

# WM343-CS350

C246  
Q370

8th/9th Gen Intel® Core™  
Desktop Box PC



## KEY FEATURES



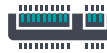
### Upgraded CPU

Powered by 8th/9th Gen Intel® Core™



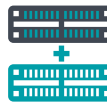
### Triple Independent Display

HDMI + DVI-D + DP++



### 4 Expansion Slots

3.5"/2.5" SATA + 5.25" optical drive bay



### Multiple Expansion

Support 2 PCIe x16, 2 PCIe x4, 1 M.2 M key, 1 M.2 E key



### 15 Years Long Term Support

15-Year CPU Life Cycle Support Until Q3' 33



## PANEL

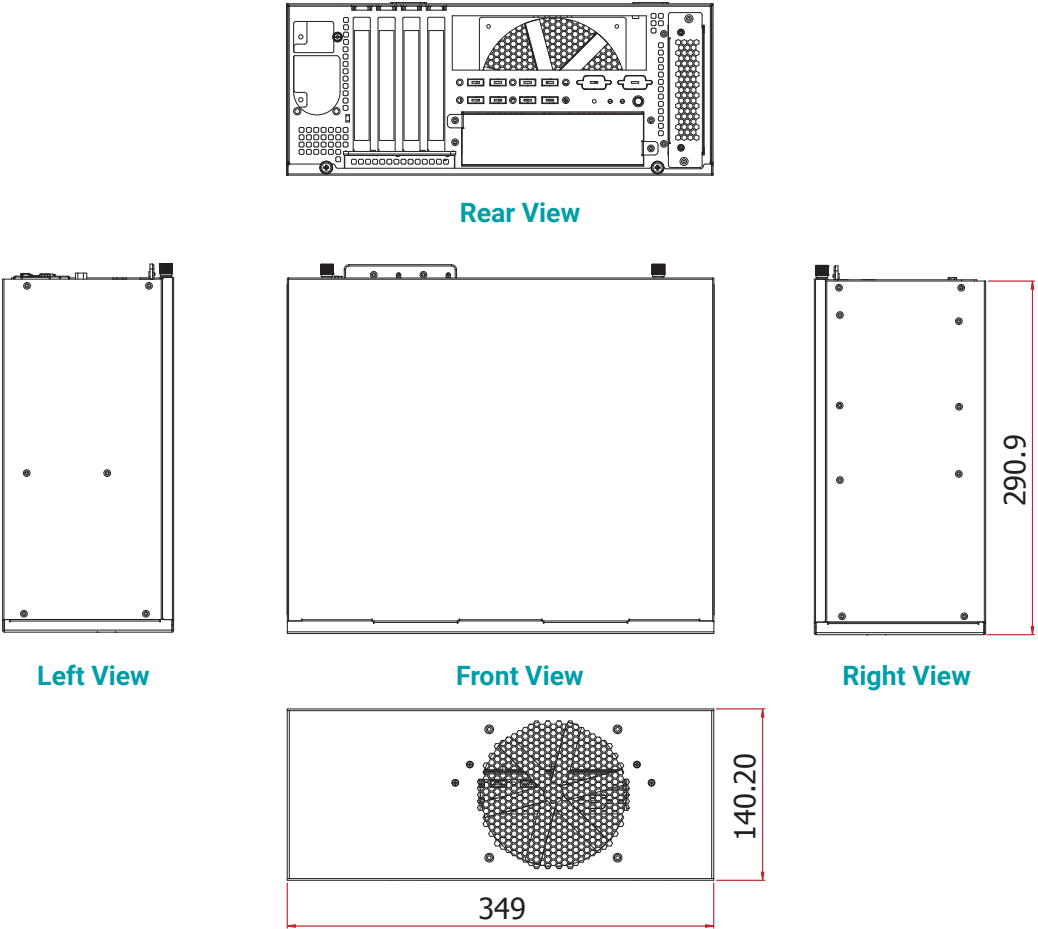


Front View

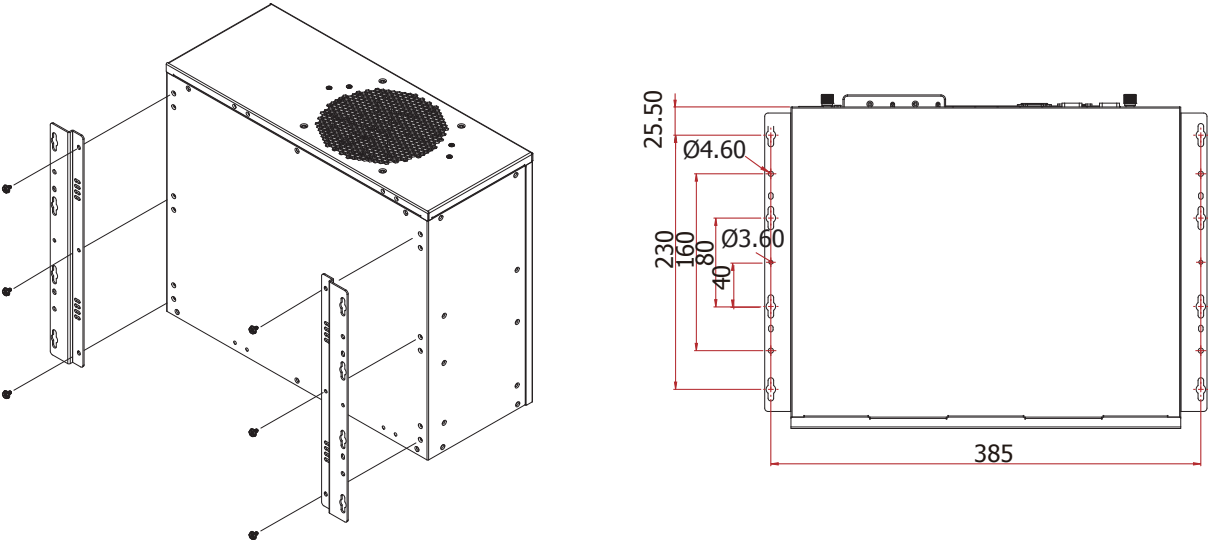


Rear View

DIMENSIONS



WALL MOUNTING



## SPECIFICATION

|          |                 |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |                                                                                                                                              |
|----------|-----------------|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------------------------------------|
| SYSTEM   | Processor       | 8th Generation Intel® Core™ /Pentium®/Celeron® LGA 1151 Socket Processors:<br>Intel® Xeon® E-2176G (6 Cores, 12M Cache, up to 4.7 GHz); 80W (C246 only)<br>Intel® Xeon® E-2124G (4 Cores, 8M Cache, up to 4.5 GHz); 71W (C246 only)<br>Intel® Core™ i7-8700K (6 Cores, 12M Cache, up to 4.7 GHz); 95W<br>Intel® Core™ i7-8700 (6 Cores, 12M Cache, up to 4.6 GHz); 65W<br>Intel® Core™ i7-8700T (6 Cores, 12M Cache, up to 4.0 GHz); 35W<br>Intel® Core™ i5-8500 (6 Cores, 9M Cache, up to 4.1 GHz); 65W<br>Intel® Core™ i5-8500T (6 Cores, 9M Cache, up to 3.5 GHz); 35W<br>Intel® Core™ i3-8100 (4 Cores, 6M Cache, 3.6 GHz); 65W<br>Intel® Core™ i3-8100T (4 Cores, 6M Cache, to 3.1 GHz); 35W<br>Intel® Pentium® G5400 (2 Cores, 4M Cache, 3.7 GHz); 58W<br>Intel® Pentium® G5400T (2 Cores, 4M Cache, 3.1 GHz); 35W<br>Intel® Celeron® G4900 (2 Cores, 2M Cache, 3.1 GHz); 54W<br>Intel® Celeron® G4900T (2 Cores, 2M Cache, 2.9 GHz); 35W<br>9th Generation Intel® Core™ LGA 1151 Socket Processors:<br>Intel® Xeon® E-2278GE (8 Cores, 16M Cache, up to 4.7 GHz); 80W (C246 only)<br>Intel® Xeon® E-2278GEL (8 Cores, 16M Cache, up to 3.9 GHz); 35W (C246 only)<br>Intel® Xeon® E-2226GE (6 Cores, 12M Cache, up to 4.6 GHz); 80W (C246 only)<br>Intel® Core™ i9-9900K (8 Cores, 16M Cache, up to 5.0 GHz); 95W (Non-LTS)<br>Intel® Core™ i7-9700TE (8 Cores, 12M Cache, up to 3.8 GHz); 35W<br>Intel® Core™ i5-9500E (6 Cores, 9M Cache, up to 4.2 GHz); 65W<br>Intel® Core™ i5-9500TE (6 Cores, 9M Cache, up to 3.6 GHz); 35W<br>Intel® Core™ i3-9100E (4 Cores, 6M Cache, 3.7 GHz); 65W<br>Intel® Core™ i3-9100TE (4 Cores, 6M Cache, to 3.2 GHz); 35W |                                                                                                                                              |
|          | Chipset         | Intel® Q370/C246 Chipset                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                                                                                                                                              |
