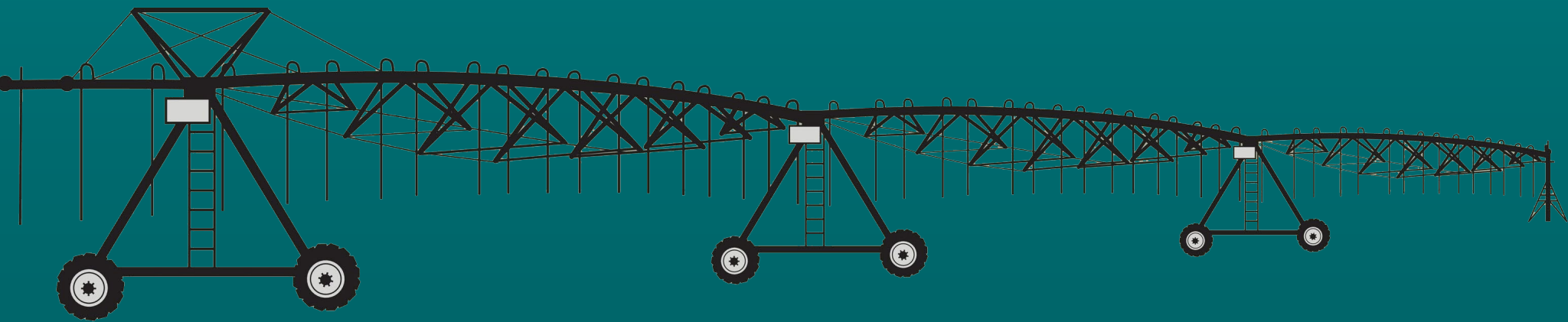
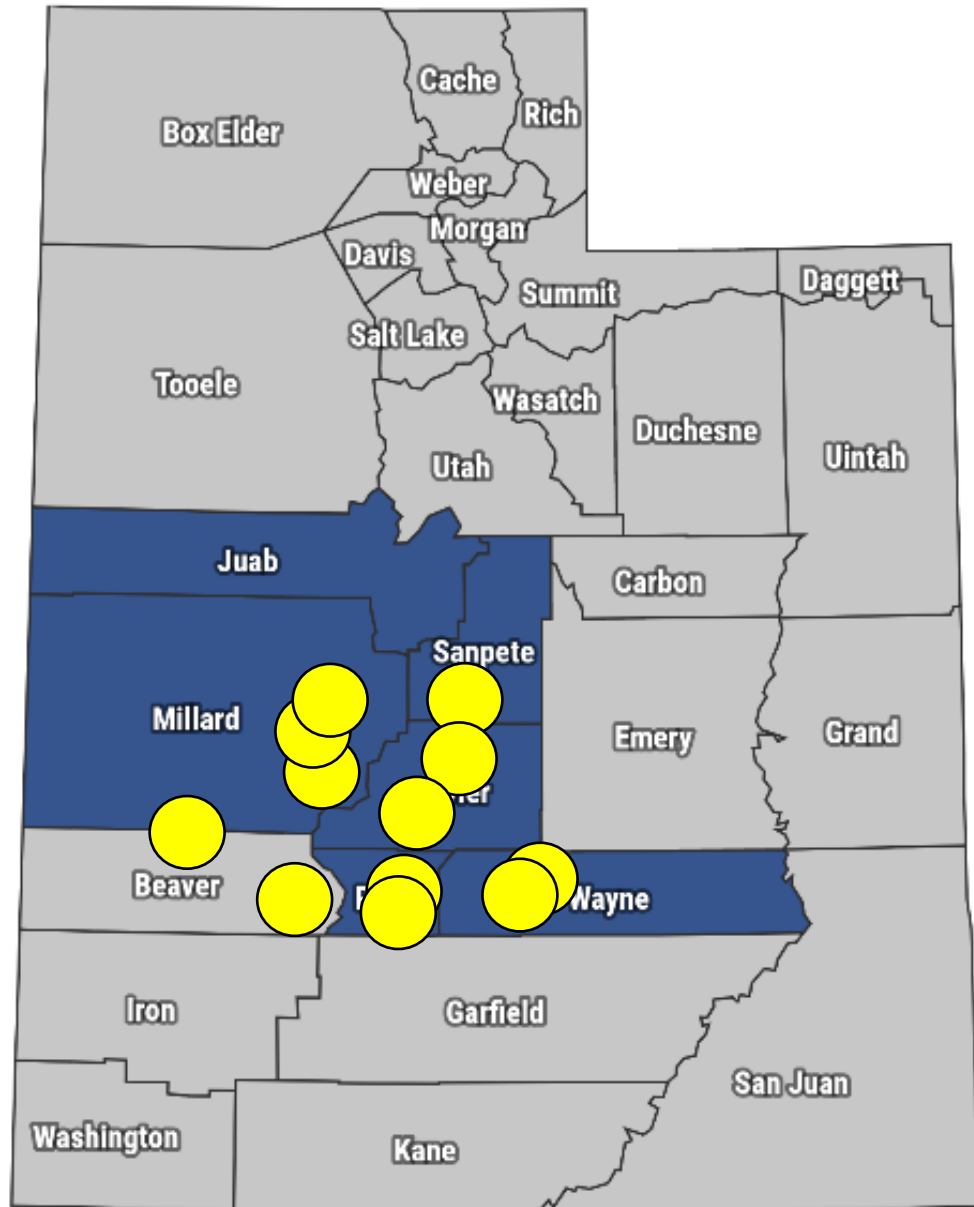


