## Southeast AGRISEEDS



Helping you optimize productivity on every acre!

# THE PERENNIAL FORAGE GUIDE



Are you ready for better hayfields & pastures?

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### **Perennial product list**



## How we help you

We, our staff and dealers, want to get to know YOU and your operation. Our commitment to modern agriculture is strong and our goal is to help you find the products that fit your farm and develop a cropping system that is balanced and profitable. Proudly based out of Rome, Georgia, Southeast AgriSeeds services the southeast region with a full line of forage, cover crop, wildlife and erosion control seeds.

We're here to help.

### **Research and Development**

In house variety trials and quality samples, as well as university and privately sponsored trials allow us to bring you top-performing varieties for the southeast. When a new variety hits your farm, rest assured that it has been evaluated extensively to ensure that it aligns with our goals.

#### **Extensive Dealer Network**

Our local dealers do more than sell seed. They are your local advisors. Many of them have experience with our products on their own operations, are key members of local forage and conservation programs, and attend our frequent training programs. They have the tools to serve your needs!

### **Technical Support Staff**

We are committed to helping you find solutions. Our technical staff members participate in continued education training and are well versed in state-of-the-art production. Through farm visits, phone calls, educational meetings and frequent publications, our staff shares what they have learned or discovered with you.

#### **Seed Quality Standards**

We pay attention to the details just like you do. Every bag of seed we handle has been quality checked for high purity and germination. Our warehouse staff diligently manages to maintain this quality from our facility to your farm.

See what we see every day. Follow us!











## TALL FESCUE

### HIGHLIGHTS:

#### **SEEDING RATE**

25-30lbs/A full rate or 10-12lbs/A interseeding

#### PLANTING DEPTH

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

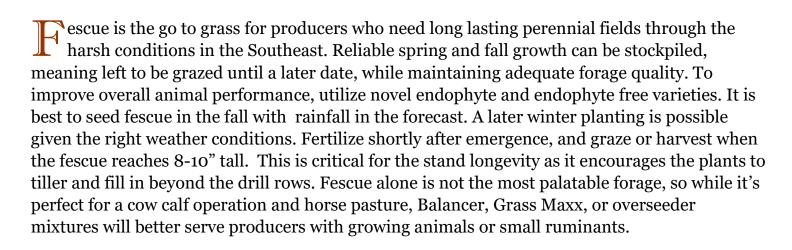
8+" tall to harvest, leave behind 4"

#### **BEST USED FOR:**

Stockpiling, grazing tolerant forage, persistent pasture and hayfields

#### **NOT WELL SUITED FOR:**

Lactating dairy cattle, sandy soils, areas that flood more than 36 hours



## **Consider this...**

Average weaning weight for calves on novel endophyte fescue vs KY-31 is 75lbs heavier. The toxin in KY-31 reduces palatability and total animal intake.

Fescue planting season is long. With mild winters, we can stretch the planting dates of fescue until later in the fall and even see success with later winter seedings.

A maintenance overseeding of 10-15lbs per acre every other year will keep your fescue stand thick and fresh.

The endophyte from KY-31 will not transfer to novel or endophyte free fescues.





## **Testimonials**

"If it wasn't for my BarOptima, I'd be hurting for dry hay. I've been very impressed so far."

**Tony Isley, Snow Camp NC** 

"I like this Martin 2 so far. The cattle don't keep their hair coat like they used to. Calves are big- we have had a good season."

Charles Croft, Calhoun GA

**Martin 2 Protek -** The Tough One. This medium-early maturity novel endophyte variety is the most rugged in the lineup. Excellent disease resistance and great longevity make this one of the most sought after novel endophytes on the market. Learn more on YouTube- search 'Martin II fescue'.



**Tower Protek** - A soft leaf variety of novel fescue that is later maturing. These two unique characteristics make Tower with Protek a great option for quality hay production. The late maturity keeps plants vegetative for longer and the softer nature of the leaves improves palatability.

**BarOptima +E34** - The original soft leaf tall fescue. The soft leaf quality makes this fescue more palatable and drives consumption by livestock higher.



**Cajun II Endophyte Free** - A strong endophyte free variety. Great disease resistance and yield. Cajun II genetics have been used as the basis for many new fescue varieties, including Martin II.





