

Wolf Creek Ranch

January 20, 2020

Common Areas at Wolf Creek Ranch total 119 acres. Any grass restoration would be great for this area. The commons area of the ranch is currently in an Agriculture Valuation for tax purposes and should be supported as such. Grass is a necessity for cattle to graze and maintain their body condition and provide nutritional needs for pregnancy and lactation.

Woody brush species, such as, but not limited to: cedar, white brush (Bee Brush), immature mesquites and Persimmon compete directly with grass production. These species can be invasive and can take over shallow rocky soils like the soils found on Wolf Creek Ranch. While these species can be beneficial for wildlife, they still need to remain in a balance that is beneficial to the overall health of the property and keep in mind that they are directly competing with the existing Ag Valuation for tax purposes. If left untreated, these species will eventually take over parts the property.

Hardwood species include Oak Trees of all kinds, Mature Mesquite Trees, Cedar Elms and various standing trees that are not shrubs.

A little history of the hill country: Before European settlement, wildfire was common in the hill country. It is estimated that a wildfire would come through the area every 5-15 years and as even as little as every 3-5 years in some locations. These fires were usually started by lightning strikes. This natural occurrence kept woody brush species in check and prevented them from taking over a certain area. Mature hardwood trees generally would survive these fires. That is why we see several older oak trees. Also, before European settlement, Buffalo or Bison migrated through this area. The grazing was usually very intense for a short period of time and then the herd moved on. This type of grazing kept small brush species in check. As humans started to inhabit this area, fire was suppressed for human safety purposes and the herds of Bison was greatly reduced. Today, humans have tools that mimic what nature did before European settlement. Mechanical and Chemical and Biological control can help us keep the grasses growing and can keep the brush species in check.

There has been some clearing of the property. That seems to be going very well. Hopefully we will continue to get rain through the winter and spring and see some grass restoration. I would recommend to keep clearing. I would not remove any mature oaks, mature mesquite trees, cedar elm trees, or any other mature hardwood trees.

The White Bluff Trail Area – I would recommend clearing as much brush species as possible. There would be some white brush left behind for native and non-native bee species and to also create a barrier between the road and some trail area. I noticed some fence line clearing that

looked good. The pasture to the west of the barn, I believe is called the Old Pasture, I would recommend clearing brush species and leave the creek area alone. The creek area looks to be in pretty good shape.

Removing these brush species, will not only create air flow for other plant species, but will remove the shade and allow sunlight and water to get to the soil and germinate grass seeds. The root systems of the brush species would be greatly reduced allowing the establishing grass roots to get water and nutrients they need to establishment and maintenance.

Mechanical removal of brush is the fastest way to remove those species. Chemicals can be used to control regrowth. Then an IPT (Individual Plant Treatment) of Hexazinone (Velpar L) can be applied at a very low rate for regrowth in the future. Some of the brush species such as mesquite and cedar can be treated for regrowth with triclopyr ester (Remedy Ultra). Treatment of the small plants will reduce chemical cost and usage. It is better to treat smaller plants because the percentage of control is better. Before using any chemical, please read and follow all directions on the label. Please be mindful of grazing restrictions, currently there are no grazing restrictions with the above listed chemical, but with new technologies and studies that could change. THE LABEL IS THE LAW!

Annual/Common Broomweed seemed to be in abundance around the commons area as well. Common broomweed is a prolific seed producer. It can readily germinate and grow into thick stands that completely shade the ground and outcompete grasses and other desirable plants for soil moisture and nutrients. I would recommend to spray and treat for broomweed. For best results, apply during early through late spring (late March through May) when common broomweed plants are actively growing but less than 6 inches tall. Controlling common broomweed is not a one-time job—you may need to treat again when winter moisture sets the stage for a “broomweed year.” There are several herbicides that can be used to treat broomweed.

Herbicide	Herbicide/Acre	
	Early (<6 inch tall)	Late (>6 inch tall)
2,4-D	1 pint	2 pints
Weedmaster™ or Range Star™	1 pint	2 pints
Grazon P+D™	1 pint	3 pints
Cimarron™, Ally™ or Escort™	0.1 ounce	no late rate

Important: Add ¼% to ½% surfactant to the spray tank when using any of the above treatments.

Keep these points in mind when using herbicides:

- Follow the directions on the herbicide label, the label is the law
- The cost of treatment with this method remains constant regardless of number of broomweed plants per acre.
- Spray with a minimum total spray volume of 10 gallons per acre.
- Avoid herbicide “drift” onto sensitive or nontarget areas.
- Do not spray when winds are over 10 mph.

Some point of reference websites for herbicide control for the brush species and broomweed are below:

<https://agriflifeextension.tamu.edu/library/ranching/weed-busters-how-to-control-common-annual-broomweed/>

<http://forages.tamu.edu/PDF/ERM-1466.pdf>

<https://texnat.tamu.edu/about/brush-busters/cedar/>

<https://texnat.tamu.edu/about/brush-busters/mesquite/>