

# USER'S MANUAL

## **AIO Series**

All IN One Touch Panel PC



# Table of Contents

<b>Prefaces .....</b>	<b>03</b>
Revision .....	03
Disclaimer .....	03
Copyright Notice .....	03
Trademarks Acknowledgment .....	03
Environmental Protection Announcement .....	03
Safety Precautions .....	04
Technical Support and Assistance .....	05
Conventions Used in this Manual .....	05
Package Contents .....	06
Ordering Information .....	06
Available Models .....	06
<b>Chapter 1 Product Introductions .....</b>	<b>07</b>
1.1 Overview .....	08
Key Feature .....	08
1.2 Hardware Specification .....	09
1.3 System I/O .....	11
1.4 Mechanical Dimension .....	14
<b>Chapter 2 Front Panel Controls .....</b>	<b>17</b>
2.1 Users Controls .....	18
<b>Chapter 3 System Setup .....</b>	<b>19</b>
3.1 Replacement of Internal Modules .....	20
3.2 Replacement of Memory Module .....	21
3.3 Replacement of M.2 Storage Module .....	22
3.4 Install wireless network card and antenna .....	23
<b>Appendix .....</b>	<b>25</b>

## Prefaces

### Revision

Revision	Description	Date
1.0	Manual Released	2024/06/18

### Disclaimer

All specifications and information in this User's Manual are believed to be accurate and up to date. C&T Solution Inc. does not guarantee that the contents herein are complete, true, accurate or non-misleading. The information in this document is subject to change without notice and does not represent a commitment on the part of C&T Solution Inc.

C&T Solution Inc. disclaims all warranties, express or implied, including, without limitation, those of merchantability, fitness for a particular purpose with respect to contents of this User's Manual. Users must take full responsibility for the application of the product.

### Copyright Notice

All rights reserved. No part of this manual may be reproduced or transmitted in any form or by any means, electronic or mechanical, including photocopying, recording, or information storage and retrieval systems, without the prior written permission of C&T Solution Inc. Copyright © C&T Solution Inc.

### Trademarks Acknowledgment

Intel®, Celeron® and Pentium® are trademarks of Intel Corporation.

Windows® is registered trademark of Microsoft Corporation.

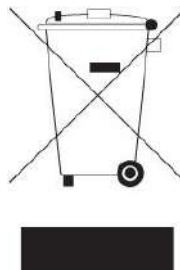
AMI is trademark of American Megatrend Inc.

IBM, XT, AT, PS/2 and Personal System/2 are trademarks of International Business Machines Corporation

All other products and trademarks mentioned in this manual are trademarks of their respective owners.

### Environmental Protection Announcement

Do not dispose this electronic device into the trash while discarding. Please recycle to minimize pollution and ensure environment protection.



## Safety Precautions

Before installing and using the equipment, please read the following precautions:

- Put this equipment on a reliable surface during installation. Dropping it or letting it fall could cause damage.
- The power outlet shall be installed near the equipment and shall be easily accessible.
- Turn off the system power and disconnect the power cord from its source before making any installation. Be sure both the system and the external devices are turned OFF. Sudden surge
- of power could ruin sensitive components. Make sure the equipment is properly grounded.
- When the power is connected, never open the equipment. The equipment should be opened only by qualified service personnel.
- Make sure the voltage of the power source is correct before connecting the equipment to the power outlet.
- Disconnect this equipment from the power before cleaning. Use a damp cloth. Do not use liquid or spray detergents for cleaning.
- Avoid the dusty, humidity and temperature extremes.
- Do not place heavy objects on the equipment.
- If the equipment is not used for long time, disconnect it from the power to avoid being damaged by transient over-voltage.
- The storage temperature shall be above  $-20^{\circ}\text{C}$  and below  $60^{\circ}\text{C}$ .
- The computer is provided with a battery-powered real-time clock circuit. There is a danger of explosion if incorrectly replaced. Replace only with the same or equivalent type recommended by the manufacturer.
- If one of the following situation arises, get the equipment checked by service personnel:
  - The power cord or plug is damaged.
  - Liquid has penetrated into the equipment.
  - The equipment has been exposed to moisture.
  - The equipment does not work well or it cannot work according the user's manual.
  - The equipment has been dropped and damaged.
  - The equipment has obvious signs of breakage.

## Technical Support and Assistance

1. Visit the C&T Solution Inc website at <https://www.candtsolution.com/> where you can find the latest information about the product.
2. Contact your distributor, our technical support team or sales representative for technical support if you need additional assistance. Please have following information ready before you call:
  - Model name and serial number
  - Description of your peripheral attachments
  - Description of your software (operating system, version, application software, etc.)
  - A complete description of the problem
  - The exact wording of any error messages

## Conventions Used in this Manual



### WARNING

This indication alerts operators to an operation that, if not strictly observed, may result in severe injury.



### CAUTION

This indication alerts operators to an operation that, if not strictly observed, may result in safety hazards to personnel or damage to equipment.



### NOTE

This indication provides additional information to complete a task easily.

## Package Contents

Before installation, please ensure all the items listed in the following table are included in the package.

Item	Description	Q'ty
1	AIO-200-ADL Series All IN One Touch Panel PC	1
2	Adapter 60W 12V 5A	1
3	128G M.2 B key SSD	1
4	8GB DDR5 4800 MT/s	1

## Ordering Information

Model No.	Description
1-E09A06012	Adapter Output 12V 5A 60W / Input 100-240V
3-WIFI0801S10	WIFI 6E Module KIT, Intel, 2T2R & BT 5.3
1-TCOM00041	COM cable (CT-240125-01/CHEN PERNG)

## Available Models

Model No.	Description
AIO-W210C-ADL	10.1" WXGA Capacitive All IN One Touch Panel PC with Intel® Alder lake N97 Processor
AIO-W215C-ADL	15.6" Full HD Capacitive All IN One Touch Panel PC with Intel® Alder lake N97 Processor
AIO-W221C-ADL	21.5" Full HD Capacitive All IN One Touch Panel PC with Intel® Alder lake N97 Processor

## Chapter 1

# Product Introductions

## 1.1 Overview



### Key Features

- 10.1" / 15.6" / 21.5" All IN One Touch Panel PC
- World Class Certifications for Safety and Reliability: CE/FCC/CB/UL/UKCA/IC
- Front IP65 Rating for protection against water and dust
- Scratch Resistant 7H Glass Hardness
- Versatile Display Outputs; HDMI and DP
- MTBF Up to 30,000 Hours
- MTBF Up to 50,000 Hours (AIO-W221-ADL only)