## **ORCHARDGRASS**

### HIGHLIGHTS:

#### **SEEDING RATE**

18-22lbs/A full rate uncoated seed or 22-25lbs/A coated seed 10-12lbs/A interseeding

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest, leave behind 4"

#### **BEST USED FOR:**

Grass and pasture finished beef, lactating dairy cows, growing animals, horses

#### **NOT WELL SUITED FOR:**

Overstocked pasture, sandy soils, low fertility areas

rchardgrass is a high energy grass that jumps out and yields big in the spring and has moderate yield in the fall. While we have come a long way with orchardgrass genetics for our climate, there are still some important management considerations for stand longevity. Harvest no lower than 4" and do not graze or mow for hay during a drought. Maintain adequate phosphorous and potassium concentrations in the soil. Orchardgrass is very marketable hay for horse and livestock customers due to its nutritive value, palatability, and visual appeal. In pastures, orchardgrass improves animal intake and is great for interseeding into fescue to reduce the toxicosis. Orchardgrass pairs well with perennial red and white clovers. In the establishment year, be sure to mow or graze the orchardgrass down to 4" when it reaches 8+". This encourages tillering in early growth.

## **Consider this...**

Improved genetics have allowed for increased longevity of orchardgrass in the south.

Orchardgrass is as drought tolerant as fescue, but it doesn't tolerate continuous grazing as well.

Drought is typically blamed for orchardgrass death, but it's most commonly disease that takes it out. Newer varieties are more tolerant of diseases.

Interseeding orchardgrass into KY-31 fescue can dilute the endophyte toxicity.

Variety maturity can affect stand life/longevity. Maturities can vary by a full month.

Orchardgrass is nutritionally superior to fescue and has better palatability.





## **Testimonials**

"I interseeded Endurance into a stand of mixed grass and it even survived the drought of 2016."

**Producer in Lyerly, GA** 

**Endurance** - An orchardgrass for the south. This early maturity variety was developed at the University of Georgia and selected for persistence and tolerance to low cutting height. The yield and disease resistance have been impressive in the field.



**Olathe** - This early maturity variety has proven to survive harsh droughts and come back with aggressive regrowth .

**Inavale -** The latest maturing variety in the lineup. Often, later maturing varieties are avoided in our region due to heat stress, but Inavale can handle it. Consider Inavale if you have a difficult time harvesting orchardgrass in the vegetative state.

**Persist** - Another southern bred variety developed by the University of Tennessee.

Persists under humid conditions and is a high yielding variety.

#### Why do we coat orchardgrass?

Some of our orchardgrasses are coated. We coat orchardgrass to hedge against variable soil conditions, attract moisture, and protect the seed.



## FESTULOLIUM

### HIGHLIGHTS:

#### **SEEDING RATE**

25-35lbs/A full rate or 12-15lbs/A interseeding

#### PLANTING DEPTH

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

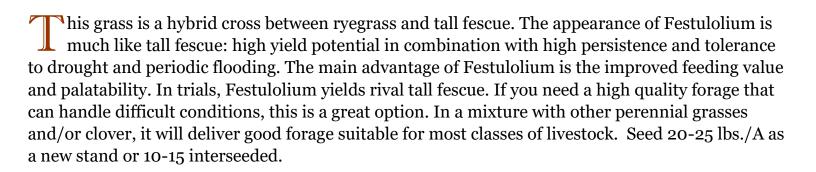
8+" tall to harvest, leave behind 4"

#### **BEST USED FOR:**

Grass and pasture finished beef, milking, growing livestock, horse hay

#### **NOT WELL SUITED FOR:**

Overstocked pasture



## **Consider this...**

Festulolium delivers a balance of ryegrass quality and fescue toughness.

Our strong interest in festulolium as a cool season perennial option for the south began after it outlasted a handful of prominent fescue trials in a piedmont NC trial- It persisted over 6 years!

Festulolium seed is more vigorous than fescue or orchardgrass, and it has the potential to be frost seeded.



## **Testimonials**

"In our 7-way trial, the Festulolium was far preferred to any other grasses."

Andy Burlingham Greenville NC

**Mahulena** - This early maturing variety has been entered into tall fescue trials and tops the charts on yield. It's known as a robust variety that has high leaf to stem ratio.

