

CASE STUDY

A ground power system to replace jet fuel at Auckland Airport

Challenge

Aircraft typically rely on auxiliary power units (APUs) while connected to the airport's bridge, resulting in increased fuel consumption and carbon emissions.

Solution

We developed an alternative ground power system, which involves aircraft plugging into electricity at the gate. This electricity is sourced directly from the wholesale market and supported by sophisticated metering.

Impact

In the first month, trialling ground power across Air New Zealand's fleet, Auckland Airport saved 475,000 kg of carbon and 188,000 litres of fuel – more than required for a Boeing 777-300 flight from Auckland to Los Angeles. The system is used by Auckland and Christchurch airports, as well as 19 airlines.