ORBICA

LOCATION.
DATA.
CONNECTIVITY.

CAPABILITY OVERVIEW

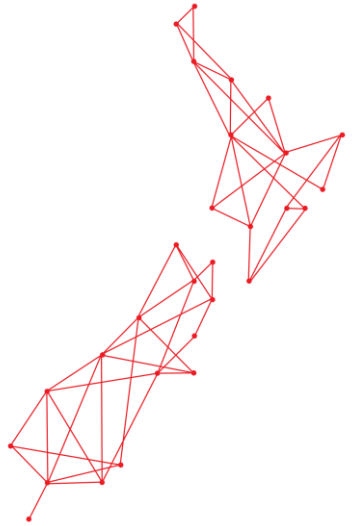
Venue: Zoom – video conference

ORBICA.WORLD

- Who are we and what do we do
  - Our strengths
  - How we contribute back
- Future opportunities
- Our expectations as a Business Partner

Our **purpose** is simple

“To enhance a billion lives through the power of geography.”



MEET THE ORBICANS

CONSTANTLY THINKING OUTSIDE THE QUADRILATERAL

KURT JANSSEN
CEO & Founder

NEAL JOHNSTON
Location Data Specialist

ANTONIN CAEN
Geospatial Architect

BANIKA SIROHI
Full-stack Developer

FAISAL ABBAS
Geospatial Craftsman

LOUISA TAYLOR
Commercial Manager

JUSTIN FAIL
Service Delivery Manager

KURT JOY
Remote Sensing Specialist

PETER ROSE
Director (Europe)

SUNNY SUN
Geospatial Developer

PHIL CLUNIES-ROSS
Freshwater Scientist

SANTOSH SESHADRI
Geospatial Innovator

LAURA WINDERS
PA/team support

RIMU BODDY
Full-stack Developer

SAKINAH ABDUL
Full-stack Developer

ARTHUR MCGREGOR
Full-stack Developer

BRIDGET EDWARDS
Chief Financial Officer

SUVARNA DUDAM
IT Specialist

WILL JONES
Location Data Specialist

SAGAR SONI
Data Scientist (AI)

ROB PARSONS
Business Development

VANESSA O'BRIEN
Communications Manager

Barriers to customer engagement

TIME POOR

THE AMOUNT AND COMPLEXITY OF INFORMATION

THEY CAN'T ACCESS INFORMATION IN A WAY THAT'S RELEVANT TO THEM

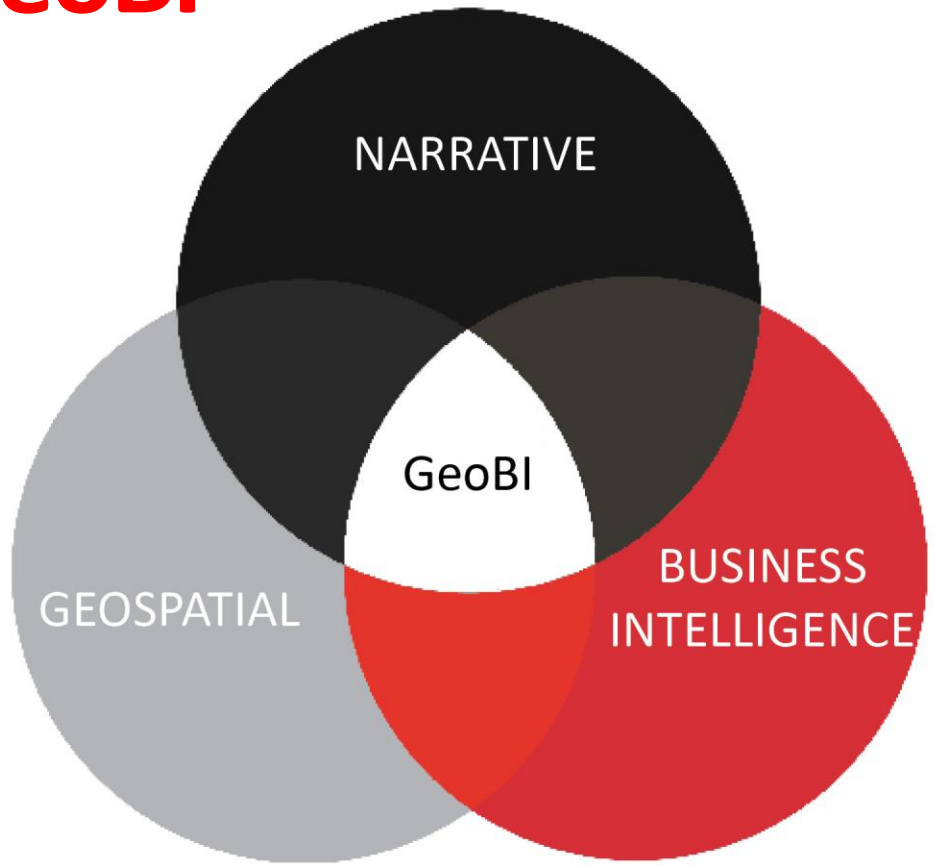
But it's more than digital: it's got to be accessible

- The way we communicate data must be customer-centric
- Does your customer have time to read a 200-page annual plan?
- There may be better ways to communicate than the platform you've always used

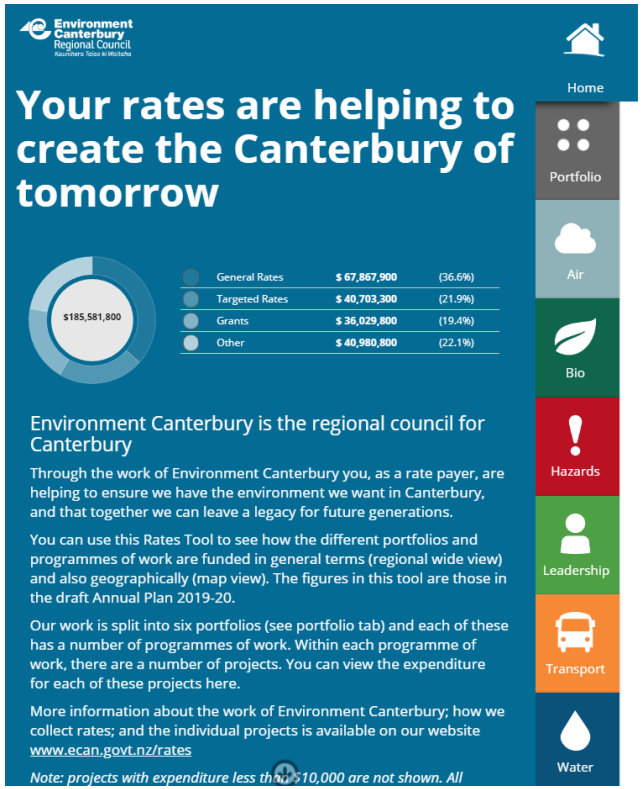
Smart, interactive data visualisations and story telling

