

Cotton Variety Performance Across Environments

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Purpose

- **Seed is a major investment**
- **Varieties have a short shelf-life**
- **New technologies change rapidly**



Research Areas

•Goals:

- Variety x Soil Type
- Variety Stability
- PGR Management
- Variety x Irrigation
- Planting Dates x Varieties





On-Farm Cotton Trials Considerations



ü Trial Plan

ü Field Location

ü Equipment

ü Layout

ü Analysis

ü Larger Areas



ü Trial Plan

Treatments

Site Selection

Producer

ü Field Location

Drainage

Fertility

Irrigation



ü Equipment

Application

Harvest

ü Layout

Field

Data Collection

Harvest



ü Analysis

What criteria

How Analyzed

ü Larger Areas

More Resources

More Producer
Time



~~PGR~~ x Variety x Soil Type

Varieties (2 Reps):

- STV5288
- DP1133
- DP1137
- PHY499

Location:

- Concordia Parish
- On-farm

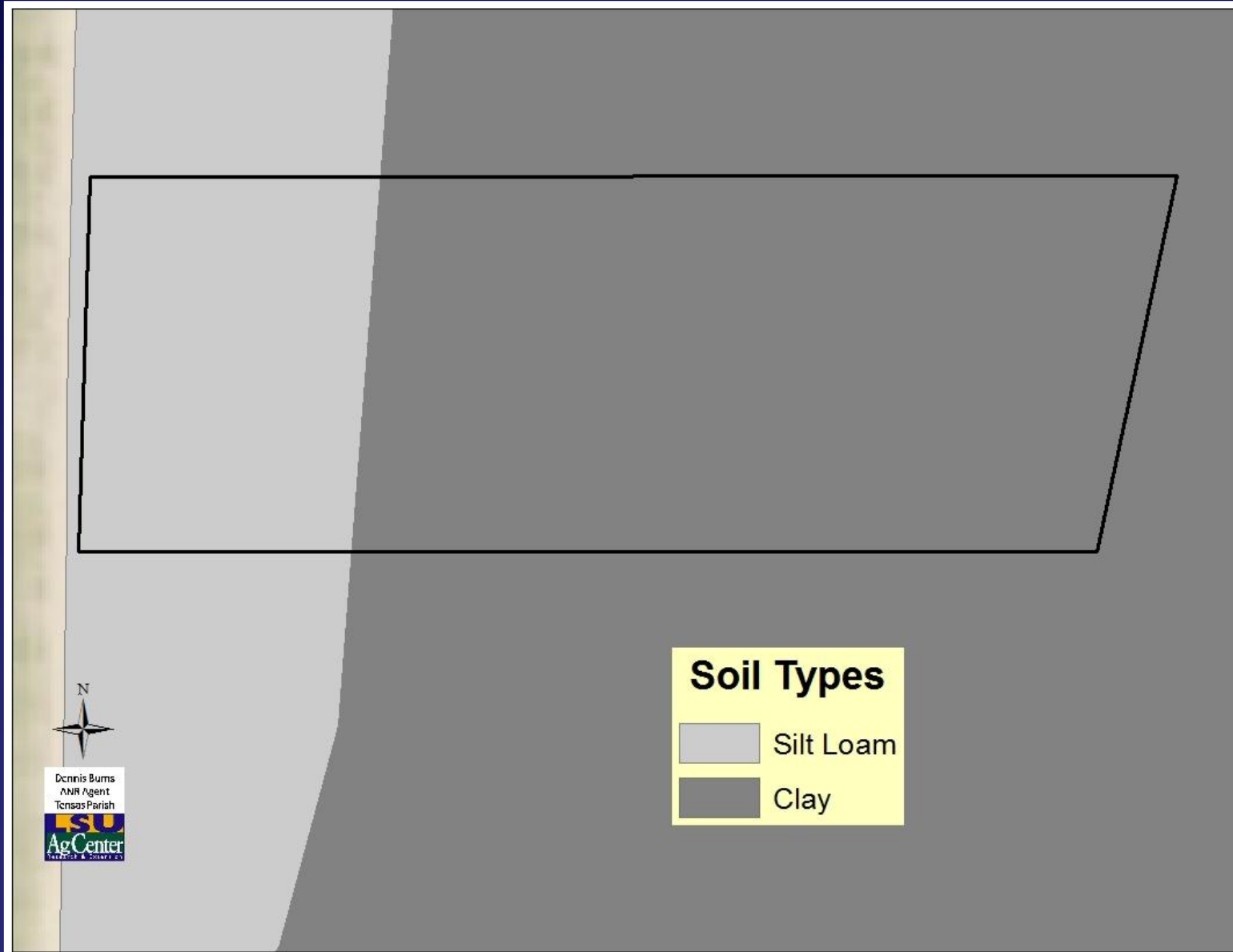
Soil Types (2):