**Fojtan-** A long-lived, heat tolerant tall fescue type with good nutrition and high palatability.



BROMEGRASS

### HIGHLIGHTS:

#### **SEEDING RATE**

25-35lbs/A full rate or 10-12lbs/A interseeding

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

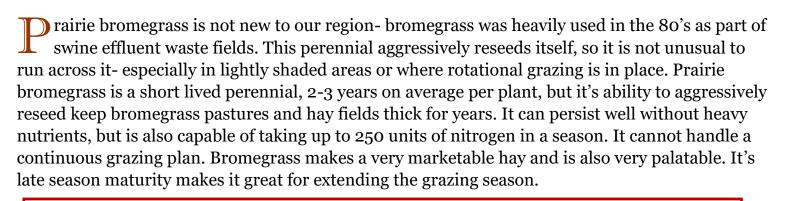
8+" tall to harvest, leave behind 4"

#### **BEST USED FOR:**

Grass and pasture finished beef, milking, rotational grazing, high nutrient areas, shaded areas

#### **NOT WELL SUITED FOR:**

Overstocked pasture, wet fields



## **Consider this...**

Persister bromegrass has solid potential as a perennial replacement for annual ryegrass in the growth curve.

Prairie bromegrass is a very aggressive re-seeder.

Prairie bromegrass holds quality after it seeds out better than any other perennial grass.

'Rescue grass' is a common name for prairie bromegrass. Unlike common 'rescue grass', these improved bromegrass varieties have much higher leaf to stem ratio.



## **Testimonials**

"Persister bromegrass is a game changer. It provides a more balanced diet than ryegrass because of the effective fiber present."

Northeast GA producer Danielsville, GA

"The cows prefer the brome 10 to 1 over fescue."

Northwest GA producer, Bowdon, GA

**Persister** - A disease tolerant variety with excellent yield, regrowth, and reseeding capacity.



**Matua-** A short lived bromegrass that works well in the south.





## MIXTURES

**Balancer** - A top-yielding mix of grasses and legumes with balanced energy and protein. Rugged and tough with high nutritional value, this high-end mixture designed specifically to provide livestock the nutrition they need to gain in the challenging climate of the southeast. From its base of Martin II Protek, to its complementary blend of orchardgrass and clovers, this mixture has quality and performance in mind!



#### **SEEDING RATE**

25-30lbs/A full rate or 15bs/A interseeding

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest Leave behind 4"

**Tower Plus** - This mix is based in Tower Protek novel tall fescue, which is a soft leaf, later maturing fescue variety. This translates to a more palatable forage that stays higher quality for longer periods of time. In addition, the mix includes our best Orchardgrasses for longevity and persistence, and an impressive mix of red and white clovers for added protein and diversity.

#### **SEEDING RATE**

25-35lbs/A drilled, or 30-35bs/A broadcasted

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

Pre-head stage to harvest for high quality Leave behind 4"

**Rejuvenate 2, 4, 6, 8** - This interseeding mixture is great for maintaining productive, diverse pastures or hayfields. At 20 lbs./ac, you will be seeding: 2 lbs./ac of White Clover, 4 lbs./ac of Red Clover, 6 lbs./ac of Orchardgrass, 8 lbs./ac of Endophyte-Free Fescue. This mix can help reduce KY-31 toxin load, increase pasture productivity, and offers an excellent mixture for building pasture diversity and rejuvenating pastures each year.

#### **SEEDING RATE**

15-20lbs/A interseeding

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest Leave behind 4"



**Grass Maxx** - Grass Maxx is an all grass mix that combines the yield and aggressiveness of Martin II Protek tall fescue with the elevated nutrition of orchardgrasses. Grass Maxx provides the diversity you need in a hayfield or pasture while giving you the option of broadleaf weed control during the establishment year. After establishment, frost-seeding a clover or clover blend into the stand in late winter can be a great option to thicken it and boost protein.

#### **SEEDING RATE**

25-30lbs/A full rate or 15bs/A interseeding

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest, Leave behind 4"

**Overseeder (NEW) -** This all grass mix was designed to add diversity, improve quality and extend the growing season. With the base of Martin 2 Protek, the mix is tough and tolerant of a wide variety of growing conditions. The orchardgrass, festulolium and prairie bromegrass improve the overall quality of the mix while also stretching the growing season. While originally designed to be interseeded into an existing stand, we have had numerous producers begin a new stand with this mix. Add your favorite legumes and forbs for a diverse, high energy forage stand that is suitable for all livestock classifications.

