AID-173M

17.3” Medical PC

Quick Reference Guide

1st Ed – 15 September 2014

Part No. E2017A7M0A0R

FCC Statement

THIS DEVICE COMPLIES WITH PART 15 FCC RULES. OPERATION IS SUBJECT TO THE FOLLOWING TWO CONDITIONS:

(1) THIS DEVICE MAY NOT CAUSE HARMFUL INTERFERENCE.

(2) THIS DEVICE MUST ACCEPT ANY INTERFERENCE RECEIVED INCLUDING INTERFERENCE THAT MAY CAUSE UNDESIRED OPERATION.

THIS EQUIPMENT HAS BEEN TESTED AND FOUND TO COMPLY WITH THE LIMITS FOR A CLASS "A" DIGITAL DEVICE, PURSUANT TO PART 15 OF THE FCC RULES.

THESE LIMITS ARE DESIGNED TO PROVIDE REASONABLE PROTECTION AGAINST HARMFUL INTERFERENCE WHEN THE EQUIPMENT IS OPERATED IN A COMMERCIAL ENVIRONMENT. THIS EQUIPMENT GENERATES, USES, AND CAN RADIATE RADIO FREQUENCY ENERGY AND, IF NOT INSTATLLED AND USED IN ACCORDANCE WITH THE INSTRUCTION MANUAL, MAY CAUSE HARMFUL INTERFERENCE TO RADIO COMMUNICATIONS.

OPERATION OF THIS EQUIPMENT IN A RESIDENTIAL AREA IS LIKELY TO CAUSE HARMFUL INTERFERENCE IN WHICH CASE THE USER WILL BE REQUIRED TO CORRECT THE INTERFERENCE AT HIS OWN EXPENSE.

A Message to the Customer

Avalue Customer Services

Each and every Avalue's product is built to the most exacting specifications to ensure reliable performance in the harsh and demanding conditions typical of industrial environments. Whether your new Avalue device is destined for the laboratory or the factory floor, you can be assured that your product will provide the reliability and ease of operation for which the name Avalue has come to be known.

Your satisfaction is our primary concern. Here is a guide to Avalue's customer services. To ensure you get the full benefit of our services, please follow the instructions below carefully.

Technical Support

We want you to get the maximum performance from your products. So if you run into technical difficulties, we are here to help. For the most frequently asked questions, you can easily find answers in your product documentation. These answers are normally a lot more detailed than the ones we can give over the phone. So please consult the user's manual first.

To receive the latest version of the user's manual; please visit our Web site at:
http://www.avalue.com.tw/

Content

1. Getting Started

1.1 Safety Precautions

Warning!

Always completely disconnect the power cord from your chassis whenever you work with the hardware. Do not make connections while the power is on. Sensitive electronic components can be damaged by sudden power surges. Only experienced electronics personnel should open the PC chassis.

Caution!

Always ground yourself to remove any static charge before touching the CPU card. Modern electronic devices are very sensitive to static electric charges. As a safety precaution, use a grounding wrist strap at all times. Place all electronic components in a static-dissipative surface or static-shielded bag when they are not in the chassis.

1.2 Packing List

- 1 x AID-173M Medical PC
- 1 x Adapter
- 1 x Power cord

If any of the above items is damaged or missing, contact your retailer.