- Dundee Loam
- Tensas-Alligator Clay Complex

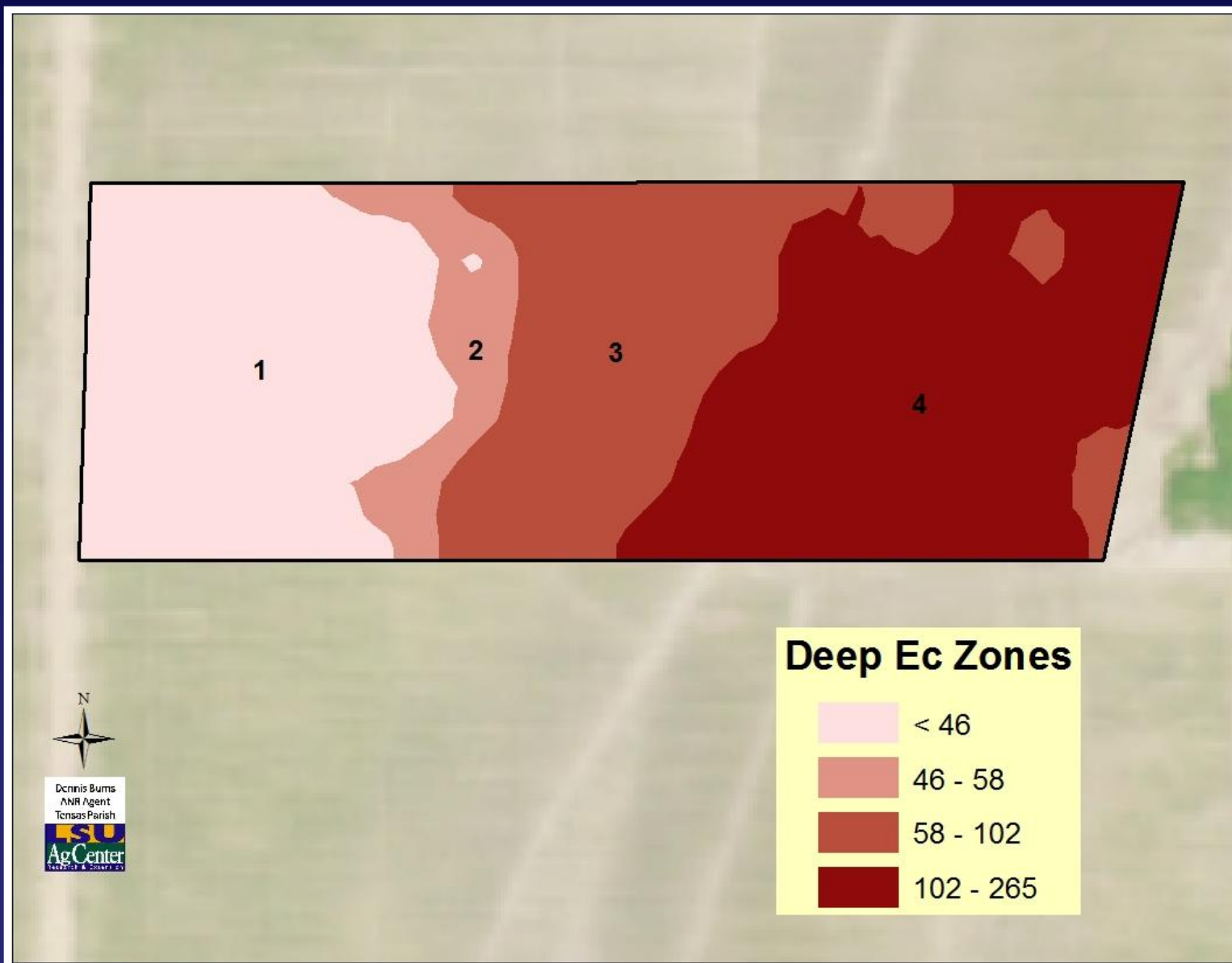
Cooperators:

