

## EM9160 Specifications V3.0

### CPU Unit

- 200MHz ATMEL AT91SAM9260 (ARM926 based)
- 32MB SDRAM, 32MB NAND FLASH.
- WINDOWS CE5.0 Pre-installed
- Supporting eVC Development of Applications
- MicroSD Memory Card Interface Ready
- USB Mass Storage Interface Ready
- RTC Enabled (external battery required)

### Interfaces

- 1 Ethernet Port
- 6 Serial Ports
  - COM2, with full modem lines (LVTTL)
  - COM3, Standard RS232
  - COM4, with RTS#/CTS# optional
  - COM5, multiplex pin with GPIO0 – GPIO1
  - COM6, multiplex pin with GPIO2 – GPIO3
  - COM7, multiplex pin with GPIO4 – GPIO5
- 2 USB Host Ports
- 1 USB Device Port, Active Sync Ready

### Display and Keypad

- Specified LCD Interface for low cost LCD module
- Supporting LCD resolution 320x240, 240x128, 128x64
- GPIO based matrix keypad driver

### Expand BUS

- Simplified ISA Bus with Chip Selection (CS0#, CS1#)
- 8-bit Data Bus (SD0 –SD7), 32 Bytes Address Access (SA0 – SA4)
- 500ns Bus Cycle, 3.3V Bus Signal Level(LVTTL)

#### **GPIO and Local Controls**

- 8 GPIO, direction, open drain configurable independently
- 1 I<sup>2</sup>C interface, max transfer rate 1Mbps
- 1 full-duplex SPI interface, max transfer rate 10Mbps
- 3 PWM output

#### **Power Supply and Mechanical Parameters**

- Single 5V±5% / 150mA
- Operation Temperature: -40°C – 80°C (Industrial)
- Piggyback Board Style with Size of 74mmx53mm
- 2 Rugged 36-Pin IDC for Communication Ports and ISA Bus

#### **Basic Software Environment**

- Windows CE Pre-installed
- EM9160 SDK Package for Application Development with eVC
- Typical Application Examples(Source Code Included)
- Both Ethernet and USB Configurable as Debug Port
- Supporting Microsoft's Remote Tools for Embedded Platform