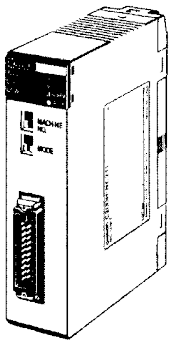
SPECIAL I/O MODULES

POSITION CONTROL MODULE



C200H-NC211
C200H-NC112

Position control modules provide either a step and direction pulse train or CW/CCW pulse trains to control a single- or dual-axis stepper or servo motor driver. Interface signals include CW and CCW limits, origin approach, origin stop, emergency stop, and interrupt signals. Automatic backlash and origin offset functions are now included for precise positioning requirements. Move parameters can be set up in either ladder logic, or by connecting the hand-held programming console and are stored in battery-backed memory. Extensive diagnostics are also available to the PLC for quick error detection and troubleshooting.

Features

- Pulse output for stepper motor or servo motor driver
- Origin and backlash compensation for precision positioning
- Teach mode or storage of calculated movement parameters
- Internal diagnostics
- External signal interface for CW, CCW, origin, emergency stop, mode, and interrupt
- Parameters, speeds, and positions set in CPU DM area
- Linear interpolation capability on C200H-NC211

Additional Functions – C200H-NC211 Only

- Simultaneous two-axis control is possible with single-axis independent control and two-axis linear interpolation.
- Position data or speed data can be changed or transferred from the PLC to the NC211 while the positioning operation is stopped.
- Speed can be changed using the speed coefficient, even during positioning operation.
- Up to 53 positions can be set on both axes.

Specifications

PART NUMBERS		C200H-NC211	C200H-NC112
Axes controlled		2 axes/Module	1 axes/Module
Control system		Automatic trapezoidal acceleration/deceleration	
Position	Data	–8,388,607 to 8,388,606 pulses	
	Data capacity	53/axis	20
Speed	Data	1 to 250,000 pps	
	Data capacity	15	
Speed adjustment rate		2 to 2,000 pps/1 ms	
Origin search	Origin proximity	None/NO/NC When provided, H/L level selection is available.	
	Origin signal	Rise or fall selection	
	Origin compensation	0 to ±9,999 pulses	
	Origin search speed	High speed, proximity speed setting available	
Backlash compensation		0 to 9,999 pulses	
Manual operation		High-speed jog, low-speed jog, inching	
I/O words required		20 (Special I/O area)	10 (Special I/O area)
Internal current consumption		5 VDC, 0.5 A max.	5 VDC, 0.2 A max.
Weight		500 g max.	400 g max.
Manual		W166	W128

Connection Example – Servo Motor for the Pulse-train Input