- Tim White, Producer

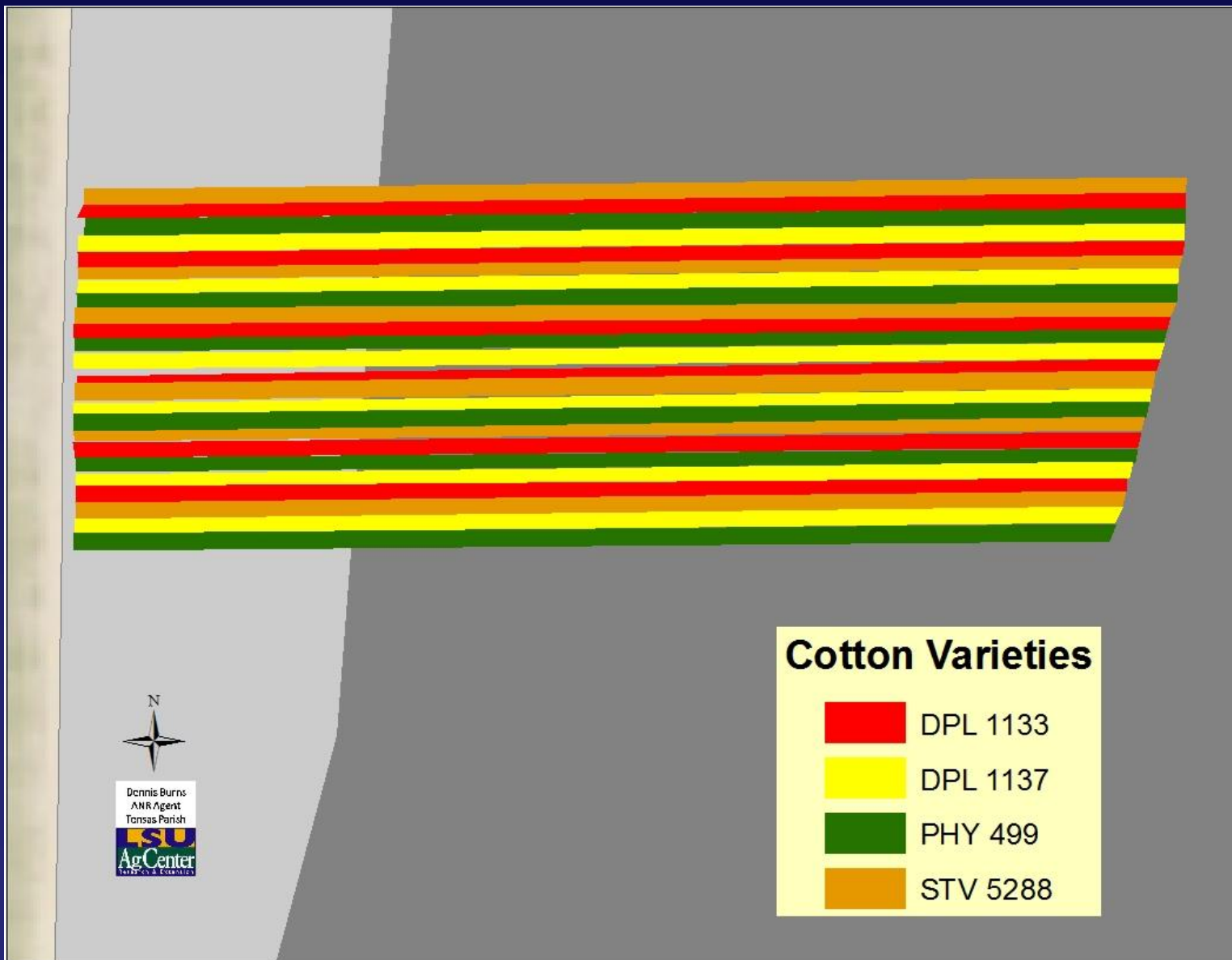
2011 Soil Map



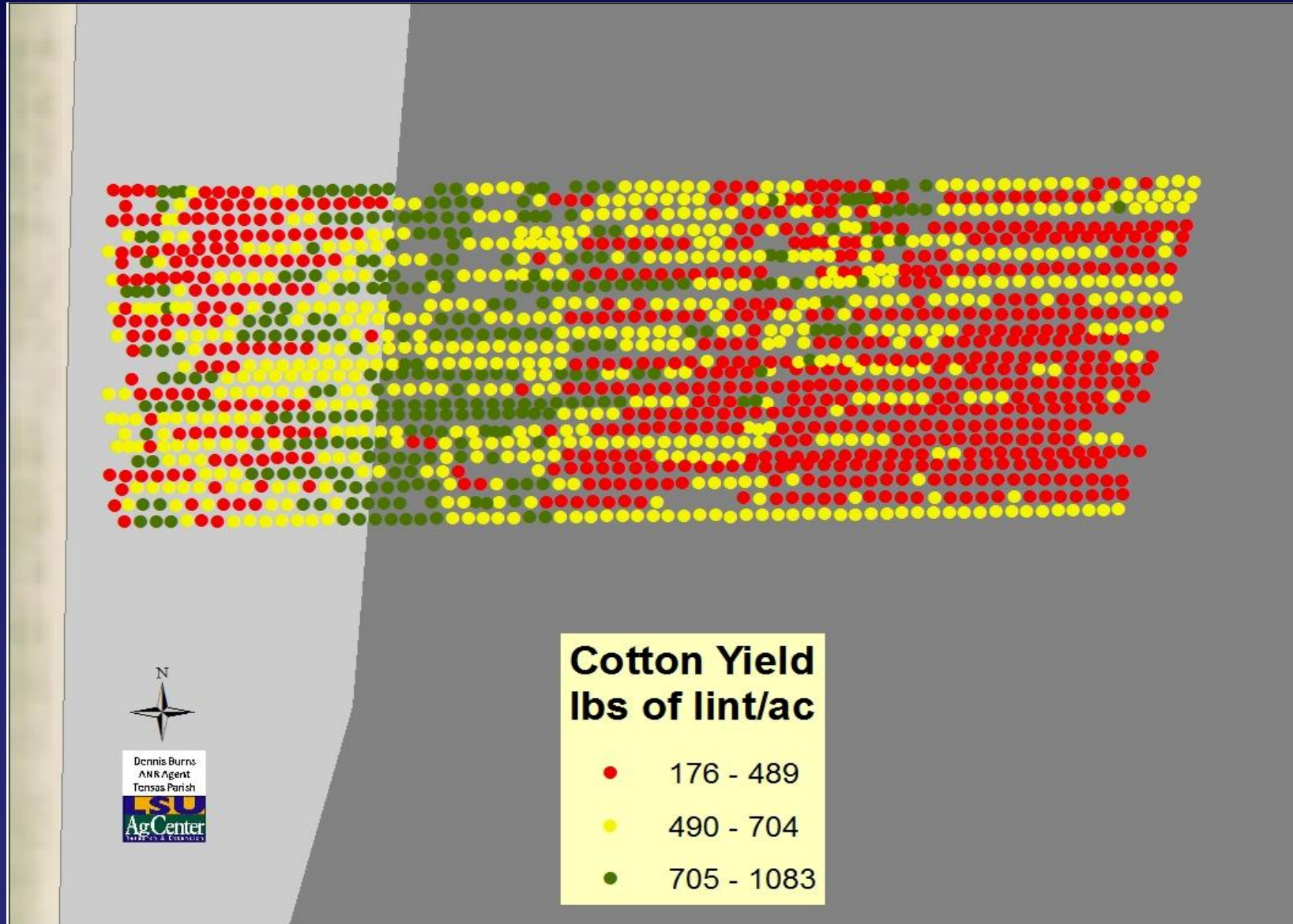