## 1.2 Hardware Specification

Display	AIO-W210-ADL	AIO-W215-ADL	AIO-W221-ADL
LCD Size	10.1" (16:10)	15.6" (16:9)	21.5" (16:9)
Max. Resolution	1280 x 800	1920 x 1080 (FHD)	1920 x 1080 (FHD)
Brightness (cd/m2)	400	400	500
Contrast Ratio	800:1	800:1	1,000:1
LCD Color	16.7M	16.7M	16.7M
Pixel Pitch (mm)	0.169(H) x 0.1695 (V)	0.17925 (H) x 0.17925 (V)	0.248 (H) x 0.248 (V)
Viewing Angle (H-V)	89/89/89/89 (Typ.) (CR>=10)	85 /85 /85 /85 (Typ.) (CR>=10)	89/89/89/89 (Typ.) (CR>=10)
Backlight MTBF	30,000 Hours	30,000 Hours	50,000 Hours

### Touch

- **Projected Capacitive**  
AIO-W210C / AIO-W215C / AIO-W221C
- **Surface Hardness**  
7H / IK07

### System

- **Processor**  
Intel® Processor N97 6M Cache,  
up to 3.60 GHz
- **System Chipset** SoC integrated
- **LAN Chipset**  
GbE1:  
Intel I225-V (Support Wake-on-LAN and PXE)  
GbE1:  
Intel I225-V (Support Wake-on-LAN and PXE)
- **Audio Codec**  
Realtek ALC897
- **System Memory**  
Default 8GB DDR5 4800MT/s SODIMM  
(up to 16GB)

### BIOS

AMI uEFI 8Mbit SPI BIOS

### Watchdog

Software Programmable Supports 1~255 sec.  
System Reset

### Storage

- **SSD/HDD**  
128G M.2 B Key SSD (Default)

### Expansion

- **M.2**  
M.2 E Key Support WiFi 6e (Optional)

## I/O

- **DisplayPort**  
HDMI / DP / LVDS / eDP
- **COM**  
2x RS-232/422/485 by internal cable
- **USB**  
6x USB 2.0 by internal cable (Customized)  
4x USB 3.2 Gen 2
- **LAN**  
2x 2.5G LAN
- **Audio**  
1x Audio out
- **Others**  
Support up to 6x Antenna (optional)

## Environment

- **Operating Temp**  
-10°C to 50°C
- **Storage Temp**  
-20°C to 60°C
- **Relative Humidity**  
10% to 80% (non-condensing)
- **Certification**  
CE, FCC, CB, UL, UKCA, IC
- **Vibration**  
IEC60068-2-64:2008  
With SSD: 3 Grms (5 - 500 Hz, 0.5 hr/axis)  
Designed to comply with MIL-STD-810G Method  
514.7 Procedure I
- **Shock**  
IEC60068-2-27:2008  
With SSD: 20G half-sin 11ms  
Designed to comply with MIL-STD-810G Method  
516.7 Procedure I

## Operating System

- **Windows**  
Windows 10 / Windows 11
- **Linux**  
Linux Ubuntu 22.04

## Power

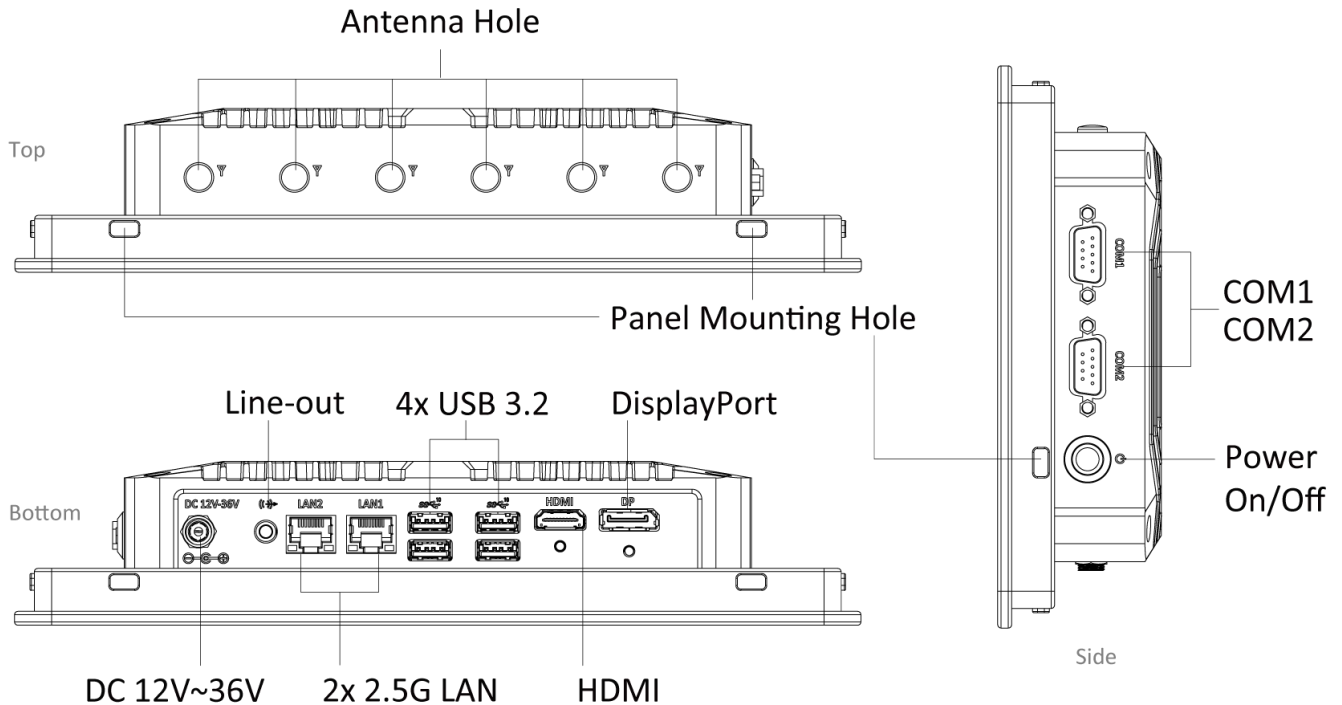
- **Power Adapter**  
60W (12V 5A, Default)
- **Power Supply Voltage**  
DC 12~36V
- **Power Connector**  
DC Jack 5.5mm/2.5mm