# 5 Irrigation Approaches for Improving Alfalfa Yield and Quality

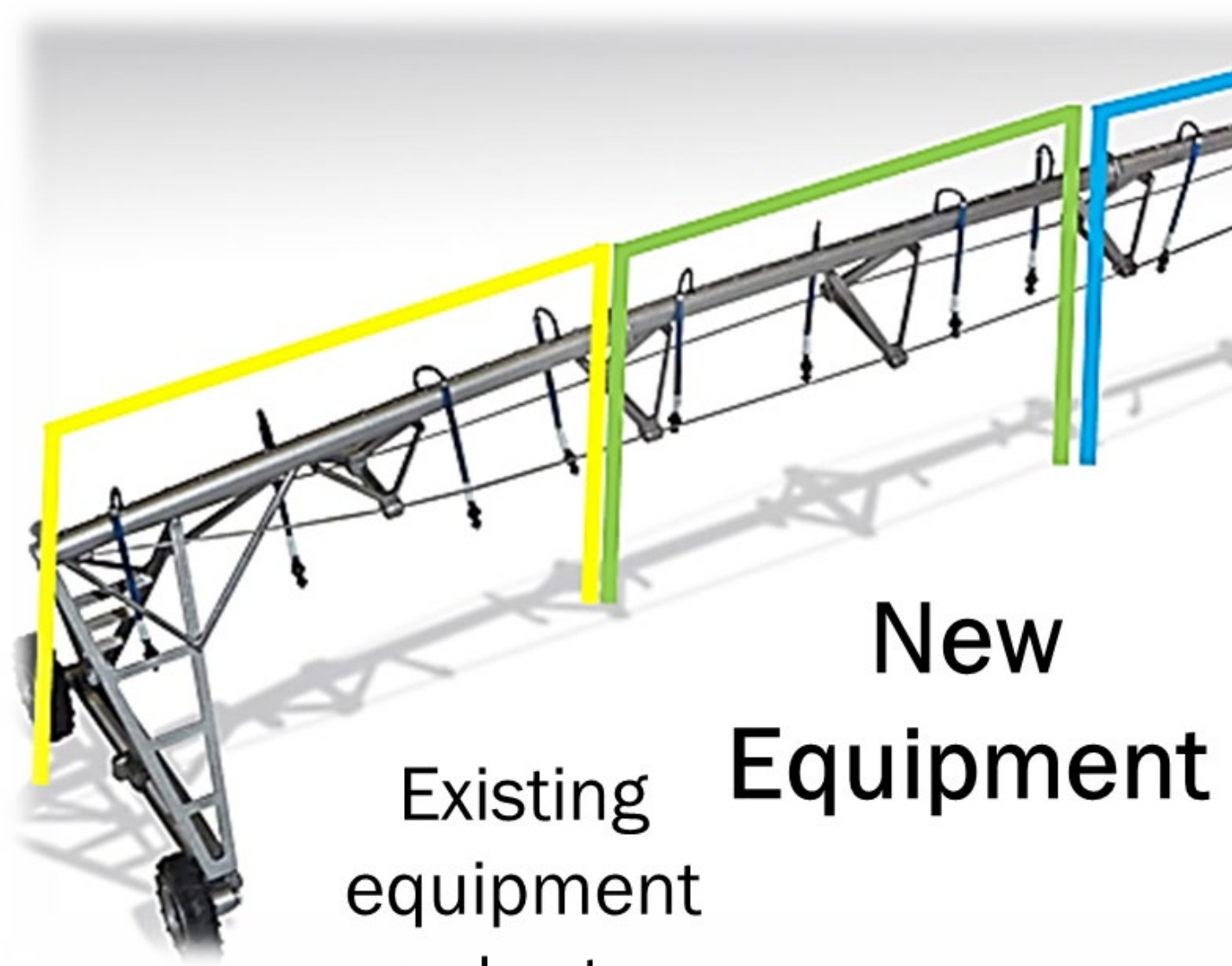




# Approach 1

New equipment

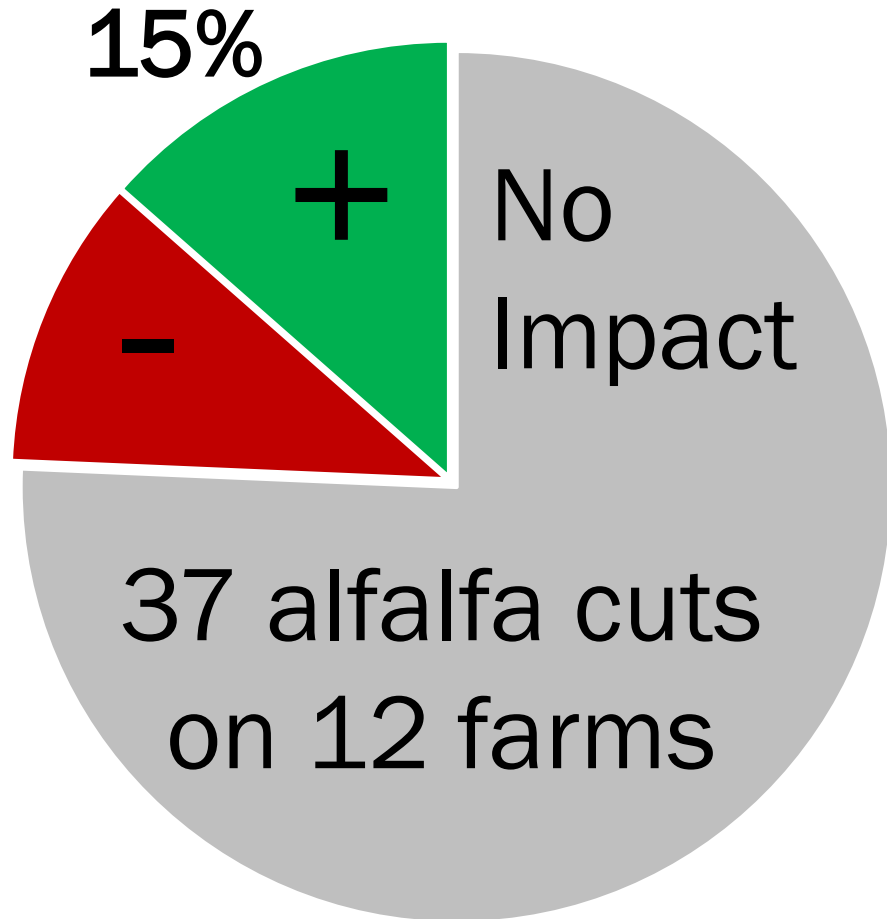




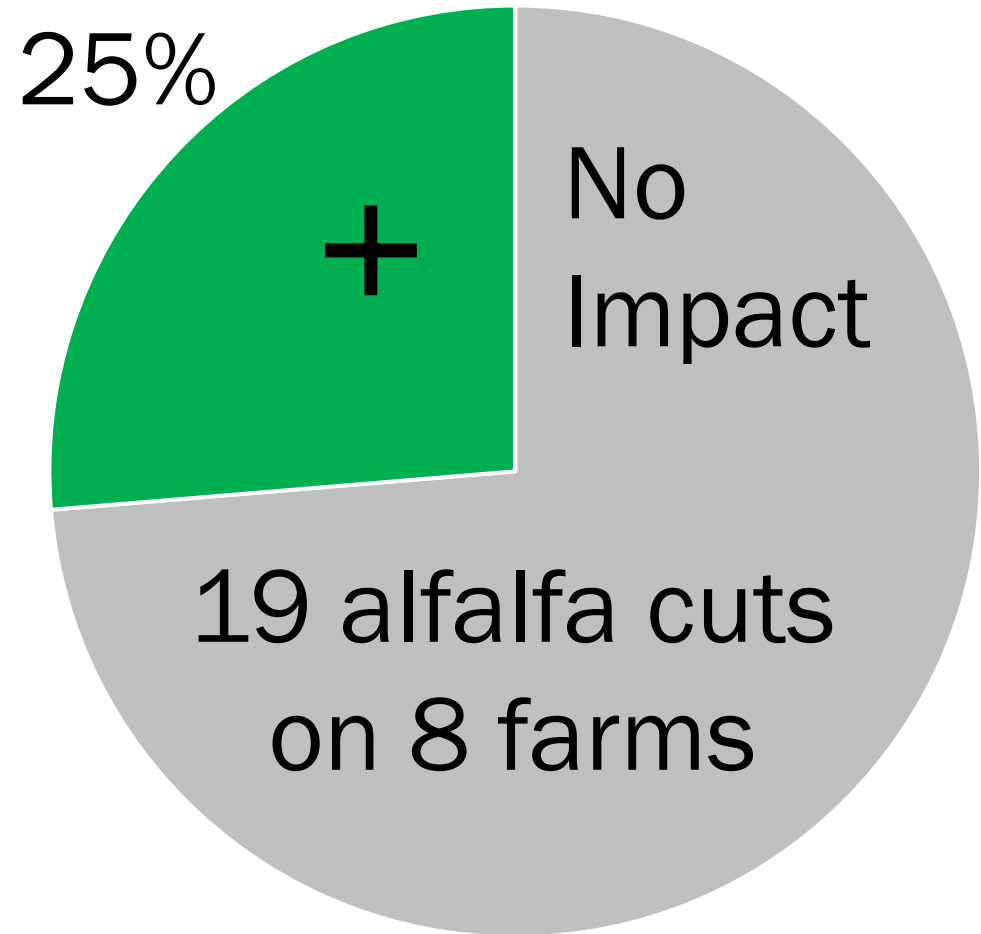
