# **TPC-1751T**

## 17" SXGA TFT LED LCD Intel® Atom™ Thin Client Terminal



#### **Features**

- Industrial 17" SXGA TFT LCD with 50K Lifetime LED Backlight
- Intel® Atom™ E3827 1.75 GHz Processor with 4GB (8GB optional) DDR3L SDRAM
- Support wide operating temperatures -20~60°C
- Compact Fanless Embedded System with Al Alloy Front Bezel
- True-flat with IP66 / non-flat with IP65 certified front panel protection
- Durable 5-wire Resistive Touch Screen
- Full-size Mini PCle Expansion Support
- Supports iDoor technology for diverse applications (optional accessory required)
- Chassis Grounding Protection
- Supports USB 3.0



#### Introduction

The TPC-1751T thin client terminal with a 17" SXGA LCD, low power embedded Intel® Atom™ E3827 1.75 GHz Processor and 4GB (8GB optional) DDR3L SDRAM provides computing performance in a compact fanless system. To enhance its durability, the TPC-1751T is true-flat touch screen designed with IP66 front protection, die-cast Al Alloy front bezel and 5-wire resistive touch. It supports wide operating temperatures -20~60°C and includes full size mini-PCle slot to extend the functionality and meet a variety of automation applications needs. Through the Mini-PCle slot, Advantech iDoor technology (optional) can provide more I/O connectors, Isolated Digital IO, the Fieldbus Protocol, 3G/GPS/GPRS/WiFi Communication and Battery-backup MRAM.

## **Specifications**

#### General

■ BIOS AMI UEFI

Certification
 BSMI, CCC, CE, FCC Class A, UL

• Cooling System Fanless design

Dimensions (W x H x D) 410.4 x 343.4 x 61.9 mm (16.16" x 13.52" x 2.44")

• **Enclosure** Front bezel: Die-cast Aluminum alloy

Back housing: SECC

Mounting Desktop, Wall or Panel Mount

OS Support
 Microsoft® WES7 64bit / WE8S 64bit / Windows 7

32bit/64bit

Power Consumption 30 W (Typical)
 Power Input 24 V<sub>DC</sub> ± 20%
 Watchdog Timer 1 ~ 255 sec (system)

• Weight (Net) 6 KG

#### **System Hardware**

CPU Intel® Atom™ E3827 1.75 GHz Processor
 Memory 4GB (8GB optional) DDR3L 1600MHz SO-DIMM

SDRAM

LAN 10/100/1000 Base-T x 2
 Expansion Slots Full-size Mini PCI-E
 Storage CFast slot x 1

Storage UFast Slot x 1 2.5" SATA SSD slot x 1 (optional)

■ **I/O** RS-232 x 1, RS-232/422/485 x 1

USB 3.0 x 1 USB 2.0 x 1

#### **LCD** Display

Display Type
 Display Size
 Max. Resolution
 Max. Colors
 Luminance cd/m2
 Viewing Angle (H/V°)
 SXGA TFT LED LCD
 17"
 1280 x 1024
 16.7M
 16.7M
 160/140
 Packlight Life
 F0.000 brown

Viewing Angle (H/V\*) 100/140
 Backlight Life 50,000 hrs
 Contrast Ratio 800:1

#### **Touchscreen**

• **Lifespan** 36 million touches at single point

Light Transmission Above 75%Resolution Linearity

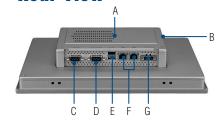
• **Type** 5-wire, analog resistive

#### **Environment**

• **Humidity**  $10 \sim 95\%$  RH @  $40^{\circ}$ C, non-condensing

Ingress Protection
 Operating Temperature
 Storage Temperature
 Vibration Protection
 Front panel: IP66
 -20 ~ 60°C (-4 ~ 140°F)
 -30 ~ 70°C (-22 ~ 158°F)
 With CFast: 2 Grms (5~500 Hz)
 With HDD: 1 Grms (5 ~ 500 Hz)
 (Operating, random vibration)

