## **Kasey Garrett Aqua Irrigation**

## INNOVATIONS IN IRRIGATION

TV Irrigation Conference 2014 Nampa, ID



 Data Collection for Drip Irrigation systems

 Irrigation Water Prefiltering with Cyclones

Irrigation Water Treatment

#### **Today's System Monitoring**







## **Fully Automatic**





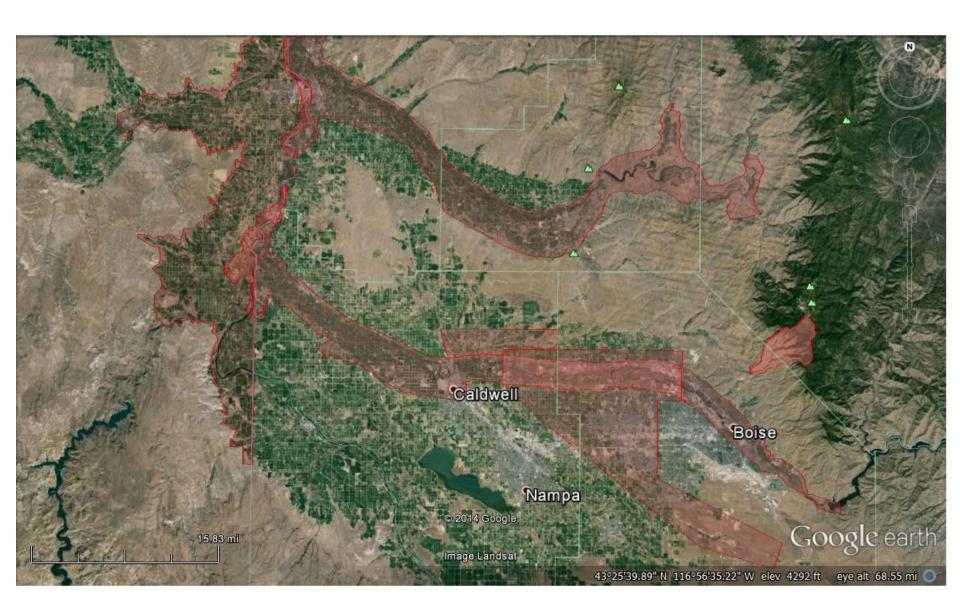
## Pump monitoring system from the early 90's!





