

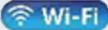
ARC® Furnace Optimization Service

Our team of experts provide you with an on-spot optimization service that helps you, on site or remotely, to gain insights and improve the performance of your arc furnace process (Regulation, Tap to Tap, Vibration, Graphite Electrode Consumption...).

State of the Art Device

The ARC® instrument is able to take electrical parameter measurements at a ultra high rate, (Up to 18'000 Hz) and it is able to be connected securely to PLC.

Safety first

In addition it can be remotely controlled through  so there is no need to enter the transformer room, and it can be connected safely while the furnace is arcing, i.e. in power on mode.

Easy setup, no expert needed on site

Device sent to arc furnace user and simply connected to furnace by maintenance technician.



Hardware

The main device contains 3 modules: 2 power transducers to measure the primary and secondary side of the furnace transformer as well as a control module that links the 2 transducers and manages the PLC communication and the additional signals are measured through the optional hardware.

Optional Hardware

For additional parameters a separate box can be provided. Each box allow for 20 additional measurements, Up to 3 boxes can be connected to the main device allowing for 60 parameters.

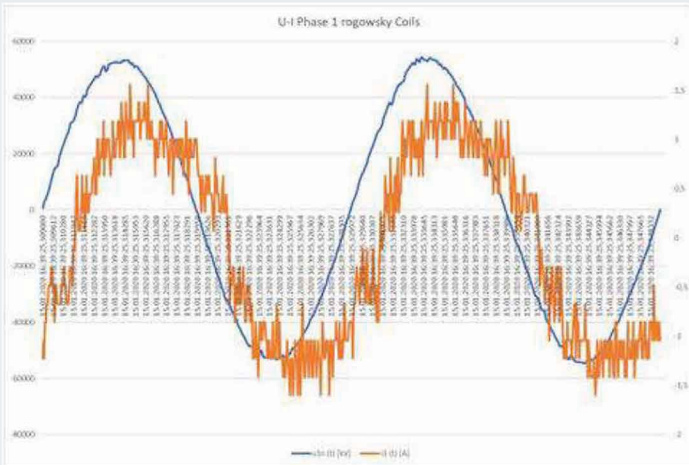
Software

Electrical measurements (Current, Voltage, Active Power, Reactive Power...) are controlled through web interface as well as through the control module.

Electrical parameters can be visualized and analysed live or stored for later analysis.

Examples of additional parameters measured with optional hardware:

- Process IDs & Parameters
- Carbon Injection On-Off
- Oxygen, Natural Gas Total Flow
- Cooling Water Inlet, Outlet Temp (Shell, Roof)
- Electrical Positions and Speed
- Regulator Output Signals
- Temperature Measurement



Current harmonics analysis using Ragowski Coils to measure the current



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