

# Adept SmartMotion CX Controller Bundle

## High-performance motion controller

The Adept SmartMotion™ CX Controller (p/n 01058-002) is a high-performance motion controller that leverages the Adept SmartServo™ system, Adept's distributed controls platform built on IEEE 1394. This bundle includes the SmartController™ CX and the sMI6 motion option.

This system also provides fully integrated motion control capabilities for industrial robots, third party mechanisms, feeders, servo-controlled conveyors, or other servo and process-control axes.

Adept's advanced motion technology was designed directly for the real-time control of high-speed robotic workcells. Advanced motion control features of the SmartMotion system can be combined with an integrated graphical user interface, machine vision and conveyor tracking. A variety of kinematic modules are available that allow simple programming of complex mechanisms including tool offsets and world coordinates. Multiple mechanisms can be coordinated from one controller.

### Complete Automation Control Platform

While most motion controllers stop with basic commands, Adept recognizes that real-world automation systems require coordination of motion control with real-time sensory feedback, workcell logic, I/O, and operator control functions.

### Powerful Software for Productivity

With over 30,000 installations world-wide, the Adept V+ programming language is a proven solution for real-time control of factory devices. Powerful diagnostic tools provide real-time information about hardware status and encoder signals. Servo tuning aids include built-in motion profile generation and on-line graphical display of servo response.

### Included Hardware

SmartController CX

sMI6, 6-axis motion control interface

Front Panel

Panel Mount Hardware Kit

### Included Software

Adept V+, version 16.0 (or later)

AdeptWindows PC

AdeptTCP/IP License

AdeptNFS Client License

### Controller Specifications

Dimensions: 328mm x 187mm x 80mm

Operating power: 24 VDC ±10%, 5A

Environment:

- Temp: 5° C to 40° C

- Humidity: 5 to 90%, non-condensing

Memory:

- 30 MB CompactFlash card

- 32 MB RAM

Specifications subject to change without notice. 07/10/2003



### Controller Specifications (continued)

Conveyor Belt Tracking support<sup>1</sup>

Digital I/O:

- 12 optically isolated inputs

- 8 optically isolated outputs

Communication Interfaces:

- RS-232 serial port (3x)

- RS-422/485 serial port (1x)

- 10/100Base-T Ethernet

- DeviceNet

- SmartServo network port (2x)

- IEEE 1394 network port (2x)<sup>1</sup>

Motion Control

- 24 axes maximum

- 15 mechanisms maximum

(with V+ Extensions option)

Kinematic modules

- Coordinate axes and

- Support sophisticated vision routines

(AdeptVision sAVI requires the Adept SmartController CX system.)

Compliance: CE

*For complete details see the Adept SmartController CX data sheet.*

### sMI6 Specifications

• sMI6, 6-axis motion control interface

• ±10 volt command signal

• Digital loop control

*For complete details see the Adept sMI6 data sheet.*

### Options

• AdeptVision sAVI

• Adept sDIO

• Conveyor Belt Tracking<sup>1</sup>

(included with V+ Extensions option)

• Adept AIM Software

• Manual Control Pendant

• MP6 interface kit, with 2.5M cables

• Extended MP6 Cable Set, 5M

<sup>1</sup> Support for conveyor belt tracking and the IEEE 1394 network is currently not available. Contact Adept for the latest information



3011 Triad Drive Livermore CA 94551

PHONE: 925.245.3400 | FAX: 925.960.0452

EMAIL: info@adept.com | WEB: www.adept.com