

Collecting & Sharing GIS Data Collaboratively to Protect Natural Resources

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Who we are



The Coalition for the Upper South Platte (CUSP) protects the water quality and ecological health of the Upper South Platte Watershed, through the cooperative efforts of watershed stakeholders, with emphasis placed on community values and economic sustainability.

Who we are



Coalitions & Collaboratives, Inc. (COCO) seeks to foster on-the-ground conservation efforts that protect and restore natural resources and local communities by supporting collaborative conservation organizations to produce collective impacts through stakeholder driven efforts.



Forest Health



Forest Fuels Mitigation



Channel Restoration



Reforestation



Monitoring



Erosion Control



Fire Suppression



Invasive Weeds Mitigation



Where we work



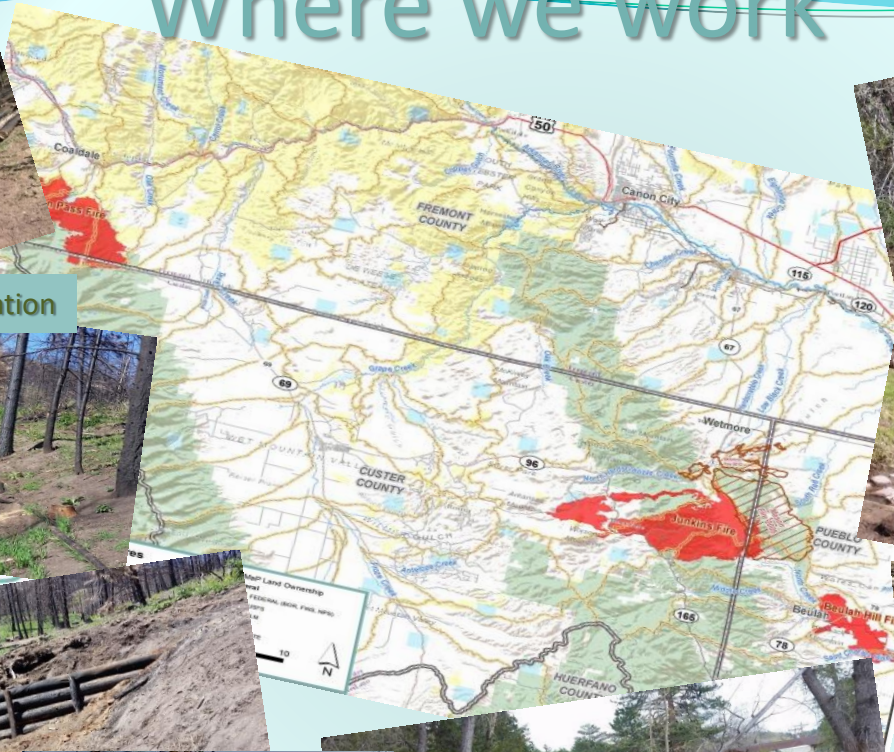
Hillslope Stabilization



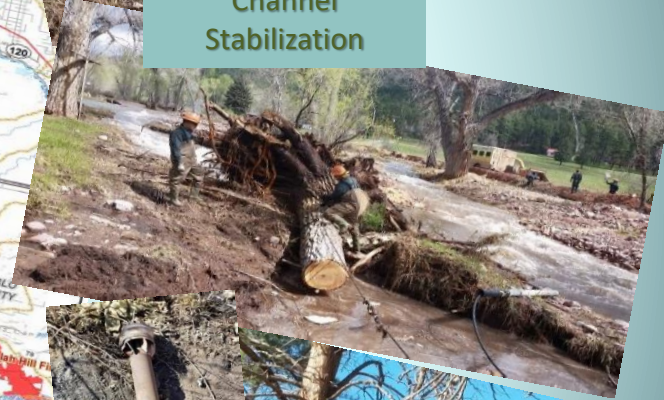
Post-Fire Restoration



Erosion Control



Channel
Stabilization



Debris Removal



Field data collection - background

Handheld GPS

	Contents	Preview	Description
	type	ident	Latitude
	WAYPOINT	MT2	38.909736
	WAYPOINT	MT25F	38.910089
	WAYPOINT	RS1	38.935518
	WAYPOINT	S C PATCH4	39.226035
	WAYPOINT	SC 100SF	39.22373
	WAYPOINT	SC 11X5	39.226351
	WAYPOINT	SC 20WIDE	39.22383
	WAYPOINT	SC A	39.222159
	WAYPOINT	SC B	39.222087
	WAYPOINT	SC B SIDES	39.22501
	WAYPOINT	SC TRTD	39.228625
	WAYPOINT	SC10X10	39.221569
	WAYPOINT	SC11SF	39.227222
	WAYPOINT	SC12X30	39.228695
	WAYPOINT	SC190SFT	39.221739
	WAYPOINT	SC19WIDE	39.224177
	WAYPOINT	TEST	38.908693
	WAYPOINT	TEST 1	39.290752
	WAYPOINT	Y T	38.909423
	WAYPOINT	YT 4P	38.909373
	WAYPOINT	YT 50PL	39.221977
	WAYPOINT	YT 5PL	38.909373
	WAYPOINT	YT A	38.909346

AT&T

CUSP

MAP

Project

Info Views

DATA

Data Entry

Data Import

Rapid Entry

Soil Sampling

Data Entry History

Map Annotations

WORK

Action Items

2:43 PM

Single

iPad based app: iCrop

Challenges



- Variety of data formats used by different agencies
- Limited customization of attributes
- Inconsistent nomenclature
- Data not easily accessible – no data hub
- Limited resources - \$ \$ \$

