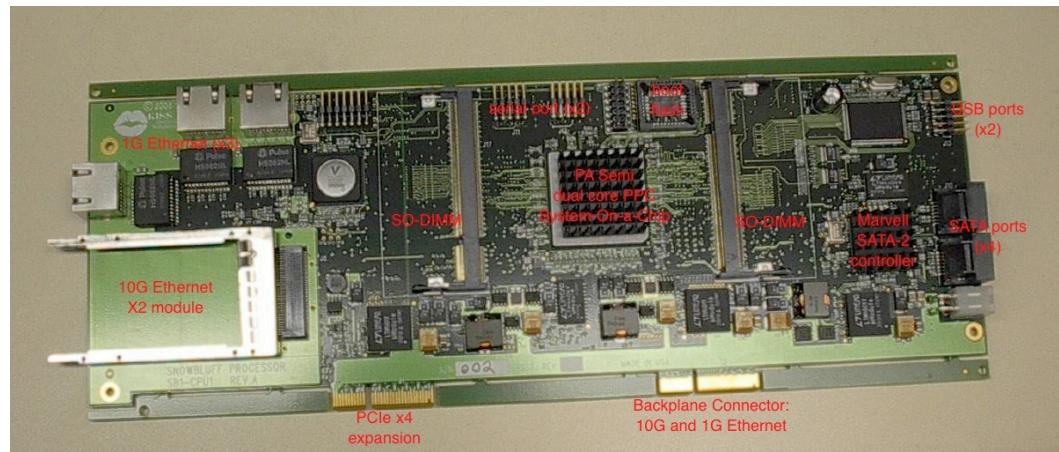The SB-1 CPU card is a high performance system on a card that has ample amounts of processing power and I/O bandwidth for the most demanding tasks.

Processor
- PA Semi PA6T 1682M PWRficient™ SOC
- Dual Core PowerPC architecture
- 1.0, 1.5, and 2.0GHz versions
- 64bit processor
- dual DDR2 memory controllers
- 2MB of L2 cache
- 25W max power usage
- Electronic Products' "Product of the Year" award winner for 2007

Memory
- 2 ECC registered SO-DIMM sockets
- Dual DDR2 memory controllers
- 2MB boot flash

Networking
- 1 10Gb Ethernet X2 module
- 3 10/100/1000 RJ-45 Ethernet ports

Storage
- Marvell 88SX7042 SATA-2 (3GHz) controller
- 4 SATA-2 ports

I/O
- 2 RS-232 serial ports
- 2 USB v2.0 ports
- Real Time Clock (RTC)

Expansion
- Dual edge connectors bring out additional functionality
- 2nd 10Gb Ethernet for high speed switching backplane
- 4th 1Gb Ethernet for low speed backplane
- PCIe x4 expansion port for adding PCIe expansion cards, such as video, networking, storage controllers, …
- GPIO and status lines

Software
- Common Firmware Environment (CFE) v2.0 boot flash code
- Linux v2.6 kernel

Power
- 50 watts
- 12V DC

Physical
- 111.15 mm x 311 mm