SpotLight

Data mining solution enabling predictive maintenance

CCS monitoring is all about avoiding "surprises"!

Relaying on flow simulator outputs & digital twins, SpotLight is able to focus an active seismic monitoring when needed, **detecting changes** on strategic location that we call **SPOTS**

Why do you need Spots

Predictive maintenance/inspection, to monitor & validate flow model.

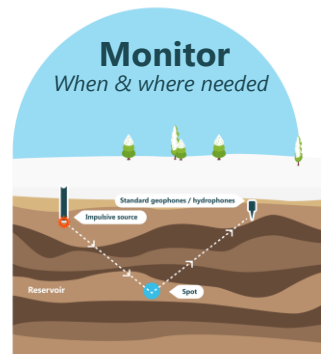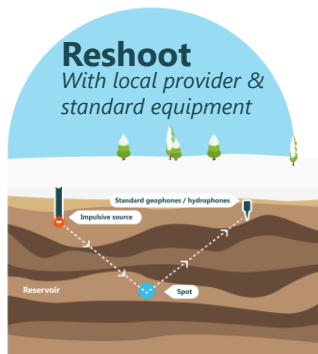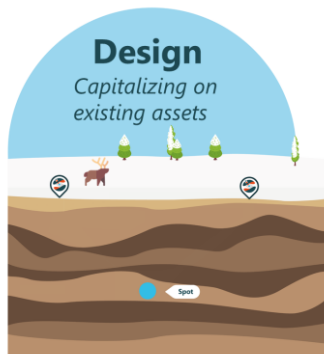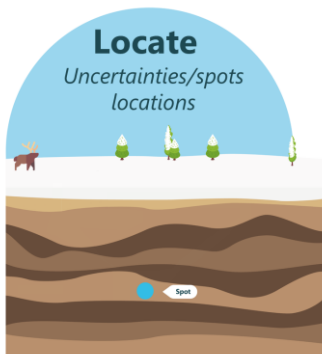**Risk management,** to monitor the identified risk areas when CO2 plume come close to them

Reactive maintenance, to agily & rapidly investigate unexpected areas of concerns. Strong **synergies with microseismic**.

Greensand successful monitoring

Our solution in **4 steps**

Locate
Uncertainties/spots locations

***Where and when** you want an update to calibrate your models*

Design
Capitalizing on existing assets

Capitalize** on million $ **existing assets to find source/receiver or antenna optimal location **on earth or at sea** to detect a change.*

Reshoot
With local provider & standard equipment

*Using **standard equipment**, and **local acquisition providers***

Monitor
When & where needed

*Signal processing to **detect changes***

Newly developed monitoring technology for CO2 storage in North Sea proves successful

CARBON CAPTURE USAGE & STORAGE

OFFSHORE ENERGY

May 5, 2023, by Amir Garanovic

The consortium partners behind the Project Greensand have developed a new monitoring technology that has successfully monitored that the stored CO2 in the North Sea subsoil is at the right location.

Cost effective, safer, and with minimal environmental footprint

SPE»ATCE
SINCE 1924

2021 award wining startup

On real data & life
Use cases & publications

Environmental footprint

SpotLight acquisition **didn't require** a fisherman liaison officer onboard and can **accommodate with** heavy Maritime traffic area.

	Full 4D (streamer baseline)		SpotLight (for 3 monitors)
Obstruction area	370 km²		12 km²
Duration	33 days	**−83%**	5 days
CO₂ emitted	4,500 tons	**−91%**	400 tons
Airgun size	3 600 Cui		600 Cui
Number of shots	60,000		3,780

Societal acceptability is paramount for CCS, and **SpotLight** is ticking all the boxes !

Airgun emission to water : **−98%** (better for mammals)

Since **2017**, **SpotLight** carried over **23 projects Onshore** & **Offshore**. We have studied the equivalent of **6 years of continuous active seismic recording** to mature our solution.

CCS/CCUS publication: Offshore energy, EAGE22
Heavy Oil publications: CSEG21, ATCE 2021
Gas storage publication: EAGE 2020
Other publications: FirstBreak 2021 EAGE 2021

SpotLighters

CCS
ENGIE * WHITECAP RESOURCES INC INEOS
GEOSTOCK ENTREPOSE * wintershall dea

Oil & Gas
OMV Lundin Energy TotalEnergies
ConocoPhillips FOXTROT International

Others
eDF BOUYGUES ANDRA

21 advisors
—
15 Scientific advisors | 6 Strategic advisors

Robert Soubaras

Robert Brunck

Abdullah Al-Shaksy

Jean-Luc Mari