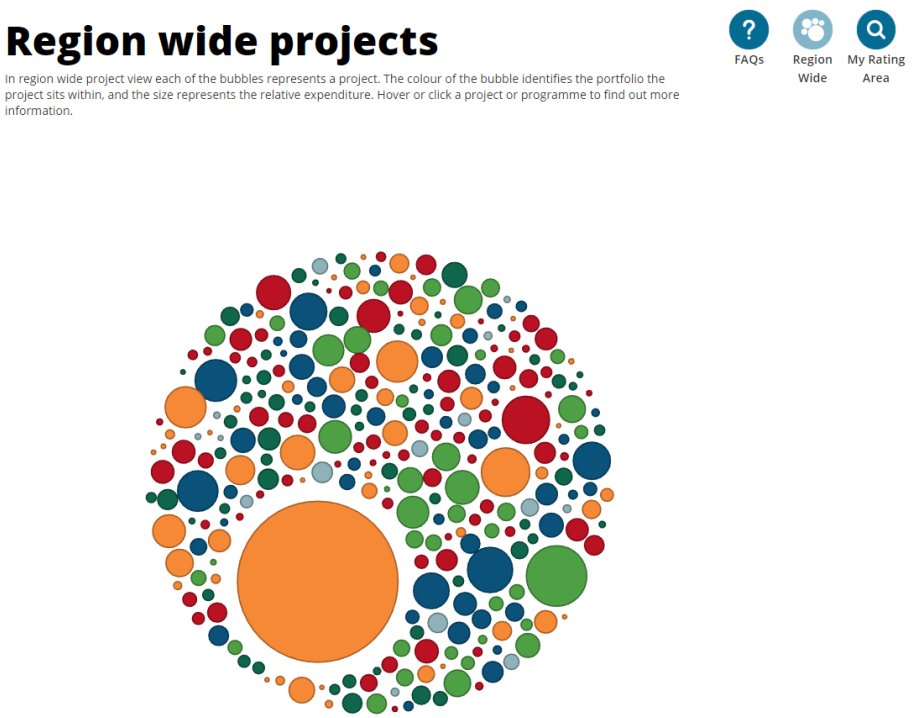
- Make complex data easy to understand
- Engage with your community
- Visually communicate multi-level data and data siloes in an interactive, simple way
- Lead the story and make it relevant to your audience

Welcome to GeoBI



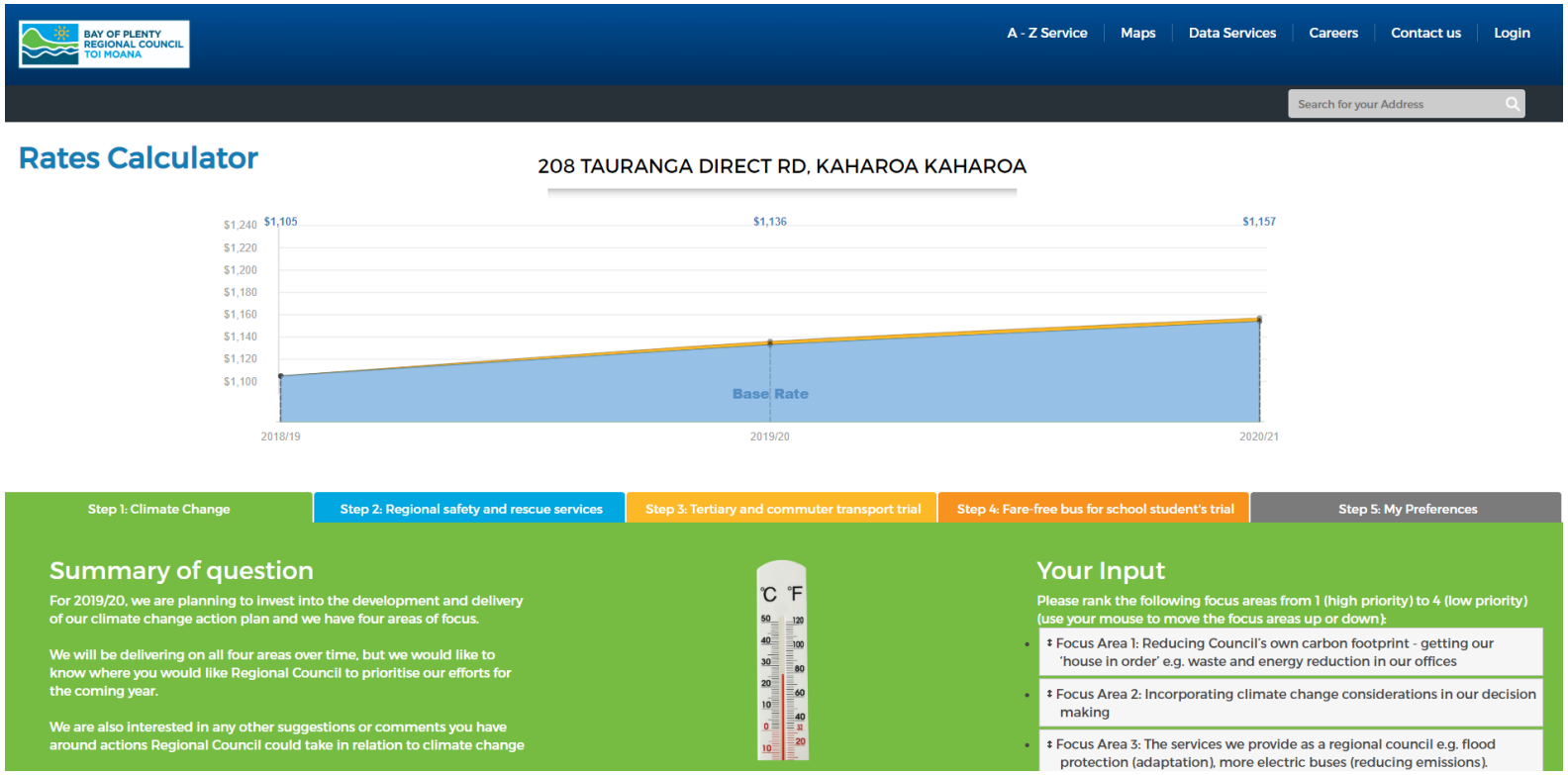
Environment Canterbury rates' tool





OBJECTIVE: To enable ECan to visually tell the story about the portfolios and projects its rates' collection funds.