Existing  
equipment  
and rates

**New  
Equipment**

# 2019

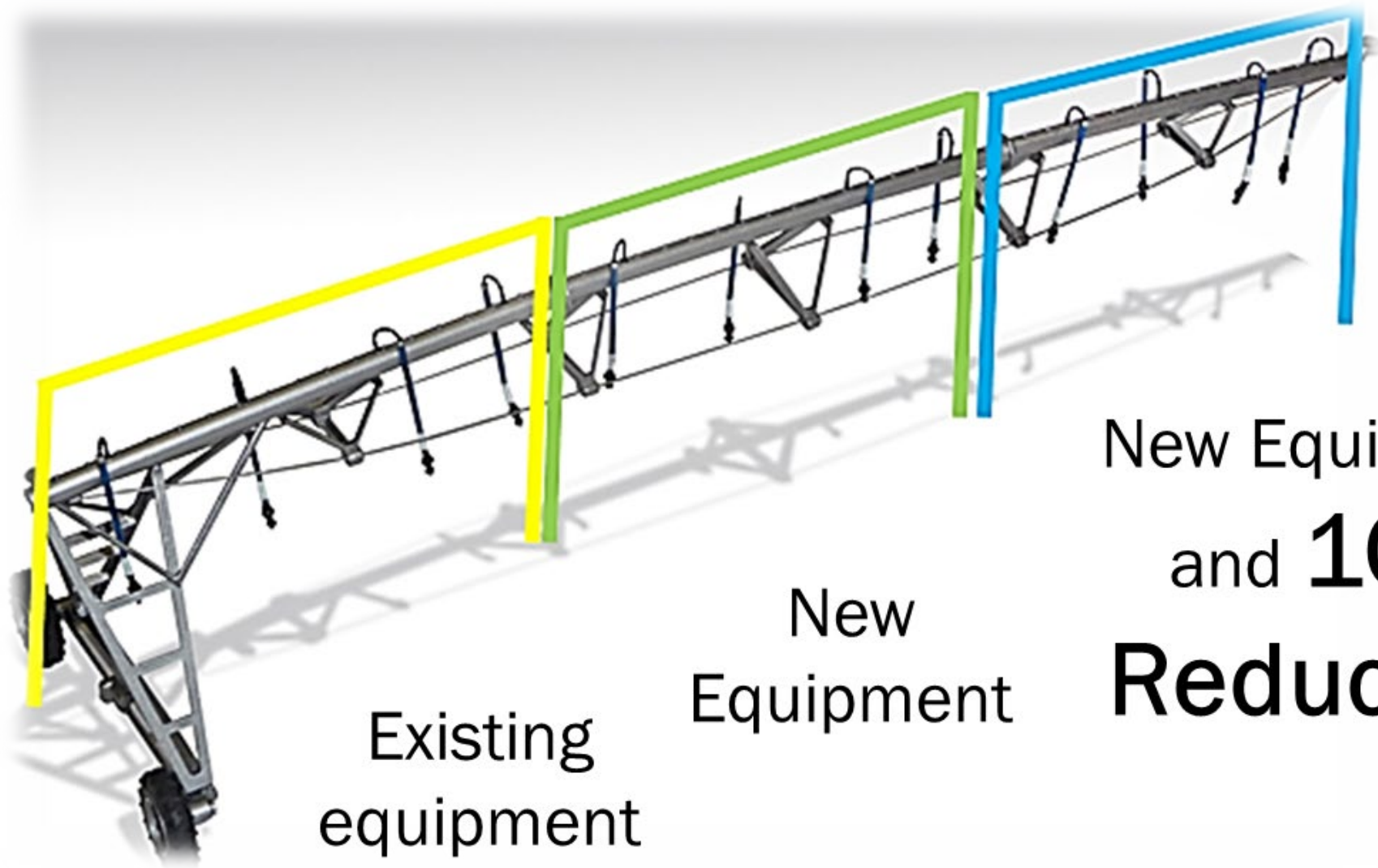


# 2020



# Approach 2

10% less  
irrigation



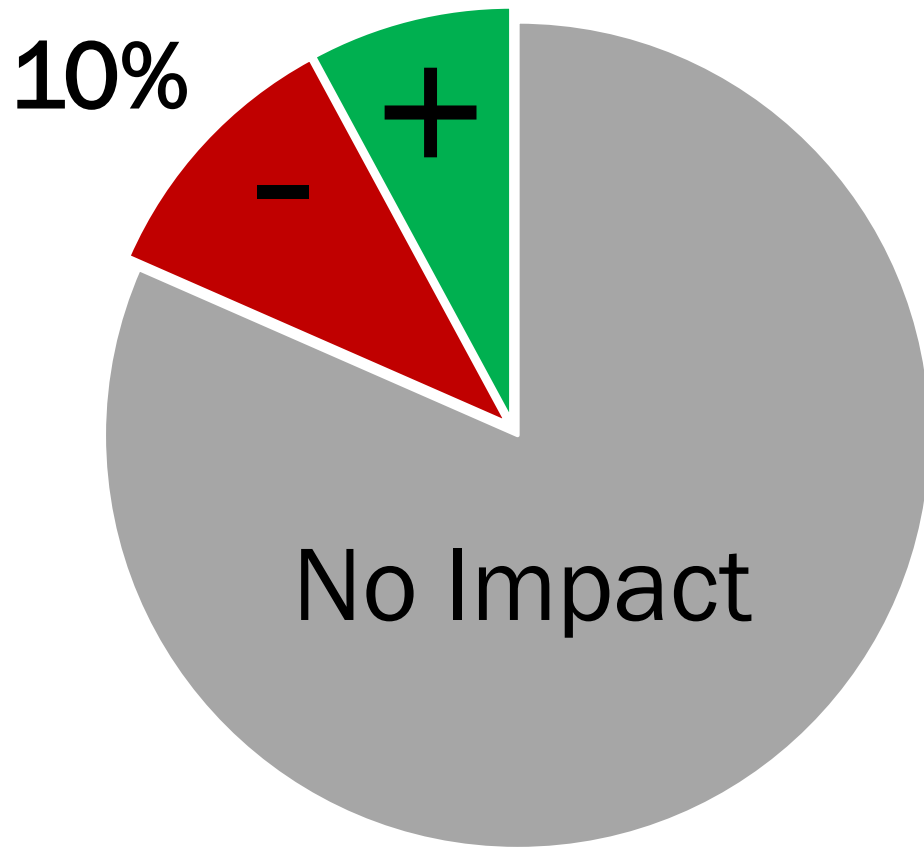