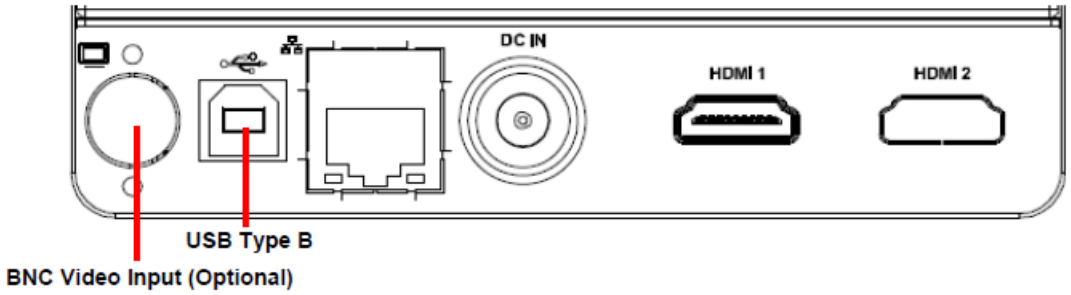
1.3 System Specifications

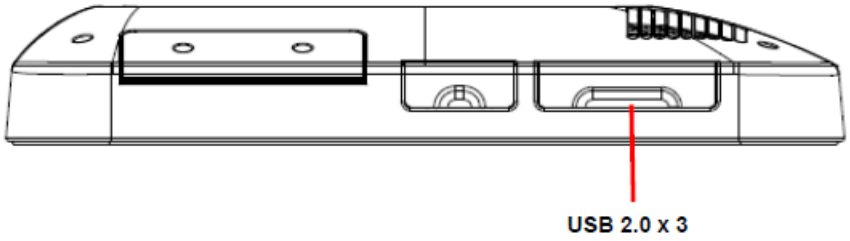
Component	
Board	Power Board AID-173M AD Board AV2362 Side Board AUX-AID173-IO
Adapter	60W 19V@3.15A IEC/EN 60601-1 Medical Adapter
System Fan	Fan-less
Microphone	1 x System Microphone
Speaker	2 x 2W High Quality System Speakers
Camera	1 x 2.0M Camera
Panel	
LCD Panel	17.3” TFT-LCD 1920*1080 from AUO / CMO-Innolux
LCD Control Board	LCD Built-in Inverter
B/L Inverter/Converter	LCD Built-in LED Backlight
Touch Screen	17.3” Resistive Touch Panel
Touch Controller	Built-in Touch controller
External I/O	
Serial Port	1 x RS-232 1 x RS-232/422/485
USB Port	3 x USB 2.0 Port
Video Port	2 x HDMI Input
Audio Port	1 x Earphone 1 x Mic
Switch	Capacitive Touch Button
Indicator Light	1 x Orange/Green LED Indicator (System) 1 x Green LED Indicator (Touch Button)
Expansion Slots	2 x Mini PCIe sockets
Mechanical	
Power Type	DC 12 ~ 19V
Power Connector Type	5.5 x 2.5 x 9.5 DC Jack
Dimension	448 (L) x 281 (H) x 45 (D) mm (w/o MSR/HS)
Weight	4.5Kgs
Color	White without Antimicrobial paint
Fan-less	Full System Fan-less
Reliability	
EMI Test	CE Class B, FCC Class B, (EN60601-1-2 based upon customers’ request)
Safety	(EN 60601-1, UL 60601-1 based upon customers’ request)

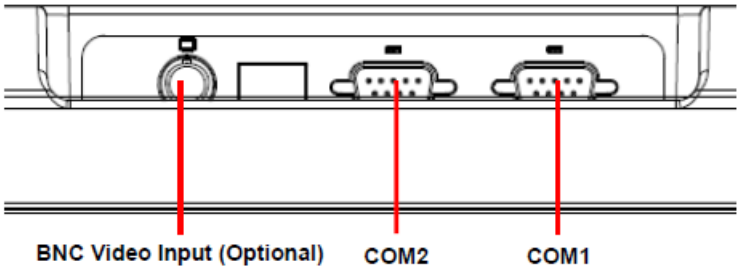
Dust and Rain Test	IP-65 on Front Panel
Vibration Test	Standard (0.00454G²/Hz,1.5Grms 5 ~ 500Hz)
Mechanical Shock Test	Standard
Drop Test	EC-60068-2-32 (96.5cm)
Operating Temperature	0 ~ 40C
Operating Humidity	10 ~ 80%
Storage Temperature	-20 ~ 45C