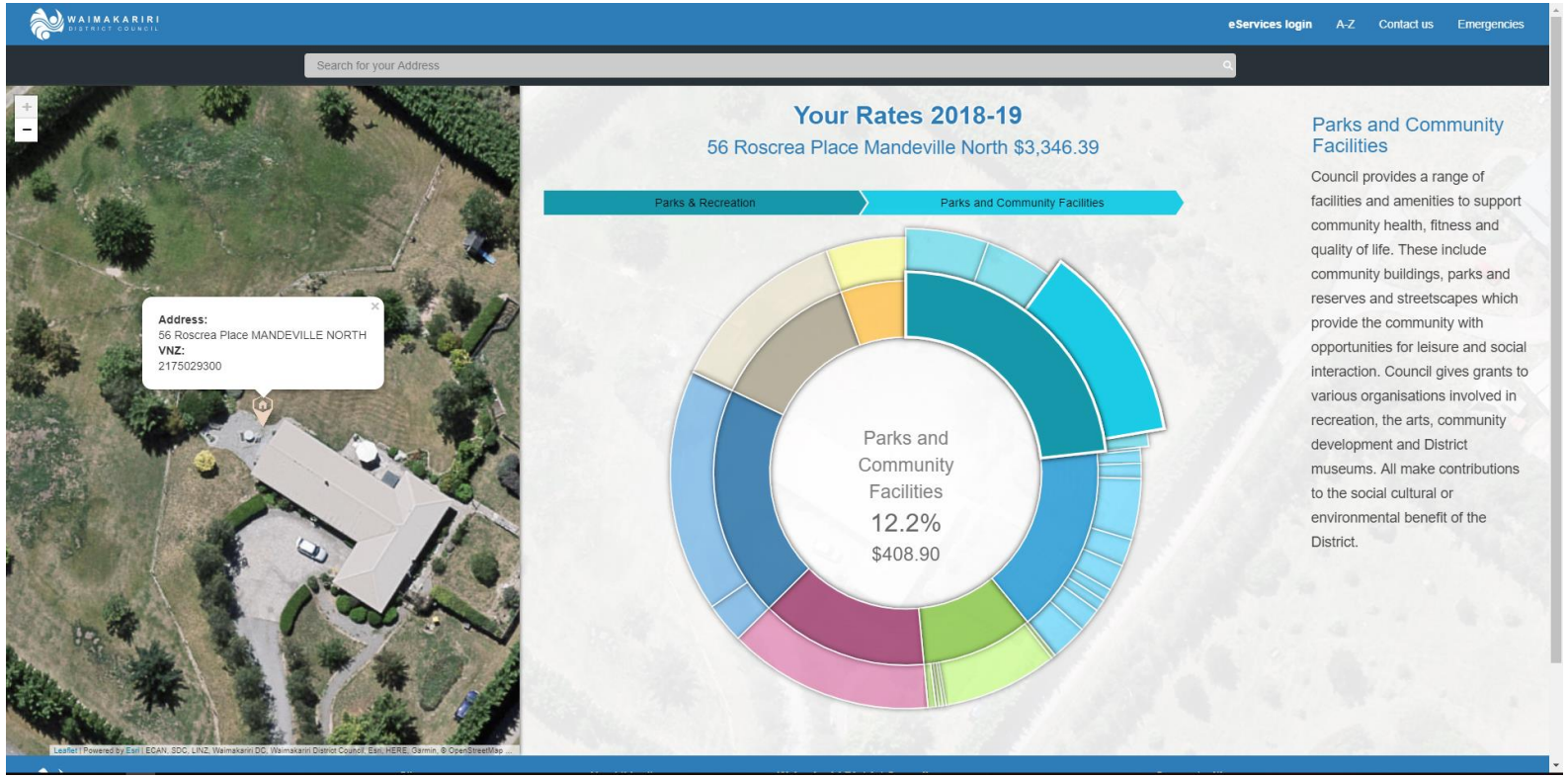
Bay of Plenty Regional Council rates' calculator



OBJECTIVE: To enable BOPRC to visually tell the story of the portfolios that rates fund, to enable rate payers to visualise their personal rates break-down and to get feedback on proposed spend.

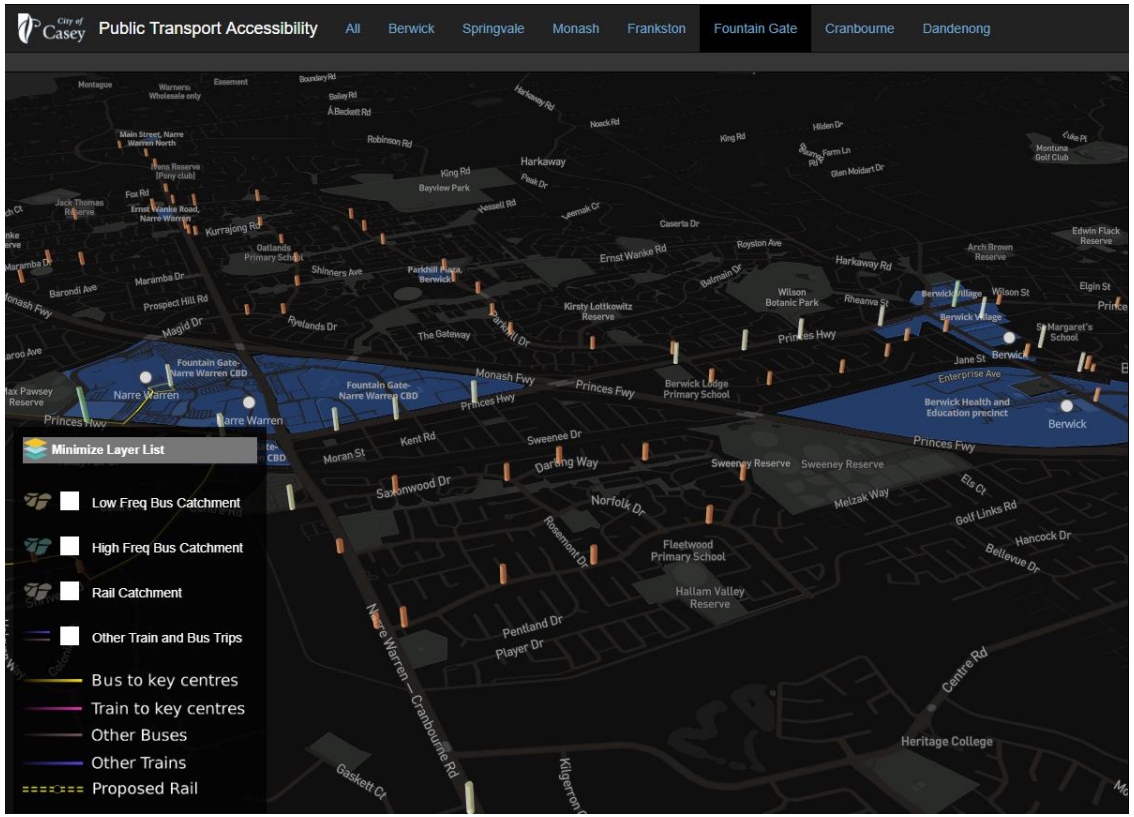
https://eservices.waimakariri.govt.nz/yourrates/

Waimakariri District Council "Your Rates"



OBJECTIVE: To enable WDC to visually tell the story of the portfolios that rates fund, and to enable rate payers to visualise their personal rates break-down.