2011 VERIS Map



2011 Variety Map



2011 Yield Map



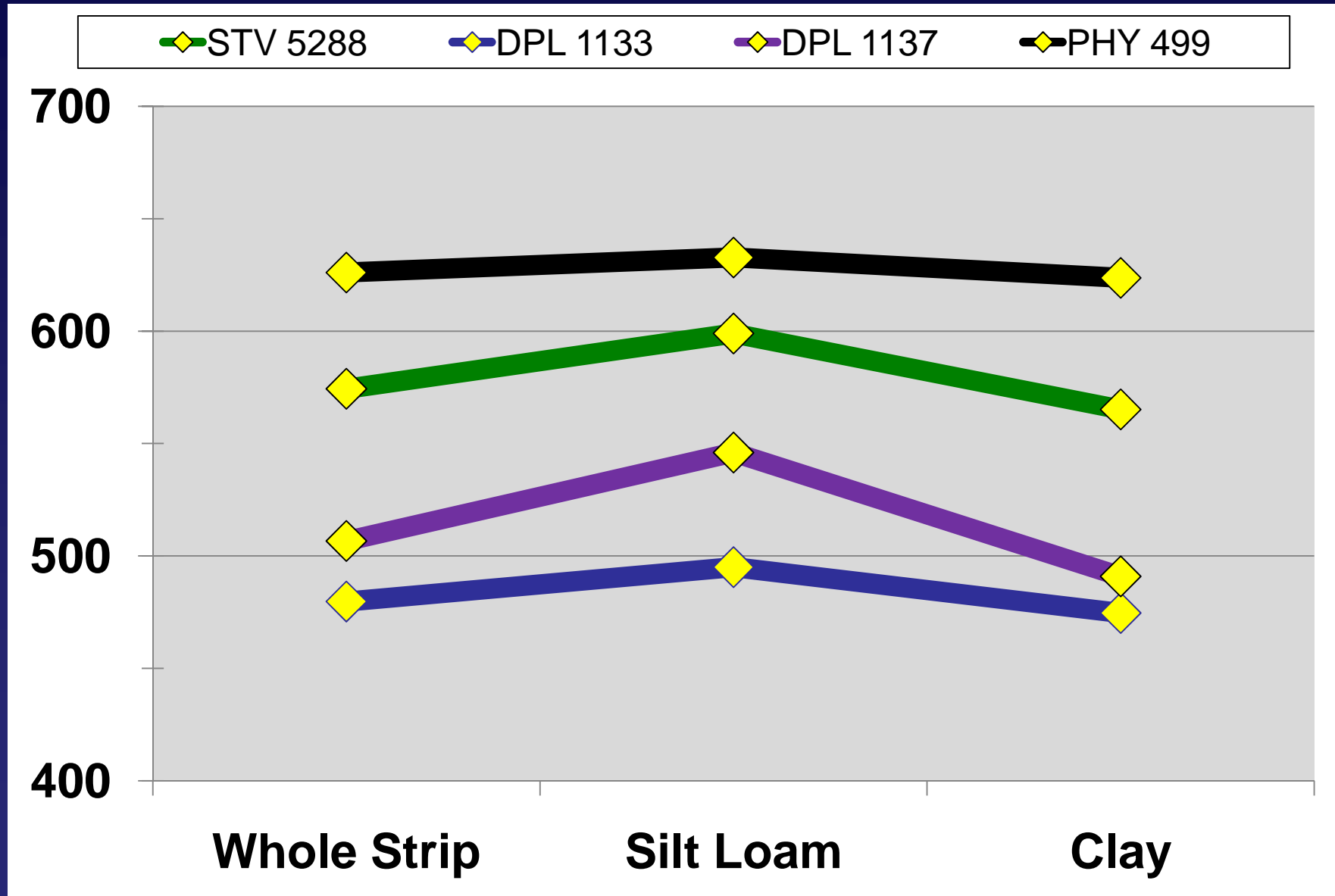
Lint Yield - Soil Type

Variety	Whole Strip	Silt Loam	Clay
STV 5288	574	599	565
DPL 1133	480	495	475
DPL 1137	507	546	491
PHY 499	626	633	624

