SPC-1840WP
SPC-2140WP

18.5" WXGA TFT/21.5" Full HD LED LCD Stationary Multi-Touch Panel Computer

iF product design award

2013
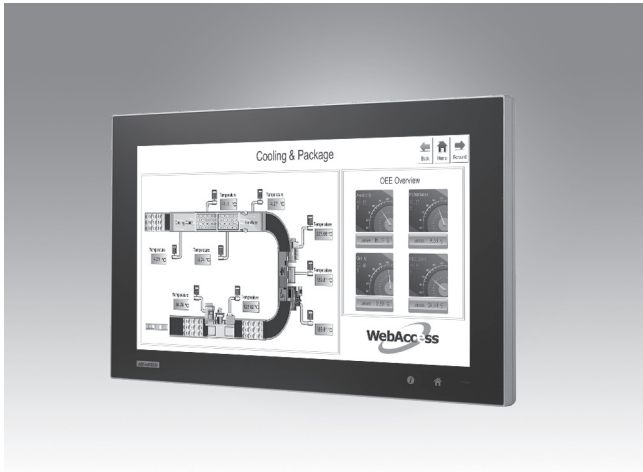
Features

- 21.5" Full HD TFT LED LCD/18.5" WXGA TFT LED LCD
- AMD dual-core T56E 1.65 GHz processor with independent GPU for advanced graphics performance
- 16:9 widescreen with PCAP multi-touch control
- Built-in function key and home key for intuitive operation
- Anti-scratch surface with 7H hardness
- IP65 rating for entire unit with waterproof M12 connector
- Supports expansion via mini PCIe slot
- Front-facing LED indicators for showing operating status
- Fanless cooling system
- Winner of the 2013 iF product design award

Introduction

The SPC-1840WP/2140WP series of multi-touch panel computers feature an 18.5" WXGA/21.5" Full HD TFT LED LCD with a 16:9 widescreen aspect ratio and PCAP multi-touch control. Powered by an AMD T56E 1.65 GHz processor with independent GPU, SPC-1840WP/2140WP can support advanced graphics performance for complex applications. The built-in function key and home key offer enhanced usability and intuitive operation. The SPC-1840WP/2140WP also includes a full-size mini PCIe slot for extending the system functionalities to satisfy diverse application needs. Moreover, to ensure reliable operation in harsh environments, SPC-1840WP/2140W is IP65 rated for protection from water and dust ingress and features waterproof M12 connectors. Finally, with the provision of vertical I/O connectors, cable routing is convenient and easy to complete regardless of mount variation.

Specifications

General

Certification	BSMI, CCC, CE, FCC Class A, UL
Cooling System	Fanless design
Dimensions (W x H x D)	21.5": 558.4 x 349.8 x 65 mm (21.98 x 13.77 x 2.56 in) 18.5": 488 x 309 x 65 mm (19.21 x 12.17 x 2.56 in)
Enclosure	Front bezel: Die cast aluminum alloy Back housing: Die cast aluminum alloy
Mounting	VESA Arm
OS Support	Microsoft® Windows 7/8, WES7P, Windows XP, WES2009
Power Consumption	35 W Typical
Power Input	24 V_{DC}
Weight (Net)	9 kg (19.8 lbs)

System Hardware

CPU	AMD G-series T56N 1.6GHz
Chipset	AMD A50M FCH
Memory	4 GB SODIMM DDR3 SDRAM
LAN	10/100/1000BASE-T x 2 (connection:M12 A-coded, 8-pin female)
Expansion Slots	1 x Full-sized mini PCIe slot (optional)
Storage	1 x 2.5" SATA HDD bracket
I/O	1 x RS-232 (connection: M12 A-coded, 8-pin male) 1 x USB 2.0 (connection: M12 A-coded, 8-pin female) 1 x 24 V_{DC} power input (connection: M12 A-coded, 5-pin male)

LCD Display

|	
Display Type	21.5": Full HD TFT LED LCD 18.5": WXGA TFT LED LCD
Display Size	21.5" / 18.5"
Max. Resolution	21.5": 1920 x 1080 18.5": 1366 x 768
Max. Colors	16.7M
Luminance cd/m²	300
Viewing Angle (H/V°)	21.5": 178/178 18.5": 170/160
Backlight Life	50,000 hr