#### **SEEDING RATE**

20-25lbs/A

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest Leave behind 4"



## White Glove

### HIGHLIGHTS:

#### **SEEDING RATE**

2-3lb/A interseeding

#### PLANTING DEPTH

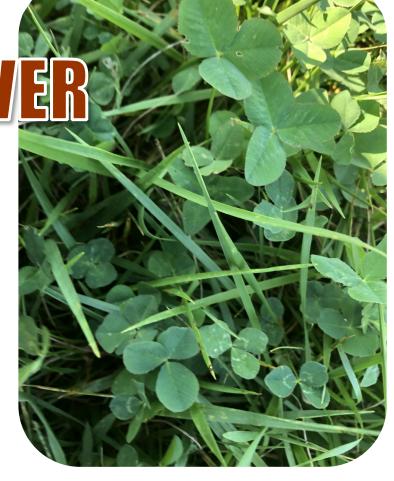
Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

6+" tall to harvest, leave behind 2"

#### **BEST USED FOR:**

Grass and pasture finished beef, lactating dairy cattle, small ruminants, increasing diversity in existing pasture



#### **NOT WELL SUITED FOR:**

Overstocked pasture, pastures where long lasting broadleaf herbicides have been used

ot all white clover is created equal. The amount of nitrogen and crude protein available is directly related to dry matter production. The bigger the clover, the better for your pasture and your livestock. Let go of your white dutch clover and look into clovers that actually do work for you: intermediate and ladino types. Intermediate white clovers are more stolon dense, hold up to traffic better, and reseed themselves more aggressively than ladino type clovers. Ladino white clovers are large, showy leaves that yield big and provide large amounts of nitrogen. Broadcast or drill into tightly grazed or mowed fields in the fall or "frost seed" in mid winter for best establishment results. Graze or mow existing plants when they reach 8" to keep the canopy open so that the clover plants can establish.

## **Consider this...**

Adding white clover to established grass stands can increase animal gain up to 0.5lb per day.

White clover is classified into 3 different groups based on size and growth habit: small, intermediate, and ladino.

In diverse stands, white clover produces enough nitrogen to meet the fertility needs of the grasses.

Bloat can be very easily avoided by not grazing for the first time when heavy dew is present or when animals are very hungry.



### Put the numbers to it

#### Adding white clover to KY-31 infected fescue stands increased steer gains.

Beef steer performance as affected by white clover in endophyte-infected tall fescue. (Hoveland et al., 1981)

Infected KY-31 tall fescue without clover: 1.06lbs ADG, Gain per acre 374lbs Infected KY-31 tall fescue with white clover: 1.53lbs ADG, Gain per acre 582lbs





**Renovation** - An intermediate variety with excellent stolon development. Ideal for those tightly grazed pastures or fields that may be stockpiled. Excellent reseeding.



**RegalGraze** - A ladino type clover selected out of the UGA program under grazing pressure. Has shown excellent drought tolerance. Very showy, yields big in University trials.



**Marco Polo -** A large-leafed white clover known for quick establishment and winter growth.



Kakhariki - A long lived, large-leafed white clover with high stolon \*\* Kakariki\*\* White Clover density.





## RED GLOVER

### HIGHLIGHTS:

#### **SEEDING RATE**

8-10lbs/A

#### PLANTING DEPTH

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

8+" tall to harvest, leave behind 4"

#### **BEST USED FOR:**

Grass and pasture finished beef, lactating dairy cattle, small ruminants, increasing diversity in existing pasture and hay fields

#### **NOT WELL SUITED FOR:**

Overstocked pasture, pastures and hayfields where long lasting broadleaf herbicides have been used

Levery year, it seems we learn a new and exciting reason to be using red clover in our pastures and hay fields. Aside from red clover having a greater percentage of bypass protein compared to alfalfa, it has also been discovered that the concentration of Biochanin A is very high in red clovers. This compound is a vasodilator, giving us not only dilution from KY-31 fescue toxicosis but a direct action against it's negative effects. To improve the longevity of red clover, leave behind a taller residual than white clover. Broadcast or drill into tightly grazed or mowed fields in the fall or "frost seed" in mid winter for best establishment results. Graze or mow existing plants when they reach 8" to keep the canopy open so that the clover plants can establish.

**Barduro** - Barduro is a persistent red clover variety named for its hardiness and durability. In a hay cutting trial at the Auburn Research Center, Barduro was the only variety to survive during their worst drought in 25 years.

**Freedom** - Bred for yield and persistence, this variety has exceptional resistance to mildew. Has reduced pubescence, making this an excellent selection for dry hay production.

**Kenland** - An early to flower variety that is fine stemmed.

**GA-9908** - Southern bred red clover.

**Redkin -** A new release. Tough perennial red clover.

GA-9908 %





## Put the numbers to it

Approximate pounds of nitrogen annually fixed per acre by various

**legumes.** Don Ball, Auburn University

Legume Species Annual Pounds N/Acre

 Alfalfa
 200-300

 Red clover
 100-200

 White clover
 100-150

 Annual clovers
 50-150

(arrowleaf, crimson, etc.)



