

TESTING & MAINTENANCE - BATTERY SYSTEMS



WHY BATTERY MAINTENANCE? – YOUR SUPPLY SECURITY MATTERS!

Stationary battery systems are the heart of your emergency power supply – whether in power plants, substations or hospitals. Their full functionality and safety are essential.

Reliability

- ✚ Only regular maintenance ensures that your batteries deliver full performance when needed.

Long Service Life

- ✚ Professional care significantly extends the lifetime of your systems and protects your investment.

Legal Compliance

- ✚ Compliance with legal standards and documentation requirements is essential.

ADVANTAGES OF REGULAR INSPECTION AND MAINTENANCE

At Ohmega Energy, we offer comprehensive service packages for battery maintenance – tailored to your requirements and always according to the highest standards.

Reliable Performance Testing

- ✚ Clear results on whether the battery maintains the required load duration.

Early Detection of Defects

- ✚ Defective cells are specifically identified before a failure occurs.

Battery Condition Assessment

- ✚ Technical values provide insight into the actual condition – for greater planning reliability.

Well-Founded Decision Making

- ✚ Whether cell replacement or complete renewal – with us, you make the right choice.

Strong Proof and Documentation

- ✚ Measurement protocols provide clear evidence to secure warranty and guarantee claims.

OUR MAINTENANCE SCOPE

Our maintenance services ensure maximum operational safety of your battery systems. Through standards-compliant inspections, precise measurement procedures and comprehensive visual checks, we effectively prevent failures – ensuring maximum performance and long system life.



Megger TORKEl 840/860

MAINTENANCE ACCORDING TO MANUFACTURER REQUIREMENTS

- ✦ *Checking Electrolyte Condition* – Inspection of fill level and quality to ensure reliable operation.
- ✦ *Cleaning the Battery System* – Removal of dust, dirt and corrosion to prevent leakage currents.
- ✦ *Measurement of Battery Voltage/Cell Voltage* – Precise voltage measurement for early identification of weak points.
- ✦ *Measurement of Electrolyte Temperature* – Temperature control to prevent overheating and premature wear.
- ✦ *Measurement of Electrolyte Density* – Key indicator for assessing charge status and cell health.
- ✦ *Checking Screw Connections* – Inspection for tight connections and possible corrosion to ensure safe conductivity.
- ✦ *Visual Inspection of Ventilation* – Ensuring proper air circulation to prevent gas accumulation.

INSPECTION SCOPE ACCORDING TO REGULATIONS

- ✦ *Electrical Equipment in Ex Areas* – Inspection of explosion-proof system components to ensure compliance and correct function.
- ✦ *Mechanical Ventilation or Extraction Units* – Verification of ventilation systems for functionality and effectiveness to ensure safe gas removal.

**Precise measurement
for maximum reliability.**

RECOMMENDED MAINTENANCE SCOPE

- ✦ *Capacity Measurement via Discharge Resistor* – Load test for realistic assessment of actual battery capacity.
- ✦ *Verification of Labeling According to EN 62485-2* – Checking for complete and standards-compliant marking of all safety-relevant elements.
- ✦ *Checking Superimposed AC Currents* – Detection of unwanted AC components that may damage the battery.
- ✦ *Control of Float and Discharge Voltage* – Ensuring optimal charging and discharging parameters for long life.
- ✦ *Measurement of Battery Floor Conductivity* – Inspection for leakage currents and potential insulation issues at the battery rack.
- ✦ *Measurement of Internal Resistance* – Early indicator of cell weakness and decreasing performance.
- ✦ *Thermographic Measurement of Transition Resistances* – Thermal imaging to detect contact problems or overheating at connection points.