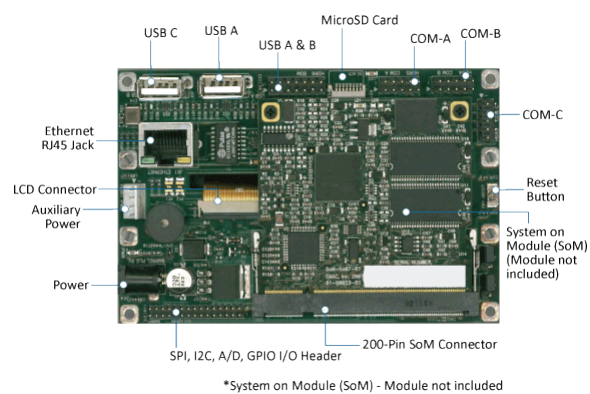
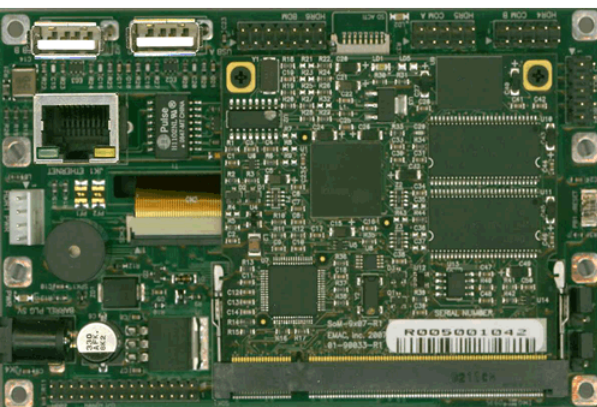


SoM-210ES



Ultra Small form factor (4.8" x 3.0")

10/100 BaseT Ethernet with onboard Magnetics and RJ45

2x RS232 serial ports and 1 RS232/485 serial port

32 SoM Specific lines with JTAG

Resistive Touchscreen interface

Graphic LCD interface with WQVGA TFT LCD with Touch

Battery for nonvolatile RAM and Real Time Clock

Micro SD Flash Card Socket

2x USB 2.0 Host Jacks & 2x USB Hosts on Header (1x USB Host port wired to Jack and Header)

Audio Beeper

System Reset button

Power and Flash Status LEDs

BARE-BONE FEATURES

Ultra Small form factor (4.8" x 3.0")

10/100 BaseT Ethernet with onboard Magnetics and RJ45 Jack

Battery for nonvolatile RAM and Real Time Clock

Dual USB Host Jack

SD Flash Card Socket

2 serial RS232 ports and 1 RS232/485 port

Audio Buzzer	
System Reset button	
The SoM-210ES is an ultra compact SoM Carrier/Socket board with an optional 4.3 inch WQVGA (480 x 272) TFT color LCD and a resistive touch screen. The dimensions of the SoM-210 are 4.8” by 3.0”, about the same dimensions as that of popular touch cell phones. The SoM-210 is small enough to fit in a 2U rack enclosure. This versatile SoM Carrier/Socket board is ideal for evaluation and early development work. This Carrier is designed to work with all EMAC 200-pin SODIMM type SoMs. Note: The SoM-210 is specifically designed for SoMs with Video & USB capability.	
The SoM-210ES provides access to much of the SoM's I/O through on-board connectors as well as a number of additional I/O expansion blocks such as Video, Touchscreen, Ethernet and micro SD flash disk. Full schematics of the SoM-210ES are provided giving the user a solid base with which to design their own SoM Carrier. Schematics of the SoM-210ES are included on the CD provided with the Carrier board.	
Although a good deal of customers will want a Carrier that is unique and is designed specifically for their application, the SoM-210ES when coupled with a SoM-9307 SODIMM SoM makes for a powerful User Interface Control System with USB and Ethernet capabilities. This allows the user to gather data and respond with Control commands via the Internet.	
When a unique custom board is required, the amount of design work required is greatly minimized by the SoM approach. The custom Carrier designer does not have to worry about the processor, memory, and standard I/O functions and can concentrate on the I/O, connectors and dimensional aspects required for the application.	
In situations where a custom Carrier is required but the customer does not have the capability to design such a board in-house, EMAC's Custom to Order Services (COS) can be utilized. Using COS the customer can select from a library of standard I/O blocks. These blocks can be put together quickly into a form-factor of the customer's choosing, providing prototypes in as little as 30 days.	
Specifications	
SOM Type:	
SODIMM Carrier Boards	
Processor	
Real Time Clock:	
Primary I/O	
GPIO:	
24x Digital I/O Lines (5x dedicated GPIO	
19x Configurable I/O)	
Video Out:	
Graphic LCD interface with WQVGA TFT LCD with Touch	
Audio:	
Audio Buzzer	
Ethernet:	
10/100 BaseT Ethernet with onboard Magnetics and RJ45	
USB:	
Dual USB Host Jack	
Serial Ports:	
2x RS232	
1x RS232/485	
Watchdog:	
Secondary I/O	
CAN:	

1x CAN 2.0B Port

LPT Port:

Keypad:

PS/2:

Touch:

Resistive Touchscreen interface

Analog on
A/D.

D/A:

Dimensions
Dimensions.

4.8 × 3 in

Power Requirements
Voltage.

5 V

Typical Current:

1 A

Typical Voltage:

5 V

Power Misc.:

Power Requirements: Typical <~1.0A. @ 5 Vdc. including SoM, USB & LCD

(Note: up to 1.0A additional is required if USB Host is providing power to USB devices)

Environmental
Low Operating Temperature:

0 C

High Operating Temperature:

60 C

Upper Operating Humidity:

90%

Pricing
SoM-210ES-000

Standard Carrier Board with LCD

\$175.00

Non-Stock

Base Product:

SoM-210ES

SoM-210ES-007

Bare Bones Carrier Board without LCD

\$95.00

Non-Stock

Base Product:

SoM-210ES

Non-Stock Minimum Order:

25

Non-Stock NCNR:

1

Carrier Boards:

SoM-9G45M-110

w/ AT91SAM9G45 CPU, 512 MB FLASH 128 MB RAM

\$190.00

Base Product:

SoM-9G45M
SoM-9M10M-130
w/ AT91SAM9M10 CPU, 1 GB FLASH 256 MB RAM
\$250.00
Base Product:
SoM-9M10M
SoM-3517M-131
TI ARM Cortex-A8 CPU, 4GB eMMC FLASH, 256MB RAM (0 ~ +70C)
\$198.00
Base Product:
SoM-3517M
SoM-3517M-141
TI ARM Cortex-A8 CPU, 4GB eMMC FLASH, 512MB RAM
\$0.00
Base Product:
SoM-3517M
SoM-3517M-339
TI ARM A8 CPU, 512MB NAND FLASH, 256MB RAM, INDUSTRIAL TEMP (-40C ~ +85C)
\$0.00
Base Product:
SoM-3517M
SoM-3354M-140
SOM-3354, TI AM3354 ARM-A8, 512MB RAM, 4GB eMMC Flash, 16MB Serial Data flash, 4x COM, 3x USB2, 10/100 ETH, Video (-40
to +85)
\$160.00
Base Product:
SoM-3354M
SoM-212ES-007
Bare Bones Carrier Board
\$110.00
Base Product:
SoM-212ES

Source URL: <https://www.emacinc.com/content/som-210es>