

» 公司简介

COMPANY PROFILE

福瑞电气成立于2016年，专注基于碳化硅（SiC）器件的大功率电力电子技术研发及应用，聚焦储能系统配套、制氢电源系统两大核心领域，深耕储能电力电子部件创新与产业化。

高管团队拥有二十余年电力电子行业研发、制造经验，搭建了成熟完善的研发、采购、生产、质量控制及售后服务体系，是多家世界500强企业一级供应商，在电力电子领域树立了专业标杆。

作为2018年科技部国家重点研发计划新能源汽车专项子课题承担单位，公司研发的储能配套大功率电力电子变换器模块、基于碳化硅器件的储能变换器及制氢电源系统，产品性能与可靠性处于国际领先水平，已与国内外超过200家整车、新能源及储能企业展开深度合作。

Founded in 2016, Foripower specializes in SiC-based high-power power electronics, focusing on energy storage and hydrogen power supply systems. With 20+ years of industry experience, we provide high-efficiency, high-reliability solutions and are a trusted Tier-1 supplier to Fortune Global 500 companies. Our advanced SiC power conversion technologies deliver industry-leading performance, serving 200+ global customers across energy storage, renewable energy, and automotive sectors.

20 +

Countries Served
国家

300 +

EMPLOYEES
员工

3

Factories Worldwide
全球生产基地

12,000 +

Pcs for Hydrogen Vehicles
出货量

28,000 m² +

Factory
工厂面积

1GW +

Electrolyzer Power Supply Shipped
制氢电源出货

Malaysia
马来西亚

Hunan
湖南

Shenzhen
深圳



合作客户

COOPERATIVE CLIENTS



中国华电集团公司
CHINA HUADIAN CORPORATION



一汽解放



云翔氢能



TOYOTA



亿华通
SinoHytec



Tel :+86-755-2738 5188 Fax:+86-755-2738 9188
E-mail:dugy@foripower.com Web: www.foripower.com
Shenzhen Foripower Electric Co., Ltd.

FORIPOW

福瑞电气

长时储能系统电力电子产品解决方案

LONG-TERM ENERGY STORAGE POWER ELECTRONICS SYSTEMS SOLUTIONS

深耕宽禁带功率半导体工程应用,引领数字能源未来

Powering the Future of Digital Energy with Wide-Bandgap Semiconductor Innovation

PCS适用于储能系统及氢能固定式发电

PCS FOR ENERGY STORAGE SYSTEM AND H2 STATIONARY POWER GENERATION

福瑞电气 PCS 专为储能系统高性能双向电能变换而设计，兼容锂电池及全钒液流电池（VRB）。同时可提供带电气隔离的 DC-AC 逆变器，面向氢能固定式发电场景应用。产品支持隔离型与非隔离型灵活配置，采用先进碳化硅（SiC）功率器件，实现高效率与高功率密度运行。并网型产品系列采用模块化设计，单机柜功率覆盖 80kW ~ 1.6MW，并支持 N+X 冗余架构，系统具备高可用性，故障模块可快速维护与更换。

Foripower PCS is designed for high-performance bidirectional power conversion in energy storage systems, supporting lithium or VRB batteries. We can also provide galvanic isolated DC-AC inverter to H2 stationary power generation applications. It offers flexible configuration with galvanic isolated or non-isolated versions, utilizing advanced SiC power components to achieve high efficiency and power density.The product series for grid-tie and modular design ranging from 80kW to 1.6MW per cabinet and support for N+X redundancy, the system ensures high availability and enables quick maintenance.

» 产品描述

PRODUCT DESCRIPTION

StrPower® 系列产品是一款双向PCS产品，应用于液流/锂电池储能系统。包括双向DC-DC、PCS、或DC-DC + PCS一体化解决方案。产品采用 SiC 模块，极大地提升了系统效率、提高了功率密度，从而减小了产品体积。

The StrPower® series is a bidirectional PCS solution designed for both flow battery and lithium-ion energy storage systems. It offers flexible configurations, including bidirectional DC-DC converters, PCS, and integrated DC-DC + PCS solutions to meet diverse application requirements.Built on advanced silicon carbide (SiC) modules, the system significantly improves efficiency and power density, enabling a more compact design with optimized system performance.

» 产品特点

PRODUCT FEATURES

- 具有较宽直流电压范围（两级变换 0~800VDC）
Wide DC voltage range (0~800VDC via two-stage conversion)
- 采用 SiC 模块技术，单级变换最大效率高达 99%
Advanced SiC module technology with peak single-stage conversion efficiency up to 99%
- 电池直流侧采用组串控制，更优的电池组均衡性能
String-level control on the DC side for superior battery pack balancing performance
- 模块化设计，优秀的系统可靠性和可用性
Modular design ensuring exceptional system reliability and availability
- 高频化控制，动态响应快，适应储能的应用
Wide DC voltage range (0~700VDC via two-stage conversion).
- 保护功能完善，确保系统安全稳定运行
Comprehensive protection functions to ensure safe and stable system operation
- 可多台并联运行，满足超大功率应用
Supports multi-unit parallel operation to meet ultra-high power requirements