Existing  
equipment  
and rates

New  
Equipment

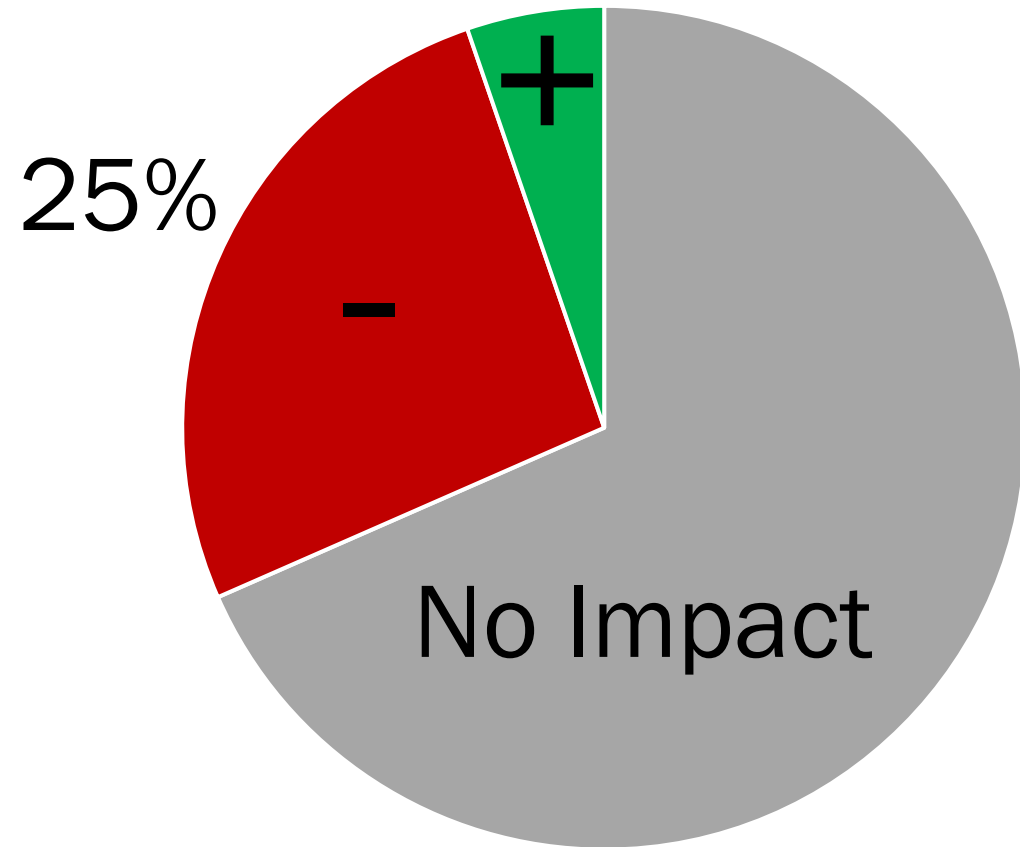
New Equipment  
and **10%**  
**Reduction**



# 2019



# 2020



# Approach 3-5

Irrigation  
scheduling tools