## Physical

- **Dimension**
  1. AIO-W210-ADL :  
256 (W) x 170 (H) x 50 (D) mm
  2. AIO-W215 -ADL:  
400 (W) x 249 (H) x 50 (D) mm
  3. AIO-W221-ADL :  
538 (W) x 329 (H) x 62 (D) mm
- **Weight**
  1. AIO-W210 : 1.4 Kg
  2. AIO-W215 : 2.3 Kg
  3. AIO-W221 : 5.2 Kg
- **Mounting**  
Panel Mounting Holes M3

## 1.3 System I/O

### 1.3.1 AIO-W210-ADL



#### Power On/Off

Press to power-on or power-off the system

#### USB 3.2 Gen 2 port

Used to connect USB 3.2 device

#### Line-out

Used to connect a speaker

#### DC IN

Used to plug a DC power input with terminal Block

#### COM port

COM1 ~ COM2 support RS232/422/485 serial device

#### LAN port

Used to connect the system to a local area network

#### DisplayPort

Used to connect a DisplayPort monitor

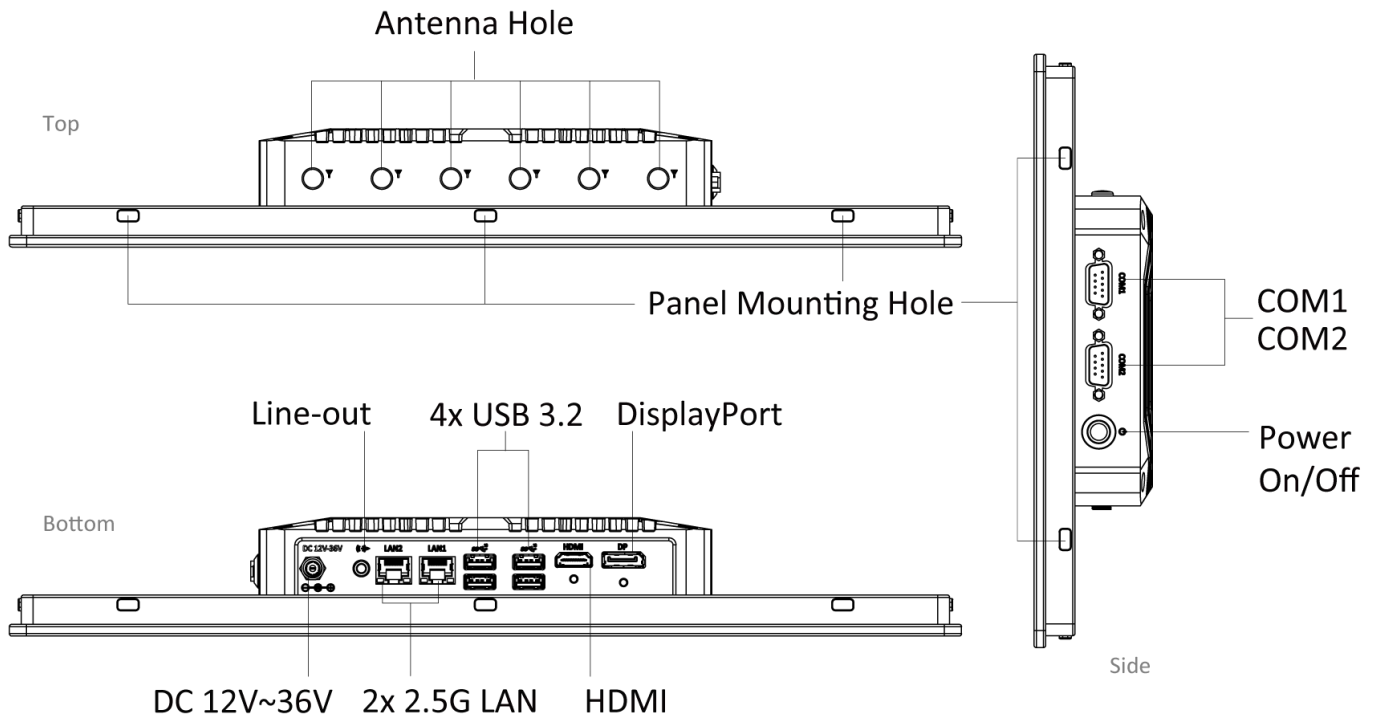
#### HDMI

Used to connect a HDMI monitor

#### Antenna hole

Used to connect an antenna for optional WiFi module

### 1.3.2 AIO-W215-ADL



#### Power On/Off

Press to power-on or power-off the system

#### USB 3.2 Gen 2 port

Used to connect USB 3.2 device

#### Line-out

Used to connect a speaker

#### DC IN

Used to plug a DC power input with terminal Block

#### COM port

COM1 ~ COM2 support RS232/422/485 serial device

#### LAN port

Used to connect the system to a local area network

#### DisplayPort

Used to connect a DisplayPort monitor

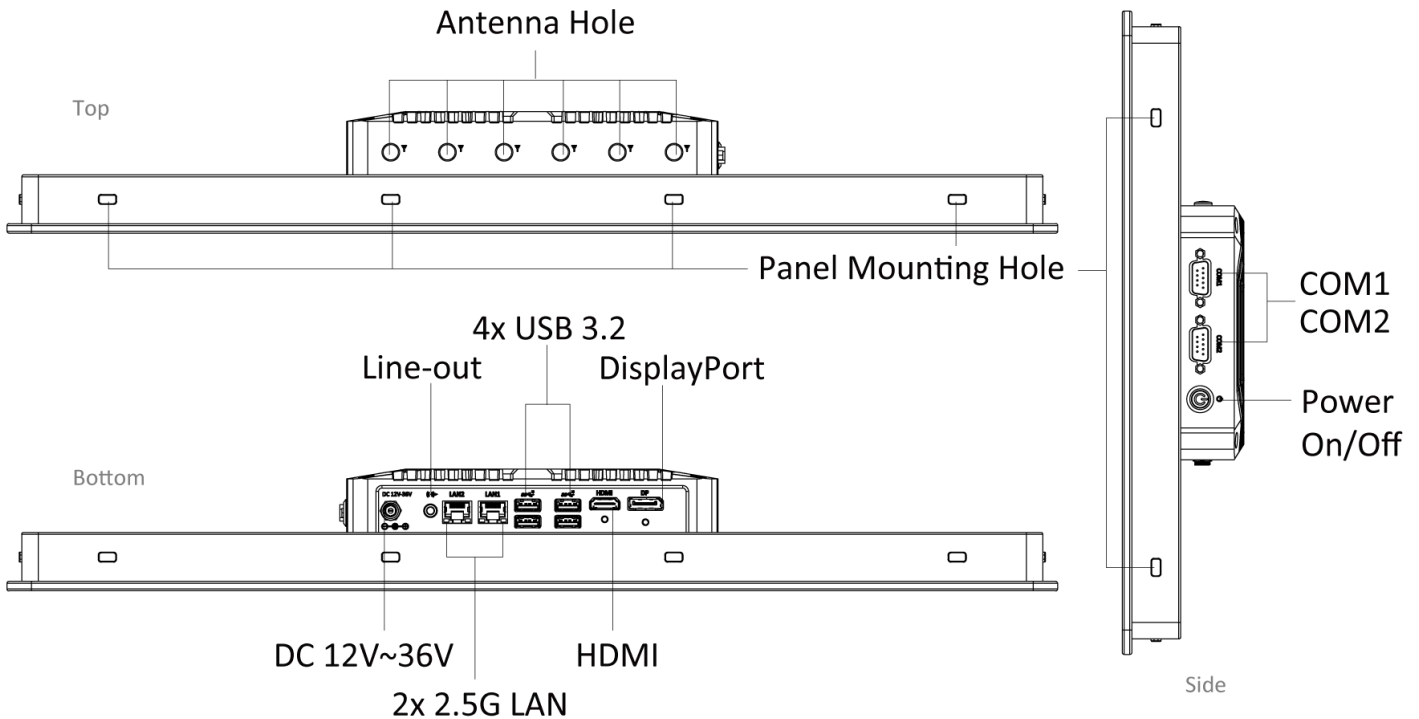
#### HDMI

Used to connect a HDMI monitor

#### Antenna hole

Used to connect an antenna for optional WiFi module