#### **Rear View**



A. External HDD/iDoor kit (TPC-1251T-EHKE) (Optional)

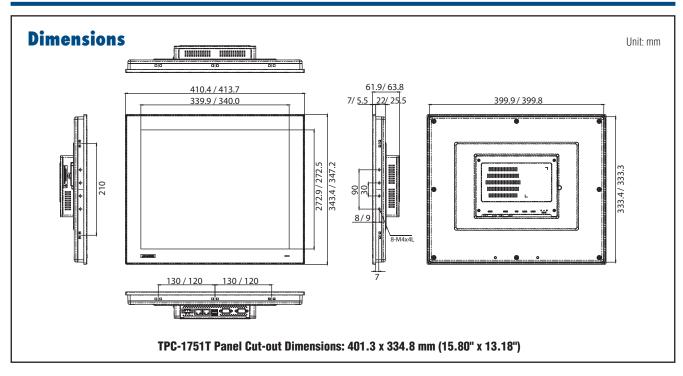
B. CFast Slot C.RS-232

D. RS-232/422/485 E. USB 3.0 & 2.0

F. LAN (10/100/1000) G. Power Inlet

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**Automation Panels** 



### **Ordering Information**

17" SXGA Panel PC, Intel® Atom™ E3827 1.75 GHz TPC-1751T-E3AE Processor, 4GB (True-flat touch screen)

 TPC-1751H-E3AE 17" SXGA Panel PC, Intel® Atom™ E3827 1.75 GHz Processor, 4GB (Non-flat touch screen IP65 certified traditional TPC front panel)

#### Accessories

PWR-247-BE 63W DC 24V/2.62A Output Power Supply ■ TPC-1251T-EHKE HDD/ SSD and iDoor extension kit

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** Power Cable China/Australia Plug 1.8 M ■ TPC-1000H-WMKE TPC VESA Mounting Kit from 10" to 17" TPC

■ TPC-1000H-SMKE TPC Stand kit from 10" to 17" TPC

## Automation S/W & Embedded O/S

968WEXP003X PanelExpress V2.0 300 tags S/W license 968WEXP015X PanelExpress V2.0 1500 tags S/W license 968WEXP050X PanelExpress V2.0 5000 tags S/W license 968WEXP2USB PanelExpress V2.0 S/W USB dongle WES7P X64 MUI. V4.12 B001 **2070013067** 

**2070013359** WEC7 X64 MUI. V4.00 B031

## **iDoor Modules** (TPC-1251T-EHKE is required for iDoor modules)

PCM-24D2R4-AE 2-Port Isolated RS-422/485 mPCle, DB9 PCM-26D2CA-AE 2-Port Isolated CANBus mPCle, CANOpen, DB9

24-Channel Isolated Digital I/O w/ counter mPCle, PCM-27D24DI-AE

■ PCM-24R1TP-AE 1-Port Gigabit Ethernet, Intel® 82574L, mPCle, RJ45 WiFi 802.11 a/b/g/n 2T2R w/ Bluetooth4.0, Half-size PCM-24S2WF-AE

mPCle, 2-port SMA PCM-24U2U3-AE 2-Port USB 3.0, mPCle, USB-A type

 PCM-24S23G-AE Wide-Temp 3.75G HSPA and GPS, 2-in-1, Full-size mPCle w/ Redundant SIM Card holder, 2-port SMA

## **Application Software**

Application Software	
SUSIÂCCESS	Version: V2.1 or above An innovative remote device management software, allowing efficient remote monitoring, quick recovery & backup, and real-time remote configuration, to create a more intelligent and interconnected embedded computing solution.
WebAcc ss	Version: V7.1 or above WebAccess, as the core of Advantech's IoT solution, is full web browser-based software package for HMI and SCADA software. All HMI and SCADA software features including: Animated Graphics Displays, Real-time Data, Control, Trends, Alarms and Logs, are available in a standard web browser. WebAccess is built around the latest internet technologies. With its open architecture, vertical domain applications can easily be integrated.
PANELEXPRESS Designed for Convenience	Version: V2.0.3.8 or above Panel Express, a windows based HMI mini SCADA, realizes the cross platform flexibility offered by WebOP Designer to switch hardware for the consideration of cost and performance become an easy job. Panel Express software provides the best economic and express solution for data intensive high-end HMI applications.
Webop	Version V2.0.3.8 or above An easy to use integrated development tool featuring solution-oriented screen objects, high-end graphics, Windows fonts for multi-language applications. WebOP runtime, a part of WebOP Designer, guarantees reliability and performance because of the minimum system overhead, high communication data rates, and sub-second screen switching.