

# RCO-6022EE-4P

Superior fanless embedded system with LGA 1151 for Intel® 6<sup>th</sup>/7<sup>th</sup> Gen Processor and Q170 PCH, 2x LAN, 4x PoE, 2x PCI x8 Expansion

## FEATURES

- LGA 1151 socket for 6<sup>th</sup>/7<sup>th</sup> Gen. Intel® Core™ i7/i5/i3 or Pentium® / Celeron® Desktop Processor
- Intel® Q170 Chipset
- 2x 260-pin DDR4 SODIMM. Max up to 32GB
- Triple independent display supported by 1x DVI-I and 2x DisplayPort
- 2x Intel® GbE supporting Wake-on-LAN and PXE
- 4x Intel® GbE with PoE function
- 4x 2.5" SATA HDD bay and 2x mSATA supporting RAID 0, 1, 5, 10
- 4x Full-size mini PCIe for communication or expansion modules, 4x SIM socket
- 2x PCIe x8, 1x Universal Bracket (For mini PCIe application)
- 4x RS-232/422/485 (w/ 2x internal), 6x USB 3.0, 2x USB 2.0, TPM 2.0
- 8x DI + 8x DO with Isolation
- 9 to 48VDC wide range power input supporting AT/ATX mode
- -25°C to 70°C extended operating temperature



## SPECIFICATIONS

### SYSTEM

Processor	Support 6 <sup>th</sup> & 7 <sup>th</sup> Gen Intel® Core™ i7 / i5 / i3 / Pentium® / Celeron® Desktop Processor (LGA 1151)
	- 7 <sup>th</sup> Gen Intel® Core™ i7-7700T, Quad Core, 8MB cache, up to 3.8 GHz
	- 7 <sup>th</sup> Gen Intel® Core™ i5-7500T, Quad Core, 6MB cache, up to 3.3 GHz
	- 7 <sup>th</sup> Gen Intel® Core™ i3-7101TE, Dual Core, 3MB Cache, 3.4 GHz
	- 6 <sup>th</sup> Gen Intel® Core™ i7-6700TE, Quad Core, 8MB Cache, up to 3.4 GHz
	- 6 <sup>th</sup> Gen Intel® Core™ i5-6500TE, Quad Core, 6MB Cache, up to 3.3 GHz
	- 6 <sup>th</sup> Gen Intel® Core™ i3-6100TE, Dual Core, 4MB Cache, 2.7 GHz
	- Intel® Pentium® G4400TE, Dual Core, 3MB Cache, 2.4 GHz
	- Intel® Celeron® G3900TE, Dual Core, 2MB Cache, 2.3 GHz

System Chipset	Intel® Q170 Express Chipset
LAN Chipset	GbE1: Intel® I210-AT (Support Wake-on-LAN and PXE) GbE2: Intel® I219LM (Support Wake-on-LAN and PXE) GbE3~GbE6: Intel® I210-AT
Audio Codec	Realtek ALC888S
System Memory	2x 260-Pin DDR4 1866/2133MHz SODIMM. Max. up to 32GB
BIOS	AMI 128Mbit SPI BIOS
Watchdog	Software Programmable Supports 1~255 sec. System Reset
TPM	TPM 2.0

### DISPLAY

VGA	Yes (by optional split cable)
DVI	1x DVI-I
DisplayPort	2x DisplayPort
Multiple Display	Triple Display

### STORAGE

SSD/HDD	2x Internal 2.5" SATA HDD Bay 2x Removable 2.5" SATA HDD Bay Support RAID 0, 1, 5, 10
mSATA	2x mSATA (Shared by 2x Mini PCIe)
SIM Socket	2x External SIM socket 2x Internal SIM socket

### EXPANSION

Mini PCI Express	4x Full-size Mini PCIe
PCI Express	2x PCIe x8

### I/O

COM	2x RS-232/422/485 2x RS-232/422/485 (internal)
USB	6x USB 3.0, 2x USB 2.0
LAN	2x GbE RJ45
PoE	4x IEEE 802.3at (25.5W) GbE RJ45 (module)
Audio	1x Mic-in, 1x Speaker-out
DIO	8 in / 8 out (Isolated)
Universal I/O Bracket	1x Universal I/O Bracket (For mini PCIe application)
Others	6x WiFi Antenna Holes 1x Power Switch, 1x AT/ATX Switch, 1x Remote Power On/Off

### OPERATING SYSTEM

Windows	6 <sup>th</sup> Gen CPU: Windows 10, Windows 7, WES7 7 <sup>th</sup> Gen CPU: Windows 10
Linux	Linux kernel 4.X

### POWER

Power Mode	AT, ATX
Power Supply Voltage	9~48VDC
Power Connector	3-pin Terminal Block
Power Adaptor	Optional AC/DC 24V/9.2A, 220W
Power Protection	OVP (Over Voltage Protection) OCP (Over Current Protection) Reverse Protection

### ENVIRONMENT

Operating Temp.	-25°C to 70°C
Storage Temp.	-30°C to 85°C
Relative Humidity	10% to 95% (non-condensing)
Vibration	With SSD: 5 Grms, 5 - 500 Hz, 0.5 hr/axis With HDD: 1 Grms, 5 - 500 Hz, 0.5 hr/axis
Shock	With SSD: 50G, half sine, 11ms
Standards / Certification	CE, FCC Class A