### 1.3.3 AIO-W221-ADL



#### Power On/Off

Press to power-on or power-off the system

#### USB 3.2 Gen 2 port

Used to connect USB 3.2 device

#### Line-out

Used to connect a speaker

#### DC IN

Used to plug a DC power input with terminal Block

#### COM port

COM1 ~ COM2 support RS232/422/485 serial device

#### LAN port

Used to connect the system to a local area network

#### DisplayPort

Used to connect a DisplayPort monitor

#### HDMI

Used to connect a HDMI monitor

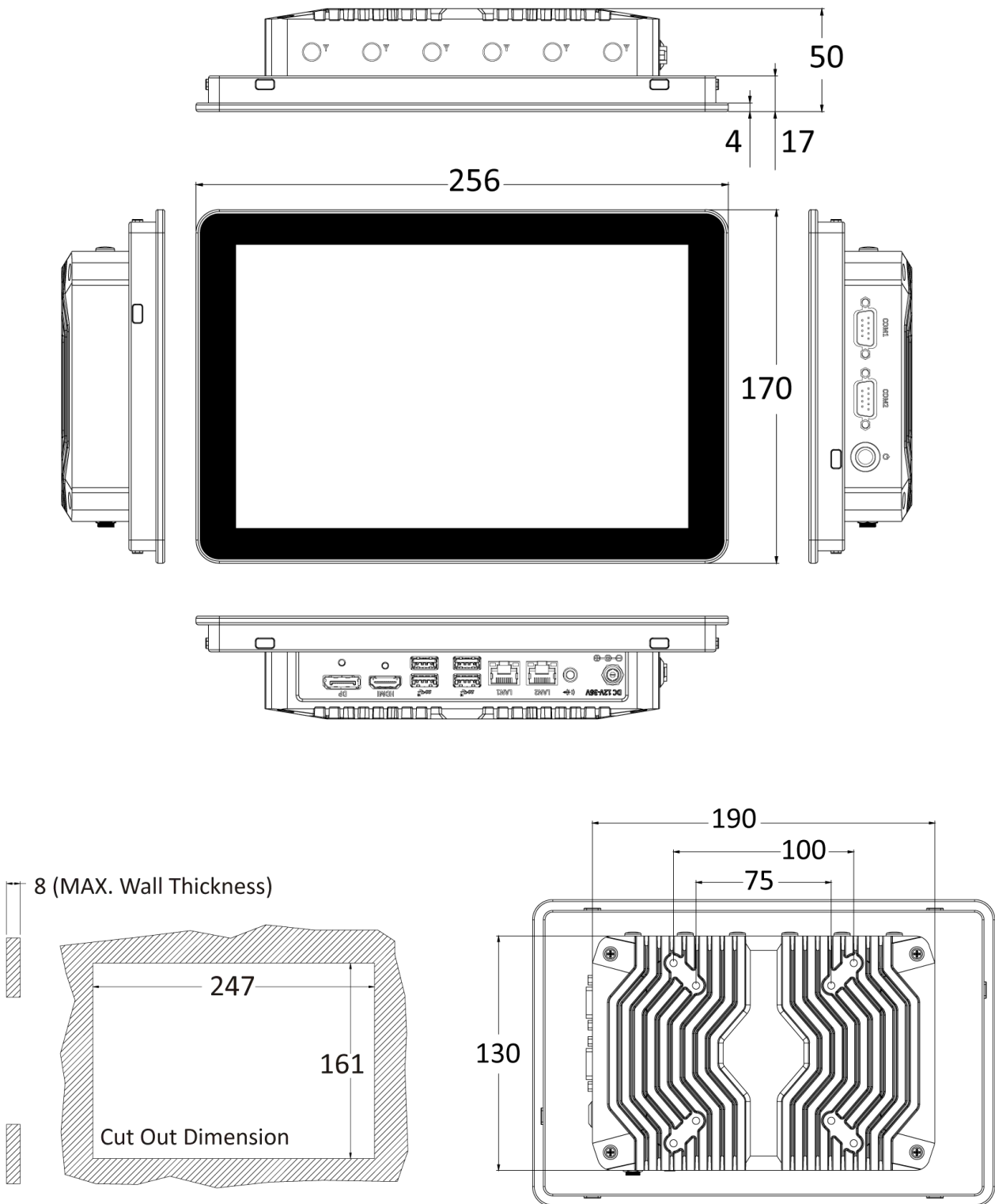
#### Antenna hole

Used to connect an antenna for optional WiFi module

# 1.4 Mechanical Dimensions

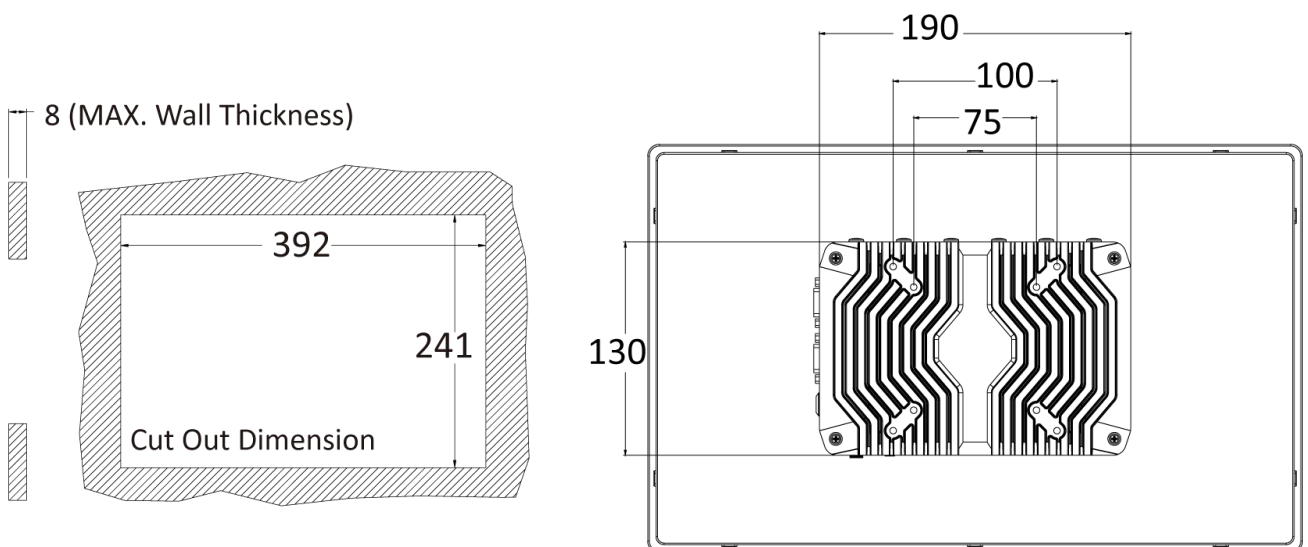
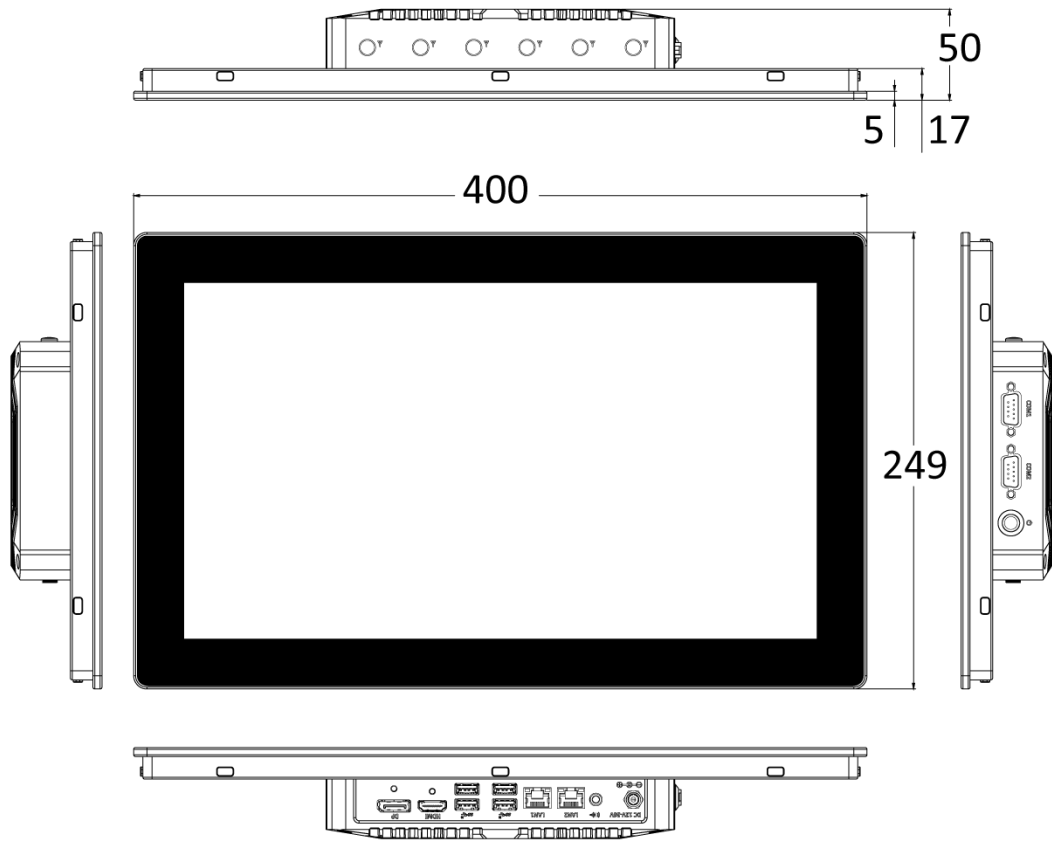
## 1.4.1 AIO-W210-ADL