City of Casey: Public transport accessibility

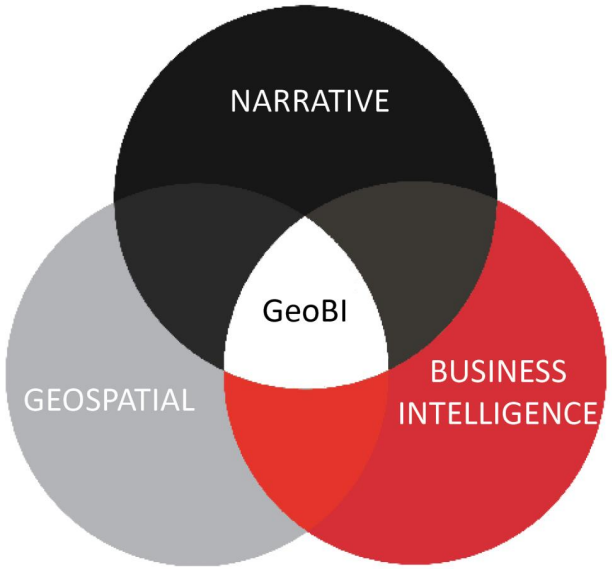


OBJECTIVE: To deliver insight into the inequality of public transport across Melbourne's South East

BASF: Goal tracker

OBJECTIVE: To help BASF visually tell the story of how it's meeting UN Sustainable Development Goals.

GeoBI helps you achieve customer success



- Customer experience
- Engagement
- Transparency
- Understanding
- Relevance

- Open data

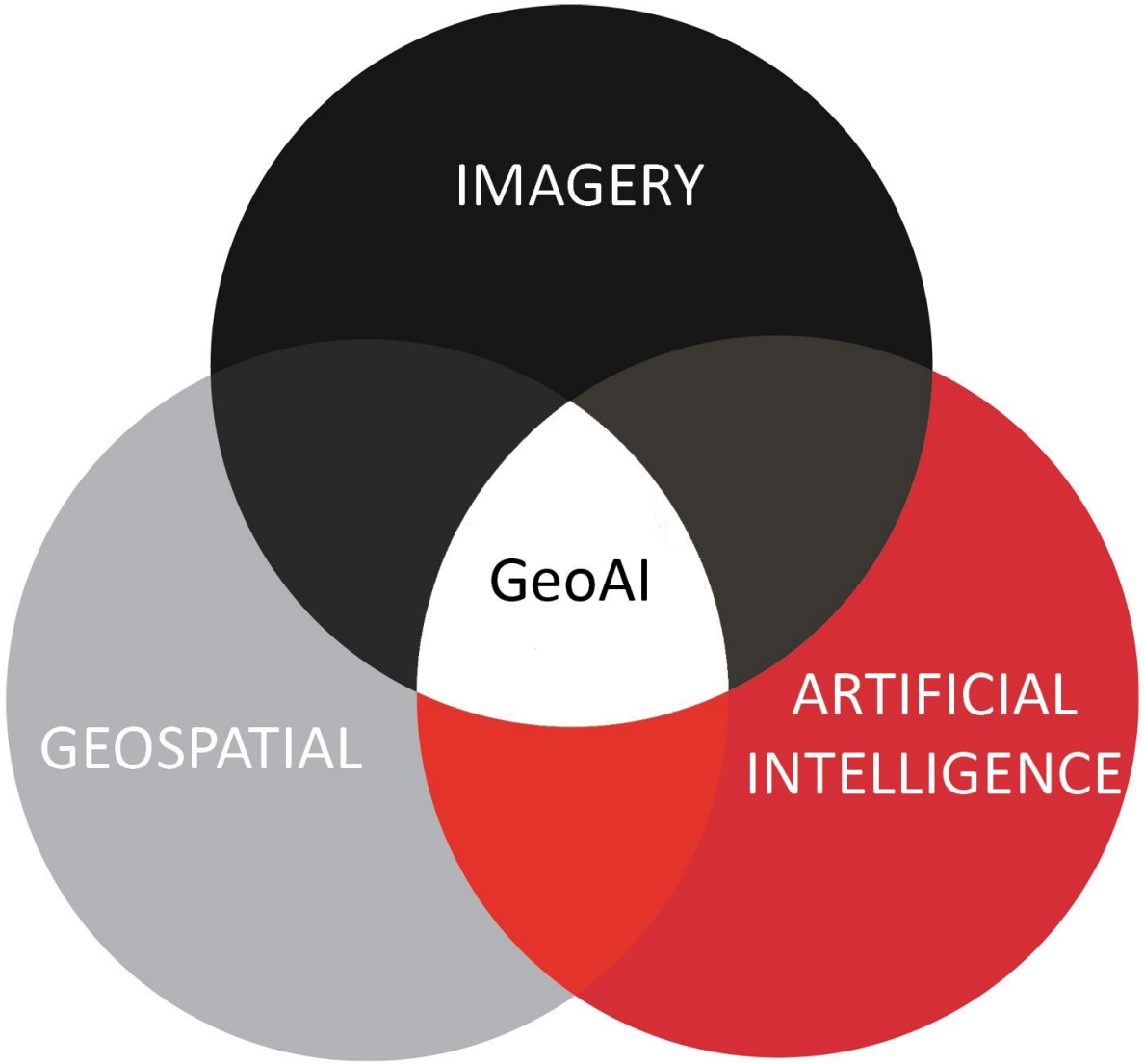
- Transparency /engagement

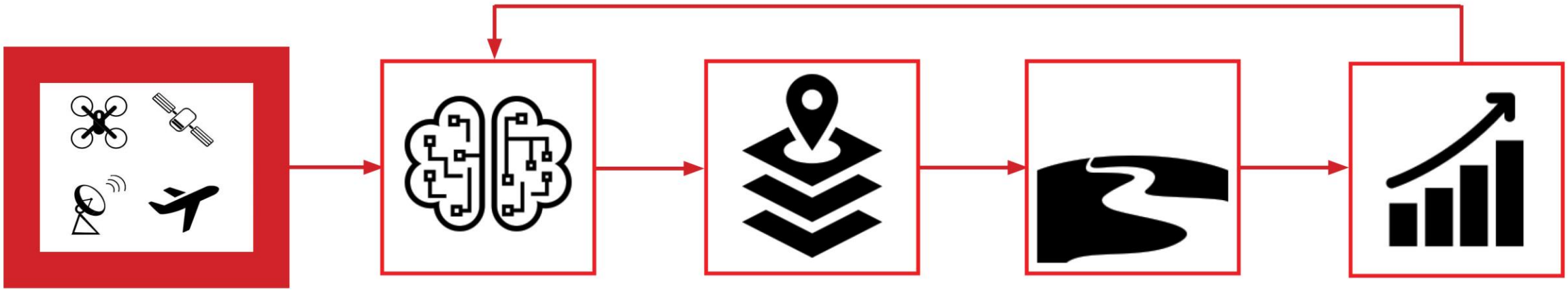
- Improves customer experience by meeting customers online in a quick, interactive and easy-to-understand way

