GE RX3i PacSystem Series Service Manual

IC695CHS016

1. Description

The IC695CHS016 is a PACSystem RX3i Universal backplane that is formerly manufactured by GE Intelligent Platforms (GE IP) now under Emerson Automation. This backplane has Twelve (12) slots and supports installation of PCI-based RX3i and Series 90-30 I/O and option modules. It has a dual-bus backplane and supports horizontal mounting orientation only. This backplane has isolated 24VDC input and current rating of 600 mA at 3.3 VDC, 240 mA at 5 VDC.

2. Specifications

Specification	Value
Brand	**GE Fanuc**
Series	**PACSystem RX3i**
Manufacturer	**Emerson Automation**
Part	**Number IC695CHS016**
Product	**Description Universal backplane**
Compatibility	**RX3i PACSystem, Series 90-30 I/O, option modules**
Supported	**modules RX3i and Series 90-30 I/O and option modules**
Mounting	**Rack**
No	**of slots Sixteen (16)**
Type	**Universal backplane**
Current	**rating 600 mA at 3.3 VDC, 240 mA at 5 VDC.**
Number	**of Slots 16**
Bus	**connectors PCI Bus / Serial Bus**
Input	**+24 Volts**
Dimensions	**23.7 in W x 5.87 in D x 5.57 in H**
Internal	**Power Used 240 milliamps at 5 Volts DC, 600 milliamps at 3.3 Volts DC**
Input	**Terminals TB1; Terminal 7: Isolated 24VDC Terminal 8: Isolated ground**
Required	**Protection for Installation NEMA/UL Type 1 (IP20)**
Recommended	**wire size 14 to 22 AWG**
Minimum	**Required Clearance for Installation 102 millimeters (4 inches) on all sides**
Mounting	**orientation: Horizontal**
Backplane	**Orientation Horizontal**
Enclosure	**IP54 or greater**
Dimensions	**(HxWxD) 141.4 x 602 x 147.3 millimeters (5.5 x 23.7 x 5.8 inches)**
Groundin	

3. Product Information

The IC695CHS016 is a PACSystem RX3i Universal backplane that is formerly manufactured by GE Intelligent Platforms (GE IP) now under Emerson Automation. This backplane has Twelve (12) slots and supports installation of PCI-based RX3i and Series 90-30 I/O and option modules. It has a dual-bus backplane and supports horizontal mounting orientation only. This backplane has isolated 24VDC input and current rating of 600 mA at 3.3 VDC, 240 mA at 5 VDC.

Technical specifications for IC695CHS016

Brand GE Fanuc

Series PACSystem RX3i

Manufacturer Emerson Automation

Part Number IC695CHS016

Product Description Universal backplane

Compatibility RX3i PACSystem, Series 90-30 I/O, option modules

Supported modules RX3i and Series 90-30 I/O and option modules

Mounting Rack

No of slots Sixteen (16)

Type Universal backplane

Current rating 600 mA at 3.3 VDC, 240 mA at 5 VDC.

Number of Slots 16

Bus connectors PCI Bus / Serial Bus

Input +24 Volts

Dimensions 23.7 in W x 5.87 in D x 5.57 in H

Internal Power Used 240 milliamps at 5 Volts DC, 600 milliamps at 3.3 Volts DC

Input Terminals TB1; Terminal 7: Isolated 24VDC Terminal 8: Isolated ground

Required Protection for Installation NEMA/UL Type 1 (IP20)

Recommended wire size 14 to 22 AWG

Minimum Required Clearance for Installation 102 millimeters (4 inches) on all sides

Mounting orientation: Horizontal

Backplane Orientation Horizontal

Enclosure IP54 or greater

Dimensions (HxWxD) 141.4 x 602 x 147.3 millimeters (5.5 x 23.7 x 5.8 inches)

Grounding bar Integrated

Installation clearance 102 mm (4.0 in) on all sides

Module Hot-swap Supported

Lifecycle status Active

The IC695CHS016 is a Sixteen (16) slot universal backplane that is part of the PACsystem RX3i Programmable Automation Controller (PAC) series. This backplane from Emerson Automation is used to host Universal controller and I/O base modules and comes with integral support for Peripheral Component Interconnect (PCI) and High-speed serial bus, enabling support for RX3i modules as well as the legacy Series 90-30 PLC series. The IC695CHS016 measures 23.7 (w) x 5.57 (h) x 5.80 (d) or 601.98 (w) x 141.5 (h) x 147.32 (d)) and consumes 600 mA @ 3.3 VDC and 240 mA @ 5 VDC that is supplied by the RX3i power supply. This baseplate also supports hot-swapping of modules, which contributes to the availability of the system and ease of maintenance. The IC695CHS016 backplane may also be termed as chassis, rack or baseplate by some personnel. Whatever term is used, the IC695CHS016 provides module connectivity to the backplane, power distribution and hosts internal communication of each module. Additionally, this baseplate has the necessary interface for interconnection of local expansion base, allowing additional module to be installed and connect to the same bus that is hosted by the IC695CHS016. The IC695CHS016 support horizontal mounting only. It comes with a terminal strip for wiring of the isolated 24 VDC input and the isolated ground as well. It is recommended to be fastened to the subpanel of an enclosure rated NEMA/UL Type 1 enclosure or an IP20 rating (IEC60529) at least. Minimum installation clearance must be followed to allow natural air cooling. Required minimum mounting clearance is 102 mm or 4 inches on all sides of the backplane.

The IC695CHS016 backplane is a universal backplane that has 16 slots and a terminal strip for the isolated inputs. The backplane is manufactured by GE Fanuc and it is part of the RX3i PACSystem series of industrial PLC components The backplane includes a connector for serial expansion and a grounding point along with a grounding bar. The backplane is compatible with serial I/O components with from the IC694 line, option modules, and IC695 components which are based on PCI. The IC695CHS016 backplane requires a minimum clearance of 102 millimeters (4 inches) for best performance and it is made for horizontal mounting. The IC695CHS016 universal backplane has an input voltage of +24 Volts and an internal power of 240 milliamps at 5 Volts DC while its internal power is 600 milliamps at 3.3 Volts DC. When installed within an enclosure, the backplane can have a protective rating from IP 20 up to IP 54, depending on where the backplane is used. The GE IC695CHS016 backplane is made to be installed in a rack and it is extremely reliable if it is installed properly. Besides the previously mentioned component types, the IC695CHS016 backplane accepts components like CPUs, power supply modules, and serial expansion modules. It should be mentioned that there are components that require more than one slot, like an AC power supply unit that requires 2 empty slots. This means that each individual slot can be configured for a specific module and a backplane like the IC695CHS016 backplane is an ideal platform for high-performance systems that involve many components. The backplane is made from durable materials and it has a housing that includes the following dimensions: 141.4 x 602 x 147.3 millimeters (5.5 x 23.7 x 5.8 inches).