



FEATURES

- Intel® Celeron® Processor J1900, Quad Core, 2MB Cache, 2.0 GHz
- 1x 204-pin DDR3L SODIMM. Max up to 8GB
- Dual Independent Display Supported by 1x DVI-I and 1x DisplayPort
- 2x Intel® GbE supporting Wake-on-LAN and PXE
- 4x Intel® GbE (RCO-3100-4L Only)
- 4x Intel® GbE with M12 connector (RCO-3100-4L-M12 Only)
- 4x Intel® GbE with PoE function (RCO-3100-4P Only)
- 4x Intel® GbE with M12 PoE function (RCO-3100-4P-M12 Only)
- 2x 2.5" SATA HDD bay, 1x mSATA, 1x CFAST
- 2x full-size Mini PCIe for communication or expansion modules, 2x SIM socket
- 6x RS-232/422/485 (w/ 4x internal), 1x USB 3.0, 3x USB 2.0
- Up to 2x universal bracket (for mini PCIe application)
- 8x DI + 8x DO with isolation
- 9 to 50VDC wide range power input supporting AT/ATX mode
- -40°C to 70°C extended operating temperature

SPECIFICATIONS

| System | |
|-----------------------|---|
| Processor | Intel® Celeron® Processor J1900, Quad Core, 2MB Cache, 2.0 GHz |
| System Chipset | SoC integrated |
| LAN Chipset | GbE1 & GbE2: Intel® I210-AT (Support Wake-on-LAN and PXE) GbE3-GbE6: Intel® I210-AT (Optional) |
| Audio Codec | Realtek ALC888S |
| System Memory | 1x 204-Pin DDR3L 1066/1333MHz SODIMM. Max. up to 8 GB |
| BIOS | AMI 64Mbit SPI BIOS |
| Watchdog | Software Programmable Supports 1-255 sec. System Reset |
| Display | |
| VGA | Yes (by optional split cable) |
| DVI | 1x DVI-I |
| DisplayPort | 1x DisplayPort |
| Multiple Display | Dual Display |
| Storage | |
| SSD/HDD | 1x Internal 2.5" SATA HDD Bay 1x Removable 2.5" SATA HDD Bay |
| mSATA | 1x mSATA (shared by 1x Mini PCIe & 1x SATA) |
| CFAST | 1x CFAST (shared by 1x mSATA & 1x SATA) |
| SIM Socket | 2x External SIM socket |
| Expansion | |
| Mini PCI Express | 1x Full-size Mini-PCIe Socket with USIM socket (PCIe + USB + SATA) (Share by 1x SATA Connector) 1x Full-size Mini-PCIe Socket with USIM socket (PCIe + USB) |
| 4-Port GbE (Optional) | Up to one 4-port GbE module with Intel® I210-AT Chipset RJ-45 or M12 connector with PoE option One Universal I/O Slot occupied for one 4-port module |
| Operating System | |
| Windows | Windows 10, Windows 7, WES7 |
| Linux | Linux kernel 3.X |

