

Conservation *on the Range*



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How can you tell when your range is losing soil?

Just look at the water running away when the snow melts. Or look at a dry wash, suddenly wet after a summer thunder shower. If the water is thick with mud, then you are losing your range. It will NEVER be quite so good again. Rocks will begin to sprout up on the hill-sides, the perennial grasses will peter out here and there, replaced by sage or cheat grass. Springs will dry up earlier and so will the grass.

This is all a slow process. It may take 10 or

20 years before the range "pays you back" for poor care by feeding less livestock. What a lot of people call "overgrazing" is really loss of soil on the hill-



sides. No amount of rotating or reseeding or anything else will ever replace it.

What causes the soil to leave?

These are some of the causes:

- Lack of dead plant cover on the ground.
- Drought. Hardy dryland grasses can help. Crested wheatgrass, whitmar wheatgrass, and other hardy grasses help whip drought.
- Fire. This destroys the plant cover so that the soil is defenseless against moving water. Firebreaks help and so do strips of grasses that stay green further into the summer.



► Replacement of perennial grasses by annuals. This doesn't necessarily cause loss of soil. A heavy cover of cheat grass (an annual) is a better erosion preventative than a partial stand of bunch grass. Trouble is that the annuals don't always make a heavy cover, or the cover may burn.

► Grasshoppers or crickets or worms. Many times these outbreaks can be predicted and action taken.

Can these things be prevented?

No—not all of them, but the first cause is more important and applies to more acres than all of the others put together. On most land drought, fire, and insects don't come every year—but much land is stripped too bare EVERY year.

A good rule is to leave half the growth to fall down on the ground and form a cover. Just one year won't help much, but if you do this every year, you'll soon notice the runoff water is clear. Also, not nearly so much will run off. The litter on the surface slows the water and allows it to sink in. Also, the litter keeps the surface from getting packed too tight by the hoofs of animals. Again this allows the water to sink in instead of sending it scooting down the hill. And don't forget—a range treated this way will soon be carrying more stock than the range eaten clean.

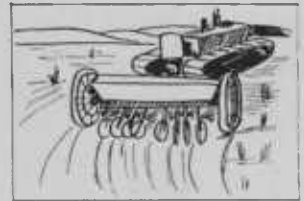
But suppose there isn't enough growth to cover the ground, no matter how it is pastured? Obviously, if an acre has only two spears of grass on it, it doesn't do much good to save one of them. Such a range may be reseeded if there is any soil left or if it isn't too rocky. If it can't be worked, about the best you can do is to

hold stock off entirely for several years and see if some grass will come. Often bulbous bluegrass can be made to grow on such places and it furnishes some feed, although it is not a heavy producer.

How can you save range soils?

Here are a few suggestions for saving soil:

- Reseed the best sites.
- Provide crested wheat or rye pasture for spring use so the grass can grow high enough that some CAN be left.



- Provide stock water, then more water, then more water. There is no such thing as too many watering places. Haul water, if necessary. Lots of watering

places mean well-scattered stock; less tendency to kill the grass around the water; less trampling of soil and grass, more time lying down, and more money in the bank when the stock is sold.

- If there is runoff in the draws, run some diversion ditches out from the draws, thus giving some of the land a sort of irrigation in winter and early



spring. This keeps the mud at home and often makes a meadow from barren land.



► Fence. Especially on the ridges. This gives a way of preventing the stock from overgrazing the south slopes.

Keep at it till you win!

Don't stop working until the water that runs away is not carrying any of your range away with it.

If the runoff is clear, your conscience can be clear too.

*See your local
County Extension Agent
for further information
on conservation and use
of Oregon resources.*