# ADVANCED IRRIGATION SCHEDULING



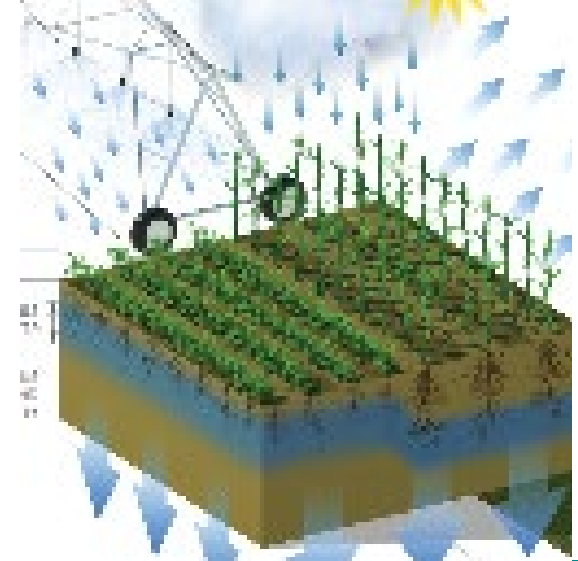
Weather  
stations

~\$7/acre/year



Soil sensors

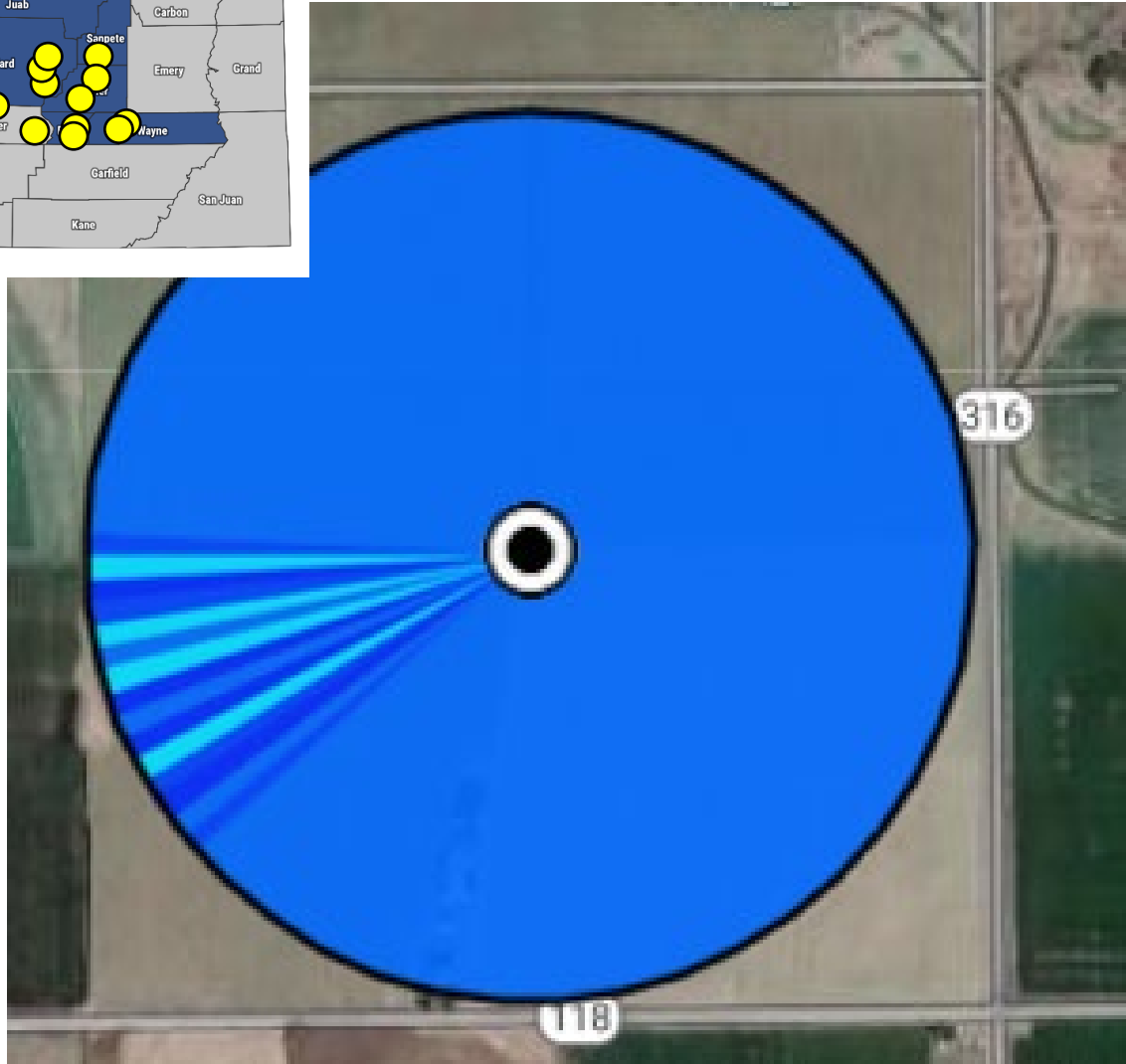
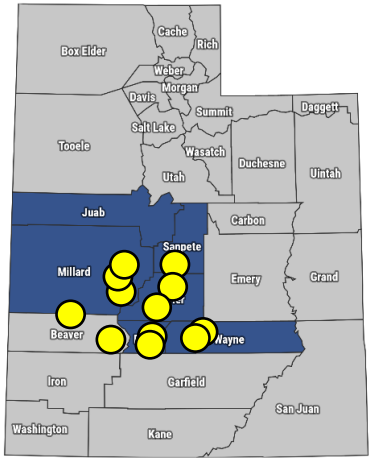
~\$15/acre/yr



