are specific to reaches and listed under those reaches.

Habitat Requirements

Resource users (agriculture, forestry, and recreation) are not aware of how they can effect (enhance or degrade) salmon habitat.

Education of resource users about how to protect and enhance salmon habitat is vital to the successful implementation of any restoration plan. Education can be a two-way process. Agency planners may find that long-term local resource users have much knowledge that can be useful in planning restoration projects and avoiding unforeseen adverse effects (e.g., habitat degradation caused by large-scale removal of woody debris from stream).