Head Interface Board for Ricoh MH5420/5440/5220 Printheads

GIS Inkjet Operating System

The HIB-RH-1280 is a Head Interface Board designed to provide communications between the Ricoh MH5420/5440/5220 (Gen 5/S) printheads and the GIS Print Manager Boards (PMB-C8-3/PMB-C8/PMB-C2).

The HIB-RH-280 is a compact system with integrated air cooling.

Printhead Control

ThThe HIB-RH-1280 provides access to all the standard Ricoh MH5420/5440/5220 printhead settings through software including:

- High quality trapezoidal waveforms
- Binary, greyscale, and multi-pulse waveforms
- Printhead temperature monitoring and control
- EEPROM read back from printhead

Additional features include:-
- 4 x fully configurable independent waveforms
- Integrated air cooling system
- In field upgradeable firmware
- System diagnostics
- Supports all print modes and resolutions

Connectivity

The HIB-RH-1280 is a standard interface component of the GIS Inkjet Operating System. It is designed to drive the Ricoh MH5420/5440/5220 series printhead using a GIS Print Manager Board and GIS Software.

Power Control

The HIB-RH-1280 provides the Ricoh MH5420/5440/5220 with appropriate head and heater voltages from a single 24V power supply.

Connectors

The HIB-RH-1280 requires just two connectors to drive the printhead:

Data Connector
A standard RJ45 for connection to a GIS Print Manager Board using CAT 6a shielded cabling (up to 10m).

Power Connector
A standard 24V DC connector to supply the board and printhead with power. There is no requirement for separate printhead power.

![GIS Global Inkjet Systems logo]

Software, Machine Control and Sub-systems for Industrial Inkjet

GIS provides a complementary suite of products that companies can easily customise and rebrand - accelerating technology design and cutting development time:

Software Support

GIS offers a range of software with its Atlas® platform to drive the HIB-RH-1280.
The Atlas suite of products includes a customisable User Interface (UI) as well as a powerful server technology for managing the entire printing and sub-system process, Atlas Machine Control Services (MCS).

Built using Microsoft industry standard software and approaches, Atlas can be configured for different types of users and customised with different languages.

Specifications

General
Supported printheads : Ricoh MH5420/5440/5220
Dimensions H 120mm W 100mm D 29.2mm Weight: 200g
Specifically designed for use with GIS software products
High Speed (400Mb/s) data channel
Power Supply
24V DC
Printhead Control
Binary, grayscale and multipulse waveforms
Printhead temperature monitoring and control
4 x fully configurable independent waveforms
Cable Length
From PMB: 10m
From HIB to head: 300mm

Ink System Components

GIS also provides a comprehensive range of ink delivery system components suitable for the controlled flow requirements of the HIB-RH-1280 printhead product line.