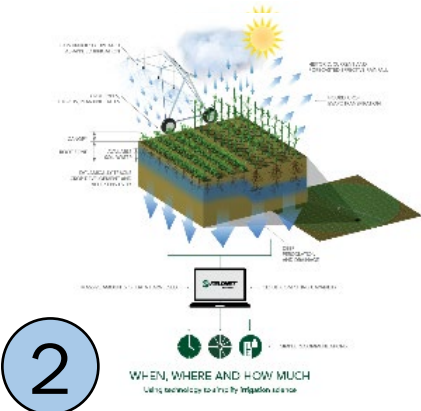
Commercial  
model

~\$15/acre/yr

# Trial Design



1 Soil sensors



2 Commercial model

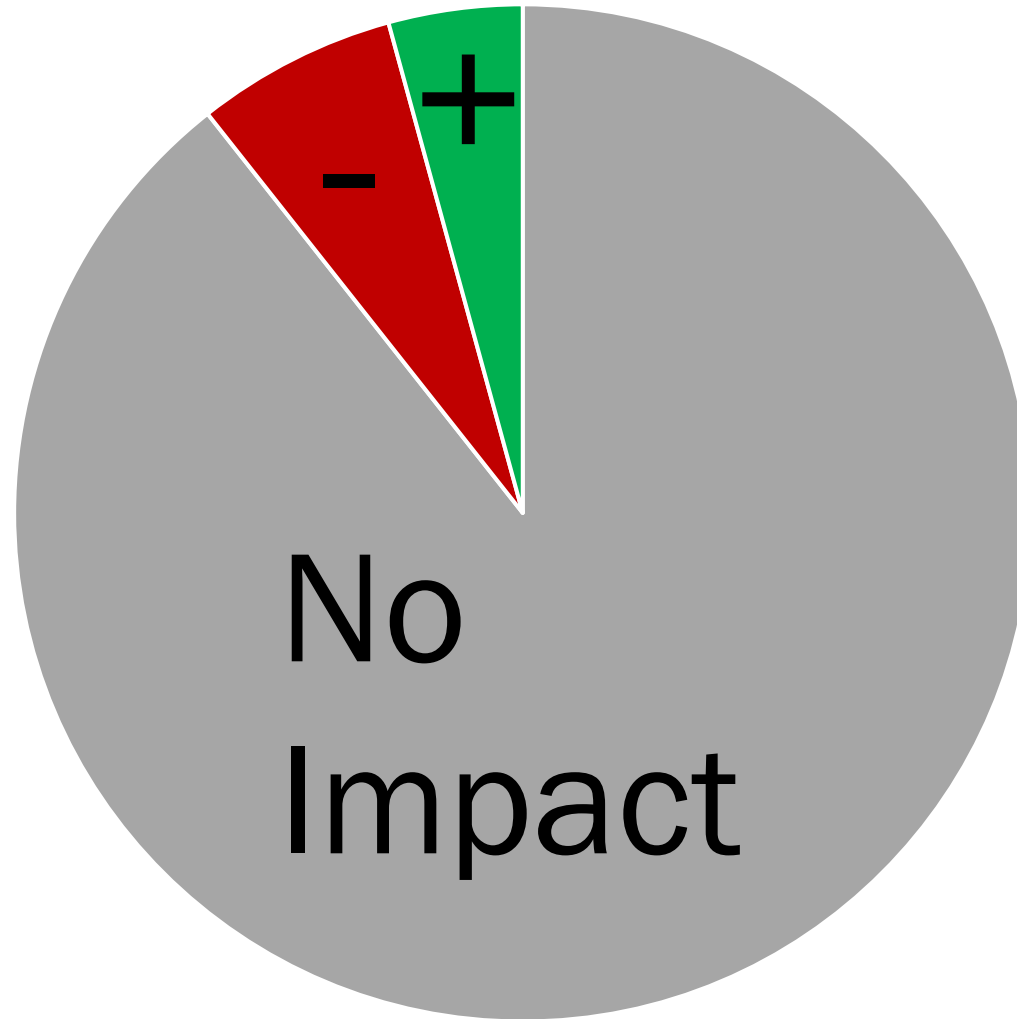


3 Weather stations



4 Farmer experience

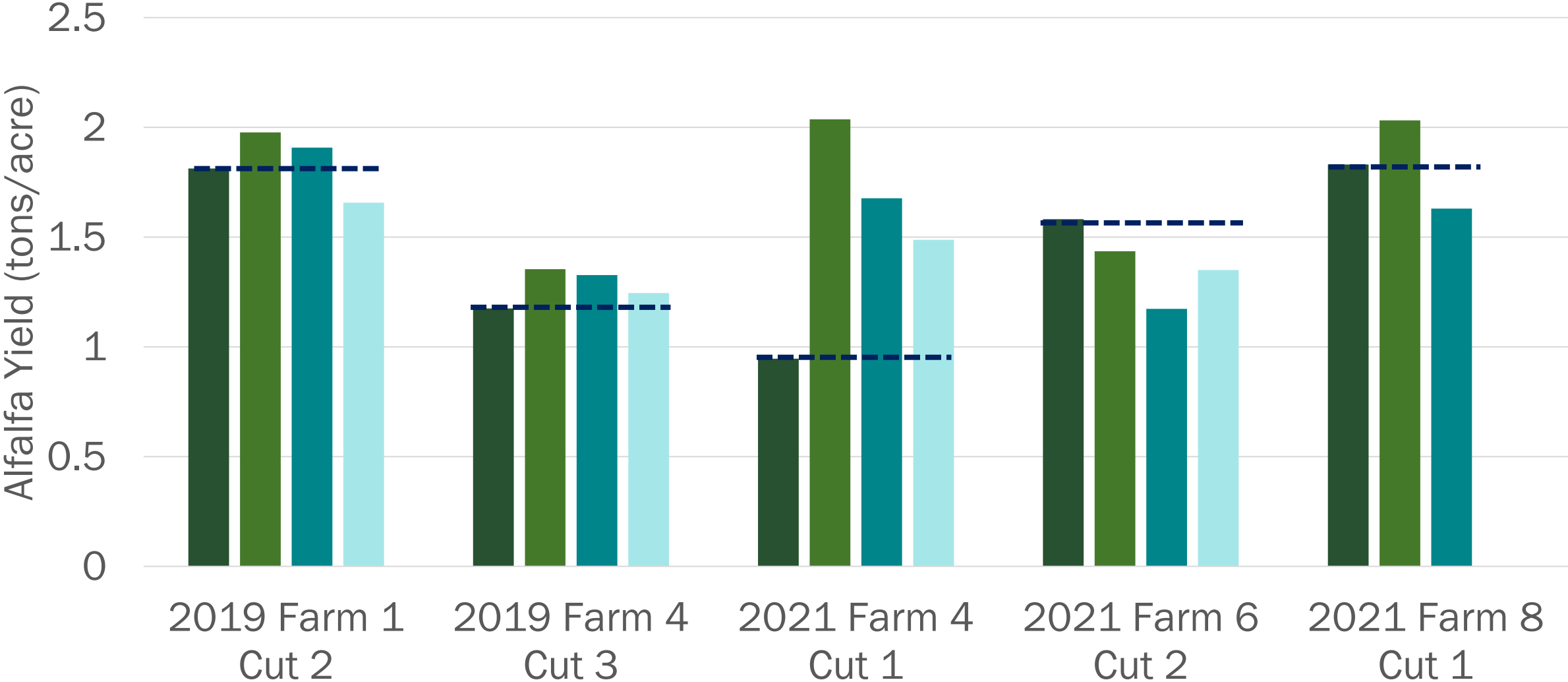
# Yield affected only 10% of time



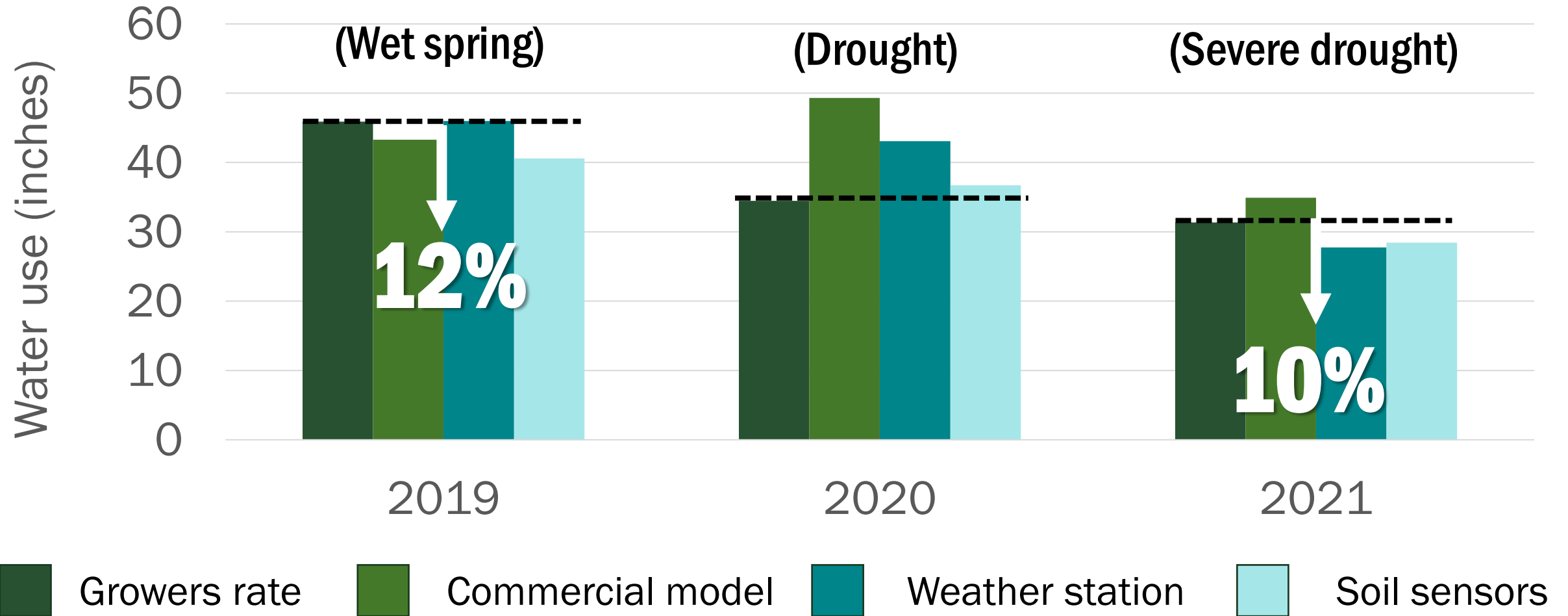