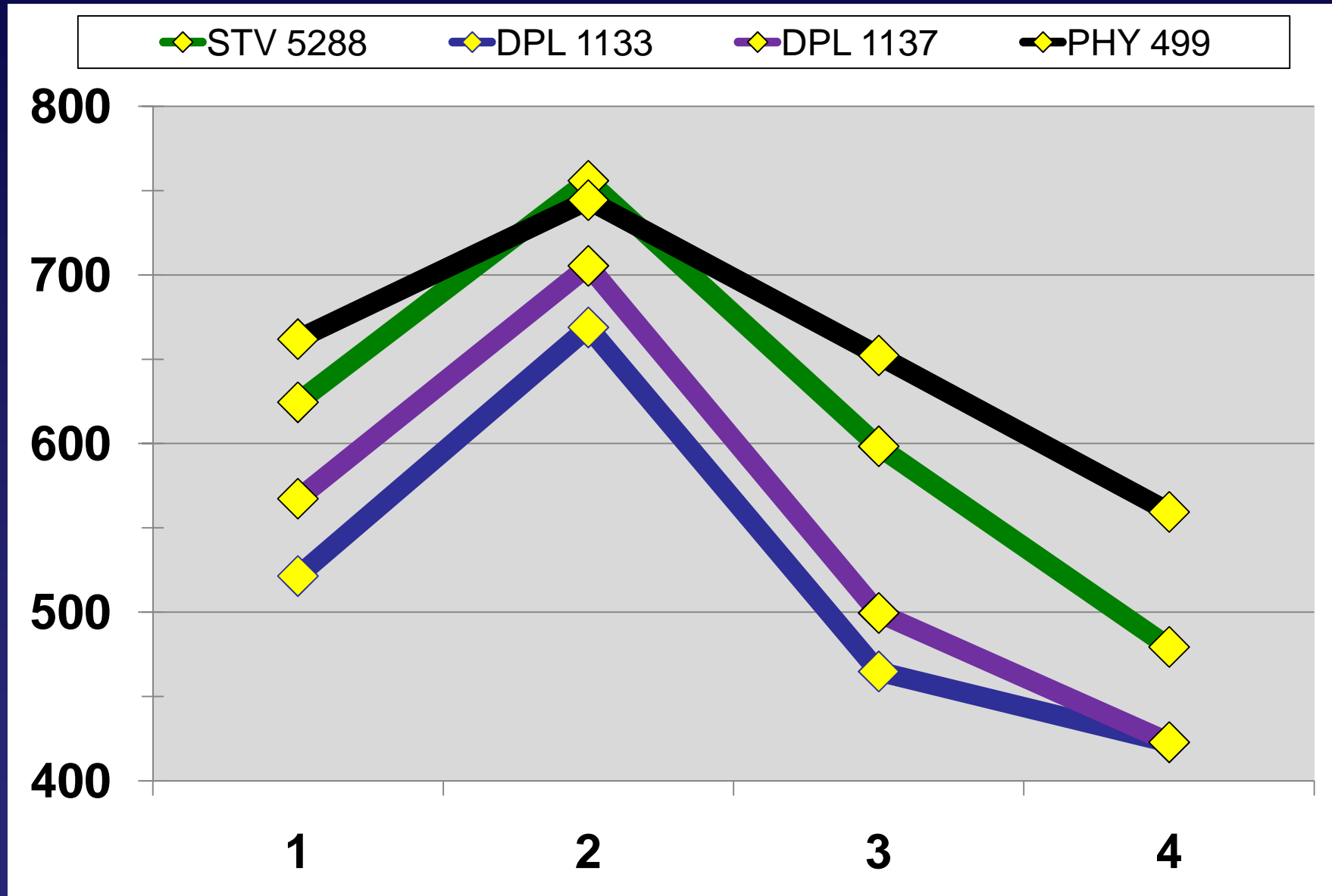
Lint Yield x Deep Ec Zones

Variety	1	2	3	4
STV 5288	624	755	598	479
DPL 1133	521	668	464	422
DPL 1137	567	705	499	422
PHY 499	661	744	652	559

Lint Yield x Soil Type



Lint Yield x Deep Ec



Stability Across Soils

	Whole Strip	Dundee Silt Loam	Tensas- Alligator Clay
	% of Average Yield		
DPL 1133	88	87	88
DPL 1137	92	96	91
PHY 499	114	111	116
STV 5288	105	105	105

Summary

- ü Expand Research Station Results to Production

 - Farms

- ü Proper Planning Makes a Good Trial

- ü Work with Producer's Equipment

- ü Producer Education

- ü Larger Acres & Data Sets

- ü Analysis



Acknowledgments



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- Darrell Franks, Farm Manager**
- Tim White, Producer**