|          | Memory          | Q370:<br>Four 288-pin DIMM up to 128GB<br>Dual Channel DDR4 2400/2666 MHz<br>C246:<br>Two 288-pin DIMM up to 64GB<br>Dual Channel DDR4 2400/2666 MHz                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |                                                                                                                                              |
|          | BIOS            | AMI SPI 128Mbit                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |                                                                                                                                              |
|          | Controller      | Intel® HD Gen 9 Graphics                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                                                                                                                                              |
| GRAPHICS | Feature         | OpenGL 5.0, DirectX 12, OpenCL 2.1<br>HW Decode: AVC/H.264, MPEG2, VC1/WMV9, JPEG/MJPEG, HEVC/H265, VP8, VP9<br>HW Encode: MPEG2, AVC/H264, JPEG, HEVC/H265, VP8, VP9                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |                                                                                                                                              |
|          | Display         | 1 x DP++<br>1 x HDMI 1.4b<br>1 x DVI-I (DVI-D signal)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             | DP++: resolution up to 4096x2106@60Hz<br>HDMI 1.4b: resolution up to 4096x2160@24Hz<br>DVI-I (DVI-D signal): resolution up to 1920x1200@60Hz |
|          | Triple Displays | DVI-D & DP++ & HDMI 1.4b                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                                                                                                                                              |
|          | External        | 1 or 2 x 3.5"/2.5" SATA 3.0 Drive Bays (1 x 3.5" SATA drive bay, by default)<br>1 x 5.25" Optical Drive Bay                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                              |
| STORAGE  | Internal        | 1 x M.2 2280 (PCIe x4/SATA)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                              |
|          | Interface       | 2 x PCIe x16 (Gen 3) (1 x16 signals or 2 x8 signals)<br>2 x PCIe x4 (Gen 3)<br>1 x M.2 2230 E key (PCIe x1/USB2.0/intel CNVi support)<br>1 x M.2 2242/2260/2280 M key (PCIe Gen3 x 4 NVMe)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |                                                                                                                                              |
|          | Audio Codec     | Realtek ALC888                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |                                                                                                                                              |