**5 of 47**  
alfalfa cuts  
on 12 farms  
  
2019 - 2021

# Few and inconsistent benefits to yield

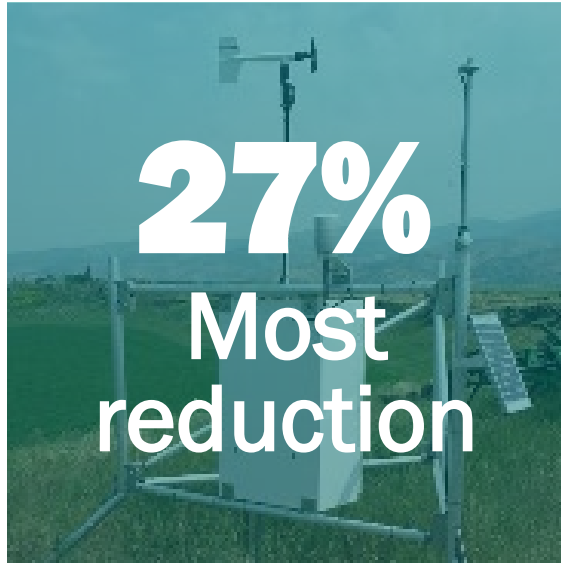
Conventional Field Net Advisor Irrigation Scheduler Soil Moisture



# 21 trials - 10-12% reductions possible



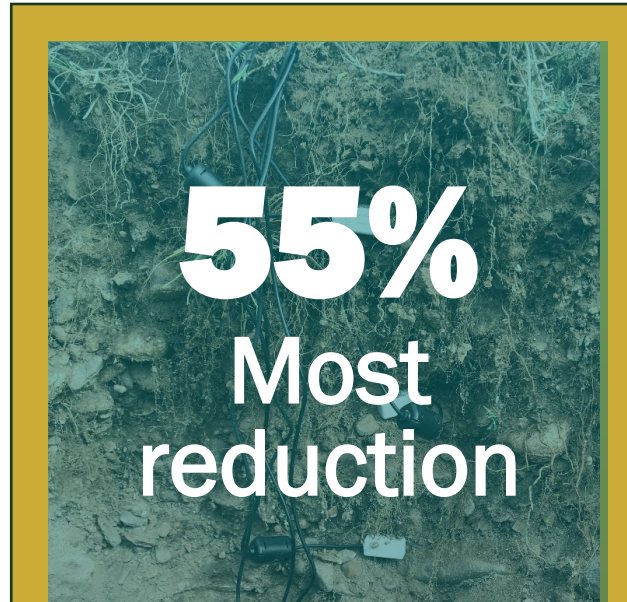
