

UAV use and adoption in Australian agriculture

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Fly Safe!
(know the rules)
Don't become
tomorrow's
headline!

NATIONAL VICTORIA

Man faces \$9000 fine for using a drone to pick up a
Bunnings sausage

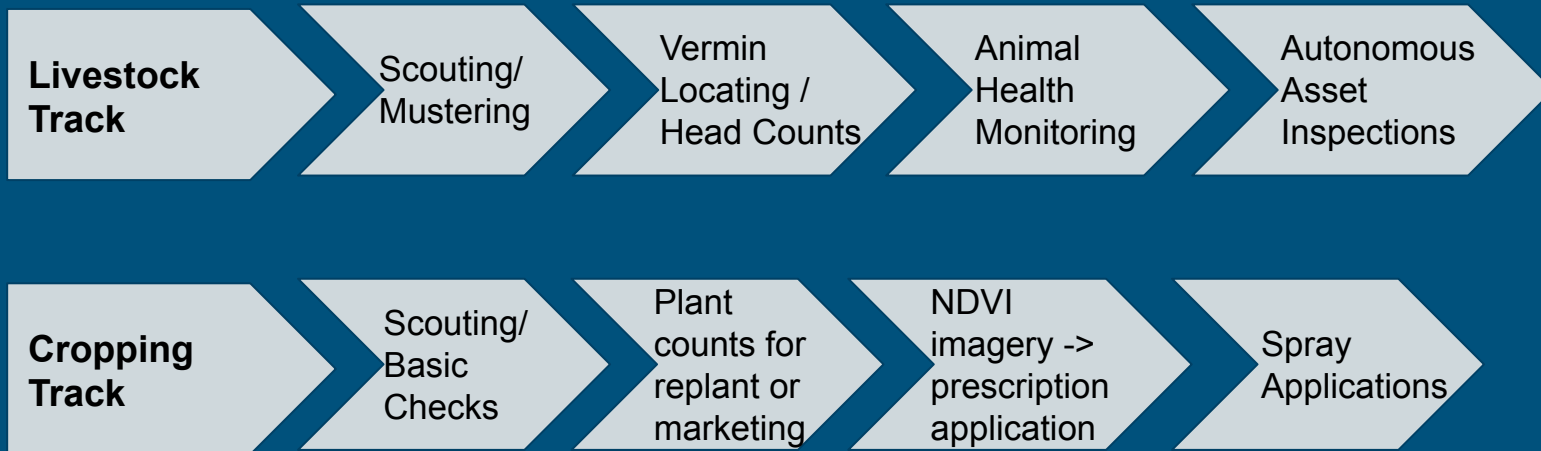
Watch out for these guys!!

Ag pilots, military and rescue aircraft are fast & will be upon you before you realise.

Might not seem a bit deal to fly further than you can see - but what if...?



What does the adoption of UAV's in #AusAg look like?



What does industry want from drones & the data they produce?

- Are there Tangible Benefits?
 - Realistic?
 - Actionable?
- Increased Productivity &/or Profitability - Key Drivers to adoption
 - Decreased inputs
 - Decreased time spent on a job
 - Increased profitability of an output
- TIMELY - data availability & action
- Build on data already collected without adding it to the 'DATA TOMB'
 - soil/planting/harvest/spraying

Limitations - what holds back adoption?

- Feeling that technology is being overhyped
- Too difficult to implement or concern about learning curve involved
- Type of technology is outside their area of interest
- Connectivity - the farmer might be connected - but the hectares aren't
- Concerned about the actual benefits
- Can't see that this tech will provide a productive or profitable outcome

Adoption - where are farmers getting their info?

