



Regardless if it's called KR bluestem, King Ranch bluestem or yellow bluestem, it is the most common of the Old World bluestems in Texas.

The Old World Bluestems

By Paul Ohlenbusch

Over the years, many new grasses and broadleaf plants have been introduced to the United States. Some have been good, some have been bad and some downright ugly! Over the next few issues, we will look at some to learn where they came from and what they have done for or to us.

To start with, the Old World bluestems or Asiatic bluestems have been around for many years. Old World bluestems are a group of grasses from the southeast Soviet Union, Turkey, India and Australia, plus surrounding areas (Table 1). They were introduced from the 1920s to 1970s as "improved" grasses.

Some 600 cultivars, mixes and blends of Old World bluestem have been tested in the southern plains. They may be called bluestems, but they are not closely related to big bluestem and little bluestem. Silver bluestem, a less desirable native species, is the closest native relative.

Old World bluestems are introduced perennial grasses, warm-season bunchgrasses with prostrate to erect growth habits. These grasses are adapted to a wide variety of soils but seem to perform best on loams and clay loams. They do not produce or survive well on extremely wet or alkaline soils. Once they

Table 1: Some common Old World bluestems and their source.

COMMON NAME	FROM
Australian bluestem	India, China, Australia
Angleongrass	India
Caucasian bluestem	Russia
Ganada bluestem	New Mexico
Gordo bluestem	South Africa
King Ranch bluestem	India, Turkey, China, Turkestan
Kleberg bluestem	India, China, North Africa
Medio bluestem	India, Africa
Plains bluestem	Oklahoma State University
PMT-587	USDA-NRCS Plant Materials
Pretoria bluestem	South Africa
WW-B Dahl	India
WW Ironmaster	Southern Plains Range Research Station, Oklahoma
WW Spar	Southern Plains Range Research Station, Oklahoma

become established, they are very aggressive and competitive due to their tolerance to grazing and their water-use efficiency.

Old World bluestems have been planted in pastures, on roadsides and many other sites. Invasion into native rangeland has been common both from adjoining plantings and hay feed in pastures. The Old World bluestems can invade any time a species or mixture is overgrazed, stressed by drought or wildfire, or otherwise stressed or suppressed. Once Old World bluestems begin invading pastures, there is no practical way to stop the invasion.

For forage production, management practices include burning as the grass emerges from winter dormancy. Unfertilized Old World bluestem pastures generally have similar production as native range. Nitrogen and phosphorus applications are required for economical production.

Forage production normally occurs in May and June, but the leaf-to-stem ratio drops below one in as little as 45 days and the forage becomes mostly stems. Intensive rotational grazing can limit the stem problem, but the best animal performance has been observed in the early part of the growing season. Forage quality is similar to prairie hay, but the digestibility and palatability are lower than prairie hay.

Wildlife is probably the group most impacted. For most wildlife species, Old World bluestems supply little if any habitat. In most cases, the Old World bluestem creates a single species monoculture. Some people consider the result to be a wildlife desert. *!!!*

Next time, a look at some broadleaves, including sericea lespedeza and purple loosestrife.

Editor's Note: Paul D. Ohlenbusch, Formerly Extension Grazingland Management Specialist, Kansas State University, is now a grazingland and vegetation management consultant (www.grassbydesign.com).

MANAGEMENT TIPS



Winter is here and we are looking forward to spring. The need to meet winter weather head on has arrived.

Continue to evaluate rainfall/snow/ice history and current soil moisture status. If soil moisture has been short, plant growth may be limited for late winter and spring. Low soil moisture can mean little spring plant growth.

If forage was stockpiled, use it as needed.

Monitor water sources for needed levels and quality. Develop options if sources are less than optimal, including for spring use.

Review and adjust grazing and economic management plans and adjust for current and past weather conditions, as well as changing economic factors.

Continue planning for 2008 and looking toward 2009. It's never too late to consider a five-year management plan.