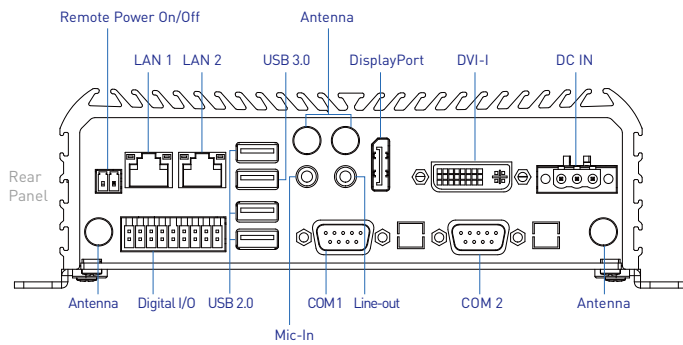
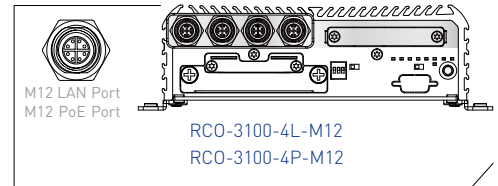
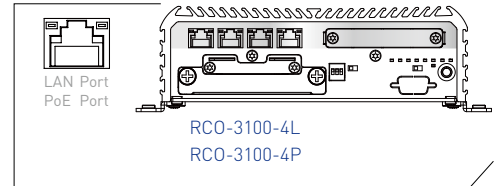
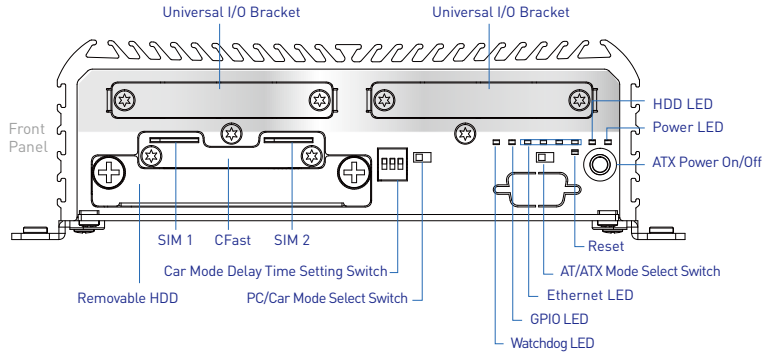
| I/O | |
|-----------------------|--|
| COM | 2x RS-232/422/485 4x RS-232/422/485 (internal) |
| USB | 1x USB 3.0, 3x USB 2.0 |
| LAN | 2x RJ45 |
| Audio | 1x Mic-in, 1x Line-out |
| DIO | 8 in / 8 out (Isolated) |
| Universal I/O Bracket | 2x Universal I/O Bracket (By mini PCIe interface) |
| Others | 4x WiFi Antenna Holes 1x Power Switch, 1x AT/ATX Switch, 1x Remote Power On/Off |

| Power | |
|------------------------|--|
| Power Mode | AT, ATX |
| Power Supply Voltage | 9-50VDC |
| Power Ignition Sensing | Power Ignition Management |
| Power Connector | 3-pin Terminal Block |
| Power Adaptor | Optional AC/DC 12V/5A, 60W Optional AC/DC 24V/5A, 120W (RCO-3100-4P & RCO-3100-4P-M12 Only) |
| Power Protection | OVP (Over Voltage Protection) OCP (Over Current Protection) Reverse Protection |

