Drones on Your Course Without all the Hype

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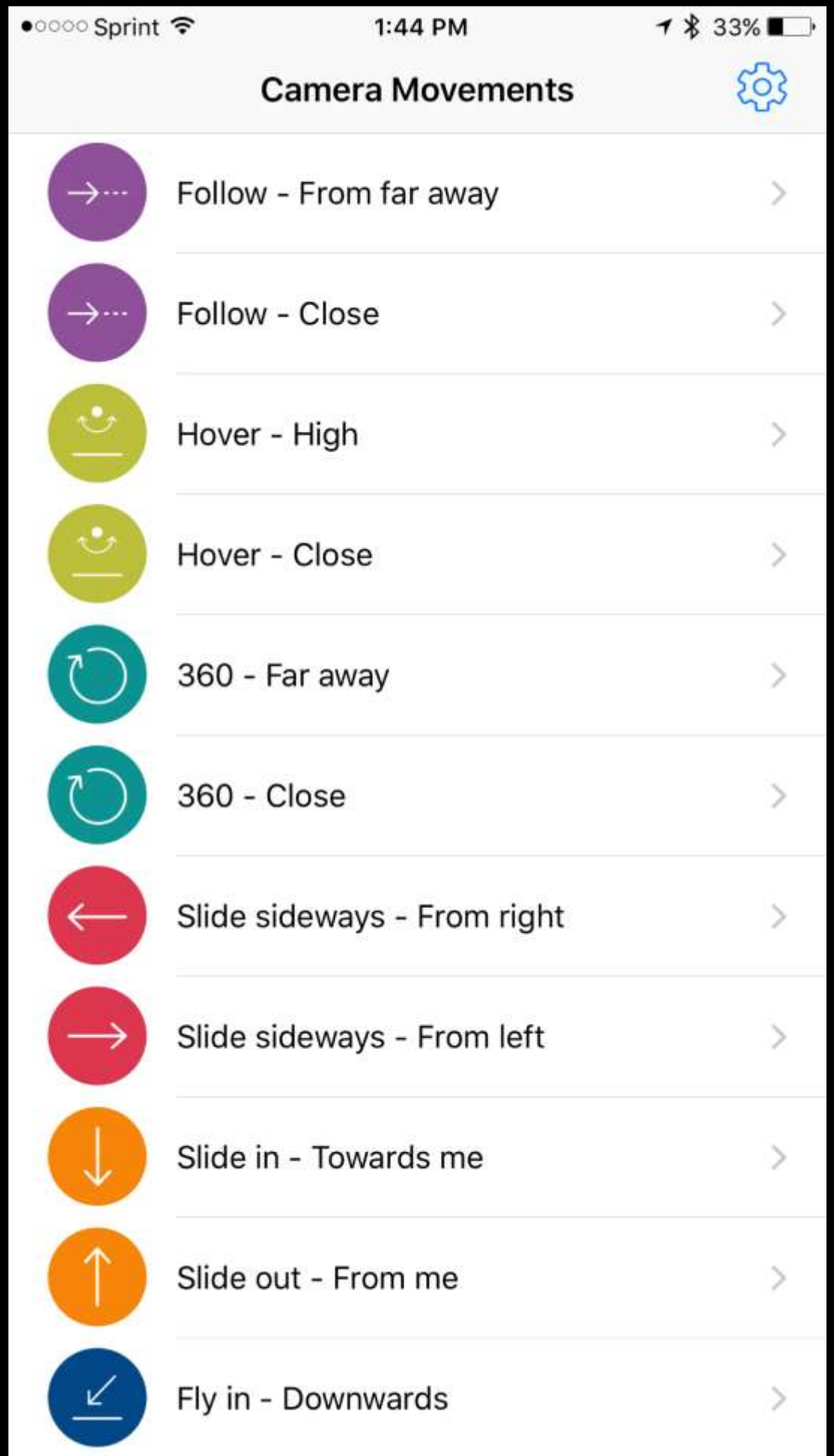
TurfNetTV
always one step ahead...

AIR
OFF
ON
PROPEL

+exo+


Sprint
1:44 PM
33%
Camera Movements
Follow - From far away
Follow - Close
Hover - High
Hover - Close
360 - Far away
360 - Close
Slide sideways - From right
Slide sideways - From left
Slide in - Towards me
Slide out - From me
Fly in - Downwards

Best Value

Editors Pick

Ready to Go (GPS)

