Acreage Solar - Aethon Hybrid Power Generator

The Problem

In recent years, there has been an increased demand in power generation. Small scale generators have been used to compensate for this increased demand. Fossil fuel powered generators are expensive to run, pollute the environment, go against recent government net zero carbon policies, and have shorter service lives than renewable counterparts. Current solar hybrid generators are expensive and do not make efficient use of the available solar hours.







Unfolds at site

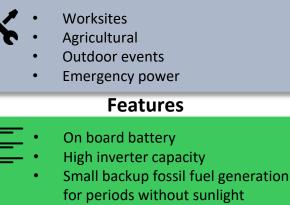
Market Implications

- 42% increase in generator sales by
 - Reducing CO2 emissions to net zero by 2050

Hybrid Improvements

- Cheaper operational cost
- Longer operational life
- Lower LCOE
- Less fossil fuel pollution

Use Cases





Our Solution

The Aethon HPG is a mobile dual-axis solar tracker mounted on a trailer. The tracking system increases power generation from the solar portion in off-grid situations by ~40% yielding an average daily solar harvest of ~20kWh. No matter the placement or orientation of the solar array, optimal output will be achieved using the tracker. It is light enough to be towed by most SUVs and trucks allowing for ease of deployment. The overall cost is significantly lower than tradition diesel generators as shown in the graphic on the left. The upfront cost is less than half of that of other mobile solar competitors.



Version 1 includes a regular trailer for testing. Integrated trailers will be included on future designs.



