

Conference Call  
Missouri Bootheel

Bob Ball  
Glenn Davis  
Pat Turman  
Michele  
David Deatley, agrono Stoddard  
Mike Milam, agronomist Dunklin  
Steve Watson, DC Dunklin

Active in CSP in 2005  
EQIP  
Lot acres involved  
More than 150 ag partic in Stoddard and 208 in dunklin

Glenn Davis – N and P or one  
Variable rate technology for N – crop canopy, color sensing....work at Univ of Missouri (CIG grant) and MFA coop in bootheel cooperators using crop canopy color sensors to regulate amount N being put on

Variable rate applications, P, K and lime  
Variable rate nitrogen  
Precision guidance systems – makes map of field to allow precision placement of fertilizer

Soil testing every year or other year....have consultants checking plant growth and spending more time in the field. 94% cotton producers have consultants

N mgmt – most farmers already split apply, tend to be innovative, tend to be more prone to soil test and do so more frequently.

New technologies must be cost-effective for farmers to be able to use them

Intensity of ag in bootheel and quantity of fertilizer used...larger operations going thru lots of fertizlier...good watershed to look at...impact lot of acres and lots of N and P going on land

ID appropriate technologies and affordable will be key thing

Some new technologies more expensive; NRCS add incentive to make more palatable; price of corn today makes somethings more affordable.

Criteria for evaluating appropriate technology

Proven results and research behind it

Affordability... some may just want to know potential technology is out there, even if can't afford it at first

Is agronomically sound as well as environmentally sound

Can we look at water management options?

Question about the value of some of the practices.

Bring in expertise to local workshops to speak on research-based findings about impact of technologies/practices (use of subsurface drainage and water mgmt systems around that to reduce direct discharge of tile lines into streams. Retain nutrients and seed through these systems/tile lines) hasn't lived up to expectations. No subsurface drainage in St Francis...because of soils and flat land.

Perhaps industry can tell us where it's applicable and where it isn't.

Drip irrigation...some use for fertilizer application thru drip irrigation (could be used more?)...precision guidance to lay down drip tape...trouble keeping lines clear of rust...auto steer

Using precision irrigation thru traditional irrigation equipment? John Sadler with ARS worked in SC on this. Resistance to see adaption in MO. Precision apply nutrients from pivot systems. In Lower St Francis – Dunklin uses on sandy cotton ground. Not using this technology. Look at why didn't work here?

Many CSP EQIP contracts include irrigation mgmt.  
Practices for irrigation water mgmt plan

What incentives would work?

Got to be simple and not take a lot of time

Cost-share to assist with financial costs

If structurally related – cost-share

If mgmt - \$ incentive, not time intensive

GPS

Survey producers

Help prioritize technologies

Large window of return time

Already planting corn and cotton's next

Time – late fall to Feb time to get their participation

NEXT STEPS

KS draft questions to survey producers about technologies needed; send to Pat to review

Pat and colleagues to develop list of producers to invite to participate; get contact list to KS