

300,000 hours and still going strong. Hydrovane compressors power Dundee Energy

Three Hydrovane compressors have clocked an impressive 310,000 working hours for Dundee Energy Recycling Ltd (Dundee Energy) since its waste-to-energy recycling plant first opened its doors in 1999.

Supported by Gardner Denver (Hydrovane) distributor, Airmac-Gdi, the same machines have provided dependable performance without fail; running the equivalent of 24 hours a day, five days a week for the past 16 years!

Benefits-at-a-glance

- Over 100,000 hours of use from each compressor, maximising equipment investment
- High reliability in a harsh environment, for maximum uptime
- Regular servicing from local distributor Airmac-Gdi to reduce downtime



Application Details

The three Hydrovane 955SQ compressors assist in the conversion of over 120,000 tons of municipal and commercial waste each year into electricity.

Every hour the plant produces over eight Megawatts of electricity, which is sold back to the National Grid.

The compressors were originally configured to operate in rotation, with one machine as a duty machine, one running on standby and the other to provide system redundancy.

However, Dundee Energy's operations have expanded considerably, meaning that all three compressors have been running

virtually non-stop to cope with the plant's high demand for compressed air.

The harsh environment of the waste incineration plant is also not ideal for the production of compressed air, placing additional strain on the units.

Customer
Dundee Energy
Recycling Ltd

Location
Dundee, Scotland

Application
Waste-to-energy
recycling plant

Products
Three Hydrovane
955SQ compressors

Customer Benefit
Over 15 years of reliable service,
without failure



“ The Hydrovane compressors are a key component in the operation of our waste-to-energy plant. All three systems work non-stop, but it is thanks to our regular service and planned maintenance programme that they have kept going strong. ”

George Rodger, Plant Support Technician, Dundee Energy

Importance of regular servicing

Key to the machines' performance is a programme of regular, routine service and maintenance provided by Airmac-Gdi and its factory trained service engineers.

Gary King, Director, Airmac-Gdi Limited, commented:

“We have been partners to this site since the installation of the compressors over 15 years ago and they have performed admirably during this time, only requiring minor component replacement during the course of routine operation. Also, the compressors are still running with the original airends, which have not needed rebearing since installation.

“As with all our compressors, we service them frequently. With Dundee Energy's machines having an especially heavy demand placed on them they are serviced every four months to maintain output.

“In the event that repairs are needed, our factory-trained engineers will only use genuine spare parts, guaranteeing reliability and ongoing performance.”

George Rodger, Plant Support Technician, Dundee Energy, added:

“Compressed air is used for a variety of applications, each one vital to the overall performance of the facility. This includes general service air, instrument air and the bag

house, which removes any particles out of the air for electricity generation and is the biggest consumer on site.

“As such, the Hydrovane compressors are a key component in the operation of our waste-to-energy plant. All three systems work non-stop, but it is thanks to our regular service and planned maintenance programme that they have kept going strong.

“We work closely with Airmac-Gdi to ensure our compressors are serviced thoroughly to reduce the likelihood of equipment failure. The team is on emergency call out within a four-hour window, making certain that we will never be without a compressor for long.”