FORIPOWER

碳化硅电解水制氢电源

SiC-BASED ELECTROLYZER POWER SUPPLY

» 产品描述

PRODUCT DESCRIPTION

LyzPower®-JP 系列产品是一款隔离型直流电源产品，LyzPower®-xJF为非隔离型，应用于电解槽制氢电源。其中，-xJP,-xZ 系列产品为交流母线输入电解槽电源；LyzPower®-xZ 系列产品为直流输入，可用于光伏离网制氢电解槽电源。产品采用 SiC 模块，极大地提升了系统效率、提高了功率密度，从而减小了产品体积。

The LyzPower®-JP series electrolyzer power supply, while the LyzPower®-xJF series is non-isolated. Both are designed for electrolyzer hydrogen production power supply applications. Among them, -xJP,-xZ series is AC bus input electrolyzer power supply, LyzPower®-xZ series is DC input and can be used as electrolyzer power supply for photovoltaic off-grid hydrogen production.The SiC module is adopted, which greatly improves the efficiency and power density, reducing the product volume.



» 产品介绍

PRODUCT INTRODUCTION

产型号及技术参数 / Technical Specifications

产品型号	LyzPower®-50J	LyzPower®-xJ	LyzPower®-xZ
直流输出参数			
电压范围	0~900VDC		
最大电流	800A	2200~16000A (可并联扩大电流)	
额定功率/峰值功率	250kW/275kW	1~5MW/1.4~5.7MW	
电流精度	<0.1%FS+5dgt	<1%FS	
电压精度	<0.1%FS+5dgt	<1%FS	
交流（ 直流 ）输入参数			
电压范围	(380VAC或480VAC)±10%	(380VAC/480VAC/690VAC/10kVAC/35kW) ±10%	800~1600VDC
相数	三相三线3P+PE		/
频率范围	(50Hz或60Hz) ±5Hz		/
功率因素	≥0.99@额定功率	≥0.98@额定功率	/
电流谐波		<3%@额定功率	/
隔离方式		前置中压变压器	变压器隔离
通讯方式	CAN/RS485/Modbus TCP/IP		
	其他参数		
尺寸	W1200*D900*H1900mm	W2800*D1200*H1800mm	W2400*D1000*H2000mm
重量	1300kg	1600kg (1MW)/4000kg (5MW)	1600kg (1MW)/4000kg (5MW)

Product Model	LyzPower®-50J	LyzPower®-xJ	LyzPower®-xZ
DC output parameters			
Voltage range	0~900VDC		
Maximum current	800A	2200~16000A (can be connected in parallel to increase current)	
Rated power / Peak power	250kW/275kW	1~5MW / 1.4~5.7MW	
Current accuracy	<0.1%FS+5dgt	<1%FS	
Voltage accuracy	<0.1%FS+5dgt	<1%FS	
AC (DC) input parameters			
Voltage range	(380VAC or 480VAC) ± 10%	(380VAC/480VAC/690VAC/10kVAC/35kW) ± 10%	800~1600VDC
Number of phases	Three-phase three-wire 3P+PE		/
Frequency range	(50Hz or 60Hz) ± 5Hz		/
Power factor	≥0.99@rated power	≥0.98@rated power	/
Current harmonics	<3%@ rated power		/
Isolation methods		Front-end medium voltage transformer	Transformer isolation
Communication methods	CAN/RS485/Modbus TCP/IP		
Dimensions	W1200*D900*H1900mm	W2800*D1200*H1800mm	W2400*D1000*H2000mm
Weight	1300kg	1600kg (1MW)/4000kg (5MW)	1600kg (1MW)/4000kg (5MW)

» 产品优势

PRODUCTS- ADVANTAGES

01 碳化硅驱动·高效节能 SiC-Driven Efficiency (High Savings)	02 一拖二智能驱动 1-to-2 Smart Drive
效率每提升1%，每1000标准立方米/小时制氢规模年节约电费 12万元 开关频率提升10倍，大幅减小滤波装置体积与重量 1% Efficiency Improvement = RMB 120,000 Saved /Year (per 1,000 Nm^3/h) 10x Switching Frequency: Drastically reduces filter size & weight	单台电源可双路输出，同时驱动两台电解槽 优化占地面积，降低初始投资与安装成本 Dual-channel Electrolyzer Support: One power supply drives two units Lower CAPEX: Optimized footprint and lower installation costs
可靠热备散热方案 Reliable Hot-Backup Cooling	04 友好并网性能 Grid-Friendly Performance
支持液冷/风冷（可选液空换热） 延长设备使用寿命，减少停机时间与维护风险 Liquid cooling or air cooling (optional liquid-air heating exchanger) Extended Lifespan: Minimizes downtime and maintenance risks	低谐波：电流总谐波畸变率 THDi < 3% 高功率因数：PF > 0.98 Low Harmonics: THDi < 3%. High Power Factor: PF > 0.98

