

Guidelines for Use of Annual Medics and Clovers in South Texas

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Fertilizer Recommendation (Apply pre-plant)

Soil Test: For pH, P, K, etc., and fertilize accordingly. In absence of soil test: Apply 40 to 80 units of P₂O₅ and K₂O and no more than 30 to 40 units of N per acre.

Herbicides AND Herbicide Residue Problems:

Some pasture herbicides applied in the spring can prevent clover/medic establishment in the fall--most critical in year of seeding!! **Residue problem herbicides** are: Grazon P+D, Amber, and Ally. Known "safe" herbicides are: 2, 4-D and Weedmaster. **All "broadleaf" pasture herbicides will kill or severely damage most clovers/medics if sprayed during active growth.** Use "safe" herbicides after medic/clover seed has set to control problem weeds. May require higher rates to control weeds because of the delayed application date. A good medic/clover stand will reduce weed potential by direct competition with winter/spring weeds.

Planting Date (early dates with good moisture)

Prepared Seedbed: Oct. 1 to Dec. 15
Sod: Oct. 15 to Nov. 30

Planting Method

Seeding depth: ¼ - ¾ inch. (use the deeper end of range early in season)
Prepared seedbed: Drill or broadcast **AND cultipack or drag**
Sod: No-Till Drill (**graze short before and after planting as needed**, recommended **medics/clovers** will establish in grazed pastures). With cultivation of sod (cultivation enhances production): Drill or **broadcast AND cultipack or drag**. Can mix with fertilizer and sling it on--**plant ASAP (within 24 hours) after mixing with fertilizer**. Drag or cultipack immediately.

Seeding Rate

2 to 16 lb./A depending on species and seeding method (use lower seeding rates with more precise seeding methods). See rates listed with recommended varieties below.

Mixtures: Mix two or more medics/clovers (use mixtures to capture strengths of each and extend season of production). On prepared seedbed, or cultivated sod, addition of 10-15 lbs of ryegrass will lengthen the grazing season. Apply N fertilizer (50 lb./A) after medics/clovers/ryegrass is established in November or December.

N-fixing rhizobia (inoculum/inoculation)

An ESSENTIAL step for growing legumes. Purchase pre-inoculated (coated) seed when available!! Otherwise, apply user applied product according to label instruction. We suggest that you use a commercial sticker enhance adhesion of inoculum to the seed. The exact

amount of liquid needed varies a bit with seed size, but about 10 ounces of liquid per 50 lb bag should be about right. Each species uses a SPECIFIC inoculum (depending on provider there may be some overlap, check supplier). With user applied products, plant ASAP after inoculation (24-48 hr); direct sunlight and high temperature results in rapid rhizobia death (this is the reason we recommend later planting dates than will often work with natural reseeding stands). When seed is mixed with fertilizer, the rate of rhizobia death is enhanced....SO PLANT WITHIN 24 HOURS OF SEED INOCULATION.

Recommended Varieties (Well adapted to calcareous soils unless otherwise noted)

Good reseeder: (Produces a high percentage of **Hard Seed**--will reseed under grazing)

Burr medic (Burr clover) (**Armadillo**) **Developed @ TAES-Beeville, released in 1998. Will spread over time to other pastures. BEST WINTER LEGUME FOR SOUTH TEXAS.** Adapted north to about I-20. Not well adapted to sandy soils. (5-10 lb./A) **WSM-1115 strain of inoculum is superior!** Use pre-inoculated (coated) seed!!

Little burr medic- (Little burr clover) (**Devine**) **Developed @TAES-Beeville, released in 2005.** Will spread to other pastures over time. BEST adapted for the I-35 corridor from the San Antonio area to nearly the Oklahoma boarder. Adapted further west than Armadillo or any of the barrel medics. (3-6 lb./A) **WSM-1115 strain of inoculum is superior!** Use pre-inoculated (coated) seed!!

Barrel medic - **Will not spread** to other pastures to any extent. (6-10 lb./A) WSM-1115 strain of inoculum is best. Use pre-inoculated (coated) seed. Better choice for sandier soil. Will NOT tolerate flooding as a seedling.
(**Jemalong or Jester**) – “best” of barrel medics (adapted south of Austin, TX)
(**Parabinga**) - susceptible to frost/freeze damage (Best in Deep South Texas)

Ball clover - Common - has worked well in Central Texas, has small seed which reduces its ability to compete in grass sods. **Surface seed and drag/cultipack.** (2-3 lb./A) Use pre-inoculated (coated) seed.

White clover (Durana and Patriot) **ONLY for areas East of the Colorado river.** (3-4 lb./A)

Poor reseeders: lacks hard seed (**good seedling traits in year of seeding**)

Crimson clover (Dixie, Tibbee, Flame, AU Sunrise, etc.) - (10-12 lb./A) Will show some chlorosis on calcareous soils.

Subclover (Koala, Clare) - reseeds some years (10-14 lb./A)

Berseem (Bigbee) - **very productive under good moisture**, e.g. clay soils, irrigation, periodically flooded soils; little or no reseeding; requires higher fertility; **not drought tolerant.** (10-16 lb./A)

Sweetclover (Hubam and Madrid) - low palatability, stems often left ungrazed. (10-15 lb./A)

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