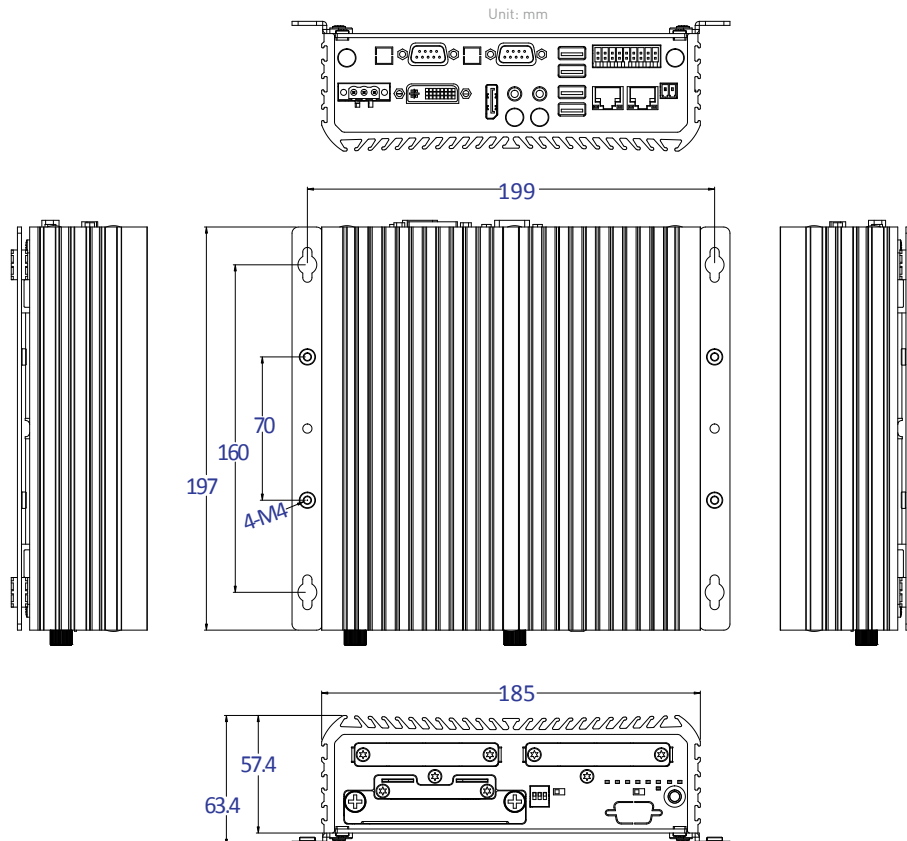
| Environment | |
|---------------------------|--|
| Operating Temp. | -40°C to 70°C |
| Storage Temp. | -40°C to 85°C |
| Relative Humidity | 10% to 95% (non-condensing) |
| Vibration | With SSD: 5 Grms, 10 - 500 Hz, 0.5 hr/axis With HDD: 1 Grms, 10 - 500 Hz, 0.5 hr/axis |
| Shock | With SSD: 50G, half sine, 11ms |
| Standards / Certification | CE, FCC Class A |

| Physical | |
|--------------|---|
| Construction | Extruded Aluminum with Heavy Duty Metal |
| Dimension | 185 (W) x 197 (D) x 57.4 (H) mm |
| Weight | 1.93 kg |
| Mounting | Wall Mounting |

EXTERNAL I/O MECHANICAL LAYOUT



DIMENSION



ORDERING INFORMATION

| MODEL NO. | DESCRIPTION |
|-------------|---|
| 1-E09A06007 | Adapter AC/DC 12V 5A 60W with 3pin Terminal Block Plug 5.0mm Pitch |
| 1-E09A12002 | Adapter AC/DC 24V 5A 120W with 3pin Terminal Block Plug 5.0mm Pitch |
| SFICBL022 | Power Cord, 3-pin US Type, 180cm |
| 1-TPCD00002 | Power Cord, European Type |
| 1-TPCD00001 | Power Cord, 3-pin UK Type, 180cm |

PACKING LIST

- 1x RCO-3100 Series Embedded System
- 1x Utility DVD Driver
- 1x Wall Mount Kit
- 1x Accessory Kit
- 1x DVI to VGA Adapter

AVAILABLE MODELS

| MODEL | MODEL NO. | DESCRIPTION |
|----------|-----------------------|---|
| RCO-3100 | RCO-3100-J1900 | Advanced Fanless Embedded System with Intel® Celeron® Processor J1900, 2x LAN |
| | RCO-3100-4L-J1900 | Advanced Fanless Embedded System with Intel® Celeron® Processor J1900, 6x LAN |
| | RCO-3100-4P-J1900 | Advanced Fanless Embedded System with Intel® Celeron® Processor J1900, 2x LAN, 4x PoE |
| | RCO-3100-4L-M12-J1900 | Advanced Fanless Embedded System with Intel® Celeron® Processor J1900, 2x LAN, 4x M12 LAN |
| | RCO-3100-4P-M12-J1900 | Advanced Fanless Embedded System with Intel® Celeron® Processor J1900, 2x LAN, 4x M12 PoE |