

High-Performance Motion Controller – softMC703S

A premium controller originating from Israel, equipped with high-performance Intel processors and an embedded real-time operating system. Beyond standard motion capabilities, it comes preloaded with multiple robot kinematic models alongside a .motion control algorithm library refined over 30 years of technical accumulation. Programming workflows rely on the MC BASIC language paired with the ControlStudio+ programming software.

It supports text editing, task scheduling, graphical data logging, live online tracing, offline simulation and more use cases. It is widely used in high-end areas including precision metrology, semiconductor manufacturing, medical equipment and robotics etc.



开放式 模块化的软件环境

Open and modular software environment

高实时性 Linux操作系统

High real-time Linux operating system

以太网人机接口

Ethernet human machine interface

小体积 满足安装空间苛刻要求

Small size to meet stringent installation space requirements

总线支持EtherCAT

Supporting EtherCAT fieldbus

可控制最多64个轴

up to 64 axes

完善的机器人软件包

Robotics Studio toolkit

可以为客户定制软件解决方案

Customized software solution

产品规格参数

Product specifications

规格参数 Specifications	描述 Description
操作系统 Operating System	实时Linux Real-time Linux
控制软件 Control Software	softMC/ControlStudio+
CPU	Intel®双核处理器 Intel®Dual-core Processor
RAM	4GB
储存 Storage	64GB
Ethernet	1 x RJ45, Intel GbE, 支持TCP/IP, Modbus TCP, OPC-UA通信 1 x RJ45, Intel GbE, supporting TCP/IP, Modbus TCP, OPC-UA communication
EtherCAT	1 x RJ45, Intel GbE,标准主站 1 x RJ45, Intel GbE, standard master
USB	1 x USB3.2; 1 x USB2.0
COM	1x RS-232C, 支持Modbus RTU通信 1x RS-232C, supporting Modbus RTU protocol
HDMI	最高分辨率4096 x 2304@30Hz Maximum resolution 4096 x 2304@30Hz
安装方式 Installation	DIN 导轨安装/壁挂式安装 DIN-rail /wall mounted
工作温度/储存温度 Operating temperature/ Storage temperature	-20至55°C/-40至80°C -20 to 55°C/-40 to 80°C
相对湿度 Relative Humidity	95%(无凝结) 95% (non-condensing)
防护等级 Protection Class	IP 30
尺寸 Dimensions	38mm x 135mm x 105mm(WxHxD)
认证 Certification	CE/UKCA/CCC/WEEE

产品选型配置

Product selection configuration

产品型号 Product model	描述 Description
MC-E08-703S-0000 MC-E16-703S-0000	1、单轴/多轴运动(移动、点动) Single-axis/multi-axis motion (moving, jogging)
	2、电子凸轮表、电子齿轮速度同步功能 Electronic cam table, electronic gear speed synchronization function
	3、G代码插补指令(移动、圆弧) G-code interpolation commands (move, arc)
	4、模拟运动(离线程序仿真) Simulation of motion (offline program simulation)
	5、3D补偿表功能 3D compensation table function
	6、内置机器人运动学和动力学模型 Built-in robot kinematics and dynamics models
	7、传送带跟踪功能 Conveyor belt tracking function
	8、碰撞检测 Collision Detection