



Taking back The weed

Weed invasions of small-acreage pastures can occur very quickly. In fact, they often seem to happen so fast some might suspect their neighbor quietly came over and planted weeds in the middle of the night! Something has to be done to stem the tide. Taking a pasture back may require very simple to somewhat complex procedures. Several factors play into putting together a plan for success.

Weed Identification

First, learn what the weeds are. If uncertain, collect plant samples and take them to a local University of Wyoming Cooperative Extension Service area specialist or a county weed and pest control district office.

Weeds are often defined as “plants out of place.” Looking across a landscape, one can often tell if a particular plant doesn’t look right. If a new plant appears one year, then begins to spread quickly and just doesn’t seem to fit with the landscape, it is probably a weed. Take it in for identification. Even if it turns out to be a native plant, that is OK. You will have learned a new native plant in the process and something new about your land.

To collect a sample, obtain the whole plant, including some roots, stems, leaves, flower blooms, and fruits or seeds if possible. This will greatly help in identification. Keep fresh samples cool and moist: don’t leave them on the dash of the pickup truck all day! New samples can be pressed between several sheets of newspaper if the sample won’t be taken to be identified for several days. Drying plant specimens is very useful for identification and is the method used by herbariums worldwide.

Weed Biology

If the plants turn out to be troublemakers, learn a little about the life cycle of each weed to determine how and when control methods should be applied. For example, Russian thistle is an annual, which means it completes its entire life cycle in one year and reproduces solely by seed. Control it before seed production occurs.

Canada thistle, which is a creeping perennial, primarily spreads by lateral roots that produce new plants. Unless the roots are removed, the problem will continue to come back for years.

your pasture: management

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If the plant is a biennial, rosettes form the first year, and flowering and seed production occur the second year. Biennials have no ability to resprout from roots. Severing them a few inches below the soil surface will control them.

A little knowledge of how the plants grow and reproduce will help determine how to be most effective in weed-management efforts. Several good sources of information on Wyoming weeds include the UW Wyoming Weed Identification Site at <http://www.uwyo.edu/CES/WYOWEED/wyoweed.htm>. There is information for many of Wyoming's problem weeds and control options in the online version of the *Montana, Utah, Wyoming Weed Management Handbook* at <http://www.uwyo.edu/UWCES/WeedManagementHandbook.asp>.

A Little Weed Ecology

Next, recognize why the weeds are there. Most, but not all weeds in Wyoming, tend to proliferate and spread following soil disturbance and overgrazing. If these are not taken into consideration, the same weeds will be battled over and over.

Disturbances that reduce native grasses, forbs, and shrubs, such as construction and severe overgrazing of open spaces, allow weeds to move in. The way pastures and roadsides are managed will play a major role in weed management. Some new landowners may have inherited the weed problems from previous poor management, while others unknowingly bring it on themselves.

Weed Control

There are no silver bullets for control. No single herbicide, biological control agent, or hand

tool applied once will solve every problem. An established population of weeds will commonly have a large seed reservoir in the soil that will reinvade a site after a single control event. There are some practical guidelines to follow, though.

If the native perennial grasses are still present but have been reduced, hand pulling or spot spraying small infestations of annual or biennial weeds should be effective and allow perennial grasses to recover. Take a quick walk through the pasture and look for desirable perennial grasses under the weed canopy. If they are patchy, the site may recover naturally. Make sure not to count downy brome (cheatgrass), Japanese brome, or quackgrass as desirable! If finding even a few perennial grasses is difficult, reseeding will likely be needed.



Reseeding

If the native grasses are completely gone and there is a big, weedy mess, weed control, reseeding, and subsequent grazing management if animals are involved, are needed. When weed pressure is heavy, reseeding without weed control will fail. The intense competition provided by a dense stand of weeds will almost always prevent perennial grass seedling establishment. Herbicide treatment or tillage, if feasible, should be initiated the year before reseeding.

What to reseed with? The first place to start is a local Natural Resources Conservation Service (NRCS) office. The Wyoming NRCS has extensive local information regarding species performance according to soil types and precipitation zones.

Being able to recommend a single species mix that will work in every case would be great, but it is just not possible. There is also the consideration of whether to go “native” or plant non-native forage grasses. There is a growing native seed industry in Wyoming, and many more native species are available than only a few years ago; however, some native grass seed may be more expensive than many non-native forage grasses.

If grazing is desired, explore grazing tolerances whether planting natives or not. Removing grazing animals from newly seeded pastures for at least one and sometimes two growing seasons is at times recommended. Weed control the first year following reseeding is often necessary. Mowing and herbicide treatments are good options, but the grasses generally need to be tillered – shoots growing from the base of the stem – and actively growing before post-emergent herbicide applications can be made. Always read the herbicide label for the best application timing following reseeding. Periodically mowing just above the grass height to prevent shading by taller weeds may need to be done throughout the summer.

What if it doesn't rain?

Having done everything needed, the weather can still wreak havoc with any reseeding project. Drought is one of the most common reasons for failure. If nothing emerges, consider waiting another year before attempting to reseed. Many

reseeding projects in Wyoming have laid dormant two or three years before enough rainfall occurred for germination and successful establishment. Don't get discouraged. Always remember persistence will eventually pay off.

Putting it all together

Although sometimes difficult, reclaiming weed-infested pastures can be accomplished. Knowing the weed problems and their life cycles, recognizing how pasture management influences weeds, applying sound weed-control measures, appropriate reseeding, and a little luck with precipitation will put you in the right direction for success!

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