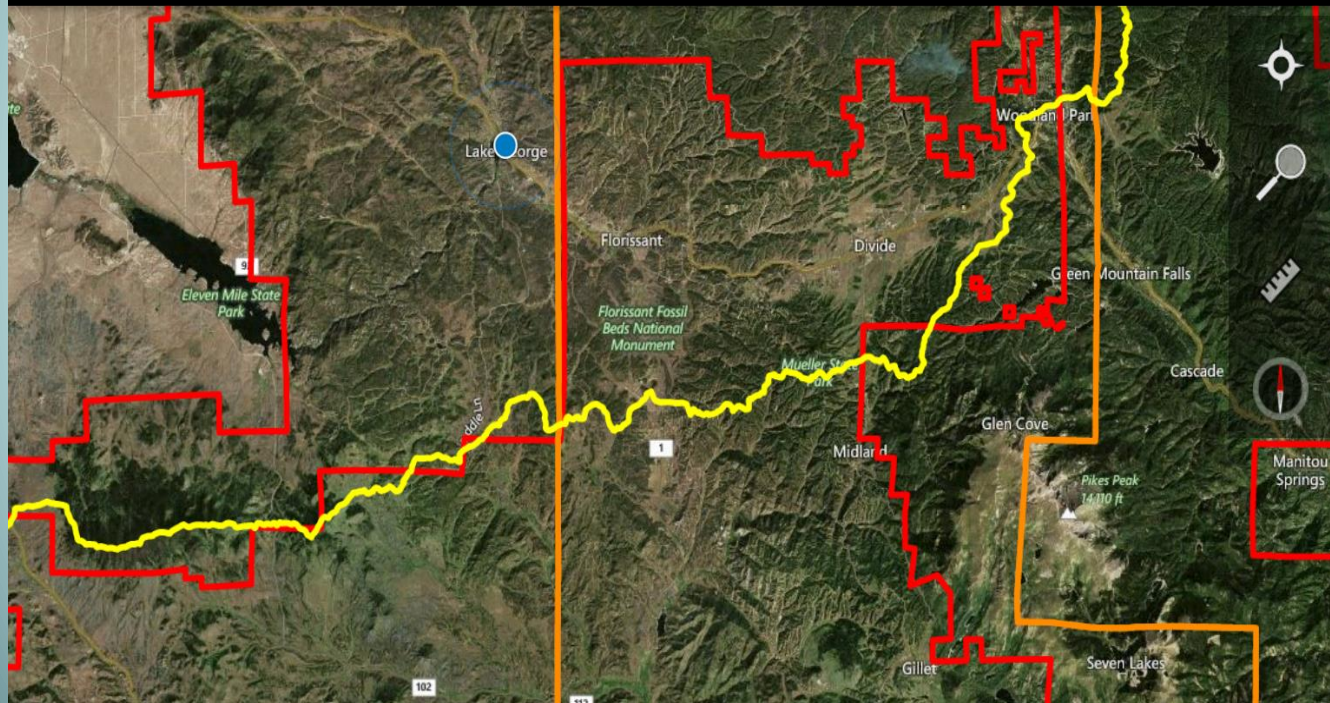


Today



MobileMap Lat: 38.982° Lon: -105.358° Acc. (ft): 34.8 Elev (ft): 8054.5

94% 10:41 AM



Select an Action

DONE

SIGN IN TO ARCGIS

UPLOAD FEATURES

UPLOAD PHOTOS

DOWNLOAD

SELECT FEATURE SERVICES

INITIALIZE DATABASE

EDIT DOWNLOAD PARAMETERS

EDIT CONFIGURABLE DEFAULTS

SELECT DATA DIRECTORY

DOWNLOAD BASEMAP

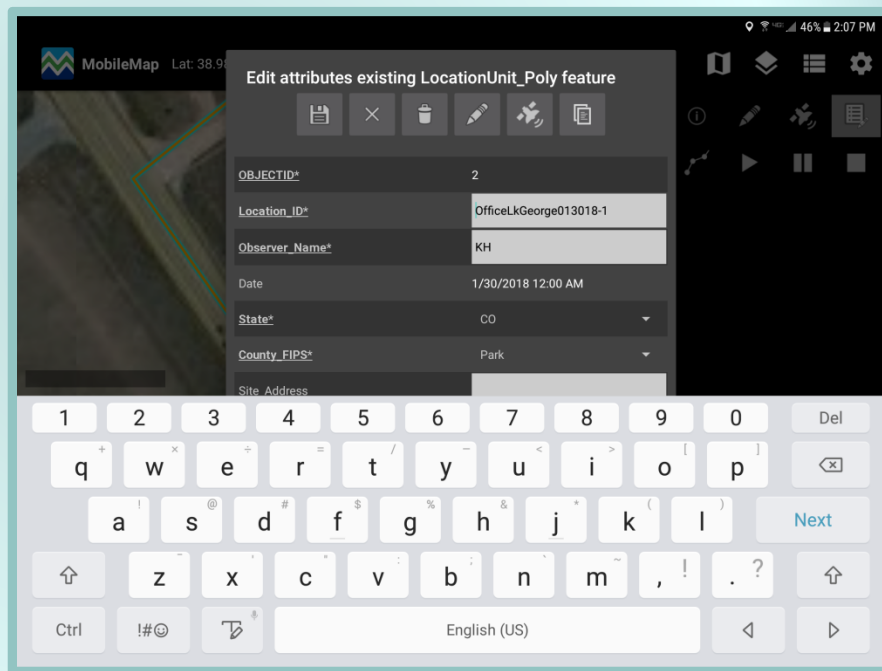
EXPORT DATABASE

FEATURES TO JSON

EXPORT SETTINGS

IMPORT SETTINGS

Features



Select Layer Display Properties

DONE

Layer



FUELS_Mitigated_Poly



Label Field:

none



LocationUnit_Poly



Label Field:

none



CUSP_Boundary.shp



Outline:



Fill:



Counties.shp



Outline:



Fill:



USFS_CO.shp



Outline:



Fill:



CUSP_Topo_L15.tpk



a_CUSP_Bing_L17_CTC



Features

Edit attributes existing LocationUnit_Poly feature



Clone Feature

Target Feature Layer:

FuelsPlanning_Poly



Field

Value



Location_ID

ManualTest031318-1



Observer_Name

kh



Date

1520920800000



State

8



CANCEL

CLONE

Map

Documents

Add Photos

Downloads

Issues

Data Layers

My account

Log out



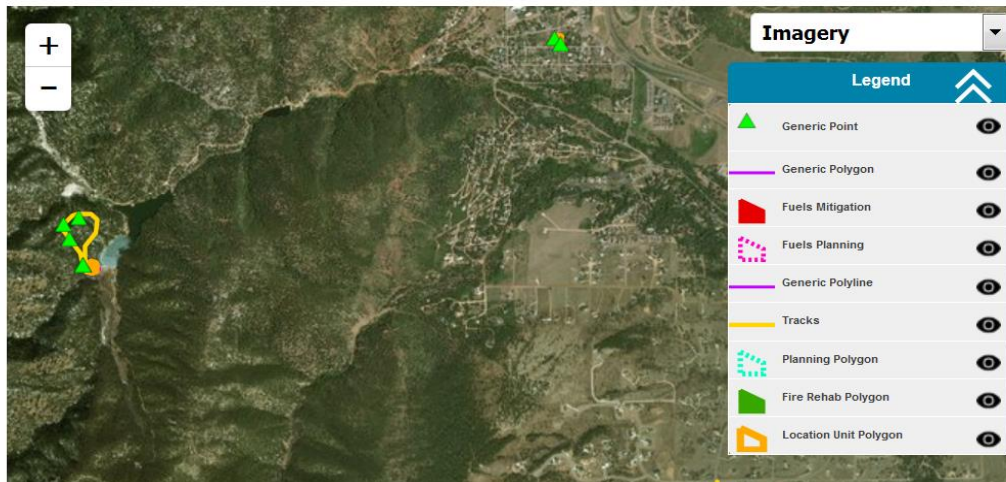
COCO CMS

Search Features

Select Layer to Search

Zoom To Features

Query Results



Export

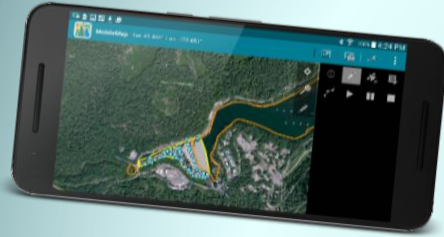
KML

Shapefile

CSV

Photos

MobileMap Data Flows



MobileMap

- Navigation
- Location awareness
- Collect and edit data
- View and query data
- Collect photos
- Android based

MB&G

MASON, BRUCE & GIRARD, INC.



ArcGIS Desktop / Pro / Online

- Package base map data
- Design data model
- Publish map services
- Perform advanced analysis



Spatial CMS Web App

- View data and photos
- Spatial + attribute search
- Track field work progress
- Perform data QA/QC
- Perform specific analysis
- Export data for external systems
- Generate reports

External Systems

- GIS and data viewers
- CSV, Excel, Shapefile, KML formats

Status



MobileMap Lat: 38.982° Lon: -105.358° Acc. (ft): 34.8 Elev (ft): 8054.5

Enter attributes new Fuels_Mitigation_Polygon feature

Observer_Name*

Activity_Date* EDIT

Activity_Type* Fuel Inventory

Status* Broadcast Burning - Covers a majority of the
Jackpot Burning - Scattered concentrations

Owner_Last_Name* Under Burn - Low Intensity (Majority of Unit)

Observer_ID Burning of Piled Material

Asset_ID Pruning to Raise Canopy Height and Discou

Location Rearrangement of Fuels

Project_Year Compacting/Crushing of Fuels

Site_Address Hand or machine piling of fuels

Chipping of Fuels

Thinning for Hazardous Fuels Reduction

1:2,600 (0.21 m)

The image shows the MobileMap application interface with a form for entering attributes for a new feature. The form has several fields with labels and a list of options. The status bar at the top right shows a battery level of 100% and the time 3:45 PM.

Questions?

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