## **CLOVER MIXTURES**

**Premium Clover** - A blend that is lower in the red to white clover ratio. Best for interseeding into thin alfalfa or grass stands or adding to your favorite coolseason grasses.

**Pasture Booster-** A mix of our best performing red and white clovers, specifically designed to dilute the impact of the toxin in Kentucky 31 Fescue.

**Clover Pollinator** - A mix of 6 annual, perennial, and biennial clovers for attracting pollinators long term.

**Orchard Enhancer-** A white/ladino clover mix for orchards.



**LEFT: Pasture Booster** 

**RIGHT: Premium Clover** 

Mix





## FORBS

### HIGHLIGHTS:

#### **SEEDING RATE**

1-2lbs/A

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

6+" tall to harvest, leave behind 2"

#### **BEST USED FOR:**

Grass and pasture finished beef, lactating dairy cattle, small ruminants, pairing with stockpiled forages, interseeding to improve palatability and quality

#### **NOT WELL SUITED FOR:**

Overstocked pasture, dry hay production

They complement existing grasses well and can be broadcasted in the fall, mid winter, and even early spring. Small seed size contributes to the low seeding rate,. These forages are also low in effective fiber. This means that they are not a suitable forage alone, but can drastically increase quality of a pasture. Chicory jumps out of the gate fairly quickly and is often ready to graze within 8 weeks of planting. Plantain establishes more similar to our cool season perennial grasses, taking it's time initially and requiring a grazing break until it reaches 6". Broadcasting is the easiest method of establishment, but they can easily be drilled shallow as part of a mixture of grasses and legumes.

## **Consider this...**

Perennial forbs have a unique mineral profile that can replace some of the minerals fed.

With a deep tap root, perennial forbs act as a continuous cover crop that alleviates compaction.

Unlike native forbs, true forage types are bred to have an exceptionally wide leaf.

While most people are concerned about killing white clover with broad leaf herbicides, perennial forbs are even more sensitive to herbicides and herbicide residual than white clover.

Perennial forbs are common in wildlife mixes...they're also great for livestock!





## **Testimonial**

"I paired chicory with stockpiled crabgrass to extend my grazing season, and the chicory kept the nutrition of the pasture high enough that my cows did really well."

Buron Lanier, Producer and Southeast AgriSeeds dealer in Burgaw, NC

**Choice Chicory** - A widely adaptable, flexible variety. Proven to be aggressive and high yielding. High metabolizable energy levels and crude protein, and very palatable.

**Forb Feast Chicory**- A high quality, reduced bolting (high feed value) chicory blend.

**Six Point Chicory** - Bred for greatly improved disease resistance, which significantly increases survival under grazing. Six Point also breaks winter dormancy earlier, so it has a longer growing season to provide high quality feed for a longer season.

**Puna 2 Chicory -** New Zealand bred broad-leaved perennial forage chicory.

**Tonic Plantain -** An improved, productive variety of plantain. Dense in minerals, very palatable and full of digestible energy.

**Tuatara Plantain -** Quick to establish, persistent. High in minerals and digestible fibers.





## BERMUDAGRAS

### HIGHLIGHTS:

#### **SEEDING RATE**

8-10lbs/A

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

6+" tall to harvest, leave behind 2"

#### **BEST USED FOR:**

Cow/calf operations, areas that tend to be droughty, summer hay production, high traffic areas

#### **NOT WELL SUITED FOR:**

Livestock with high caloric needs, areas that have standing water

Bermudagrass has a growing importance all across the Southeast as our summers become hotter and dryer. This forage is one of the most drought tolerant around, although it is not the highest quality. Bermudagrass is perfect for a reliable summer and early fall growth and actually goes dormant after the first frost. This true dormancy allows the area to be overseeded with winter annuals, like triticale and winter oats. This unique opportunity means that field dedicated to warm -season production can be used to grow cool season annuals. Limit ryegrass overseeding to avoid suppressing the bermuda long term. Requires high nitrogen and potassium fertility to perform. Seeded Bermudas do have a yield lag compared to sprigged varieties, but many producers are turning to seeded varieties because establishment ease and cost.

## **Consider this...**

Seeded bermudagrass is about 1/3 of the establishment cost of sprigged varieties.

Bermudagrass can be stockpiled into the late fall/early winter to extend the grazing season.

Some of the best stands of bermuda we have seen were mowed with a turf mower weekly during the establishment period to reduce grassy weed pressure.

Bermudagrass is not just for sandy soils! It performs just as well in clay type soils.