Earth observation data – BIG data - is increasing exponentially … and fast

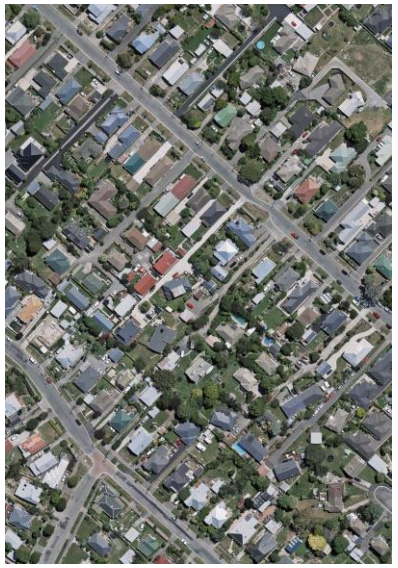
Market identification
Environmental change
TRANSFORMING DATA INTO INSIGHT, IN NEAR REAL TIME, CREATES VALUE
Urban development
Construction progress reporting
Disaster management

What is GeoAI?

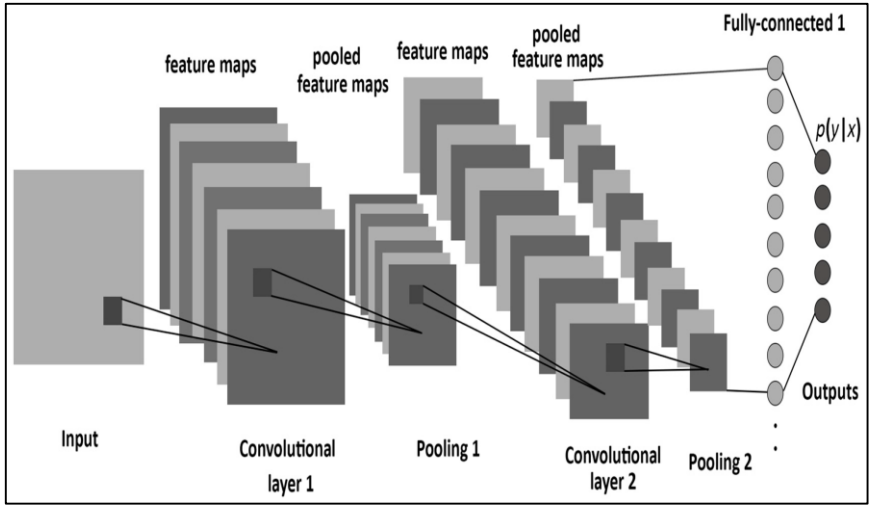



Imagery
Orbica AI Engine
Orbica Geospatial Engine
Output: Extracted features
Improve: Re-train algorithm with processed outputs

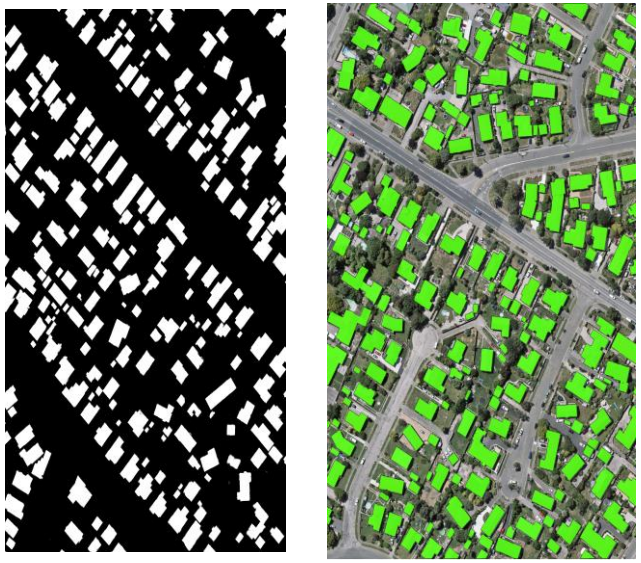
RGB Image (Input)