# WHAT'S MOST SUCCESSFUL?



**27%**  
Most  
reduction

**Weather  
stations**

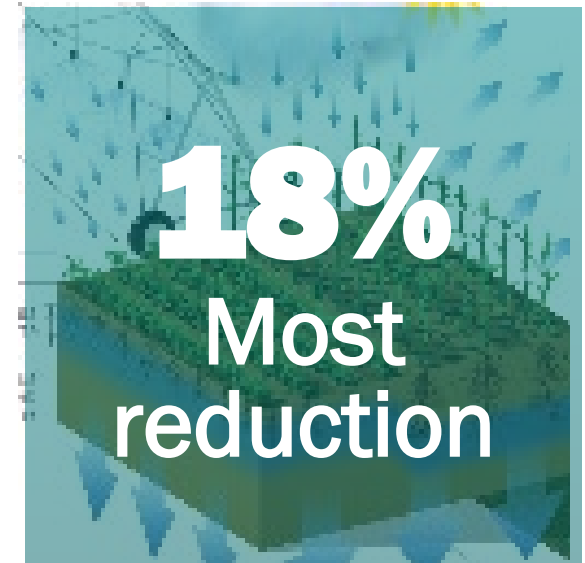
**\$7**/acre/year



**55%**  
Most  
reduction

**Soil sensors**

**\$15**/acre/yr



**18%**  
Most  
reduction

**Commercial  
model**

**\$15**/acre/yr