P-GPS

11

95%

4.26V

--:--

ISO 100

SHUTTER 1250

EV +0.0

WB Auto

N/A

CAPACITY 0

AE

D 7.4 FT H 0.0 FT

H.S 0.0 MPH V.S 0.0 MPH 18 FT

MODE P-GPS 16 No signal HD 91%

--/--

ISO 800 1/12.5 EV 0 1,475 JPEG AE

Overall Status

Deserializer disconnected

Hardware malfunction: Contact DJI Support to arrange for repairs

Fn

H: 0.0 M D: 0.6 M

V.S 0.0 M/S H.S 0.0 M/S

0.1 M

0 20m

Justify the Drone

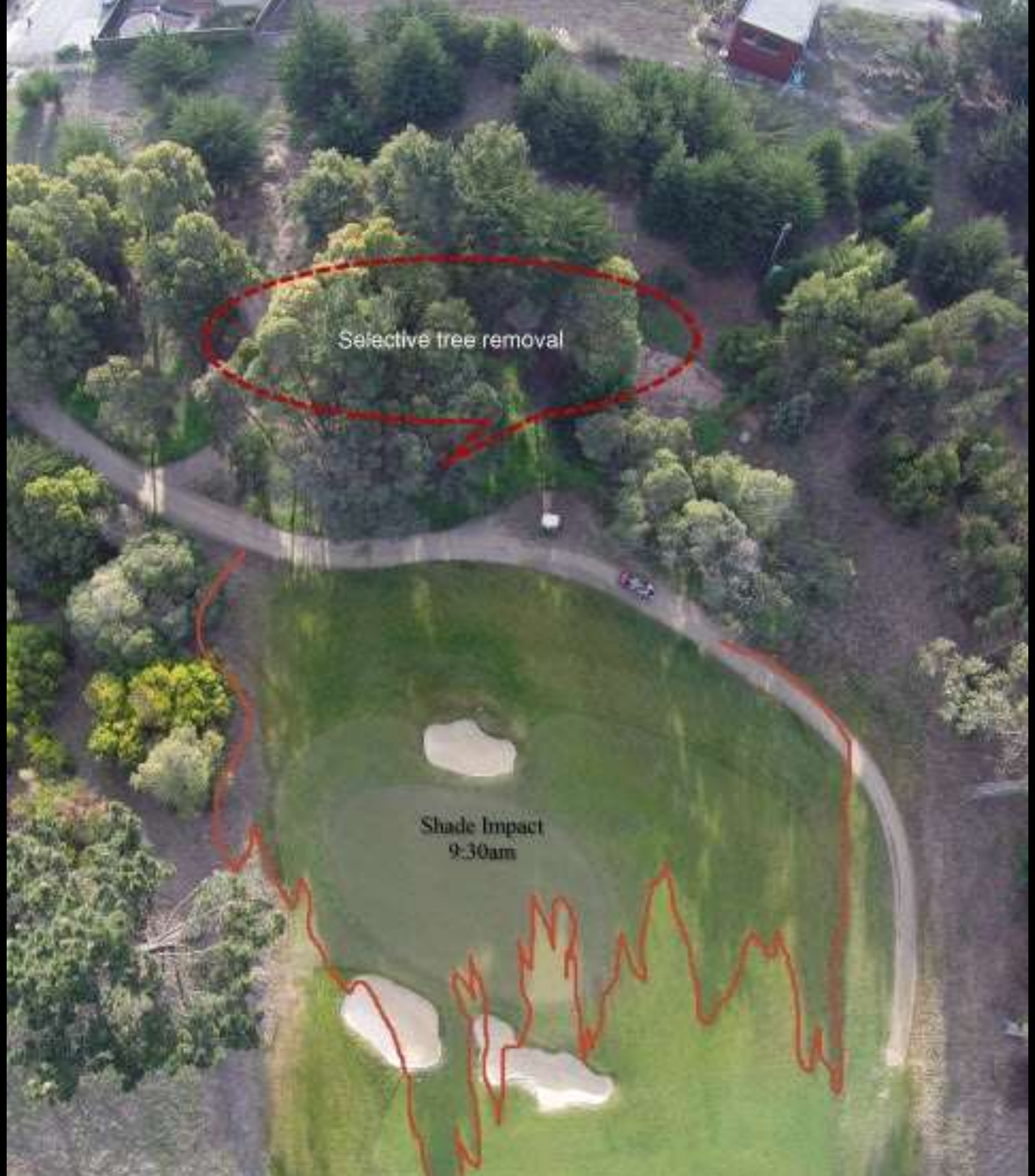
Chemical or Product Trials

Xon. .65grams/1000sq.ft.
Meth. 3.6oz.
Meth. 2.4oz.
Meth. 1.2 oz.

Methiozolin .6oz/m
3gal h20 carrier
2 week interval

Tree Evaluations

Shade


Selective tree removal
Shade Impact
9:30am

Native Grass

Project Planning

Additional tee
Extra outside roterra pass either side to blend
Eliminate cart path
11 x 1005