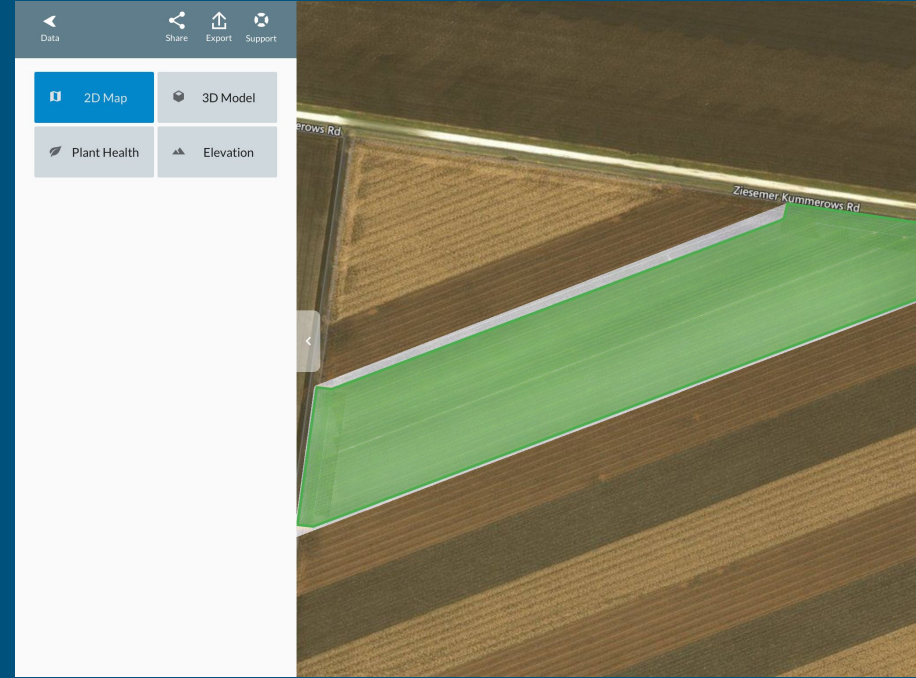
Decision Influencers - i.e. Consultant Agronomists, input suppliers, neighbours and friends, RDC's, extension officers.... The list goes on...

