

Motion Coordinator

Panel / Din Rail Mount

Product Code: P164

MC464

- Supports digital drive systems up to 64 axes
- Trio's fastest ever *Motion Coordinator*
- Based on 64 bit 400MHz MIPS processor
- High accuracy double floating point resolution
- 64 bit position integers for ultra precise axis resolution

Digital Drives Systems Supported

- Panasonic MINAS A4N
- SERCOS II
- Control Techniques SLM (1st quarter 2008)
- Ethercat (under development)
- Further drive types to be supported

Factory Communications Options

- DeviceNET
- Profibus
- MODBUS
- CC Link
- ETHERNET IP
- Profinet I/O
- Modbus TCP/IP

64 Axes

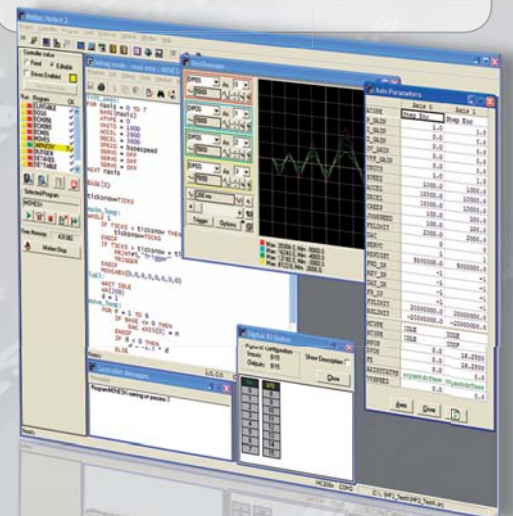
- 64 maximum axes
- 125usec minimum update rate

Advantages of Digital Drive Interfaces

- Plug & play
- Drive parameter configuration in the *Motion Coordinator*
- Monitoring parameters in real time from the *Motion Coordinator*
- Transmit data at high speeds with precise synchronisation
- Communicate with the drive using velocity, position or torque control modes (provided the mode is supported in the drive)
- Noise resistant communications
- Reduced Wiring, each connection replaces 11 wires per drive
- Cuts material costs, cabinet space and build time
- Machine downtime reduced where drive changeovers are required

Programming

- Multi-tasking Trio BASIC programmed using *Motion Perfect*
- Trio PC for Active-X
- IEC 61131 (option)
- G Code (option)



MC464 can control up to 64 Axes



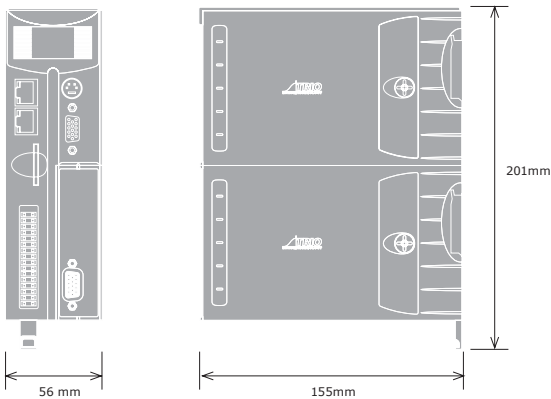
MC464 SPECIFICATION

Part Number	P164
Size	201mm x 56mm x 155mm
Weight	TBA
Temperature Range	0-45 degrees Celsius
Power Consumption	10W @ 24V DC
Maximum Number Of Axes	64
Built In Encoder I/O	1
Servo Cycle Time	1000µs, 500µs, 250µs or 125µs
Built In Inputs	8 x 24V Opto-Isolated
Built In Bi-directional I/O	8 x 24v Opto-Isolated
Built in Analogue Inputs	2 @ 0-10V 12 Bit Resolution
Inputs Functions	Forward Limit / Reverse Limit / Datum / F Hold
Watchdog Relay	1 Solid State Relay - 24V @ 100mA
SD card	Standard SD card compatible to 2Gbyte
User Memory	32 Mbyte max
Multi-tasking	2 Fast Tasks + 12 Normal Tasks
Position Values	64bit integers

BUILT-IN FACTORY COMMUNICATIONS

Communications	ETHERNET IP, MODBUS-TCP/IP, FINS, Motion Perfect programming, Active-X, CANopen, DeviceNet slave, Trio I/O
Sync Connections	1
Ethernet Connections	1 x Programming
Serial Ports	RS232 / RS485 / Modbus
CAN Ports	1 @ 1MBAUD max

Overall Dimensions
(MC464 and Expansion module)



All dimensions approximate

MC4 PANASONIC INTERFACE (P632)

Network	Ethernet Based MINAS A4N
Network Speed	100Mbps
Topology	Ring
Max Slaves per Interface / Ring	32
Max Interfaces per MC464	7
Max Axes on MC464	64
Cable	STP Cat 5-e or better
Bus to MC464	32 Bit
Registration Inputs	8 x 24V Inputs
Add Registration Capability	Y
Optically Isolated	Y
Map any I/O to any Axis	Y
Servo or Stepper Axis	-
Each Axis Ind configurable	-
Encoder Input	-
Pulse & Direction Enc Output	-
No of 16 bit DAC Outputs	-
Support for absolute enc Types	-



MC4 SERCOS INTERFACE (P616)

Network	SLM
Network Speed	16Mbps
Topology	Ring
Max Slaves per Interface / Ring	16
Max Interfaces per MC464	7
Max Axes on MC464	64
Cable	Fibre Optic
Bus to MC464	32 Bit
Registration Inputs	Drive Dependent
Add Registration Capability	Y
Optically Isolated	Y
Map any I/O to any Axis	Y
Servo or Stepper Axis	-
Each Axis Ind configurable	-
Encoder Input	-
Pulse & Direction Enc Output	-
No of 16 bit DAC Outputs	-
Support for absolute enc Types	-



MC4 SLM INTERFACE (P606)

Network	SLM
Network Speed	SLM Standard
Topology	Star
Max Slaves per Interface / Ring	6
Max Interfaces per MC464	7
Max Axes on MC464	42
Cable	RS485
Bus to MC464	32 Bit
Registration Inputs	6 x 24V Inputs
Add Registration Capability	Y
Optically Isolated	Y
Map any I/O to any Axis	Y
Servo or Stepper Axis	-
Each Axis Ind configurable	-
Encoder Input	-
Pulse & Direction Enc Output	-
No of 16 bit DAC Outputs	-
Support for absolute enc Types	-



MC4 FLEXIBLE AXIS INTERFACE (P608)

Network	-
Network Speed	-
Topology	-
Max Slaves per Interface / Ring	8
Max Interfaces per MC464	3
Max Axes on MC464	24
Cable	-
Bus to MC464	-
Registration Inputs	Flexible dual registration on all axes
Add Registration Capability	Y
Optically Isolated	Y
Map any I/O to any Axis	Y
Servo or Stepper Axis	8
Each Axis Ind configurable	Y
Encoder Input	Y
Pulse & Direction Enc Output	Y
No of 16 bit DAC Outputs	8
Support for absolute enc Types	Y



MC4 ANYBUS INTERFACE (P649)

Factory Communications Options	
CompactCom Modules	Profibus CC Link Profinet I/O USB Bluetooth



MC4 ETHERCAT INTERFACE

Details to be released shortly

MC464 Supports up to 7 half height or 3 Full Height Expansion Modules