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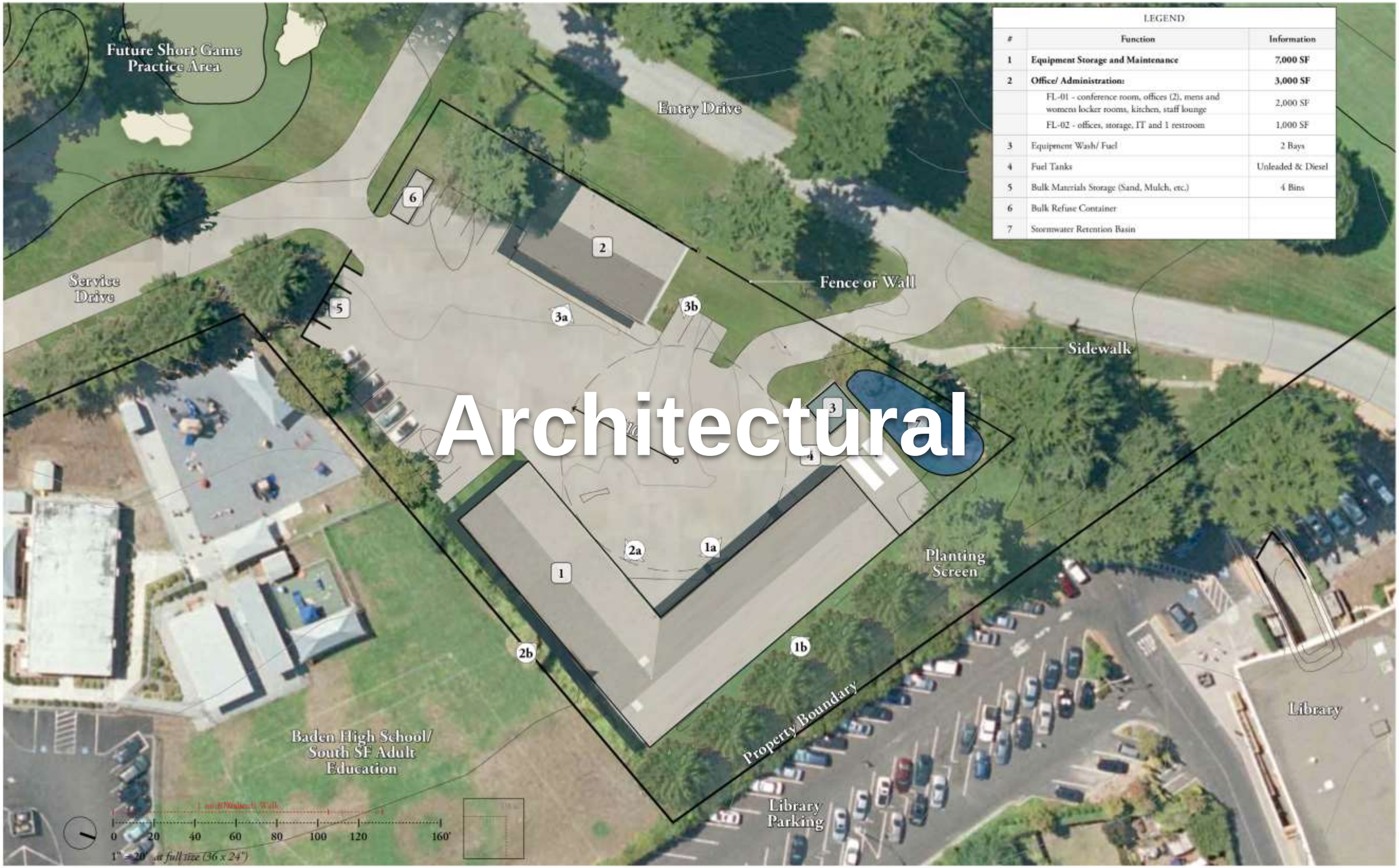

LEGEND		
#	Function	Information
1	**Equipment Storage and Maintenance**	**7,000 SF**
2	**Office/ Administration:**	**3,000 SF**
	FL-01 - conference room, offices (2), mens and womens locker rooms, kitchen, staff lounge	2,000 SF
	FL-02 - offices, storage, IT and 1 restroom	1,000 SF
3	Equipment Wash/ Fuel	2 Bays
4	Fuel Tanks	Unleaded & Diesel
5	Bulk Materials Storage (Sand, Mulch, etc.)	4 Bins
6	Bulk Refuse Container	
7	Stormwater Retention Basin	

Architectural

HART | HOWERTON

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CALIFORNIA GOLF CLUB

South San Francisco, California

Maintenance Site Plan - Enlargement

December 15, 2015

Property Line

Lake Evaluation

NTEP Trials

Lake Construction

Greens Construction

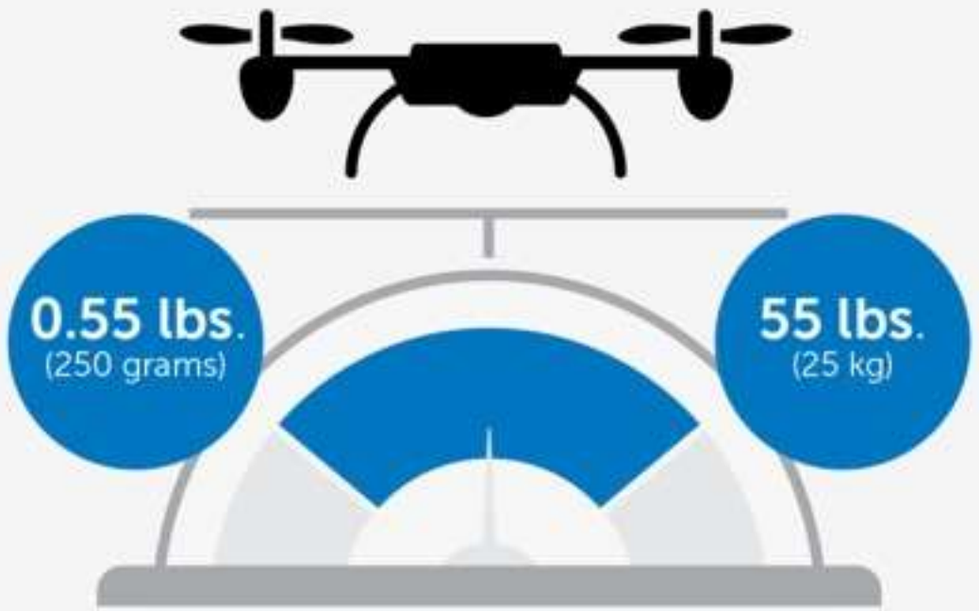
Construction Progress

Regulations?

