Grass Seeding Plan for Colorado Small Acreages

Weed Control

For your grass seeding to be successful, existing vegetation (including weeds, competitive grasses, and legumes) must be controlled prior to grass seeding. Common techniques for removing existing vegetation are herbicides or tillage. If herbicide is used, read the label to be sure it will not have any residual effects on your new grass seeding.

<u>Fertilizer</u>

For dryland grass seeding, fertilizer is not usually needed. For irrigated grass seeding, fertilize according to your soil test. Apply phosphorous (at rates according to soil test) at or before planting, but post-pone nitrogen until after grasses are established. Use a reputable soil testing lab for your soil test. Soil tests often take 4-6 weeks for the results so plan ahead.

Seedbed Preparation

After controlling the weeds or existing vegetation, prepare the seedbed by tilling or disking. If using a no-till drill, this step is not necessary.

Cover Crop

It is recommended that a cover crop be used on dryland areas because it can increase the success of the grass seeding. A cover crop will grow and die in one year and will shade out weeds, reduce erosion, and add organic matter to the soil. After the cover crop is dead, the residue will hold water at the soil surface while the grass seedlings are trying to grow. Sterile sorghum is a great cover crop to use in Colorado's dry climate, others include annuals like oats, wheat, and rye.

If using sorghum cover crop, plant 3-6 pounds per acre of sterile sorghum after the last frost when soil temperatures are 65° F (generally May 15 or later). Let it grow throughout the summer. It can be mowed or harvested before planting your grass, but it is not necessary. The cover crop will die in the fall. For more information about cover crops, please read the enclosed article, **Cover Crops Help In Dryland Grass Establishment.**

Grass Planting

Between November 15 and April 15, use a grass drill to plant your recommended seed mixture. Plant the seeds $\frac{1}{4} - \frac{1}{2}$ inch deep. Rows can be 7-12"apart. If a cover crop was used, be sure to plant your grass with a no-till drill so the cover crop residue can remain on top of the ground. Contact your local conservation district to see if they have a no-till grass drill available. After seeding, water the area if possible, or hope for rain/snow.

If a grass drill is not available, you can broadcast the seed, but be sure to double the recommended drill seeding rate. After broadcasting the seed, drag a harrow or chain link fence over the seedbed, or use a rake to create seed-to-soil contact. Mulch the seeded area if possible with weed-free straw and water if possible.

Maintenance

Although you controlled weeds prior to planting, you will still need to be diligent about controlling the weeds during the first few years of grass establishment. It is important to control weeds to reduce water and nutrient competition so the grass seedlings have the best opportunity to grow.

Mow every month during each growing season for weed control, about 3-5 times a year. Set the mower to 4-6" high, no lower. Do not use herbicides for 3-5 years after planting, or until grasses are grown past the three-leaf stage, because herbicide may hurt the establishing grass seedlings.

Exclude animals until grasses are well established. For irrigated areas, grasses may establish the first year. For non-irrigated areas, grasses can take 3-5 years to establish. Adequate establishment for dryland grasses is 3 plants per square foot. Be patient.

Once grasses are established, continue to monitor for weeds and control them before they become a problem. Manage grazing so that animals are not allowed to overgraze. Visit CSU Extension Small Acreage Management website <u>www.ext.colostate.edu/sam</u> for videos and other information about grazing. Contact your local Extension or NRCS for grazing management assistance.

Resources

Find local seeding and weeding contractors on the **Small Acreage Services Database** at <u>http://sam.ext.colostate.edu/</u>

Watch the one-hour recorded webinar called **Renovating and Reseeding Your Pasture** available at <u>www.ext.colostate.edu/sam/webinar.html</u> Scroll down to find it listed under 2012.

Watch the half-hour recorded webinar called **Introduction to Pasture Stewardship** available at <u>https://connect.extension.iastate.edu/p6erdlc9q5i/</u> if you live on the western slope of Colorado.

Watch the one-hour recorded webinar called **Pasture Management on Small Acreages** available at <u>www.ext.colostate.edu/sam/webinar.html</u> Scroll down to find it listed under 2012.



Cover Crops Help in Dryland Grass Establishment

By Jennifer Cook, Small Acreage Management Coordinator, NRCS/CSU Extension

Establishing grass is often difficult to do in our semi-arid climate, particularly when there is weed pressure. That's why I often recommend a cover crop be planted prior to seeding dryland grasses. A cover crop is allowed to grow, make cover, and is dead by the time grasses are planted. Here's how and why this strategy works well in Colorado.

Why take time to plant a cover crop before planting your grass seed?

Cover Crops:

- Provide weed control by shading weeds out;
- Add organic matter to soil by their roots and residue (dead plant material left on the ground);
- Hold moisture at the soil surface which is critical during grass seed germination and early root development;
- Protect soil from wind erosion by holding the soil in place.

How it works?

Sterile sorghum may be the best option for a cover crop in our semi-arid climate, because the residue will not decompose quickly and will remain on the soil as mulch. Use sterile seed so the crop won't reseed itself. Sorghum is a warm season crop, like corn, and can be planted after May 15, or after the last frost has passed. Plant 4-8 pounds of sorghum seed per acre. Use a grass drill to plant sorghum seeds $\frac{1}{2}$ - $\frac{3}{4}$ deep.

Sorghum will begin growing within 7-12 days after planting and will quickly tower over competing weeds. It will out-grow and out-compete weeds over the summer so much of the weed pressure will be reduced. Sorghum will grow over the summer and die off by the first frost in September or October.

The cover crop will be dead prior to planting your grass mix. You may need to mow the sorghum if it is taller than 10". Or you can take it off for hay, but make sure to leave 8-10 inches of stubble behind.

A dormant grass seeding works well in Colorado. Depending on where you live, there is a window of time for planting grass, generally between November 15 and March 15. Use a no-till drill to plant your grass seed mix right into the sorghum stubble. A no-till drill does not require that the soil be tilled and smoothed like traditional drills do. It has double disc openers that slice through the residue and soil, then the seed is dropped at a set depth. Packer wheels close the gaps and press the seed and soil together.

While the grass seedlings are germinating and growing (some take weeks to years to finally establish), the thick sorghum residue will hold moisture and act as a mulch to reduce weed pressure and wind erosion from occurring.

For more assistance on grass establishment, contact your local CSU Extension or USDA-NRCS office.



Sterile sorghum growing in August on a dryland field in Larimer County.