

4 axis Stage Controller

MAC-04



4 axis stage controllers with built-in 5-phase micro-step driver.

Multiple operation modes:

- Computer control using USB interfaces
- Manual control via jog switches
- Remotely operated by other devices using TTL I/O



Guide

- ▶ Sample programs are available for download from our website.
 - MAC04Sample 32/64-bit version for Windows®

Part Name	Part Number
4 axis Stage Controller	MAC-04

Primary Functions

Part Number	MAC-04
Controller Function	○
Number of Control Axes	4
Circular Interpolation Control	○
Linear Interpolation Control	2 axes
Driver Function	Micro-step
Micro-step (Max. Division)	250
Driving Current (A/phase)	0.35 - 1.4

General Specifications

Power Voltage	AC100 - 240V 50/60Hz
Power Supply	DC24[V] 6,5[A]
Rated Power (W)	156
Operating Temperature	5 - 40°C
Storage Temperature	-20 - 60°C
Ambient Humidity	20 - 80% RH (without condensation)
Altitude (m)	Up to 2000
External Dimensions (W×H×Dmm)	300×202×104
Overvoltage Category	II
Weight (kg)	2.56
Pollution degree	2

Installation

Mechanical	Sitting (Standing on a shelf, benchtop or similar surface)
Electrical	Must be connected to earth

Performance Specifications

Max. Travel to Set	2,147,483,648
Max. Driving Speed (pps)	10000
Min. Driving Speed (pps)	1
Acceleration/Deceleration Time (ms)	0 - 1,000

I/O Specification

Origin Sensor	○
Proximity Sensor	○
CW (+) Limit	○
CCW (-) Limit	○
Control Input	12 points
Output	8 points

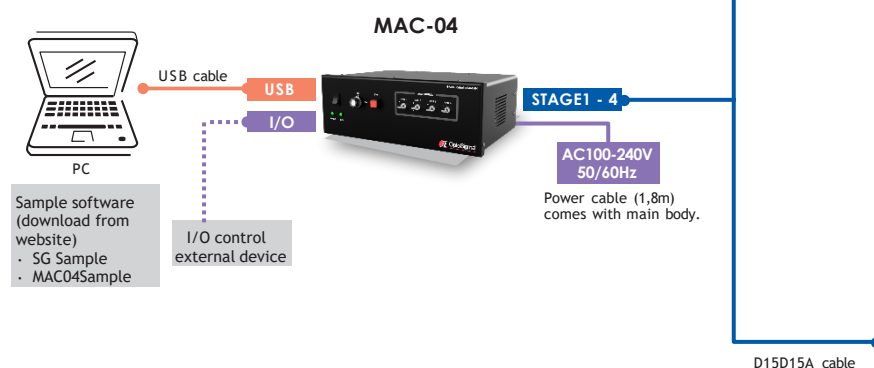
Interface

Type	USB FTDI FTD231
Baud Rate	115200
Data bits	8 bits
Parity	None
Stop bit	1 bit
Flow control	Hardware
Delimiters	CR+LF

Control Command

Machine Origin Return	○
Theoretical Origin Setting	○
Relative Position Drive	○
Absolute Position Drive	○
Jog Operation	○
Circular Interpolation Control	○
Linear Interpolation Control	○
Drive	○
Deceleration Stop	○
Emergency Stop	○
Speed Setting	○
Motor Free/Hold	○
Port Input	○
Port Output	○

MAC-04 System Chart



All Motorized stages with NO(Normal Open Sensors) are not supported.

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Options

40 × 40 mm

60 × 60 mm

80 × 80 mm

85 × 85 mm

100 × 100 mm

120 × 120 mm

Others