Bermudagrass will spread and thicken in feeding areas and cattle trails with ease.



## **Testimonial**

"The Gaucho bermuda came up and filled in faster than any bermuda I've ever seen."

Earl Smith, Hope Mills NC

"I got 120 small square bales per acre off my second cutting this year."

Tony Newson, White County GA

**Gaucho** - Gaucho is a blend CD90160, the highest yielding seeded bermudagrass. Gaucho has proven to be a perfect blend of high yielding, cold tolerant varieties with persistence.





Curious about establishing Gaucho bermuda? Find "Gaucho Bermudagrass" on YouTube.

**Chilly Verde** - This variety was developed in North Carolina for cold tolerance, persistence, and ability to survive in a wide pH range. Known for it's ability to spread quickly and establish rapidly.

**Grit** - A quick establishing and early producing bermudagrass blend.





BAHIAGRASS

### HIGHLIGHTS:

#### **SEEDING RATE**

12-15lbs/A

#### **PLANTING DEPTH**

Soil surface to 0.25"

#### HARVEST HEIGHTS/RESIDUAL HEIGHTS

6+" tall to harvest, leave behind 2"

#### **BEST USED FOR:**

Extremely wet, low fertility, or high traffic areas

#### **NOT WELL SUITED FOR:**

Livestock with high caloric needs



Bahiagrass is known for being the grass that will grow in conditions that other forages cannot handle. This high fiber grass is not suited for livestock with high caloric needs, like growing cattle or small ruminants, but is a great option for areas that will not dry out or have extremely high traffic. This grass is slow to establish, but once established will spread and prevent weeds from emerging. Not well suited for mixing with other forages due to it's aggressive nature. It can persist with low fertility but you will see a significant yield boost from fertilizing.

## **Consider this...**

Bahiagrass can tolerate persistently wet areas and frequent flooding very well.

This is commonly used by the DOT for roadsides because of it's low maintenance nutrient requirements and natural ability to suppress weeds.

Overseeding winter annuals into dormant bahiagrass is more inconsistent than what we see with bermudagrass. Consider cross drilling seed or using vertical tillage to disrupt the rhizomes for improved results.

Mow frequently, 21-28 days during peak season, to optimize quality.

Add a perennial legume, like AU Grazer lespedeza, to improve overall forage quality.



## Testimonial

"Pensacola bahiagrass dried out an area of my pasture that was always so wet."

**Producer in Duplin County NC** 

**TifQuik** - TifQuik is a fast starting, high yielding bahiagrass with good forage potential. It is more upright than other bahiagrasses and tolerates wetter conditions. One strong characteristic of bahiagrass is its ability to handle wet conditions, which works great in lower-lying areas, or areas prone to flooding. Our TifQuik is produced right here in Georgia!

**Pensacola** - This variety of bahiagrass greens up earlier than TifQuik, but plays out more quickly in the fall. Yields 10-15% less than TifQuik. Mature bahiagrass can be very unpalatable to livestock, so begin grazing when the plant is younger (6-8") so it is more nutritious and palatable. This is one of the most traffic tolerant forages once established. While bahiagrass can survive with limited nutrients, it does respond positively to fertility.







## Renovate or Rejuvenate?

It can be tough to decide whether to move on from a thinning field of perennials or to thicken it up by interseeding. Fields that have significant weed pressure, undesirable or unproductive forage species are prime examples of pasture that should be completely renovated. A great way to objectively determine the amount of useable forage is to use a method called point-step. To execute this method, simply write down "desirable" and "undesirable" on a piece of paper. Every 15 steps, look at the forage or weed at the tip of your boot and make a hash under the category it falls under. Take 50-100 points and calculate the percentage of desirable forage. If the percentage of desired forage is high in the field (>75%), it may be a good opportunity to simply thicken up the stand, or "rejuvenate". Interseeding grasses, legumes, or forbs can quickly improve pasture productivity and quality. Rejuvenation can also be part of your maintenance program. We encourage regular overseeding with low rates to encourage seed banking and keep a cool season perennial stand fresh.

## Interseeding

There are several ways to rejuvenate the existing pasture without completely reseeding. Management strategies should be evaluated to determine if any of the following will significantly thicken the pasture:

- -Timely Fertilization
- -Weed Control
- -Grazing Management

Over time, you may find that pastures need to be thickened to improve productivity and quality as well as increase overall diversity. The addition of new grasses into an existing stand of pasture can greatly improve palatability, quality, and yield. Interseeding grasses or legumes into Kentucky 31 Tall Fescue pastures can even help to dilute the negative effects.



