



Farming Crop Pest Solutions

Double the Seeding Rate

Compared to traditional methods

AT A GLANCE DETAILS

Company: Auto Spray Systems

Location: United Kingdom

Industry: Agriculture/Agri-tech

Activity Type: Seeding/Spraying

BENEFITS

- No tread or soil compaction.
- Double the seeding speed, from 6 to 12 hectare per hour.
- 100% reduction in scope 1 CO2 emissions.



ISSUE

A British farm faced a significant challenge with their oil seed rape crop, which had been heavily decimated by flea beetles. The crop had not grown sufficiently due to adverse weather conditions, including dryness and heat, resulting in poor plant density and a risk of severe yield loss.

SOLUTION

To tackle the yield loss, Autospray Systems used a drone to re-plant the affected areas. Re-planting helped fill in the gaps left by the damaged crops, ensuring a more uniform plant density and a healthier overall crop. This approach increased the chances of a successful harvest despite the initial damage caused by the flea beetles.

Using drones for re-planting provided a significant advantage over traditional methods. Unlike tractors, drones do not tread on the healthy parts of the crop, preventing further damage. The drones could navigate the fields without causing soil compaction or creating ruts, which often happen with heavy machinery. This allowed the new seeds to be sown efficiently and without harming the existing healthy plants.

BENEFITS



Cost Savings

Negating the disastrous consequences of the flea beetle attack helped the farmer avoid a hefty cost associated with harvesting a partial field.



Improved Efficiency

Replanting using a drone completely eliminates tread damage, improves seeding spread consistency and improves work rates from around 4-8 hectares per hour (tractors) to 12 hectares per hour (drones).



CO2 Benefits

Fully electric drones have zero emissions (Scope 1) in comparison to traditional ICE engine tractors.

AUTOSPRAY
SYSTEMS

ARPAS-UK
The UK Drone Association