Touchscreen

Light Transmission	≥88%
Resolution	4096*4096 dot
Type	Projected capacitive

Environment

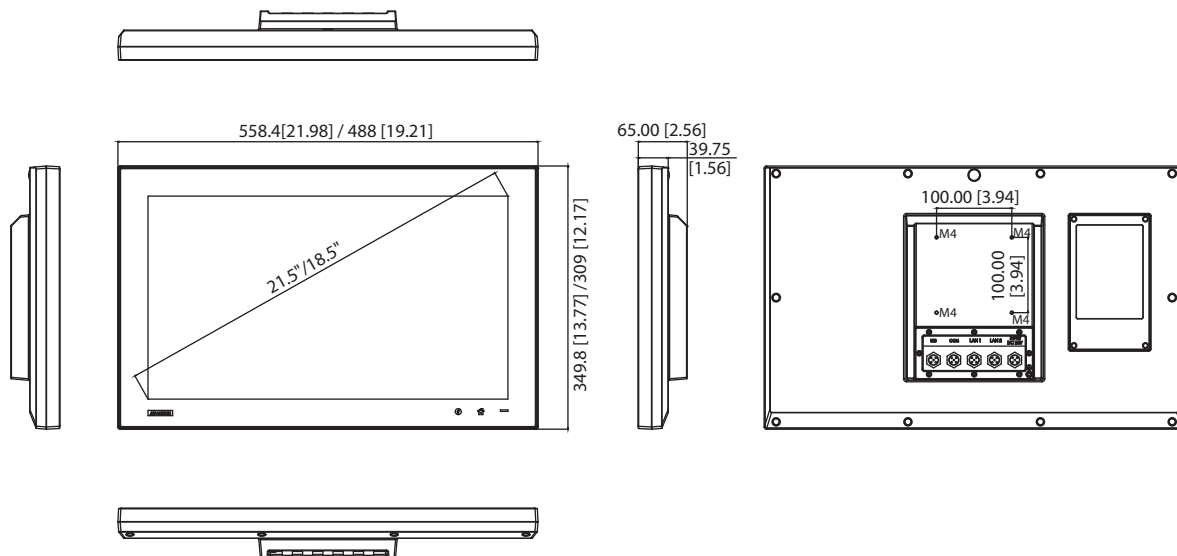|	
Humidity	10 ~ 95% RH @ 40 °C, non-condensing **Note:** Tested for 48 hr
Ingress Protection	IP65 rating for entire system
Operating Temperature	0 ~ 55 °C (32 ~ 131 °F)
Storage Temperature	-20 ~ 60 °C (-4 ~ 140 °F)
Vibration Protection	With HDD: 1 Grms (5 ~ 500 Hz) (Operating, random vibration)

Rear View
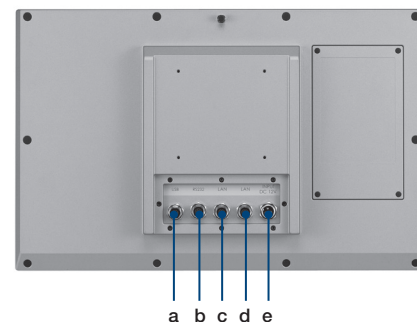
a. USB 2.0 with M12 connector
b. COM (RS-232) with M12 connector
c. LAN 1 with M12 connector
d. LAN 2 with M12 connector
e. 24 V_{DC} input with M12 connector

Dimensions

Unit: mm [inch]

558.4[21.98] / 488 [19.21]

65.00 [2.56]

39.75 [1.56]

349.8 [13.77] /309 [12.17]

21.5"/18.5"

100.00 [3.94]

M4 M4

100.00 [3.94]

M4 M4

Ordering Information

- **SPC-2140WP-T3AE** — 21.5" full-HD stationary Multi-Touch Panel PC, 4GB
- **SPC-1840WP-T3AE** — 18.5" WXGA stationary Multi-Touch Panel PC, 4GB

Optional Accessories

- **1702002600** — Power Cable US Plug 1.8 M
- **1702002605** — Power Cable EU Plug 1.8 M
- **1702031801** — Power Cable UK Plug 1.8 M
- **1700000596-11** — Power Cable China/Australia Plug 1.8 M
- **EWM-W151H01E** — 802.11bgn RTL8188EE 1T1R, Half-size Mini-PCIe (also need 9656EWMG00E)
- **9656EWMG00E** — Half-size miniPCIe to Full-size miniPCIe bracket set
- **1750007668-01** — Waterproof Wireless Antenna R/P SMA.M2dB L=86.7
- **1750003418** — Wireless Antenna AN2400-5901RS R/P SMA.M9dB
- **SPC-1840WP-MCKE** — M12 cable accessory kit for SPC series
- **SPC-1840WP-MOKE** — M12 Connector accessory kit for SPC series

Application Software

WebAccess/SCADA	Advantech WebAccess/SCADA is a 100% browser-based IIoT software platform aimed at supervisory control and data acquisition (SCADA) operations. WebAccess/SCADA provides open interfaces that allow our customers and partners to develop unique IoT applications for different vertical markets. In addition to supporting traditional SCADA functions, the platform features an HTML5-based user interface and intelligent dashboard to facilitate cross-platform, cross-browser data analysis. Moreover, WebAccess/SCADA not only offers built-in widgets, but is also equipped with an innovative Widget Builder that enables customers to build their own widgets.
WebAccess/HMI	Advantech WebAccess/HMI is human-machine interface (HMI) software based on Microsoft's Windows operating system. This software features excellent communication and monitoring capabilities, supports more than 350 PLC communication protocols, and offers a wide choice of screen design objects to satisfy diverse integrations of factory automation and HMI operation and monitoring requirements.