sUAS 14 CFR Part 107

Do I need to register my Unmanned Aircraft?

You need to register your aircraft if it weighs between **0.55 lbs.** (250 grams) and up to **55 lbs.** (25 kg)



You will be subject to civil and criminal penalties if you meet the criteria to register an unmanned aircraft and do not register.

	Fly for Fun	Fly for Work
Pilot Requirements	No pilot requirements	Must have Remote Pilot Airman Certificate Must be 16 years old Must pass TSA vetting
Aircraft Requirements	Must be registered if over 0.55 lbs.	Must be less than 55 lbs. Must be registered if over 0.55 lbs. (online) Must undergo pre-flight check to ensure UAS is in condition for safe operation
Location Requirements	5 miles from airports without prior notification to airport and air traffic control	Class G airspace*
Operating Rules	Must ALWAYS yield right of way to manned aircraft Must keep the aircraft in sight (visual line-of-sight) UAS must be under 55 lbs. Must follow community-based safety guidelines Must notify airport and air traffic control tower before flying within 5 miles of an airport	Must keep the aircraft in sight (visual line-of-sight)* Must fly under 400 feet* Must fly during the day* Must fly at or below 100 mph* Must yield right of way to manned aircraft* Must NOT fly over people* Must NOT fly from a moving vehicle*
Example Applications	Educational or recreational flying only	Flying for commercial use (e.g. providing aerial surveying or photography services) Flying incidental to a business (e.g. doing roof inspections or real estate photography)
Legal or Regulatory Basis	Public Law 112-95, Section 336 – *Special Rule for Model Aircraft* FAA Interpretation of the Special Rule for Model Aircraft	Title 14 of the Code of Federal Regulation (14 CFR) Part 107

Pop Quiz!

QUESTION

Which preflight action is specifically required of the pilot prior to each flight?

ANSWER CHOICES

- Check the aircraft logbooks for appropriate entries.
- Assess the operating environment including local weather conditions, local airspace and any flight restrictions, the location of persons and property on the surface, and other ground hazards.
- Visually inspect the pilot certificates of all crew members.

Sprint
12:12 PM
75%
Unmanned Aircraft System C...
Regulations
73 questions
National Airspace System
80 questions
Weather
66 questions
Loading and Performance
28 questions
Operations
67 questions

The Future…

Today!