#### **Suppress the existing grasses**

The challenge with interseeding is the competitive nature of an established perennial to a seedling that has just germinated. Due to this advantage to the established grasses, a few measures should be taken to give the newly seeded grass an opportunity to thrive.

Option A: Chemically suppress existing grasses prior to seeding. Applying a half or quarter rate of glyphosate or gramaxone can stunt the established stand without termination. Depending on weather conditions, this can do some damage to the existing grasses. This method does provide the best opportunity for establishment of the newly seeded forages. Be sure to read herbicide labels to determine when it is safe to plant.

Option B: Mowing the existing grasses very low prior to seeding. This method is less of a risk to the established grass, but may not be enough of an opportunity for the newly seeded forage. Multiple mowing's may be necessary if growing conditions favor the established grass.

Management to favor the interseeded grasses does not stop once seed is in the ground. The first 6 months during the establishment period, mowing high (6-8" residual) when the existing grasses start to grow tall is imperative.



## Before you seed a perennial, have you...

- Fertilized according to your soil test?
- Calibrated your drill?
- Limited residue on the soil surface?







## **Pasture Renovation**

If the point step method yields desirable forage in less than 75% of the area, it may warrant a complete renovation. Pasture renovation is a process that requires planning and clear goals for the farm. It is important to ask yourself a series of questions to determine what forages would help you meet your goals and how you can keep the same problem from occurring again.

Questions to ask consider: Why did the pasture diminish or become unproductive? What time of the year do I lack grazing? Is pasture quality matching livestock needs?

After determining the answers to these questions, direction becomes clearer and the process of renovation can begin. This should be a deliberate process, so we encourage you to do a small percentage of the farm at a time. To begin, take soil samples to verify that your pH and nutrients are adequate. Perennial grasses and legumes are especially sensitive to soil fertility and will be very unproductive or not survive if not within the ideal pH range (6.0-6.8) or have insufficient N, P, and K.

Tip: Annuals can handle lesser soil fertility and can be planted until the soil has been amended enough for perennial grass and legume establishment.

Although thinning pastures may not seem very productive, any established forages will be competitive against the seedlings as they emerge. Set yourself up for success by removing this competition by means of a burndown herbicide or tillage.

If herbicides are part of your management plan, there are several strategies for renovation: spray-smother-spray and spray-wait-spray.

## **Myth**: Leave perennials alone for a year **Fact**: Perennials NEED to be harvested in the first year

Many of the cool season perennial grasses are bunch type grasses. Their nature is not to form that nice, thick sod seed in the pictures above. To encourage tillering and to keep the stand as thick as possible, perennials absolutely need to be lightly grazed or mowed for hay when they reach 8-10" tall, regardless of the number of months it has been planted. Don't concern yourself with how much or how little yield you get off of the acreage during this initial harvest. The purpose of this harvest is to invest into the longevity of your new perennial stand.







#### **SPRAY-SMOTHER-SPRAY**

After removing pasture growth towards the end of its primary growing season, spray with glyphosate. When moisture in the ground is present, sow an annual into the dead sod. This annual will provide quick, dense coverage to smother any plants that survived the spraying and will serve as excellent feed for livestock. The best annual to plant is one that best matches your management needs. Refer to our Summer and Winter Annual Manual's for more details about the best annual for your needs.

It is important to manage this annual as you would any perennial grass by respecting the grazing or cutting height and allowing regrowth time. When the annual nears the end of its growing season, graze or mow down the growth significantly, as leaving too much material behind can hinder seed to soil contact of the perennial seed.

#### **ADVANTAGES**

- Provides a large grazing boost
- Conditions and improves soil to be renovated
- Reduces weed seed bank

#### **SPRAY-WAIT-SPRAY**

Remove the seasonal growth by grazing or cutting for hay. Spray with a burndown herbicide 6 weeks prior to target planting date. Wait 4 weeks and apply again. This wait period allows for any missed or surviving plants to grow back so that the herbicide will be effective at the second spraying. Wait the recommended period per the herbicide label before sowing the new perennial seed.

#### ADVANTAGES

- · Can be done with less advance planning
- Greater potential for "escapes"

## **Planting methods**

Depending on the condition of the field, there are a number of options to successfully establish a perennial forage. If the field is rough or has evidence of pugging from a wet year, this is a great time to utilize a prepared seed bed. After tillage, be sure to cultipack or firm up the ground so that your boot doesn't sink more than 0.25". These small seeds need a firm seedbed to establish quickly. If the field doesn't need tilling, reduce input costs, minimize weed invasion, and improve moisture retention by utilizing a no-till drill. Minimize the residue to ensure good seed to soil contact. Regardless of how the seedbed is prepared, make sure to calibrate the drill to reduce seeding rate mishaps.

