

ECX-1400 GTX1050

Intel® Xeon®/Core™ i7/i5/i3 Expandable GPU Computing System with Intel® C246 & NVIDIA® GeForce® GTX 1050, NVIDIA® Pascal™ architecture, 6 GigE LAN w/4 PoE+, 4 Front-access SSD Tray, 1 PCIe/PCI, 6 USB 3.1, 2 M.2 Socket, 3 SIM, 32 Isolated DIO, High Performance, Independent Graphics



Features

- 9th Generation Intel® Xeon®/Core™ i7/i5/i3 (Coffee Lake Refresh) with workstation-grade Intel® C246 Chipset
- 2 DDR4 2666MHz Memory, up to 64GB (ECC/Non-ECC)
- NVIDIA® GeForce® GTX 10 Series graphics engine supports NVIDIA® Pascal™ GPU architecture, up to 8K resolution
- 1 VGA, 1 HDMI, 2 DVI & 3 DisplayPort interfaces support up to 6 independent HD displays
- Multiple external USB 3.1 Gen 2 support up to 10Gbps data transfer
- 6 Independent GigE LAN with 4 IEEE 802.3at PoE+
- 4 2.5" SSD trays, RAID 0, 1, 5, 10 supported
- 1 PCIe/PCI, 32 Isolated DIO, 3 External SIM Socket, 6 USB 3.1, 4 COM
- 12V to 36V DC-in, 80V Surge Protection, Ignition Control



