

CASE STUDY

The Vodafone Data Center required continuity/emergency power supply line for its Local Technology Center (LTC), in which the Telco Over Cloud (TOC) equipment had to be installed. The Customer asked for a No-Break power solution capable to guarantee the full load power supply (200 kW) for minimum 20 seconds in highly residential area needing for a minimum environmental impact.

After the analysis of the project requirements, Ausonia proposed a containerized solution with a very low noise level of 55 dB(A)@7m, consisting into a 500 kVA Diesel Generator fully integrated to an UPS with Flywheel Storage Technology (no batteries/no hazardous materials/no toxic emissions), with complete dual redundant starting and refueling systems, in order to reach the best-in-class

reliability and to guarantee the maximum autonomy of the power back-up solution.

While rejecting the proposals sent by other vendors for solutions with Rotary UPS on horizontal axis, Vodafone selected the Ausonia solution, which has been designed according to TIER III criteria, as defined by the Uptime Institute.

The excellent efficiency, utmost reliability and significant TCO reduction guaranteed to Vodafone allowed Ausonia to sign a 12 years agreement with VPC (Vodafone Procurement Company), becoming the referred supplier for the category of No-Break Power systems to the entire Vodafone Group.

MAIN BENEFITS AND ADVANTAGES:

Higher Efficiency

- Modular parallel configuration
- True online double conversion
- Total protection against mains quality problems

Flywheel for energy storage

- Outstanding reliability
- Fast recharge
- High power density
- Wide operating temperature range
- Easy to manage and control

Reliability

- No load fault propagation
- Architectures adaptable to any requirements
- Higher MTBF
- Redundant starting system (electric and pneumatic)
- Integrated long autonomy fuel tank
- Redundant refueling system

Monitoring

- User friendly interface
- Supervision, monitoring and internet access

Go-Green

- No hazardous materials
- No toxic gas emissions

Operation & Maintenance

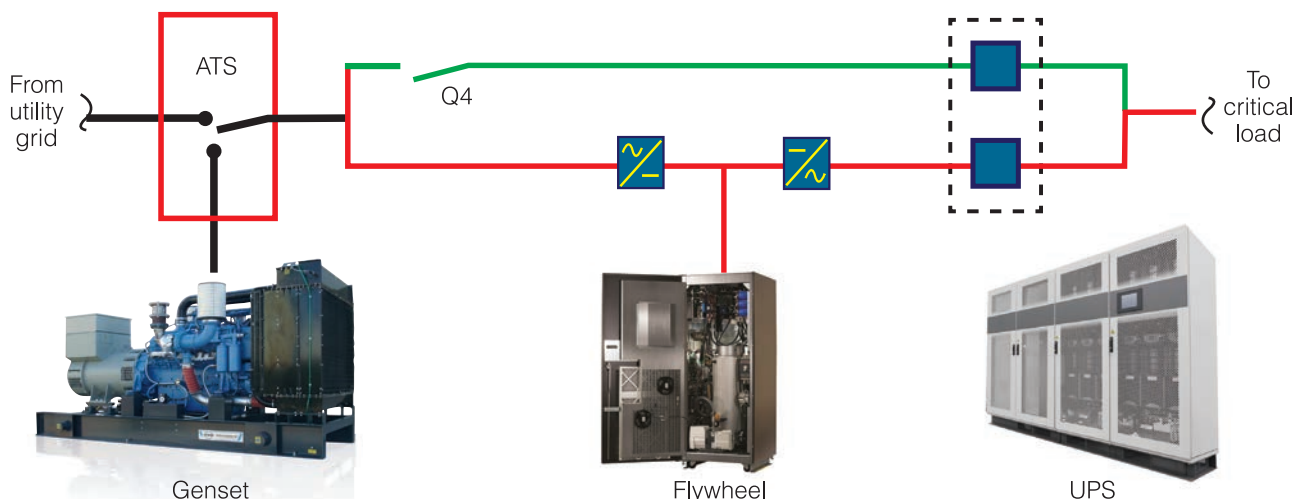
- Reduced and simplified maintenance
- Long lifetime up to 20 years without downtime

Footprint

- Easy installation on space restricted sites
- Plug & Play soundproofed shelter

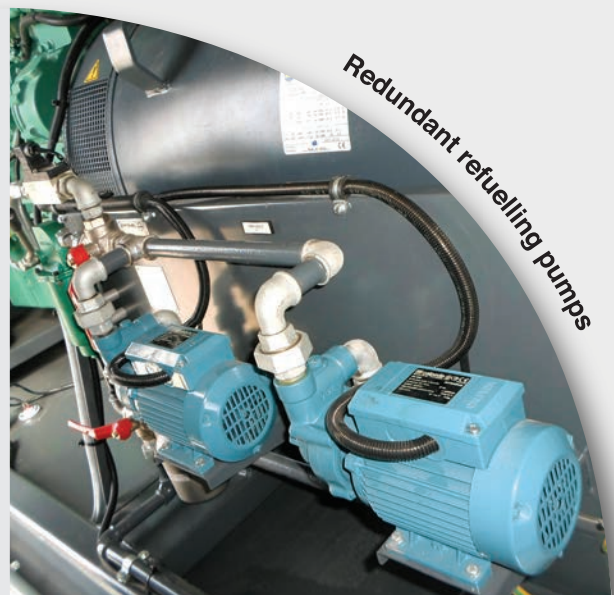
Noise level

- 55 dB(A) @ 7m with engine ON
- 52 dB(A) @ 7m with engine OFF





Soundproof elements



Redundant refueling pumps



Sub-station control panel



Emergency starting system