Field days, grower groups and conferences

Social Media - Twitter / YouTube / Facebook



UAV adoption in #AusAg today



Crop Health

◀ Data 🔗 Share ⬆ Export 🔄 Support



2D Map



3D Model

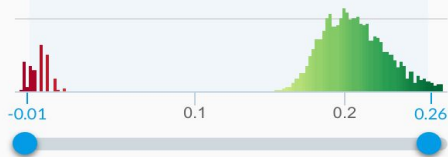


Plant Health



Elevation

12.6 ha



Filter Type

RGB



Algorithm

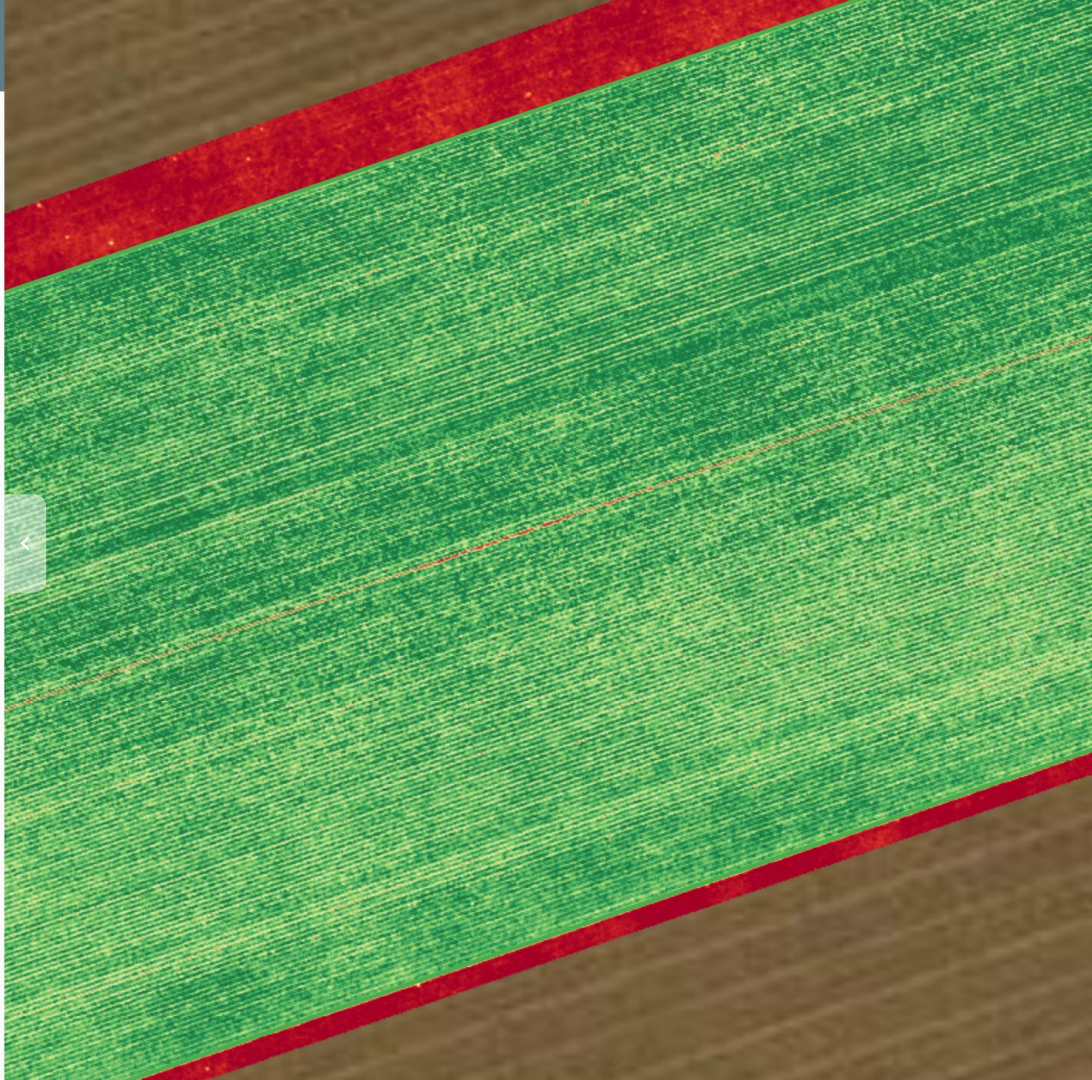
VARI (Recommended)