| AUDIO    | Interface       | 1 x Line-out<br>1 x Mic-in<br>1 x Line-in (opt.)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |                                                                                                                                              |
|          | Controller      | 1 x Intel® i219LM PCIe (10/100/1000Mbps) with iAMT 12.0 (Only Xeon, Core i7/i5 support iAMT)<br>1 x Intel® i211AT PCIe (10/100/1000Mbps)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          |                                                                                                                                              |
| ETHERNET | Indicators      | 1 x Power LED<br>1 x HDD LED                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |                                                                                                                                              |
| LED      | Ethernet        | 2 x GbE (RJ-45)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   |                                                                                                                                              |
| REAR I/O | Serial          | 1 x RS-232/422/485 (RS-232 w/ power) (DB-9)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                              |
|          | USB             | 2 x USB 3.1 Gen 2<br>2 x USB 3.1 Gen 1<br>2 x USB 2.0                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |                                                                                                                                              |
|          | Display         | 1 x HDMI<br>1 x DVI-I (DVI-D signal)<br>1 x DP++                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |                                                                                                                                              |
|          | Audio           | 1 x Line-out<br>1 x Mic-in<br>1 x Line-in (opt.)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  |                                                                                                                                              |
|          | PS/2            | 1 x PS/2 (mini-DIN-6)                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             |                                                                                                                                              |
|          | Buttons         | 1 x Power button<br>1 x Reset button                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              |                                                                                                                                              |
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## SPECIFICATION