# Drip System Data Collection

### **LIDAR Elevation Data**

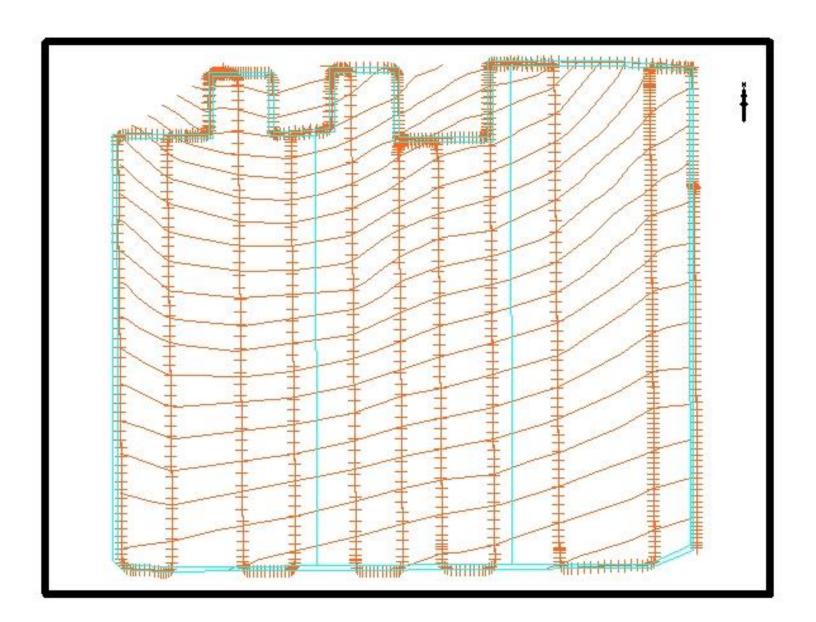


#### Polaris Ranger Mid-size w/ GPS

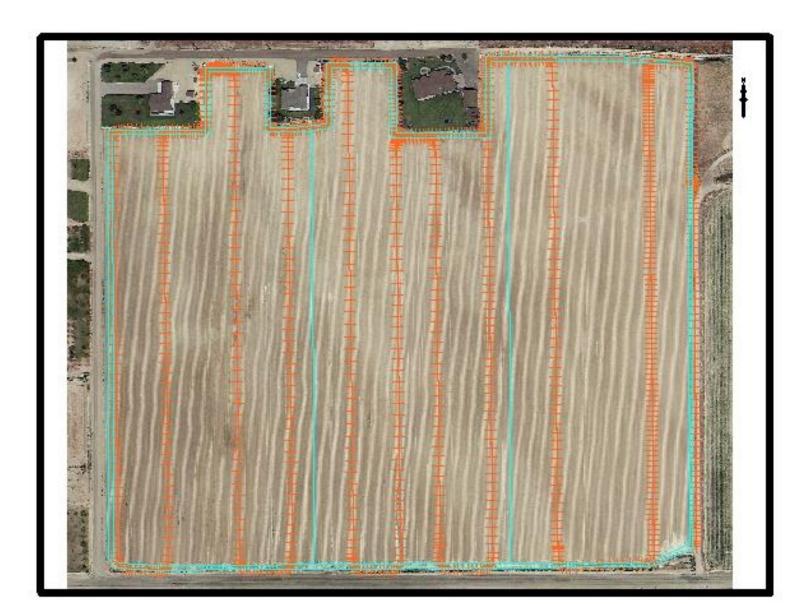




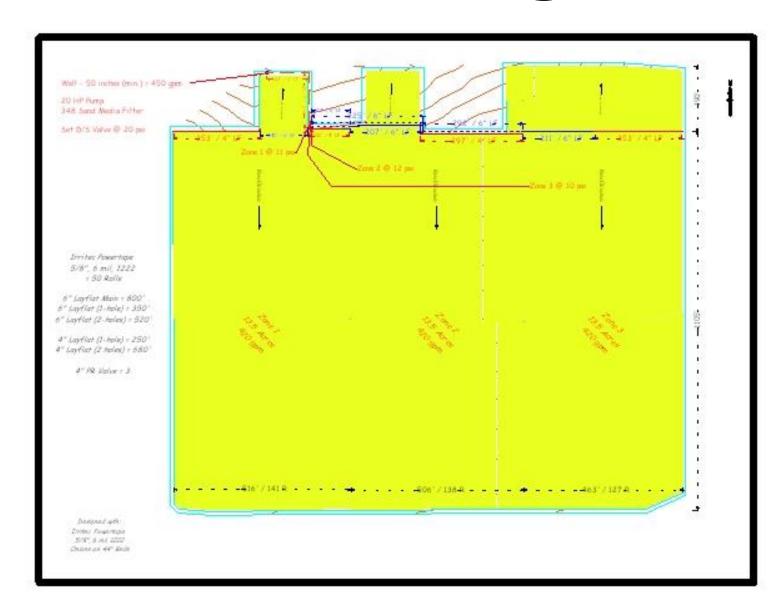
#### GPS Data Points to create contour lines



#### GPS Data Points overlayed on map



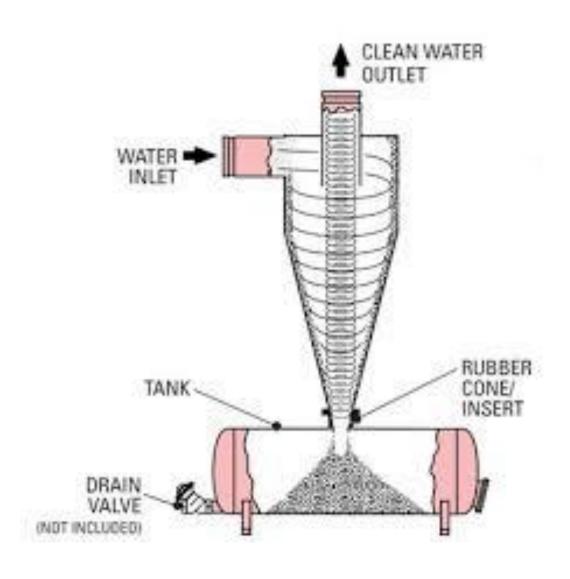
## Final Design



## HydroCyclones



### **HydroCyclone Operation**





### HydroCyclone



### HydroCyclone



#### Sand Filter w/ Cyclone Video



## Water Treatment Option

## Chlorine Tablet Treatment Systems







## Advantages

Simple and cost effective way to treat irrigation water

Safe way to apply chlorine

Stay ahead of food safety regulation

 Helps prevent issues in drip systems caused by dirty water

#### In Regards to Innovation...

1. "Yes, I see the value in that innovation. I'd like to be the first to try it."

2. "I'll wait to let other people try it and then I'll consider it."

3. "I'll never try it."

## Which one are you?