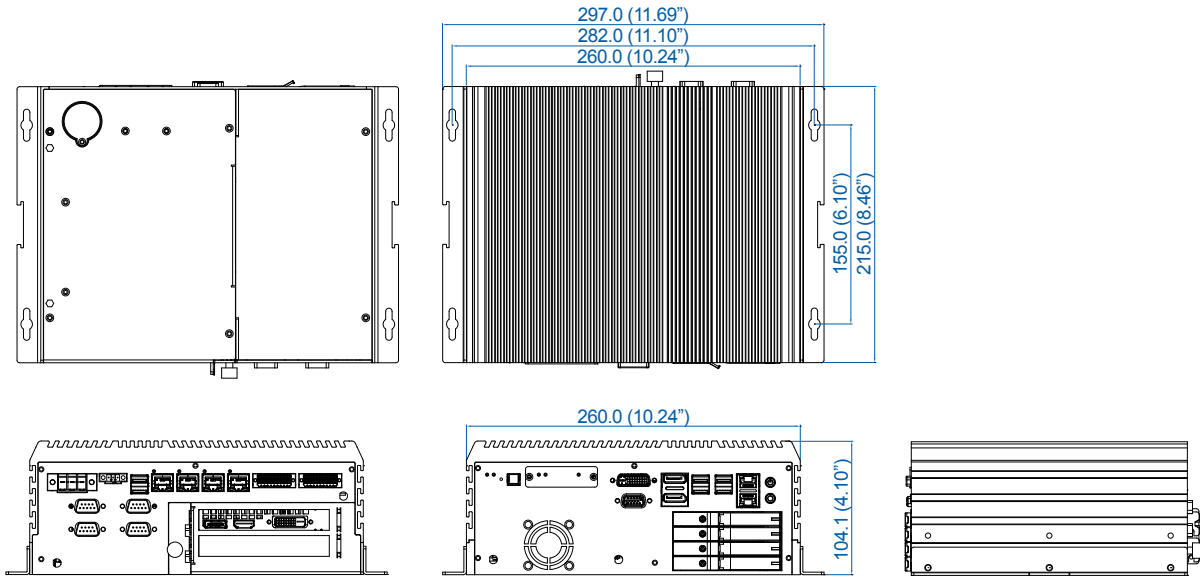
Specifications

System	
Processor	Intel® Xeon®/Core™ i7/i5/i3 Processor (CFL-R S/CFL-S)
Chipset	Intel® C246
BIOS	AMI
SIO	IT8786E
Memory	2 DDR4 2666MHz SO-DIMM, up to 64GB (ECC/Non-ECC)
I/O Interface	
Serial	4 COM RS-232/422/485 (ESD 8KV)
USB	<ul style="list-style-type: none"> ▪ 6 USB 3.1 (External) ▪ 1 USB 2.0 (Internal)
Isolated DIO	32 Isolated DIO : 16 DI, 16 DO
LED	Power, HDD, PoE, Wireless
SIM Card	3 External SIM Card Socket
Expansion	
Mini PCIe	2 Full-size for PCIe/USB/External SIM Card/mSATA
M.2	1 M.2 Key E Socket
PCI/PCIe	ECX-1410-GTX1050 : 1 PCIe x4 ECX-1401-GTX1050 : 1 PCI
Graphics	
Graphics Processor	<ul style="list-style-type: none"> ▪ Intel® UHD Graphics 630 ▪ NVIDIA® GeForce® GTX 1050
Interface	<ul style="list-style-type: none"> ▪ 1 VGA : Up to 1920 x 1200 @60Hz ▪ 1 HDMI : Up to 4096 x 2304 @60Hz ▪ 2 DVI-D : Up to 1920 x 1200 @60Hz ▪ 1 DisplayPort : Up to 7680 x 3840 @60Hz ▪ 2 DisplayPort : Up to 4096 x 2304 @60Hz
Storage	
SATA	4 SATA III (6Gbps) support S/W RAID 0, 1, 5, 10
mSATA	2 SATA III (Mini PCIe Type, 6Gbps)
M.2	<ul style="list-style-type: none"> ▪ 1 M.2 Key B Socket
Storage Device	<ul style="list-style-type: none"> ▪ 1 CFast Socket, Push-in/Push-out Ejector ▪ 4 Front-access 2.5" SSD/HDD Tray
Audio	
Audio Codec	Realtek ALC888S-VD, 7.1 Channel HD Audio
Audio Interface	1 Mic-in, 1 Line-out
Ethernet	
LAN 1	Intel® I219LM GigE LAN supports iAMT 12.0
LAN 2	Intel® I210 GigE LAN

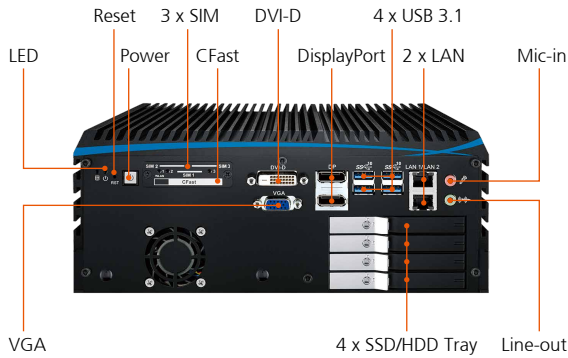
PoE	
LAN 3 to 6	GigE IEEE 802.3at (25.5W/48V) PoE+ by Intel® I350
Power	
Power Input	12V to 36V, DC-in
Power Interface	3-pin Terminal Block : V+, V-, Frame Ground
Ignition Control	16 Mode (Internal)
Remote Switch	3-pin Terminal Block
Surge Protection	Up to 80V/1ms Transient Power
Others	
TPM	Optional Infineon SLB9665 supports TPM 2.0, LPC Interface
Watchdog Timer	Reset : 1 to 255 sec./min. per step
Smart Management	Wake on LAN, PXE supported
HW Monitor	Monitoring temperature, voltages. Auto throttling control when CPU overheats.
Software Support	
OS	Windows 10, Linux
Mechanical	
Dimensions	260mm x 215mm x 104.1mm (10.24" x 8.46" x 4.10")
Weight	5.8 kg (12.79 lb)
Mounting	<ul style="list-style-type: none"> ▪ Wallmount by mounting bracket ▪ DIN Rail Mount (Optional)
Environment	
Operating Temperature	35W TDP CPU : -20°C to 60°C (-4°F to 140°F) 65W TDP CPU : -20°C to 55°C (-4°F to 131°F) 80W TDP CPU : -20°C to 45°C (-4°F to 113°F)
Storage Temperature	-40°C to 85°C (-40°F to 185°F)
Humidity	5% to 95% Humidity, non-condensing
Relative Humidity	95% @ 60°C
Shock	<ul style="list-style-type: none"> ▪ IEC 60068-2-27 ▪ SSD : 50G @ wallmount, Half-sine, 11ms
Vibration	<ul style="list-style-type: none"> ▪ IEC 60068-2-64 ▪ SSD : 5Grms, 5Hz to 500Hz, 3 Axis
EMC	CE, FCC, EN50155, EN50121-3-2