Unit: mm



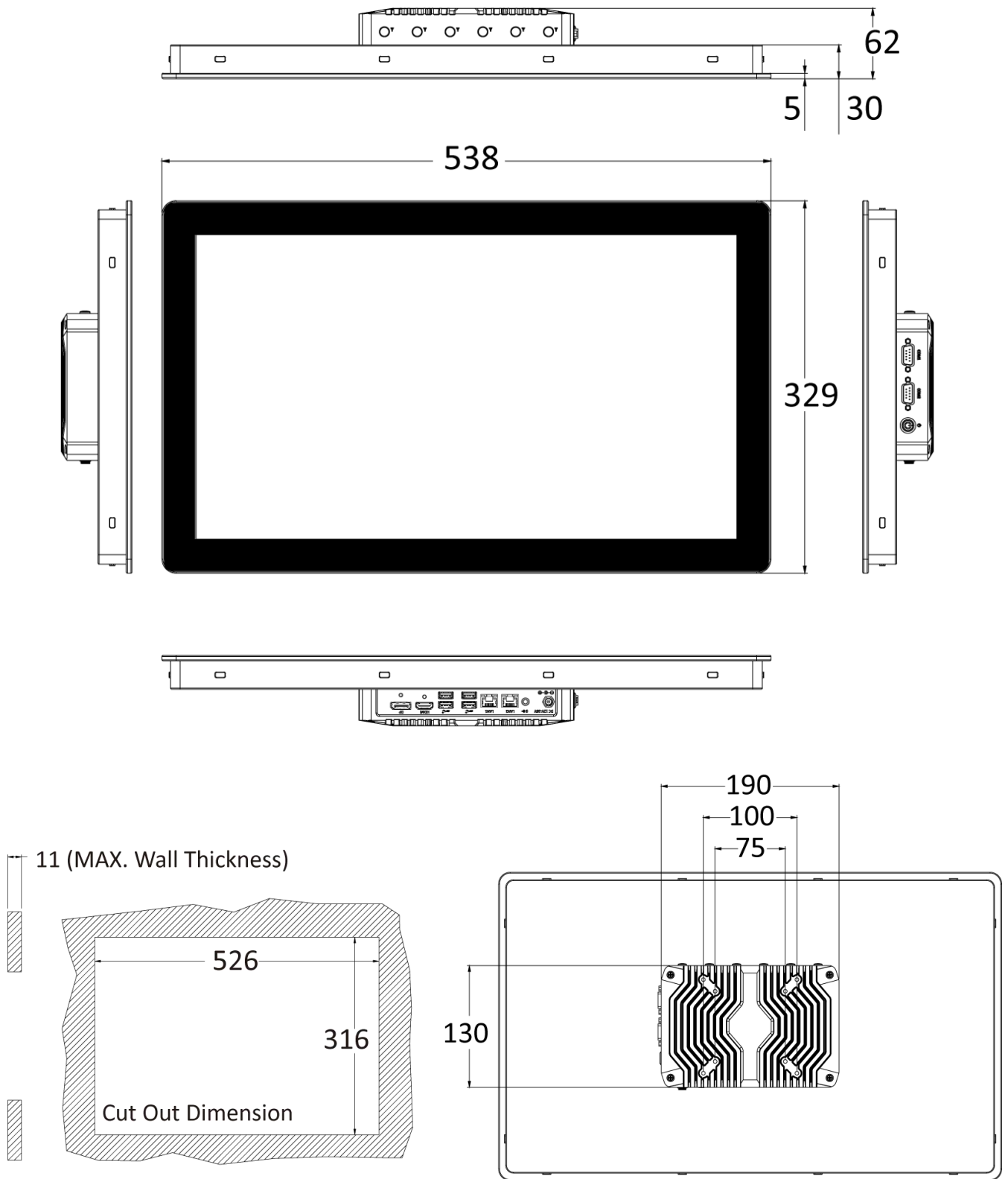
### 1.4.2 AIO-W215-ADL

Unit: mm



### 1.4.3 AIO-W221-ADL

Unit: mm

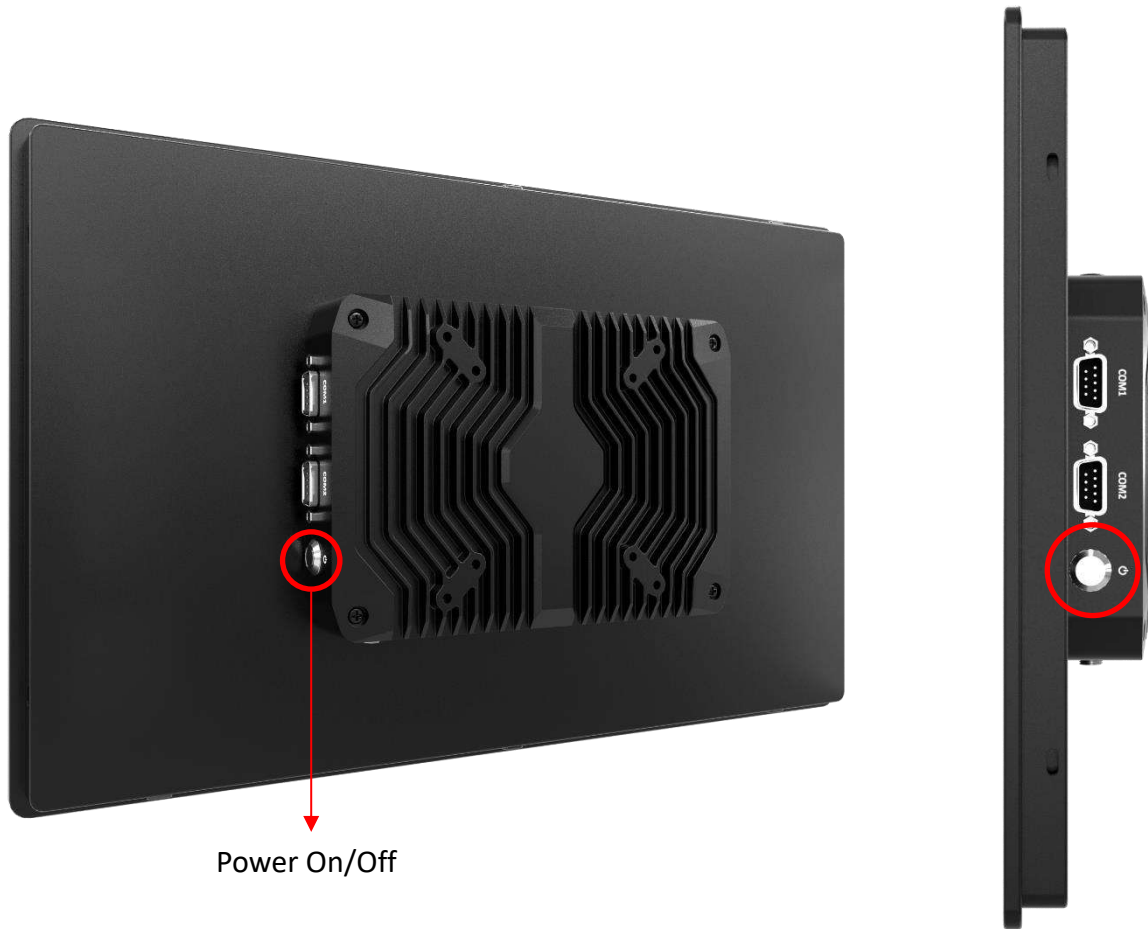





**Chapter 2**

# **Panel Controls**

## 2.1 Users Controls



Power On/Off

 **Power Button**  
System power on or off.

## Chapter 3

# System Setup

Set torque force to 3.5 kgf-cm to execute all the screwing and unscrewing.