1.4 System Overview

1.4.1 I/O View



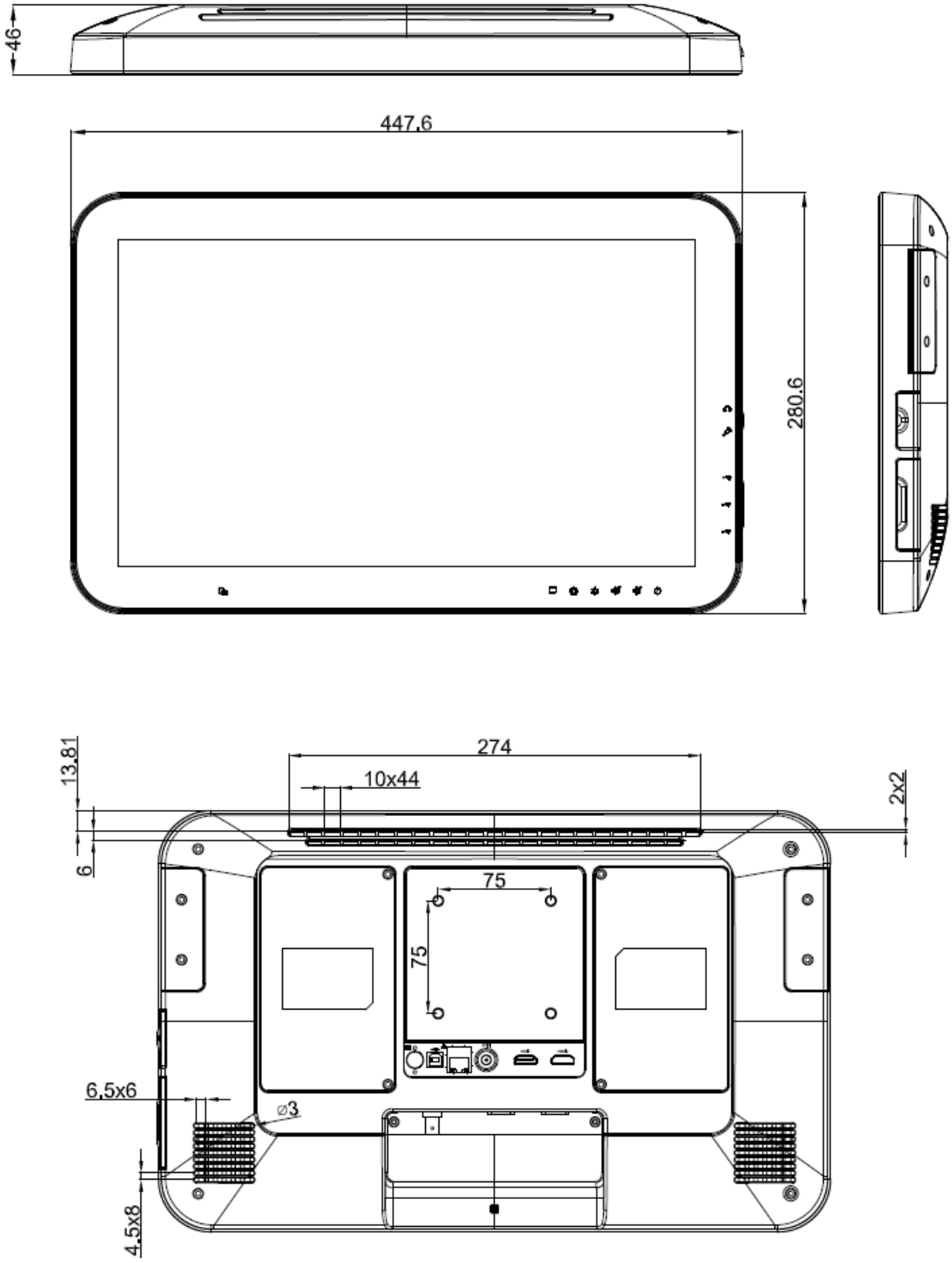




Connectors

Label	Function	Note
USB Type	USB connector	
USB	3 x USB 2.0 connector	
HDMI1/2	HDMI 1/2 input connector	
DC IN	connect to adapter	
BNC Video Input	For TV Tuner Card (Optional)	
COM1/2	External Serial Port 1/2 connector (Optional RS-422/485 for COM2)	DB-9 male connector

1.5 System Dimensions



(Unit: mm)

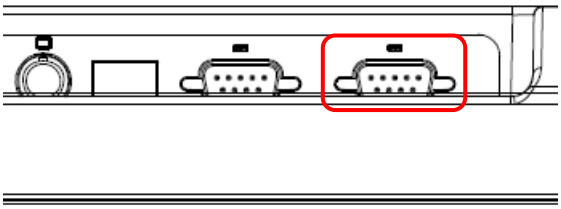
2. Hardware Configuration

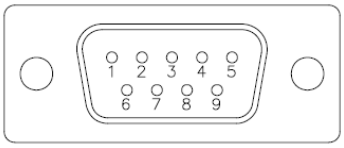
Note: If you need more information, please visit our website:

http://www.avalue.com.tw

2.1 AID-173M connector setting

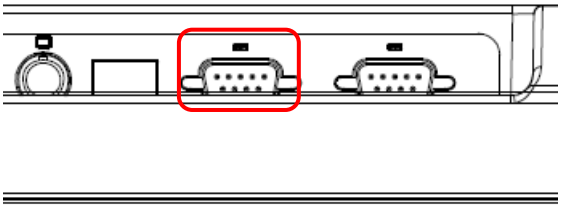
2.2.1 External Serial Port 1 connector (COM1)

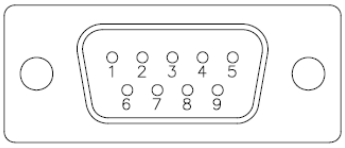




Signal	PIN	PIN	Signal
DCDA#	1	2	RXDA
TXDA	3	4	DTRA#
GND	5	6	DSRA#
RTSA#	7	8	CTSA#
RIA#	9		

2.2.2 External Serial Port 2 connector (COM2)





In RS-232 Mode

Signal	PIN	PIN	Signal
DCDB#	1	2	RXDB
TXDB	3	4	DTRB#
GND	5	6	DSRB#
RTSB#	7	8	CTSB#
RIB#	9		

In RS-422 Mode

Signal	PIN	PIN	Signal
TxD1-	1	2	TxD1+
RxD1+	3	4	RxD1-
GND	5	6	NC
NC	7	8	NC
NC	9		

In RS-485 Mode

Signal	PIN	PIN	Signal
DATA1-	1	2	DATA1+
NC	3	4	NC
GND	5	6	NC
NC	7	8	NC
NC	9		