Natural Resources Conservation Service
Plant Materials Program
An 80-Year History of Plant Development - Delivering Results for Agriculture and Conservation Through Effective Vegetation

Helping People Help the Land
Some background on NRCS...
NRCS work begins with **Resource Concerns**

**SOIL EROSION:** Sheet, rill, & wind erosion

**SOIL QUALITY DEGRADATION:** Organic matter depletion

**WATER QUALITY DEGRADATION:** Excessive sediment in surface waters

**WATER QUALITY DEGRADATION:** Excess nutrients in surface and ground waters

**LIVESTOCK PRODUCTION LIMITATION:** Inadequate feed and forage

**DEGRADED PLANT CONDITION:** Excessive plant pest pressure

**INADEQUATE HABITAT FOR FISH AND WILDLIFE:** Habitat degradation

**DEGRADED PLANT CONDITION:** Inadequate structure and composition
We use Conservation Practices

• Forage and Biomass Plantings (512)
• Critical Areas (342)
• Cover Crops (340)
• Range Planting (550)
• Field Border (386)
• Conservation Cover (327)
• Early Successional Habitat Development/Management (647)
An 80 Year History

“Nature has evolved a plant for every purpose.”
- Dr. Franklin J. Crider
Plant Materials Centers Provide Turn-key Solutions
Plant Materials Center Plant Development

• Address a Resource Concern
• Support a Conservation Practice
• Must be practical to use by farmers and ranchers
• Must be cost-effective
• Must be viable for commercial growers
The PMC Plant Development Process

- Collect
- Evaluate
- Select
- Test
- Release
How Much Selection?

- Cover Crops (340)
- Forage and Biomass Plantings (512)
- Critical Areas (342)
- Range Planting (550)
- Field Border (386)
- Conservation Cover (327)
- Early Successional Habitat Development/Management (647)

Specific Characteristics
- More Uniformity
- Wider Adaptation

Typical Characteristics
- Increased Diversity
- Local Adaptation
What Type of Release?

Cultivars

Tested

Selected

Source-Identified

Specific Characteristics
- More Uniformity
- Wider Adaptation

Typical Characteristics
- Increased Diversity
- Local Adaptation
Summary of NRCS Plant Releases

Total from 1939 to present = 739

Origin of PMC Releases

- Native: 544
- Introduced: 195

Types of PMC Releases

- Cultivar: 358
- Tested: 19
- Selected: 201
- Source-ID: 104
- Other: 57

Pre-varietal total = 381
PMC Efforts Yield Significant Benefits
The preceding presentation was delivered at the 2017 National Native Seed Conference in Washington, D.C. from February 13-16, 2017. This and additional presentations are available at http://nativeseed.info.