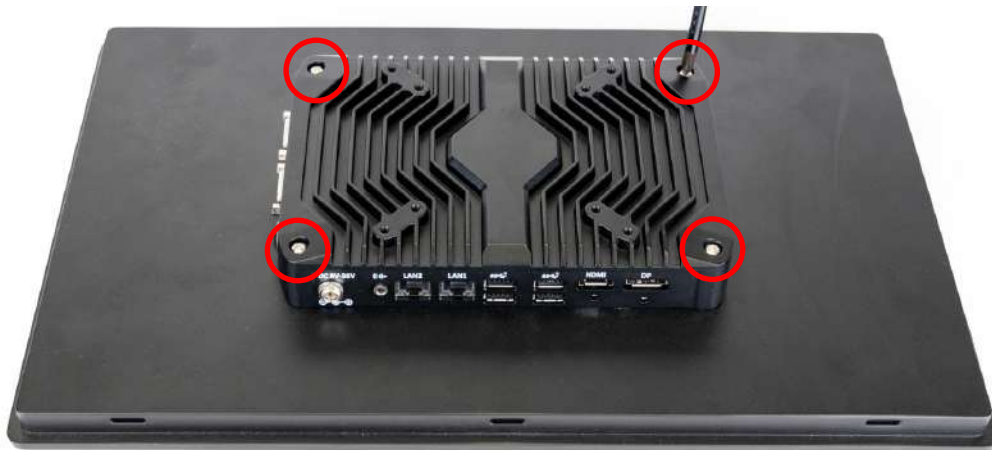
### 3.1 Replacement of Internal Modules



**WARNING**

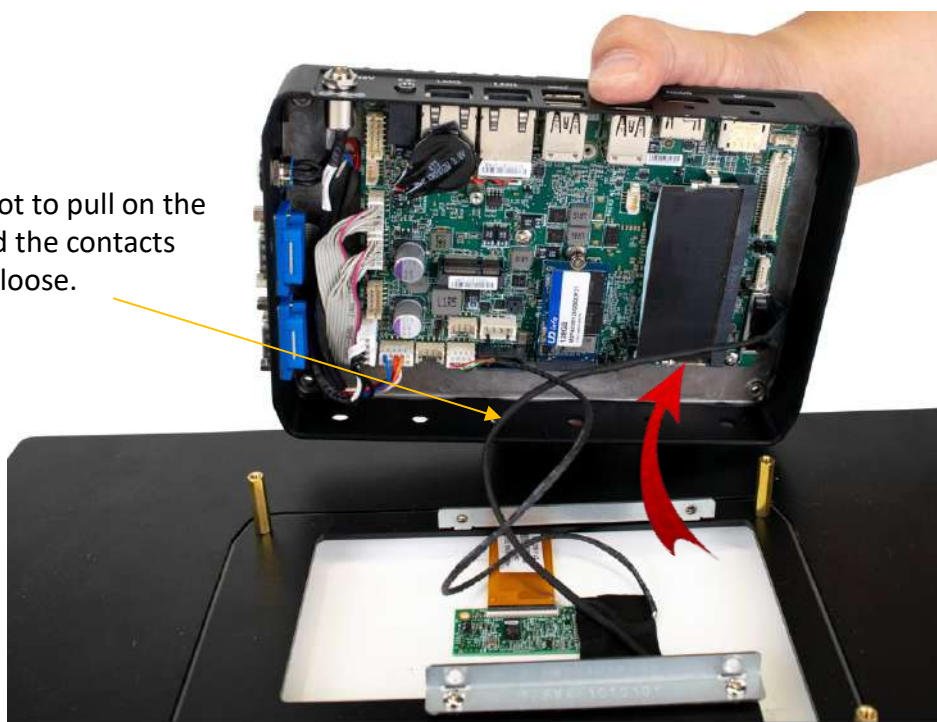
In order to prevent electric shock or system damage, before removing the chassis cover, must turn off power and disconnect the unit from power source.

1. Use a screwdriver to remove the four screws securing the back cover.



2. After removing the screws, detach the main unit from the screen.

\*Be careful not to pull on the cable to avoid the contacts from coming loose.



## 3.2 Replacement of Memory Module

1. Pull out the locking tabs on both sides of the memory slot to release the memory module, allowing it to pop out.



2. After the memory module pops up, pull it out. Carefully remove the thermal pad underneath the memory module.



### 3.3 Replacement of M.2 Storage Module

1. Use a screwdriver to remove the single screw securing the M.2 card. After removing the M.2 card, carefully remove the thermal pad underneath.



## 3.4 Install wireless network card and antenna

1. Install the network card in the designated red frame and secure it with screws.



2. Ensure the internal antenna is securely connected to the network card, and the antenna interface is properly installed in the designated opening on the chassis cover.

