

HIGH VOLTAGE HYDROGEN RECIRCULATION BLOWER

Rheinmetall's side channel blower is engineered for active anode gas recirculation supporting stack humidity & nitrogen balance. Complete with integrated electronics, HRB1800 is designed to meet rigorous automotive standards. Active cooling of electronics and motor guarantees high power density and long lifetime.

This high performance blower works on 850V electrical architecture and is focused on exceptional safety and electromagnetic compatibility (EMC).

BENEFITS

- Real life experience with core technology validated over more than 10 years
- Materials compatible with PEM FC having no negative effect on stack degradation
- Dynamic speed control for an improved stack controllability & calibration for a wide range of operating profiles & applications
- Fully sealed against ambient (no dynamic seals) with gas tightness over lifetime
- High efficiency combined with best-in-class NVH characteristics

TECHNICAL DATA

Operating voltage	850V
Nominal power	1,800 W
Control unit	12/24V
Communication	CAN
Flow rate	$33 \text{m}^3/\text{h}$
Pressure rise	230 mbar

RHEINMETALL POWER SYSTEMS DIVISION

Within Rheinmetall the Power Systems Division is a system provider for high-quality and innovative (mobility) solutions, control technologies and digital applications for the automotive and energy industries, among others.

With its Business Units and Business Areas, the Division stands for outstanding expertise in the following areas: air management, thermal management, e-mobility and digitalization, hydrogen technology, metallic plain bearings, composite materials and lightweight construction. The Power Systems Division also represents Rheinmetall's global aftermarket activities through the Trade Business Unit.

CONTACT

Power Systems Division

Pierburg GmbH · Alfred-Pierburg-Str. 1 · 41460 Neuss power-systems@rheinmetall.com