Full-Service Providers

EYEON18

GREENSIGHT AGRONOMICS

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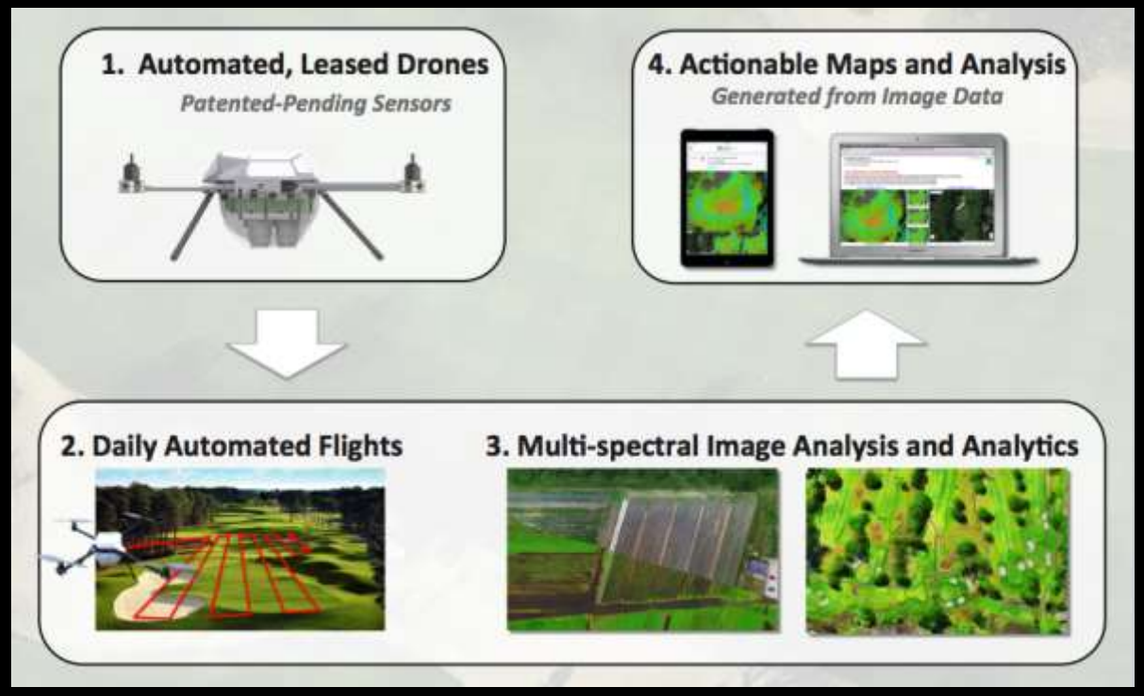
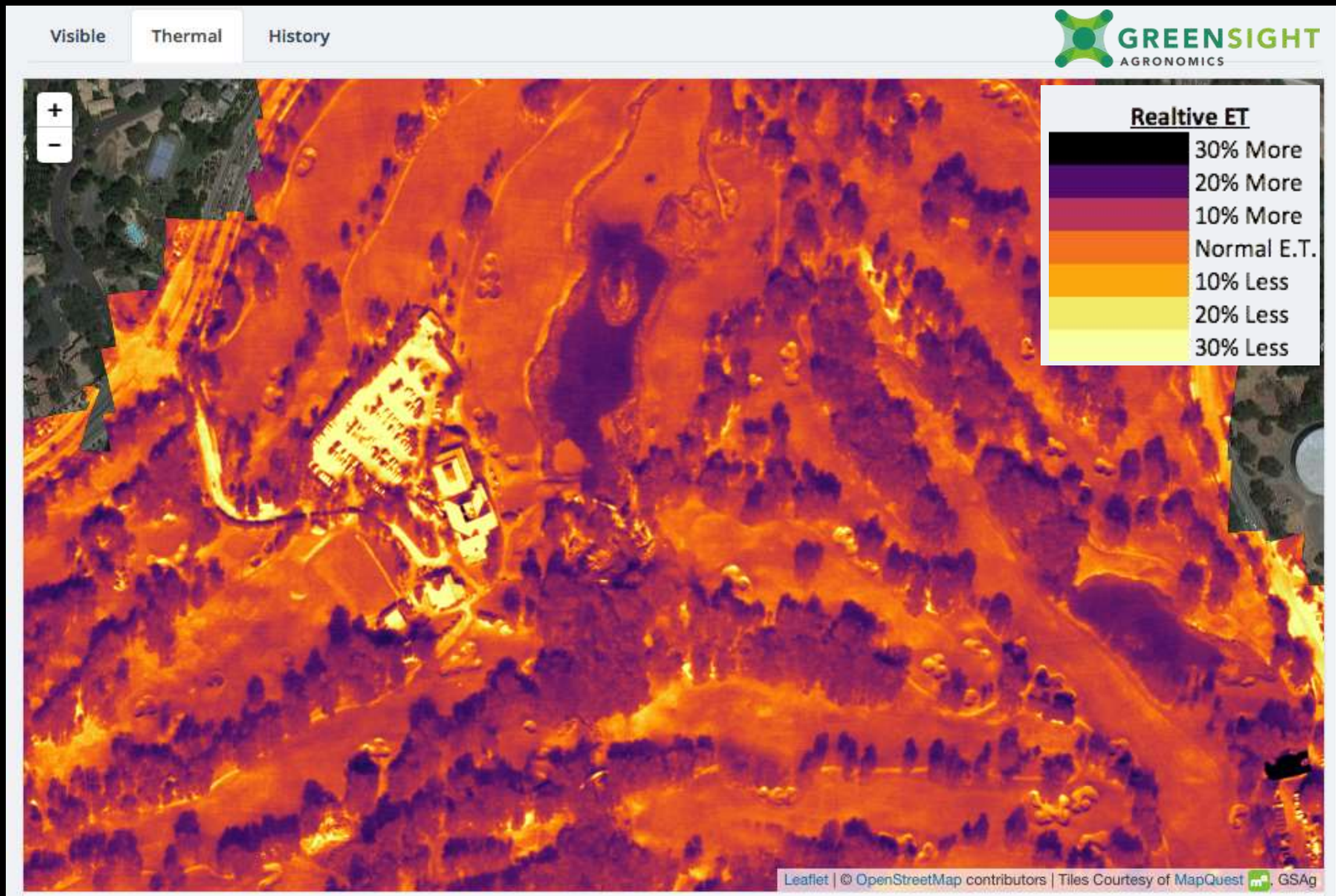
GREENSIGHT AGRONOMICS

