Annual Lespedeza in Fescue Pasture: a way to fill the summer forage gap

Matt Booher, Augusta County Extension: 540-245-5750, mrbooher@vt.edu

Facts:

Annual or common lespedeza- Lespedeza striata. Varieties include 'Common' and 'Kobe'

- Pasture or hay –adapted to heat, humidity, poor soils
- Summer annual legume not the perennial you see along the highway!
- Graze from mid-July until frost. CP 18-22%, TDN 65-75%, Non-bloating legume
- Seeding rate:15-20 lbs./ac first year
- > Seed cost: \$2.50/lb.
- ➤ Planting: Plant March-April into close-grazed pasture. Plant at ¼". Treat with inoculant.
- Management: Minimize competition from fescue (no N fertilizer, graze fescue in spring), Can begin grazing when lespedeza reaches 8-10" tall.



April 3

Annual lespedeza was no-till drilled into live, fescue sod on April 3, 2013. The sod had been grazed down very close to facilitate seeding of the lespedeza. Lespedeza seed is small and light, causing bridging in the small box seed tubes. We ended-up running seed through the large seed box. We planted as shallow as the drill would allow; some seed was visible on the soil surface.



April 27

About a month after planting, lespedeza seedlings had emerged, survived a hard frost, and had grown to several inches tall.



May 15

By mid-May, fescue had begun to grow rapidly to about 20" tall. To reduce competition to the lespedeza, ewes were turned into pasture to graze down the fescue.



July

Although not a hot summer by recent standards, warmer weather in July & August caused the lespedeza to grow rapidly. In these photos it is about 20" tall. Due to a rainy summer, fescue remained a major component of the available forage. Forage quality on this lespedeza (not including fescue) was measured at 18.7% CP and 71.6% TDN in early August.





Ideally, sheep would have been rotationally grazed on the lespedeza as soon as it reached about 10" tall to maximize quality & regrowth potential of the forage. Due to excellent forage elsewhere, sheep were not turned into this project until August 24- at this point there was an estimated 1-2 tons of mixed-fescue + lespedeza pasture per acre.

Take-away points:

- Way to provide quality, heat-tolerant summer forage without giving up any cool-season pasture
- Grass must be held in check during establishment!
- Annual lespedeza will die with freezing temperatures, but can be managed to reseed itself before the first fall frost.
- There is obvious value in lespedeza as a heat-tolerant crop, and as highly nutritious forage. Not-soobvious benefits include: dilution of endophyte-infected fescue, potential as an anthelmintic, nitrogen fixation.