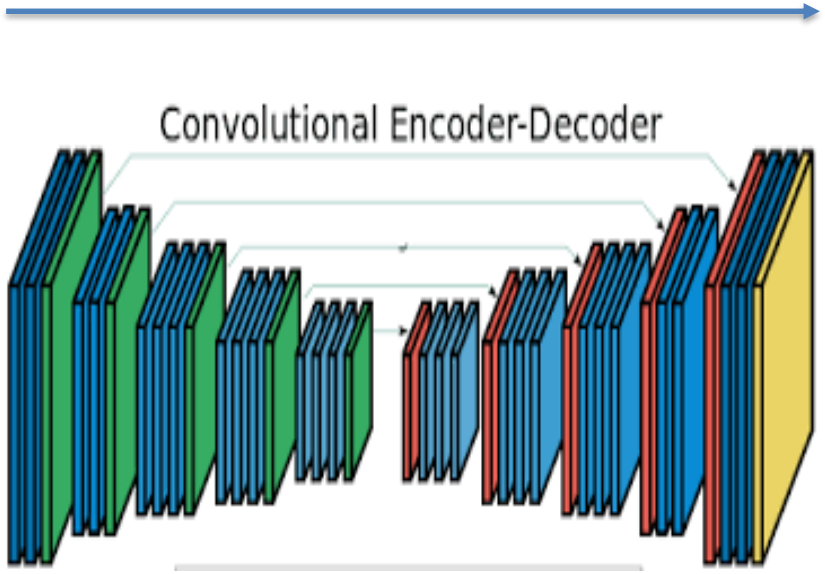
Feature Extraction + classification

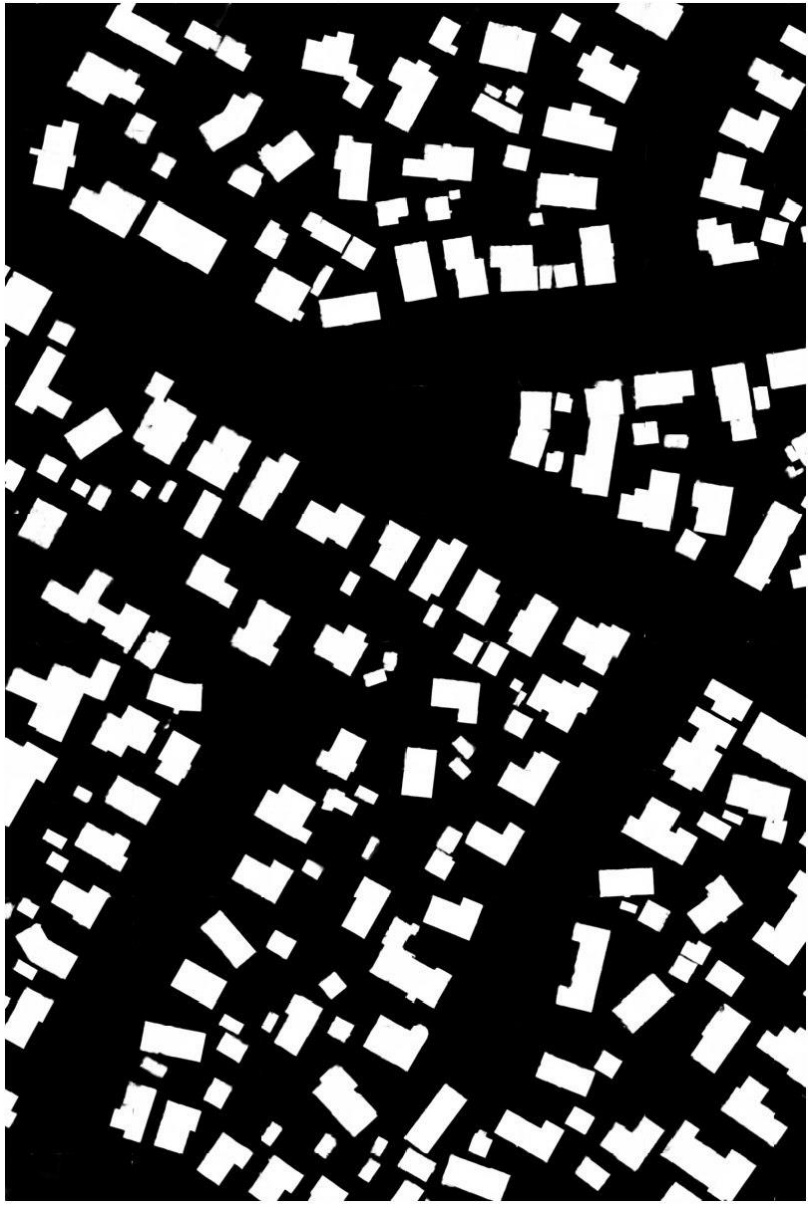


Output (Raster & Vector)