# Avoid runoff with FAST, EASY, & EFFECTIVE TURF and EROSION CONTROL

#### **Southeast Ag Turf Blend**

A blend of three different turf type fescues, chosen for drought tolerance, rich green color, and stand density. This fescue blend is a clear option for lawns, roadsides, and erosion prevention projects.

#### **Heritage Mixture**

A classic erosion control mix made with unique varieties to provide fast top growth and deep root development from LowBoy annual ryegrass and cereal rye while our Southeast Ag Turf Blend fills in with its rich, green color. Summer Heritage Mixture available with browntop millet and common bermuda.

#### **Summer Contractors Mix**

A quick solution to a long-term project. A mixture of browntop millet and Chile Verde Bermudagrass to give that quick groundcover while the slower Bermudagrass germinates and creeps along the soil surface. Perfect for those lighter soils that cannot support fescue. Provides quick groundcover.

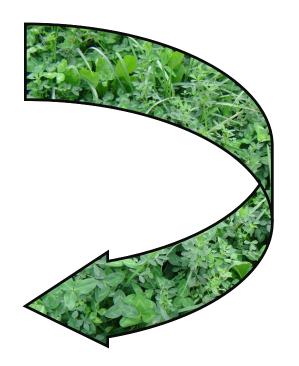
80/20, 70/30, and 50/50 Fescue/Ryegrass mixes also available





## Don't see exactly what you need?

We do custom mixes!



Our technical team will work directly with you to understand what you need and develop a mixture to accomplish that. You'll walk away with a mix named after your farm that is well balanced and unique. Check out our facility and learn about the process on our YouTube channel. Search for 'Southeast AgriSeeds Mixing Facility'. Check out some of our favorites:

#### FoxPipe Farm, Reed Edwards in Laurens SC

19% Endurance orchardgrass coated

10% Fojtan festulolium

10% Balin bluegrass

10% Persister bromegrass

9% AU Merit hairy vetch

9% Crimson clover coated

9% Zenyatta timothy

9% FixatioN balansa clover

5% Tonic plantain

5% Neches white clover

5% Forb Feast chicory

#### Yellowbird Farms, Jim Malooley in McMinnville TN

40% BarOptima Tall Fescue Plus E34

10% Olathe orchardgrass untreated

28% Persister bromegrass

6% RegalGraze white clover

10% Barduro red clover

6% Forb Fest chicory





#### **Cool Season Perennials List**

#### **Tall Fescue**

Martin 2 Protek

**Tower Protek** 

BarOptima Plus E34

Cajun II Endophyte Free

#### **Orchardgrass**

**Endurance** 

Olathe

Inavale

Persist

#### **Festulolium**

Mahulena

Fojtan

#### **Bromegrass**

Persister

#### **Mixtures**

Balancer

Tower Plus

Rejuvenate 2, 4, 6, 8

**Grass Maxx** 

Overseeder

Econo Pasture Mix

#### Clover

Renovation White

RegalGraze Ladino

Marco Polo White

Kakariki White

Barduro Red

Freedom

Kenland Red

Redkin Red

GA-9908 Red

Grazer Select Ball Clover

White Sweet Clover

Yellow Sweet Clover

#### **Alfalfa**

KingFisher 519

KingFisher Stronghold 35-2

L450 RR

KingFisher 435 HD

#### **Bluegrass**

Filly KY

#### **Timothy**

Zenyatta

**KY Early** 

#### **Clover Mixtures**

Premium Clover Blend

**Pasture Booster** 

**Clover Pollinator Mix** 

**Orchard Enhancer** 

#### **Forbs**

**Choice Chicory** 

Forb Feast Chicory

Six Point Chicory

Puna 2 Chicory

**Tonic Plantain** 

Tuatara Plantain

**Boston Plantain** 

### Warm Season Perennials

List

#### **Bermudagrass**

Gaucho

Chilly Verde

Grit

#### **Bahiagrass**

**TifQuik** 

Pensacola

#### **Turf and Erosion**

SE Ag Turf Blend

Heritage Mixture

**Summer Contractors Mix** 

KY 31 Fescue

Contractors Mix (50/50, 70/30, or

80/20)

Contractors Fescue



## **NOTES**