Grid



Zones



Zones - VR Tech

Data Share Export Support



2D Map



3D Model



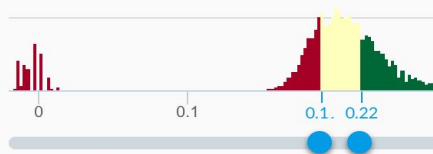
Plant Health



Elevation

4.3 ha

4 ha



Filter Type

RGB

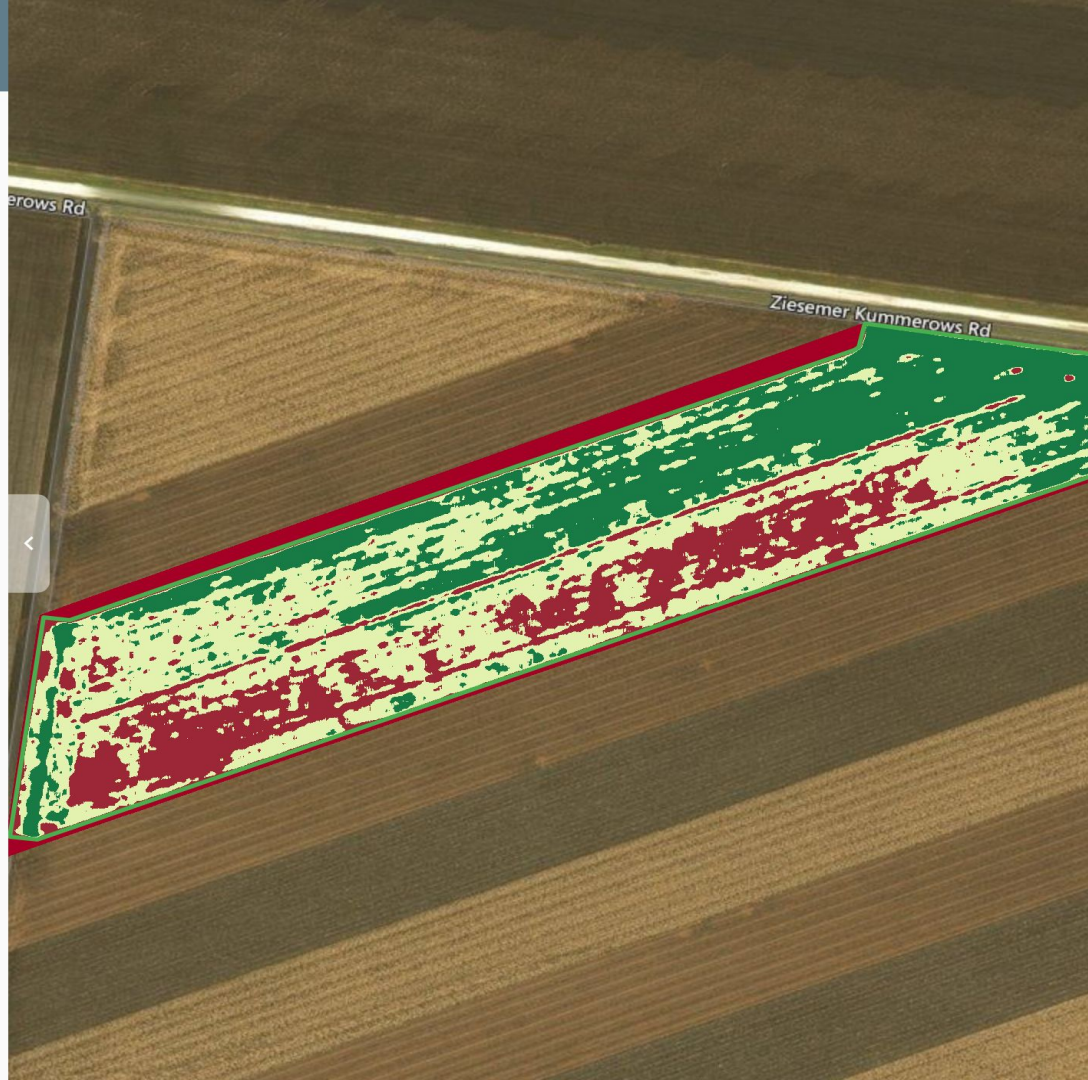
Algorithm

VARI (Recommended)

Grid



Zones



Aside from the 'tech' - what else?
SHARING YOUR FARM STORY & SOCIAL
LICENCE...

A person wearing a blue t-shirt and jeans is kneeling on a stone patio. They are pouring a red liquid from a white plastic jug into a red bucket. The background shows a grassy field, a white fence, and a cloudy sky.

A TYPICAL ROUNDUP READY SOYBEAN APPLICATION IS
ONLY 22 OUNCES PER ACRE

Pointers for the UAV Industry & those wanting to implement the use of drones on farm

- UAV Industry - Knowledge & Understanding of the industry you are heading into...
 - Spraying of Broadacre crops?
 - Replacing agronomists?
- Potential Users - Get knowledge from reputable sources
 - What regulations might surround the use of a drone...?
 - CASA?
 - Privacy Laws?
 - Other Government Agencies - EPA/Biosecurity/APVMA?

The Future?

Farm Centric Innovation Model (Pete Nelson - AgLaunch)

*Involve farmers and their decision influencers in development -
don't develop in isolation from your end user...*

Tangible Benefits -

Sustainable profitability & productivity

Ownership of Data & Associated IP -

Retained by farmer - data is the new gold / oil

Food Provenance -

sharing the story of ag to end users

BVLOS - safely

Extended Battery Life



Thanks!