### PHYSICAL

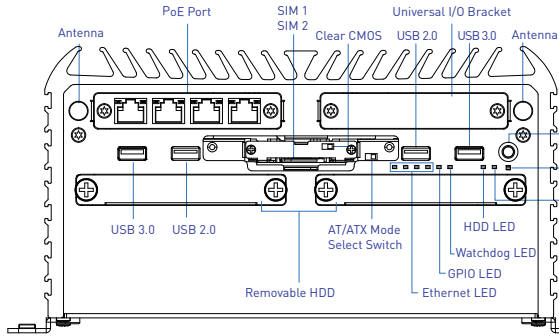
Construction	Extruded Aluminum with Heavy Duty Metal
Dimension	240 (W) x 261(D) x 127 (H) mm
Weight	5.79 kg
Mounting	Wall Mounting

\* For detailed performance specification, please refer to the data sheet or consult with the technical team.

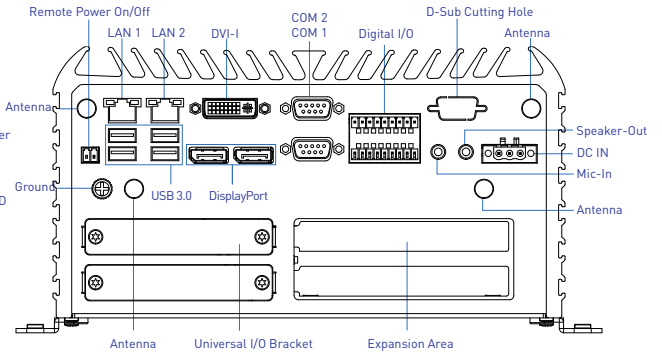
† The environmental specification covers the bare bone systems and does not include other components environmental specification.

**EXTERNAL I/O MECHANICAL LAYOUT**

**Front Panel**

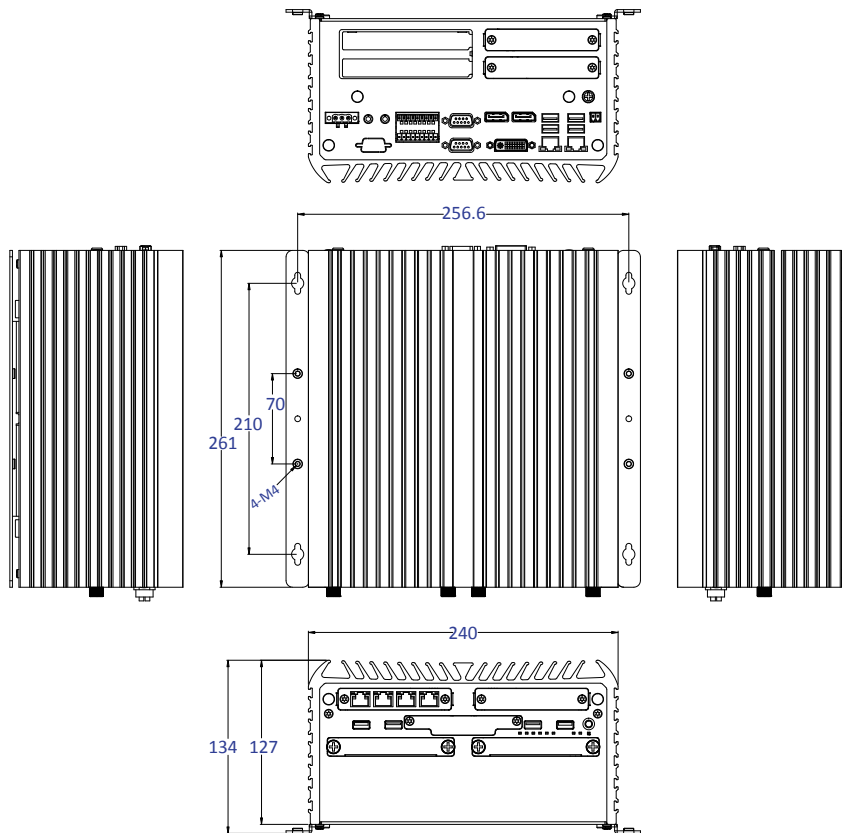


**Rear Panel**



**DIMENSION**

Unit: mm



**AVAILABLE MODELS**

MODEL NO.	DESCRIPTION
RCO-6022EE-4P	Superior fanless embedded system with LGA 1151 for Intel® 6 <sup>th</sup> /7 <sup>th</sup> Gen Processor and Q170 PCH, 2x LAN, 4x PoE, 2x PCIe x8 expansion

**OPTIONAL ACCESSORIES**

MODEL NO.	DESCRIPTION
1-E09A22102	Adapter AC/DC 24V 9.2A 220W with 3pin Terminal Block Plug 5.0mm Pitch
SFICBL022	Power Cord, 3-pin US Type, 180cm
1-TPCD00002	Power Cord, European Type, 180cm
1-TPCD00001	Power Cord, 3-pin UK Type, 180cm

**PACKING LIST**

- 1x RCO-6000 Series Embedded System
- 1x Utility DVD Driver
- 1x Wall Mount Kit
- 1x Accessory Kit
- 1x DVI to VGA Adapter

