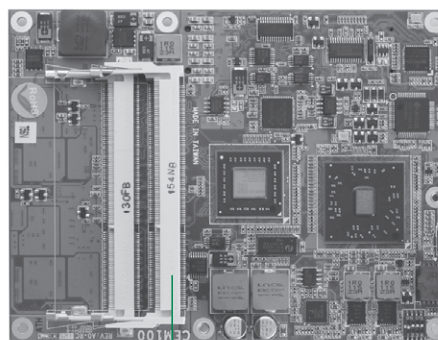


CEM100

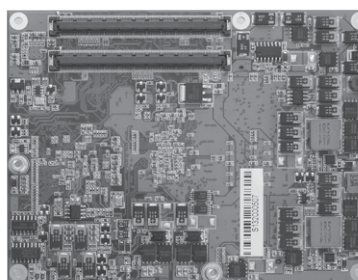
COM Express Type 2 Basic Module with AMD G-Series APU and AMD A55E

Features

- AMD G-Series APU T56N 1.65 GHz/T40R 1.0 GHz
- AMD A55E
- 2 DDR3-1066 SO-DIMM, up to 8GB
- 8 lanes of PCIe Gen 2 at 5GT/s
- 4 SATA-600 with RAID 0/1/5/10
- DirectX11, OpenGL 4.0, and OpenCL 1.0 supported
- TPM 1.2 supported



2 x DDR3-1066 SO-DIMM



▲ Rear view



Core System

| | |
|---------------------|---|
| CPU | AMD G-Series APU T56N 1.65 GHz/T40R 1.0 GHz onboard |
| System Memory | 2 x 204-pin SO-DIMM DDR3-1066, up to 8GB |
| Chipset | AMD A55E |
| BIOS | AMI uEFI (Legacy free) |
| SSD | N/A |
| Watchdog Timer | 255 levels, 1 ~ 255 sec. |
| Expansion Interface | 8 x PCIe x1 devices 4 x 32-bit PCI bus masters |
| Battery | N/A |
| Power Requirements | TBD |
| Size | 125 x 95 mm |
| Board Thickness | 2.0 mm |
| Temperature | 0°C ~ +60°C (+32°F ~ +140°F), operation |
| Operation Humidity | 10% ~ 95% relative humidity, non-condensing |

Display

| | |
|-------------------|---|
| Chipset | AMD |
| Memory Size | Depending on integrated GPU |
| Display Interface | 1 x VGA 1 x LVDS; 18/24-bit single/dual channel 2 x Digital output ports (DP, HDMI, DVI; DPO port is available if LVDS not used) |

Packing List

Quick installation guide, user's manual/utility CD

Ordering Information

| Standard | |
|---|---|
| CEM100VG-T56N (P/N: E38D100100) | COM Express Type 2 module with T56N 1.6 GHz APU, VGA/LVDS, GbE LAN, USB and TPM |
| CEM100VG-T40R (Fanless) (P/N: E38D100101) | COM Express Type 2 module with T40R 1 GHz APU, VGA/LVDS, GbE LAN, USB and TPM |
| Optional | |
| CEB94000 | ATX form factor Type 2 baseboard |
| 5078D100000E | CEM100 heat spreader module |
| 5078D100100E | COM Express SoM cooling kit with fan |
| 5078D100200E | COM Express SoM cooling kit without fan |

Note : 5078D100100E/5078D100200E has to be used with 5078D100000E

I/O

| | |
|---------------------|--|
| MIO | 1 x LPC interface 1 x SPI interface 1 x IDE; PATA-100 |
| SATA | 4 x SATA-600 with RAID 0/1/5/10 |
| Hardware Monitoring | N/A |
| Ethernet | 1 port as 10/100/1000 Mbps supports Wake-on-LAN, RPL/PXE Boot ROM with Broadcom BCM50610 PHY |
| Audio | HD link interface to baseboard for external Codec |
| USB | 8 x USB 2.0 |
| TPM | TPM 1.2 |
| SMBus | Yes |
| Digital I/O | 4 channels IN & 4 channels OUT |

Block Diagram