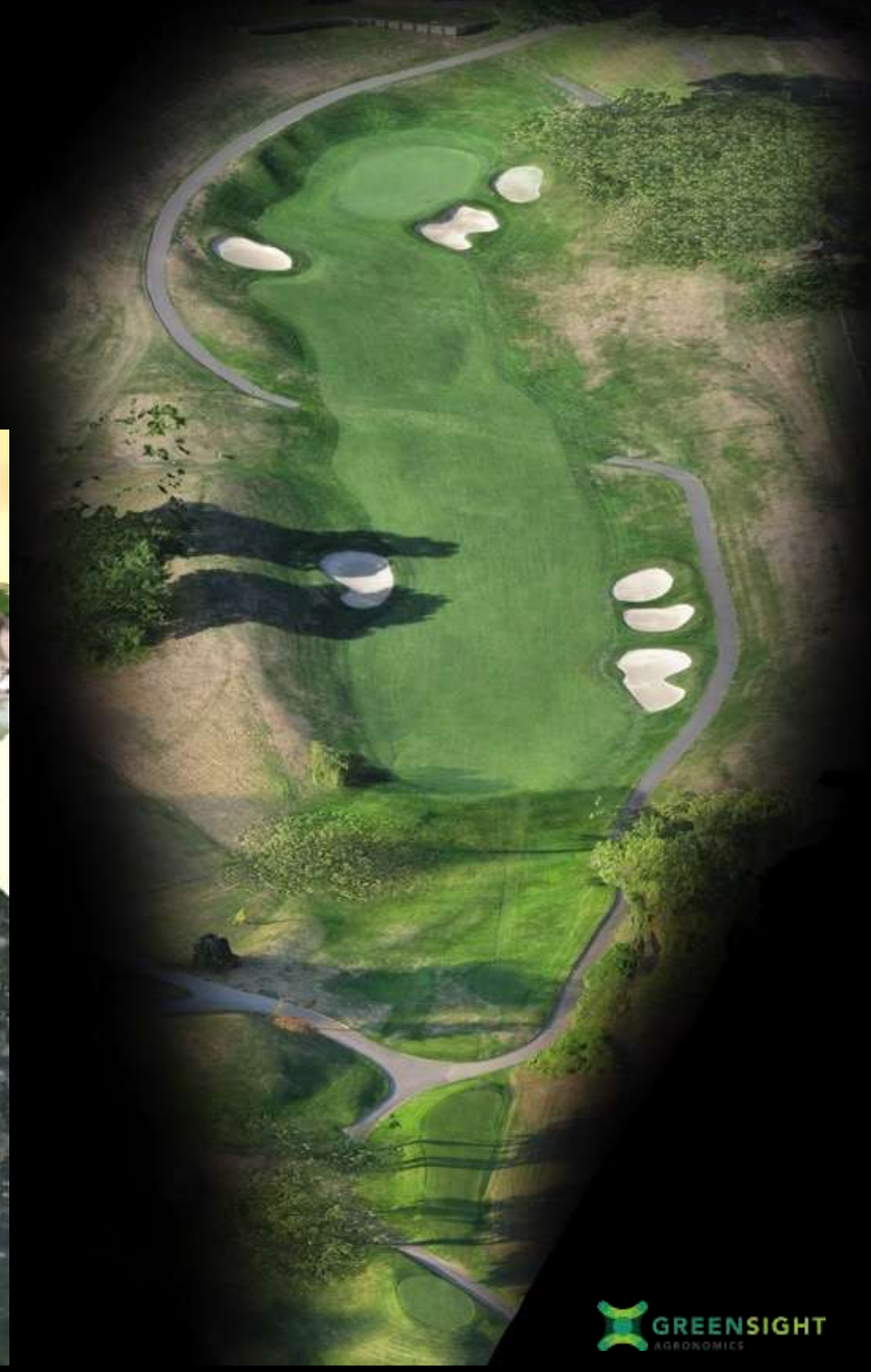
Sophisticated Command and Control Behind the Scenes



