

Compre Drive

Force
•
Temperature
•
Precision

Solid state electrochemistry under active force- and temperature control
- New horizons in solid state research -



➤ **Force good results!**

The CompreDrive applies variable forces between 0 and 75 kN to the sample.

➤ **Keep the pressure up!**

The applied force is kept constant with unprecedented accuracy for as long as required by the active regulation system.

➤ **Connect with your sample!**

Specialized sealed measuring cells allow precise electrochemical measurements of sensitive samples under force control.

➤ **The heat of the moment!**

Fully automated, active temperature control provides even more possibilities for material characterization!

rhd  instruments
flexible cell solutions

Supported by:



on the basis of a decision
by the German Bundestag



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➤ Active force control

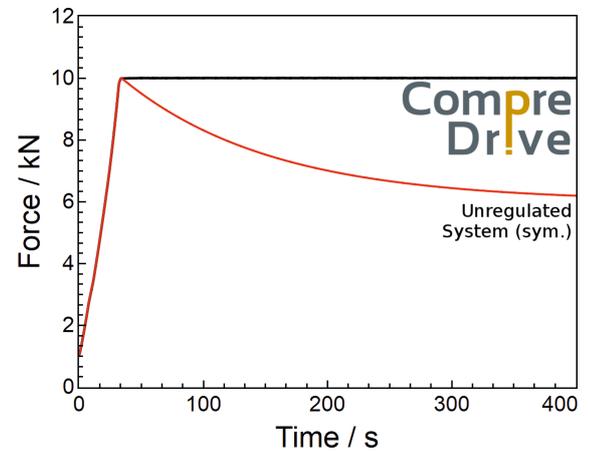
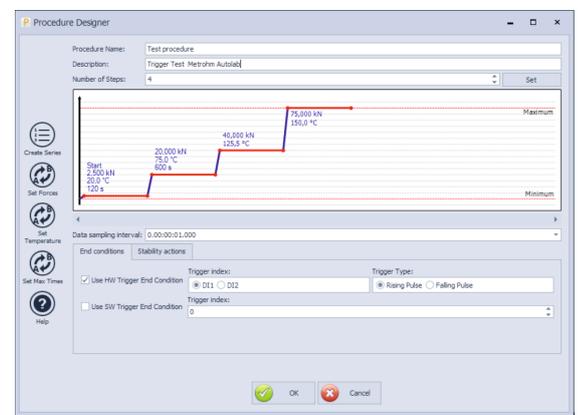
The CompreDrive's active control loop keeps the applied force constant for as long as required, whereas ordinary presses drift away from the setpoint over time.

➤ High-pressure electrochemistry

Specially designed electrochemical measuring cells allow for electrochemical characterization of materials under pressures of up to 1,7 GPa in a sandwich-type configuration.

➤ Sensitive samples

Airtight measuring cells protect even the most sensitive samples from the atmosphere.



➤ Broad temperature range

Actively control your sample's temperature between -40°C and $+250^{\circ}\text{C}$.

➤ Benefit from automation

Use external triggers to establish communication between the CompreDrive and your potentiostat/galvanostat for fully automated measurements.

➤ Build your own procedures

The procedure builder allows you to build your own specific force/temperature procedures.

➤ Specifications

Dimensions	167 x 81 x 58 cm
Total Weight	180 kg
Drive type	Servo-driven lifting spindle
Power supply	1-phase AC 110-230V, 50/60 Hz
Materials in sample contact	Hard metal (WC), AlOx-ceramic
Maximum force	0.03 - 75 kN ± 0.1 kN
Default temperature range	-40°C \leftrightarrow $+250^{\circ}\text{C}$ $\pm 0.1^{\circ}\text{C}$
Maximum total cell height	135 mm
Default sample height	≤ 10 mm
Default sample diameter	6/12 mm

For questions, quotes and orders, please contact us:

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