|                                     |                              |                                                                  |
|-------------------------------------|------------------------------|------------------------------------------------------------------|
| <b>WATCHDOG TIMER</b>               | <b>Output &amp; Interval</b> | System Reset, Programmable via Software from 1 to 255 Seconds    |
| <b>SECURITY</b>                     | <b>TPM</b>                   | Infineon TPM1.2/2.0 (optional)                                   |
| <b>POWER</b>                        | <b>Supply</b>                | Flex ATX 150W/250W/350W/400W/500W (250W Default)                 |
| <b>COOLING</b>                      | <b>Fan</b>                   | 1 x 12cm system fan                                              |
| <b>OS SUPPORT</b>                   | <b>Microsoft</b>             | Windows 10                                                       |
|                                     | <b>Linux</b>                 | Linux                                                            |
| <b>ENVIRONMENT</b>                  | <b>Operating Temperature</b> | 0 to 45°C                                                        |
|                                     | <b>Storage Temperature</b>   | 0 to 60°C                                                        |
|                                     | <b>Relative Humidity</b>     | 5 to 95% RH (non-condensing)                                     |
| <b>MECHANICAL</b>                   | <b>Construction</b>          | Sheet Metal                                                      |
|                                     | <b>Mounting</b>              | Wall mount                                                       |
|                                     | <b>Dimensions(W x H x D)</b> | 349 x 140.2 x 290.9mm (13.74" x 5.52" x 11.45")                  |
|                                     | <b>Weight</b>                | 7.7kg                                                            |
|                                     | <b>Color</b>                 | no coating or black coating                                      |
| <b>STANDARDS AND CERTIFICATIONS</b> | <b>Shock</b>                 | Operating: 3G Non-operating: 5G                                  |
|                                     | <b>Vibration</b>             | Operating: Random 5~500Hz 0.5G Non-operating: Sine 10~500Hz 1.5G |
|                                     | <b>Package Drop</b>          | ISTA Project 1A                                                  |
|                                     | <b>Certification</b>         | CE, FCC Class A, RoHS                                            |

## ORDERING INFORMATION

| Model Name  | Part Number     | Description                                                     |
|-------------|-----------------|-----------------------------------------------------------------|
| WM343-CS350 | 750-WM3438-000G | WM343-CS, uATX System, Black, CS350-C246, 250W, F/G SYSTEM RoHS |
| WM343-CS350 | 750-WM3438-100G | WM343-CS, uATX System, Black, CS350-Q370, 250W, F/G SYSTEM RoHS |

## OPTIONAL ITEMS

| Optional Items | Part Number     | Description                                                  |
|----------------|-----------------|--------------------------------------------------------------|
| CPU            | TBD             | CPU Intel Core i7/i5/i3/Pentium/Celeron CPU                  |
| Memory         | TBD             | 4GB to 32GB, DDR4 U-DIMM RAM                                 |
| M.2 SSD        | TBD             | 32GB to 2TB, SATA/PCIe x4 M.2 2280 SSD                       |
| 2.5" SSD       | TBD             | 32GB to 1TB, SATA MLC/TLC 2.5" SSD                           |
| 2.5" HDD       | TBD             | 500GB to 2TB, SATA 2.5" HDD                                  |
| 3.5" HDD       | TBD             | 500GB to 16TB, SATA 3.5" HDD                                 |
| Wireless Kit   | TBD             | M.2 2230 WiFi5 or WiFi6, antenna kit.                        |
| Power Cord     | 785-PWRD        | Power Cord, Standards (USA/EUR/CH), 1.8m, RoHS for test only |
| Power Supply   | TBD             | AC/ATX FLEX 150W/250W/350W/400W/500W                         |
| Wall Mount     | 761-WM3410-000G | ACCESSORY WALL MOUNT KITS WM34x Series RoHS                  |

## PACKING LIST

|                                                        |
|--------------------------------------------------------|
| 1 WM343-CS350 System Unit                              |
| 1 CPU cooler                                           |
| 1 SATA Data Cable (Length: 650mm)                      |
| 4 HDD Screws                                           |
| 1 Quick Installation Guide                             |
| 1 PSU Flex ATX 150W/250W/350W/400W/500W (250W Default) |
| 1 System Fan                                           |