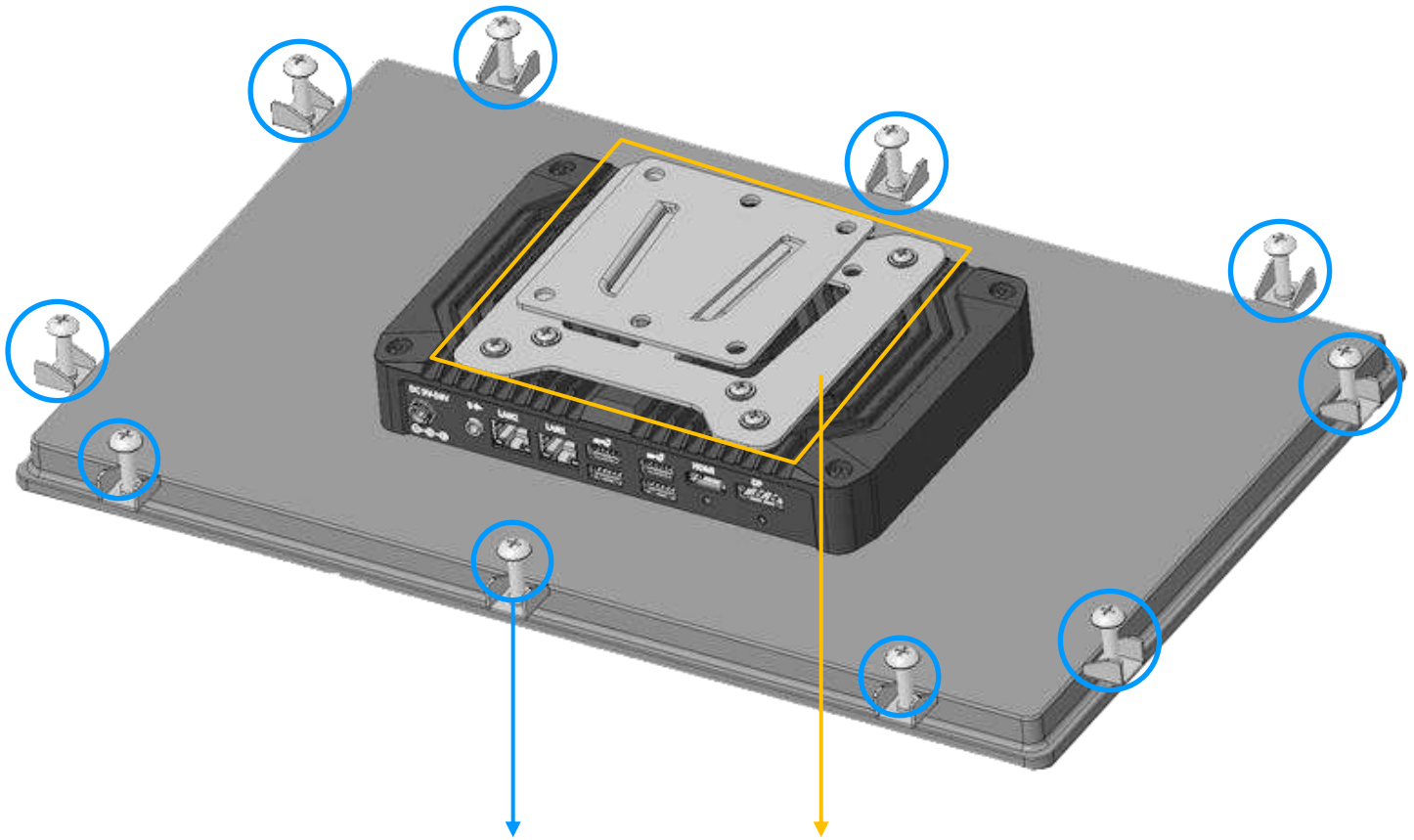


3. Connect the external antenna to the internal antenna, reattach the main unit to the screen following the original steps, and secure it with the four screws.





## VESA Mount / Panel Mount:



Panel mount bracket

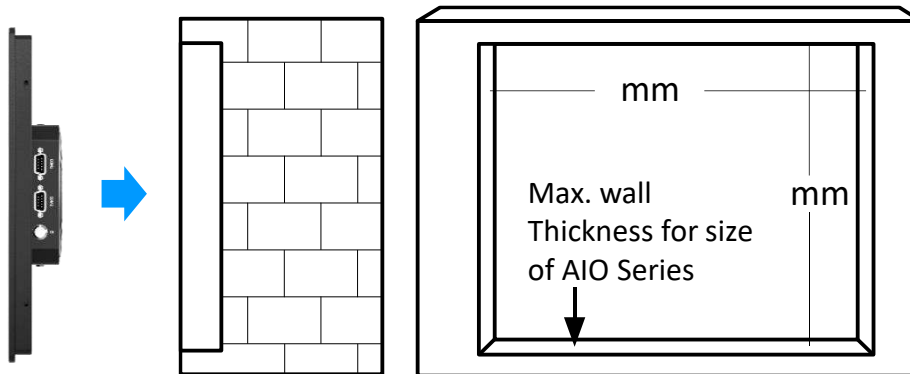
VESA mount bracket  
(75mm x 75mm/100mm x 100mm)

Model	Panel Mount Kit
AIO-W210-ADL	6
AIO-W215-ADL	10
AIO-W221-ADL	12

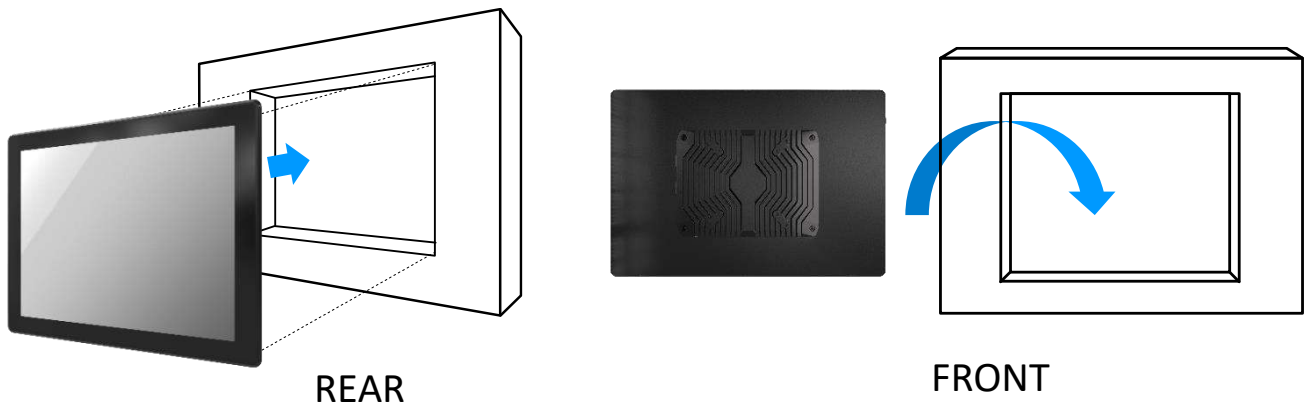
## Mounting Guide

### Flush Mount / Panel Mount:

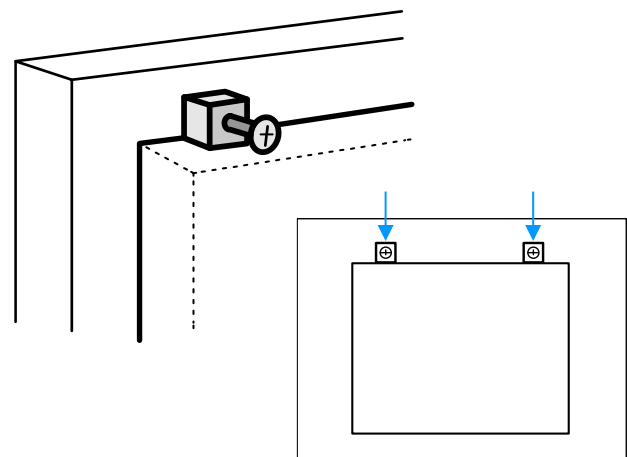
- Cut hole in the wall w/ dimensions according to the screen size you have purchased. Please refer to the next page for the list of cutout dimensions and max wall depths



- From the FRONT of the wall, place the AIO Panel PC with its rear (display screen forward) into the measured cutout hole.



- Install the mounting clips around the AIO and screw them in to secure against the wall. If the wall's thickness is greater than maximum wall thickness allowed, the clips will not fit. Please refer to the next page for the list of max wall depths



## AIO Series

Model	Wall Cut-Out (W x H) Unit: mm	Max Wall Thickness (mm)
AIO-W210-ADL	247 x 161	8
AIO-W215-ADL	392 x 241	8
AIO-W221-ADL	526 x 316	11

