

Advantech SOM-ETX Modules

Introduction

Advantech's SOM-ETX form factor System on Module series provides a scalable solution that meets customers' advanced CPU and application development needs. With the SOM concept of an application-specific carrier board utilizing a plug-in CPU module, the SOM-ETX line has great I/O capacity and meets both ISA and PCI needs. The small size (95 mm x 114 mm) and use of four high capacity connectors based on the ETX form factor, allow the SOM-ETX modules to be easily and securely mounted on a customized application (carrier) board. This design and multiple processor choices give customers good performance choices, eliminates CPU integration worries and allows fast application support for the most dynamic embedded needs, greatly streamlining the product development process and reducing critical time-to-market.

Compact & Powerful

Easy to Upgrade

Fast Time-to-Market

Common SOM-ETX Specifications:

10/100 Mbps PCI Ethernet interface

AC97 Audio

Video/TV Out

LVDS/TTL LCD

2 USB interface & 1 Infrared interface (115 Kbps IrDA compliant port)

62-level timer interval, reset to system or IRQ11 by jumper on carry board Support

ATX Power function

SOM Module Specifications:



Pentium® III/ Intel® 440BX

SOM-4470 Intel® Pentium® III/ Celeron SOM-ETX Module

CPU: Embedded Intel® low power Pentium® III 500 MHz or Celeron™ 400 MHz (1.1 V) Processor

Chipset: Intel® 440 BX

2nd level cache: 256 KB on Pentium® III CPU, 128 KB on Celeron™ CPU

RAM memory: One SODIMM socket supports up to 256 MB synchronous DRAM

VGA/LCD controller: SMI 3DM8 for Pentium® III, 3DM4 for Celeron™ 2 x AGP, 64-bit graphic Engine with 4 MB/8 MB SDRAM frame buffer

TTL interface: Supports up to 36-bit LCD (SOM-4470FM)

Video interface: SMI 3DM chip

Audio interface: ESS 1989 Allegro audio controller, supports line-in, out, mic, Sound Blaster Pro compatible

Ethernet interface: Intel® 82559ER chip



Geode™GX1/CS5530A

SOM-4450 Geode™ GX1 SOM-ETX Module

CPU: NS Geode™ GX1-300 MHz

Chipset: NS CS5530A

RAM memory: One SODIMM socket supports up to 128 MB synchronous DRAM

VGA/LCD controller: CS 5530A LCD/CRT controller, single 18-bit LCD interface, 64-bit graphics engine, 1 - 4 MB display memory

TTL interface: Supports 18-bit LCD (SOM-4450F)

LVDS interface: Supports Single Channel LVDS 68 MHz (SOM-4450FL)

Video interface: CS5530A chip & CH7003 TV Out decoder, S-video support

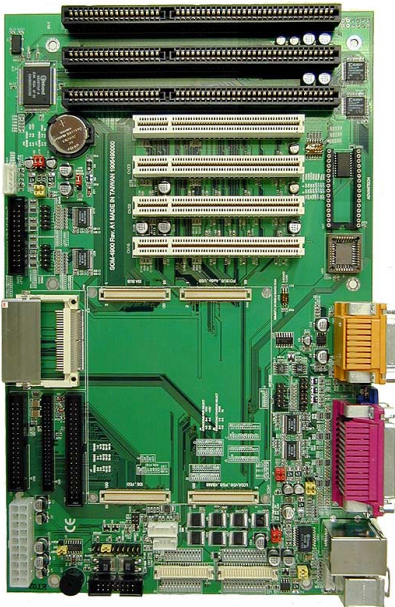
Audio interface: CS5530A chip, AC97, 16-bit stereo, line-in,out,mic-in, 3D audio

SSD support: 1 CompactFlash™ socket on board, 16 MB DOC® 2000 (optional)

Ethernet interface: RealTek RTL 8139 controller

Development Board:

SOM-DB4400 Development Board for SOM-ETX ISA/PCI Solution



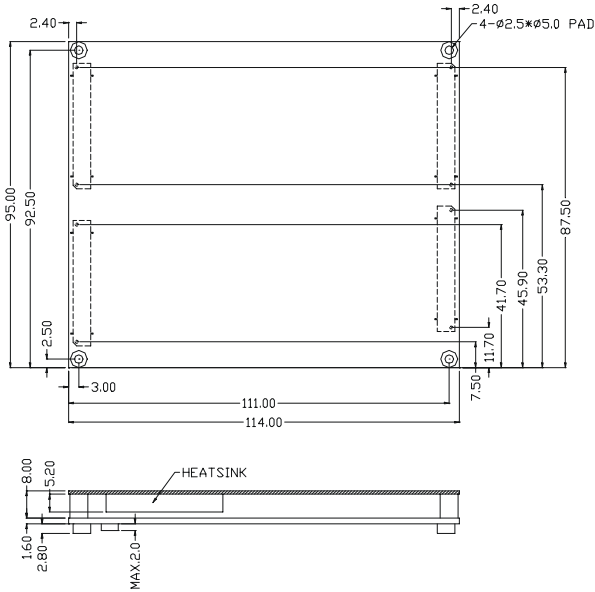
SOM-DB4400 Development Board

Specifications

- * Supports 1 x ETX CPU Module connector
- * Supports 1 x ATX Power connector
- * Supports 1 x TV-out connector
- * Supports 1 x DOC2000 Socket
- * Supports 2 x EIDE connector
- * Supports 1 x FDD connector
- * Supports 1 x LAN connector
- * Supports 2 x LCD connector
- * Supports 2 x USB connector
- * Supports 1 x SIR connector
- * Supports 3 x ISA Bus connector
- * Supports 4 x PCI Bus connector

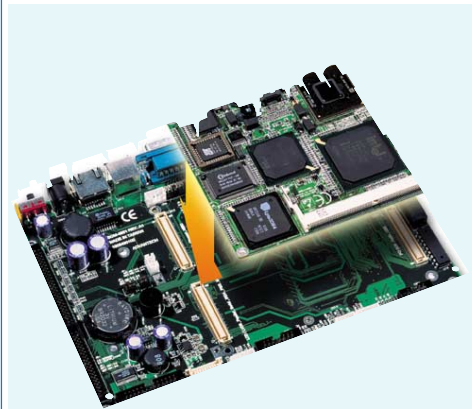
Part No.: SOM-DB4400

SOM-ETX Mechanical Information:



30 second Installation:

1. Plug the SOM-ETX module into the solution board's ETX socket.
2. Connect any accessory cables
3. Screw the SOM-ETX Module and the solution board together.



Easy Installation

SOM-4450F-G0A1	GX1-300 CPU, LAN, VGA/LCD, Audio, Video, SSD
SOM-4450FL-G0A1	GX1-300 CPU, LAN, VGA/LVDS, Audio, Video, SSD
SOM-4470F-L0A1	Intel® PIII-500 CPU, LAN, VGA/LCD, Audio, Video
SOM-4470F-J0A1	Celeron™-400 CPU, LAN, VGA/LCD, Audio, Video
SOM-DB4400	Development Board for SOM-ETX (ATX)
SOM-DK4450F-C01	Windows® CE 3.0 Development Kit for SOM-4450F