Advanced Data Products



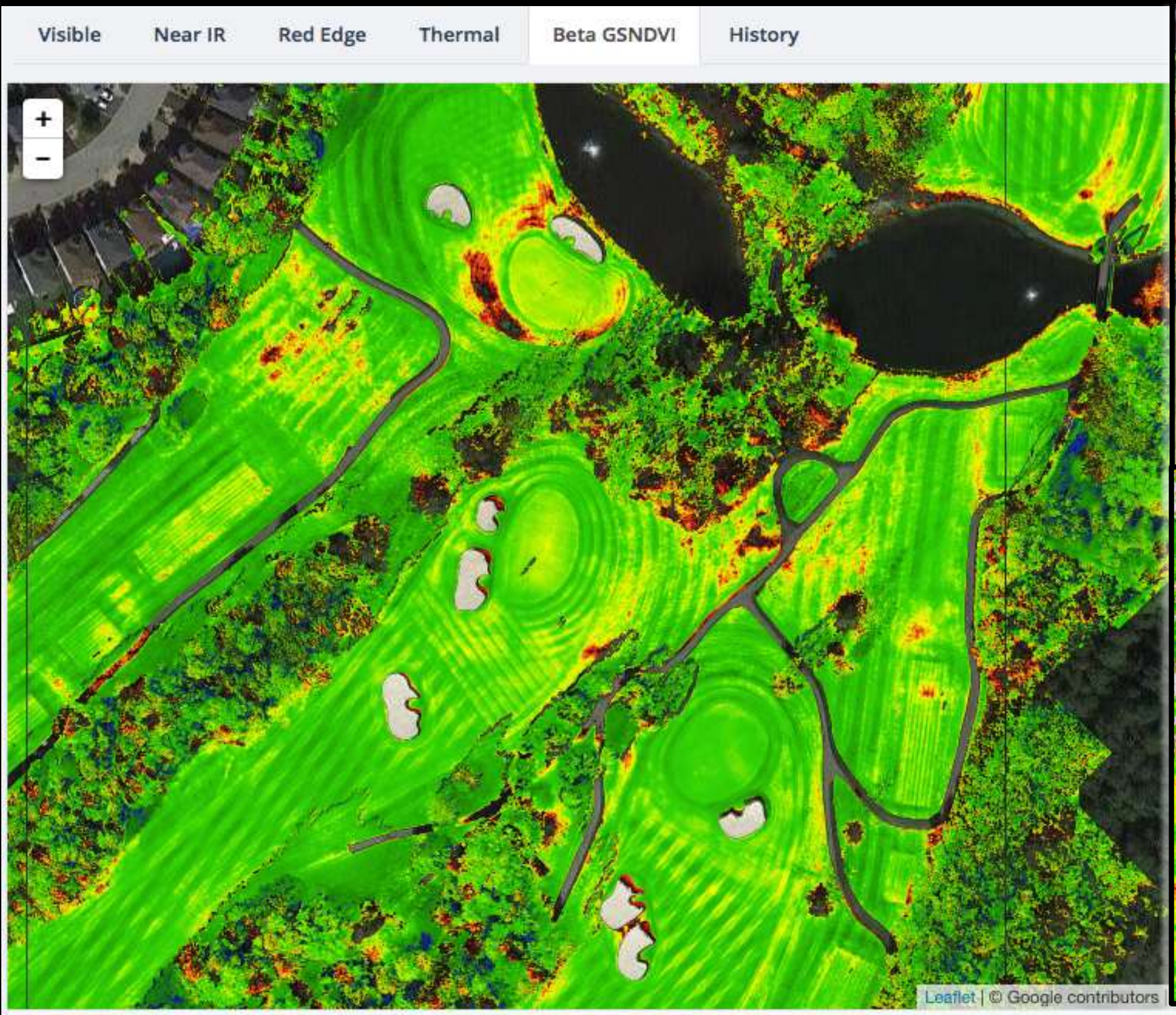
3D Terrain Mapping

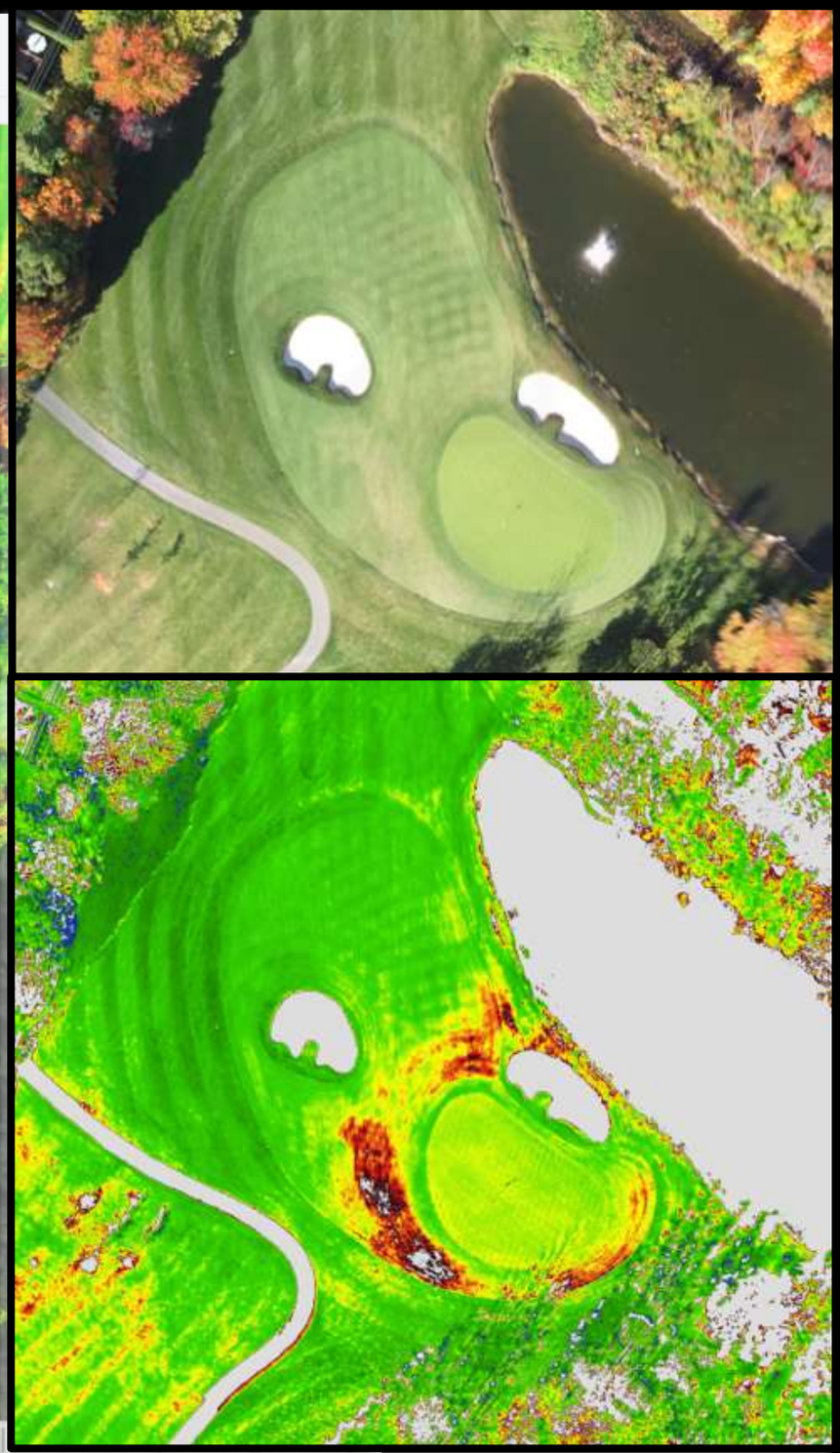


Relative Turf Health Index

EYEON18

NDVI: Normalized Difference Vegetative Index
Near-Infrared Cameras to Detect Chlorophyll





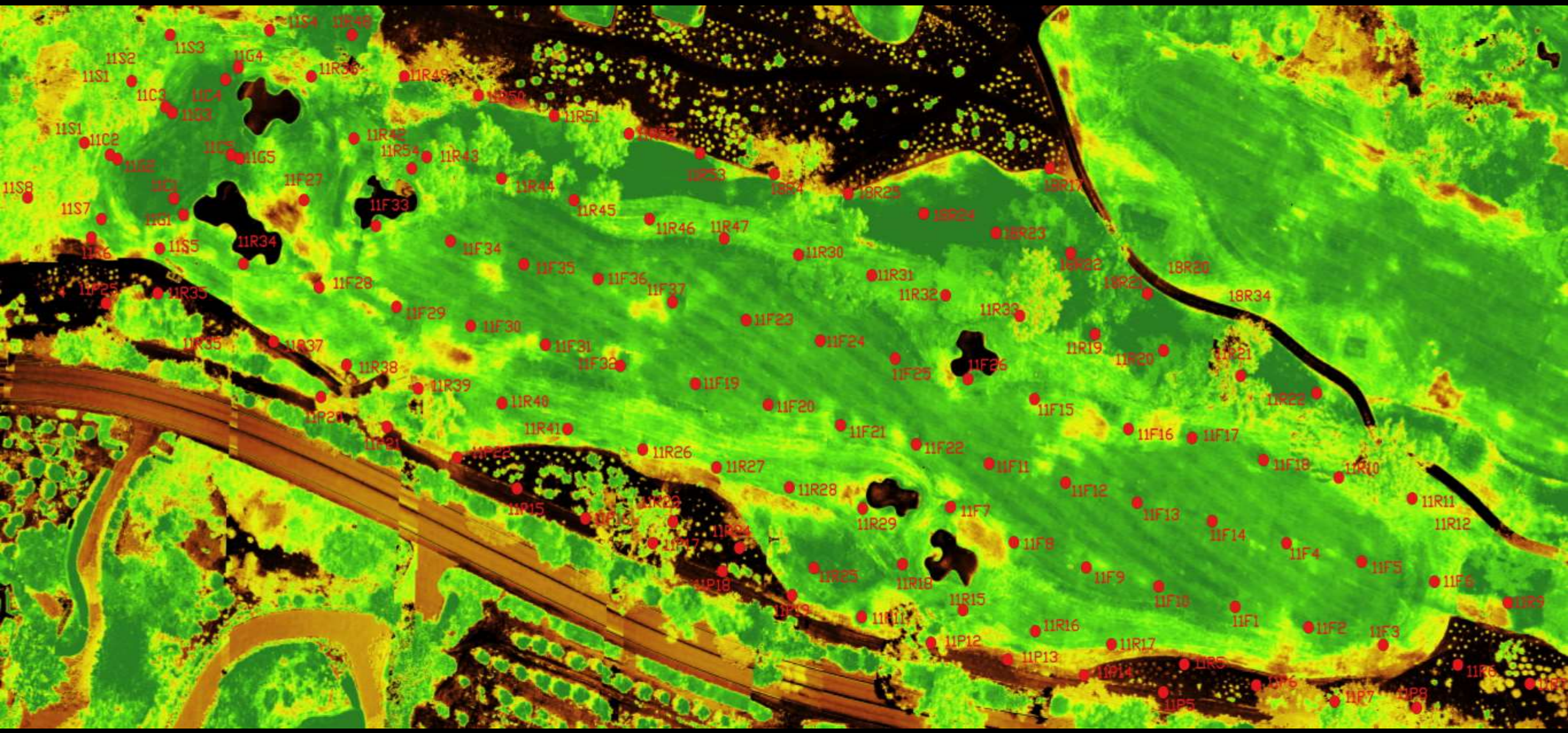
Feature Mapping

EYEON18

Relative Turf Health Index

EYEON18

NDVI: Normalized Difference Vegetative Index
Near-Infrared Cameras to Detect Chlorophyll



Take aways…

Register your drone

Get licensed

Be safe

@Calsuper

Thank You

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