Dimensions

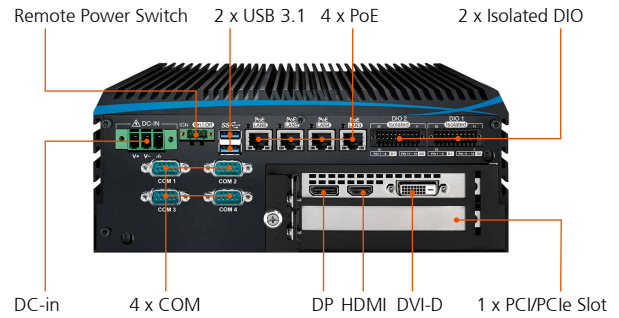
Unit : mm/ inch



Front I/O



Rear I/O



Order Information

ECX-1410-GTX1050	ECX-1400, NVIDIA® GeForce® GTX 1050, 6 GigE LAN w/4 PoE*, 4 SSD Tray, 1 PCIe x4, 6 USB 3.1, 4 COM, 3 SIM, 32 Isolated DIO
ECX-1401-GTX1050	ECX-1400, NVIDIA® GeForce® GTX 1050, 6 GigE LAN w/4 PoE*, 4 SSD Tray, 1 PCI, 6 USB 3.1, 4 COM, 3 SIM, 32 Isolated DIO

Accessories

DDR4 32G	Certified DDR4 32GB 2666MHz RAM
DDR4 16G	Certified DDR4 16GB 2666/2400/2133MHz RAM
DDR4 8G	Certified DDR4 8GB 2666/2400/2133MHz RAM
DDR4 4G	Certified DDR4 4GB 2666/2400/2133MHz RAM
PWA-160WB-WT	160W, 24V, 85V AC to 264V AC Power Adaptor with 3-pin Terminal Block (7.62mm pitch), Wide Temperature -30°C to +70°C
PWA-280WB-WT	280W, 24V, 85V AC to 264V AC Power Adaptor with 3-pin Terminal Block (7.62mm pitch), Wide Temperature -30°C to +70°C
PWS-360W	360W, 24V, 90V AC to 264V AC Power Supply
PWS-480W-WT	480W, 24V, 90V AC to 305V AC Power Supply, Wide-Temp, IP65
VESA Mount	VESA Mounting Kit
DIN-RAIL Kit	DIN Rail and VESA Mounting Kit
TMK2-20P-100	Terminal Block 20-pin to Terminal Block 20-pin Cable, 100cm
TMK2-20P-500	Terminal Block 20-pin to Terminal Block 20-pin Cable, 500cm
TMB-TMBK-20P	Terminal Board with One 20-pin Terminal Block Connector and DIN-Rail Mounting
4G Module	Mini PCIe 4G/GPS Module with Antenna
WiFi & Bluetooth	WiFi & Bluetooth Module with Antenna

CPU List

Series	CPU	Cores	GHz	TDP (W)	ECC RAM
Intel® Xeon®	E-2176G	6	4.6	80	Yes
	E-2124G	4	4.5	71	
	E-2278GE	8	4.7	80	
	E-2278GEL	8	3.9	35	
	E-2226GE	6	4.6	80	
Intel® Core™	i7-8700	6	4.6	65	N/A
	i7-8700T	6	4	35	
	i7-9700E	8	4.4	65	
	i7-9700TE	8	3.8	35	
	i5-8500	6	4.1	65	
	i5-8500T	6	3.5	35	
	i5-9500E	6	4.2	65	
	i5-9500TE	6	3.6	35	
	i3-8100	4	3.6	65	
	i3-8100T	4	3.1	35	
Yes	i3-9100E	4	3.7	65	
	i3-9100TE	4	3.2	35	