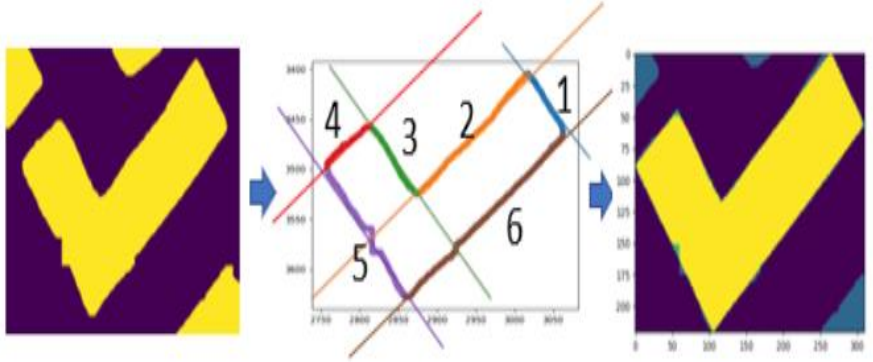
Orbica AI Engine

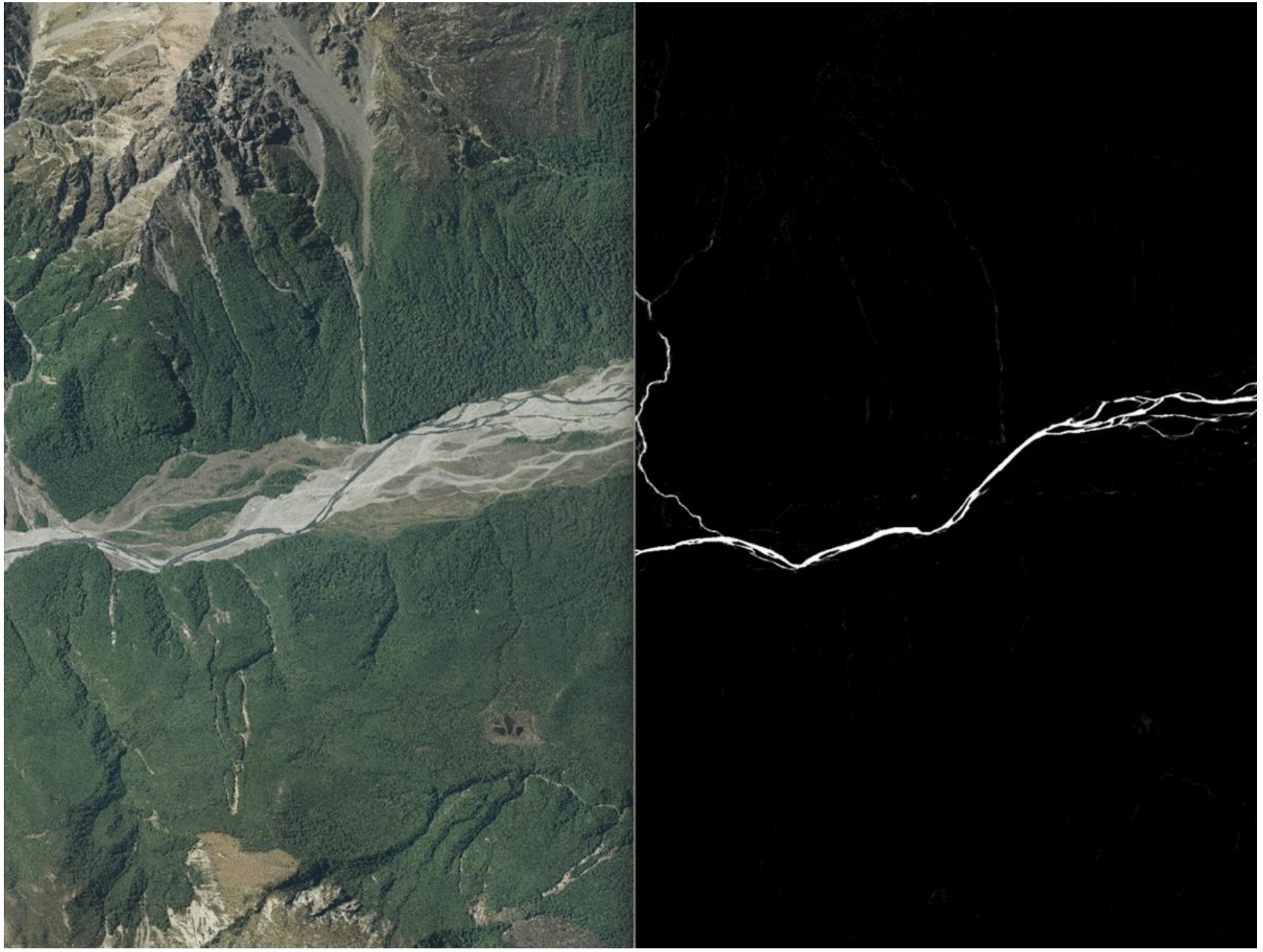




Orbica
Geospatial
Engine

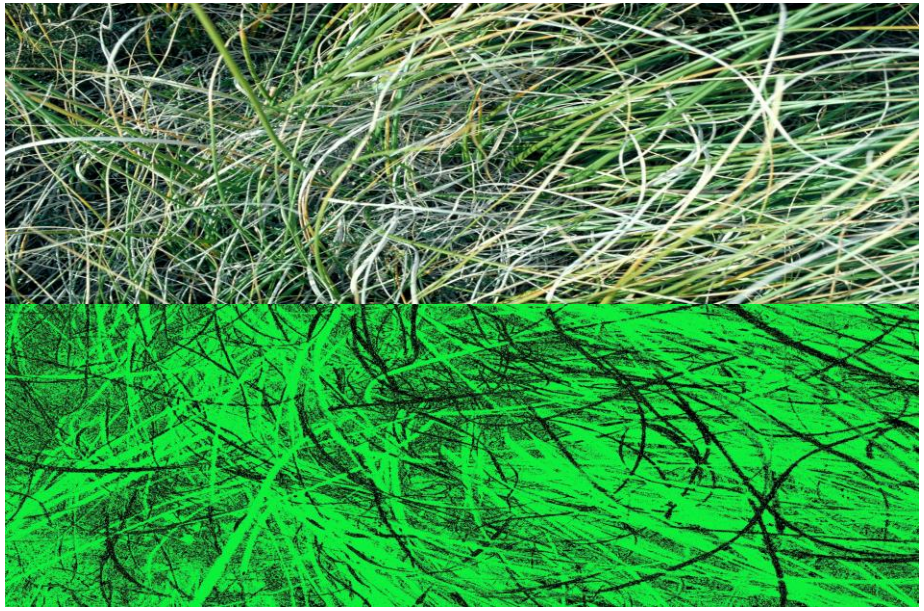
Geoprocessing

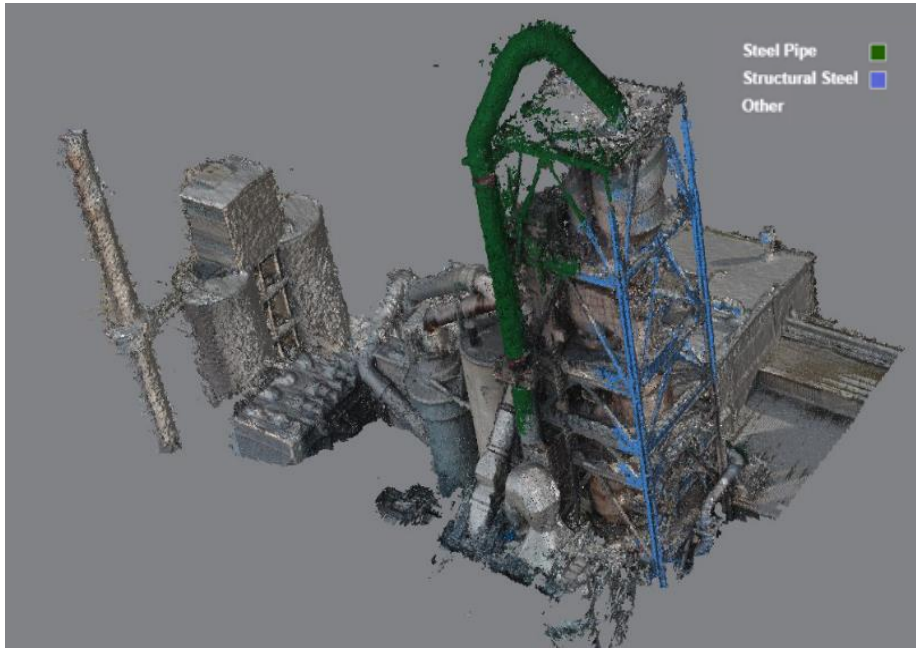




Water Detection use cases:

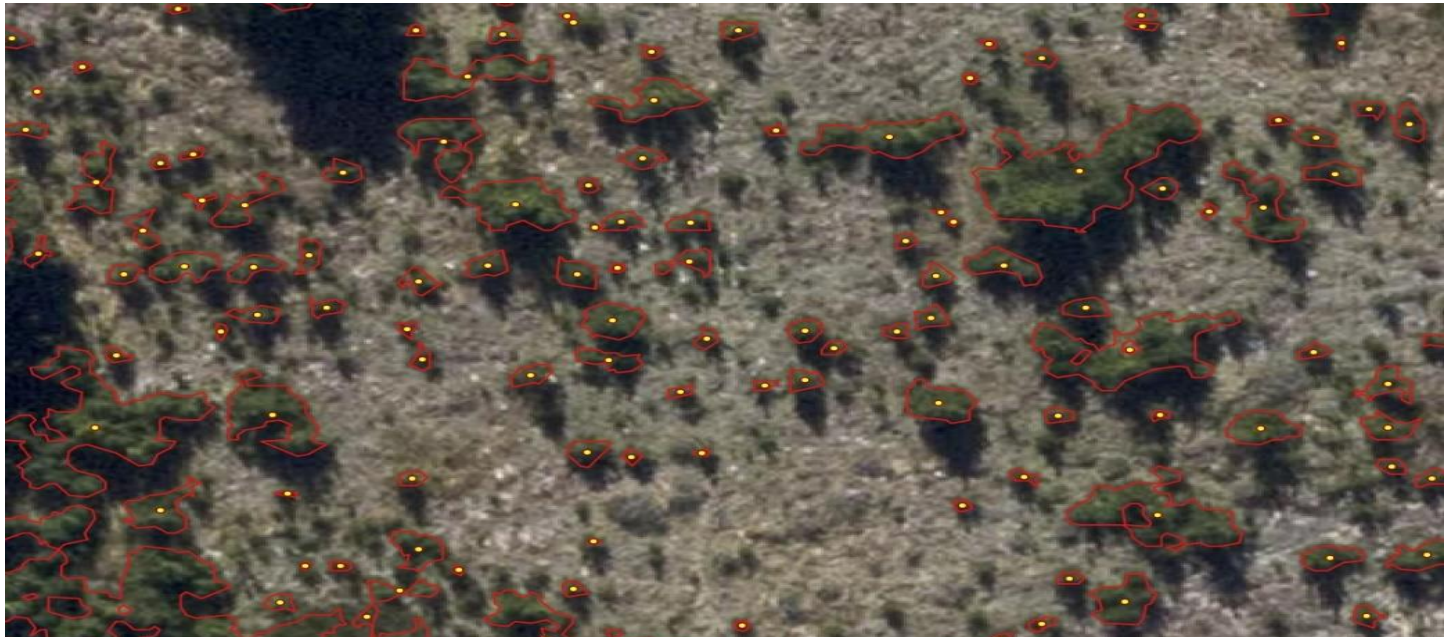
- Consenting/legislation/monitoring of water – i.e. identifying illegal water use
- Biosecurity and biodiversity – protecting species/migration etc
- River monitoring – flooding purposes
- Change detection
- Recreational purposes – identifying fishing/swimming locations etc
- Emergency response

