

PolarS400V



Introducing our versatile 40kW chiller - engineered to deliver balanced performance, efficiency, and durability. Perfectly suited for medium-scale Battery Energy Storage Systems (BESS), this unit bridges the gap between compact and high-capacity cooling, ensuring consistent thermal management and optimized lifecycle costs.

Key Features

Balanced 40kW cooling capacity designed for medium-scale BESS and demanding mission-critical applications

Wide operating range and precise temperature control for reliable performance in variable load conditions

Fully integrated plug-and-play design with simplified installation and low-maintenance operation

Sustainable operation with optimized energy efficiency, low noise levels, and reduced total cost of ownership

Robust and long-life construction with advanced safety protections for dependable operation



Ideal for commercial- and industrial-scale BESS projects, renewable energy facilities, and other mission-critical systems where dependable, energy-smart cooling is essential for safety, uptime, and performance longevity.

| CHILLER MODEL | | PolarS400V | |
|----------------------------|----------------------|----------------------------|--|
| Technical Specifications | | | |
| Cooling capacity | 40kW | Coolant | 50%50% Glycol / Water |
| Cooling capacity range | 10~40kW | Coolant flow rate | 250L/min @ 90kPa OR 360-400L/min @ 140kPa |
| Heating capacity | 16kW | Coolant outlet temp. range | 15~35°C |
| Ambient temperature range | -30°C ~ + 60°C | Communication protocol | CAN2.0 / RS485 |
| Nominal COP (Cooling) | ≥2,0 (@45°C Ambient) | Control target | Operating Mode & Target Coolant Temperature |
| Refrigerant | R513a | Noise | <80db(A) |
| GWP | ~629 | IP rating | IP67 |
| No of refrigerant circuits | Two | Dimension | L980xW630xH2400mm |
| Type of compressor | Rotor | Total weight | <300kg |
| High voltage | 380-480VAC±15% | Inlet/Outlet | DN50 |
| Low voltage | 24VDC | Certifications | CE/UL |
| Corrosion protection | C5-M | Appearance color | RAL7035 (customizable) |



Part of the Yinlun Group