Media Luna: Used to help disperse water more widely across valley bottoms. This helps water soak into the soil and restore proper flow. The specific shape of this Zeedyk structure prevents rills and gullies from forming and disperses water across a wide area of space.



How is the Sheridan Community Land Trust (SCLT) involved?

Sheridan Community Land Trust is actively helping landowners implement Zeedyk structures through project design, on-the-ground survey, and education. In the future, SCLT hopes to host volunteer days and other resources to help landowners build these structures.

How Can I Get Involved?

There are several ways that you can make your land more drought resilient through the use of Zeedyks.

For landowners who are interested in implementing Zeedyk structures:

- Contact Rebecca Ash, SCLT Water Conservation Intern water@sheridanclt.org
- Call the SCLT office: 307-673-4702

To volunteer for a Zeedyk building project:

• Visit SheridanCLT.org/Volunteer and complete our online volunteer sign-up and check the "Conservation" box under interests. (You can check any of the other boxes, too.) You will be notified of any upcoming volunteer opportunities

Don't have erosion issues on your land where Zeedyks can be used or unable to volunteer?

• No Problem! These projects rely on community support. You can help improve drought resiliency in Sheridan County by making a tax-deductible gift to SCLT at SheridanCLT.org.







Donate



Water & Drought



IMPROVE YOUR LAND WITH ZEEDYKS

OVERVIEW

Wet meadows play a key role by providing forage for livestock while providing a home for many species of wildlife and plants. Wet meadows act as a natural sponge by absorbing and slowly releasing water so that surrounding plants and wildlife are not as negatively impacted by drought.

When gullies or head cuts begin to form, the water runs out of the meadow faster which decreases the amount of vegetation. Over time, if the erosion is not corrected, it is possible to lose the entire meadow. This erosion can be addressed by using Zeedyks which are lowmaintenance, hand-built structures.



Email SCLT

Volunteer

Uses

- Control erosion (head cuts, grade control, ditches)
- Improve wildlife habitat
- Increase the amount of soil water storage
- Improve drought resiliency
- Increase vegetation in surrounding area of Zeedyk



Sheridan Community LAND TRUST Conservation | History | Recreation

Connecting people to land and history

What is a Zeedyk and where did Zeedyks come from?

Zeedyks are not a new concept when it comes to land management and restoration. They are typically constructed out of rock and local materials and can mostly be built using hand tools. These structures can be used to increase the amount of water in the soil, increase the amount of vegetation grown by extending the growing season, and are a tool to stop and heal erosion caused by head cuts and gullies. They are named after Bill Zeedyk, who helped develop several different low-tech structures that address common erosion problems in wet meadows, also known as mesic meadows. The key to improving the land is to be proactive, catching erosion and opportunities early.

What is the main role of a Zeedyk?

The main role of Zeedyks is to stop erosion before a head cut, rill, or gully becomes too big or too expensive to fix. Zeedyks prevent further erosion by slowing the flow of water and provide a protective layer on top of the eroding soil. Zeedyks also catch sediment that eventually will rebuild the eroded area over time. Zeedyks also allow water to soak deeper into the ground, which allows greater growth of the surrounding vegetation in the eroded area.

What does this process look like?



Head cut repair in Wyoming.



Gully before repair in Wyoming.



- Meadow restoration in Colorado.
- Meadow restoration 4 years later.







How often do I need to check on my Zeedyks?

After the Zeedyks have been installed, it is best to check on them after a rainfall to see how the water is flowing through them. When examining the Zeedyks, it is important to look for any washout around the structure and any modifications that may need to occur such as adding another layer or row of material. After the first season, Zeedyks must be checked at least once a year. The key to Zeedyks being successful is remembering to check up on them.

Can wildlife and livestock co-habitat in areas with Zeedyks?

Yes! Wildlife and livestock both benefit from the areas where Zeedyks are placed once the vegetation has had time to reestablish. It is important to have a grazing plan in place in areas with Zeedyks, so that the vegetation in the eroded zone has time to reestablish.

COMMON ZEEDYK STRUCTURES

The Zuni Bowl: This structure is named after the Zuni people. It is one of the more common structures used when treating head cuts. Head cuts progress when the soil surrounding the vegetation's roots washes away. The Zuni Bowl prevents this process by slowing the flow of water and preventing the soil from washing away. Zuni Bowls can be incorporated with other Zeedyk structures to have an even greater effect.



One Rock Dam: Commonly used for treating gullies and grade control. The One Rock Dam is great at catching sediment as well as dispersing the flow of water. Once the sediment has built up over the one rock dam, another layer of rock can be added to continue the process.