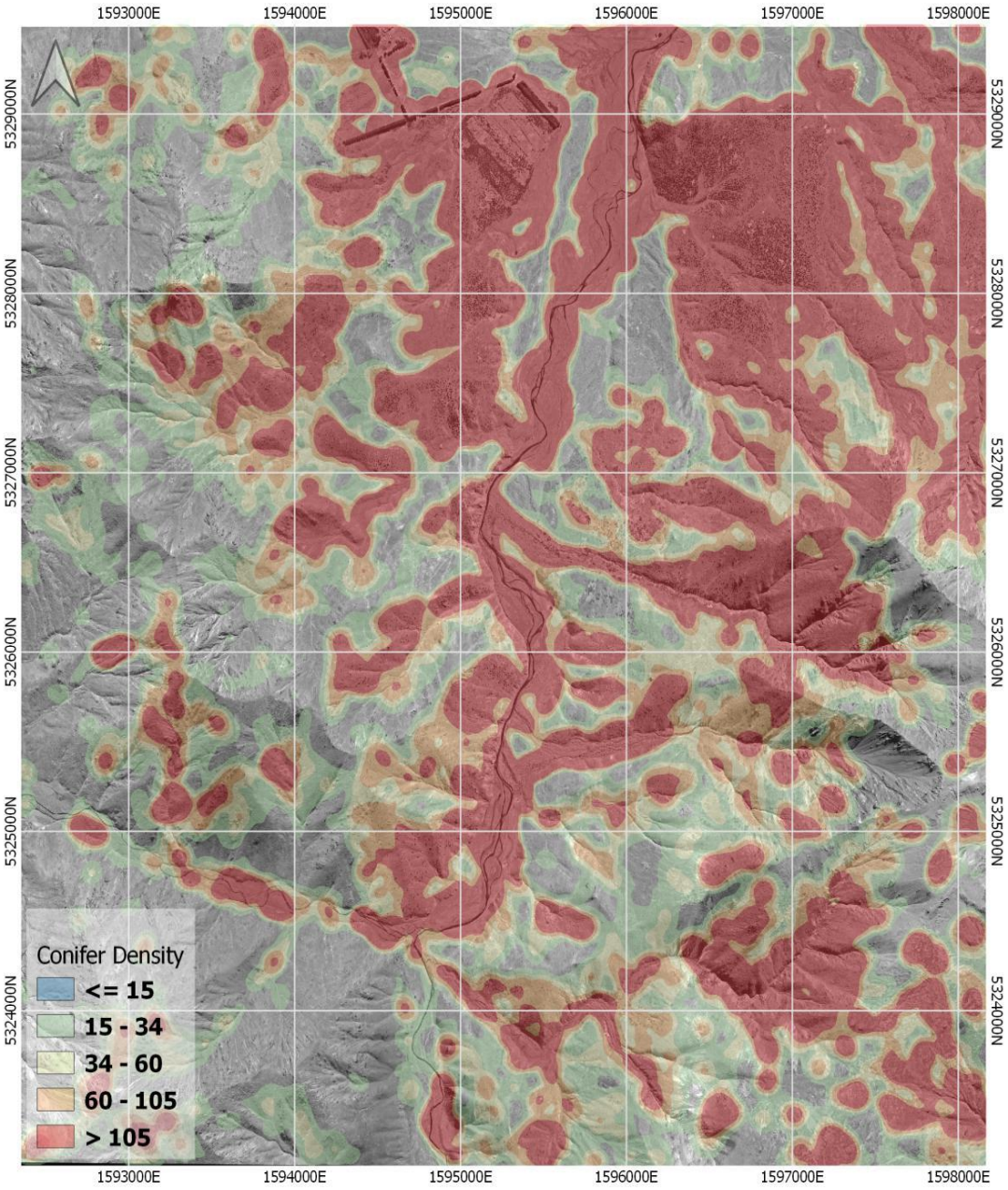



Steel Pipe
Structural Steel
Other

OTHER IDEAS

TRANSFORM LOCATION DATA INTO SOLUTIONS





DATA AGNOSTIC

- Data from any source – satellite, drone, aerial
- No vendor contracts

AS A SERVICE

- Near real-time results
- Instant feedback on results
- Ease of process

VALUE

- Extract value from existing data investments
- Flexible pricing models

GLOBAL

- Data from anywhere
- Algorithm trained to locale specifics
- Custom algorithms on request

Location Intelligence 2019

- Digital geography
- https://www.locationintelligence2019.nz/
- NZ Tech Week

Conferences

- FOSS4G attendance Boston, Dar-es-salam Tanzania, Bucharest, Melbourne
- Locate
- Geospatial Research Conference

Internships and Mentoring

- University of Cant. GIS and Geography, and data science
- Signal ICT Graduates
- NZ Space Challenge
- Smart Seeds

Functions and tours

- ALGIM
- Foreign and national dignitaries
- New Zealand Aerospace Meetings

Sponsorships and Memberships

- FOSS4G Sponsorship (OSGeo)
- TedX
- Children's Christmas party
- GIS in Conservation
- Chamber of commerce

Space and Spatial

- Operational tools
- https://explorer.orbica.world

Product Development

- Collaboration
- DevOps with deep geospatial domain knowledge

Our expectations as a Business Partner

- Introductions to networks
- Making more data available
- Breaking down barriers to NZ business working in Aussi

ROB PARSONS
Business Development Lead
rob@orbica.world

ORBICA
LOCATION.
DATA.
CONNECTIVITY.

A FUTURE OF EXPERIENCE, INNOVATION AND CREATIVITY

Know the world, change the world