PWS-870

10" Fully Rugged Tablet with 4th Generation Intel® Core™ i Processor

TAIWAN EXCELLENCE 2015

Features

- MIL-STD-810G and IP65 certified, can withstand drops of up to 4ft.
- 10.1" HD high-brightness, multi-touch, Gorilla Glass panel with digitizer
- 4th generation Intel® Core™ i processor supports Windows 8
- Built-in 4G LTE, WLAN (802.11 a/b/g/n/ac), BT4.0, and GPS modules with Beidou/GLONASS support
- Hot-swappable battery provides up to 11 hours operation[*1]
- Built-in dual cameras, 1D/2D barcode scanner, and NFC RFID
- Rich peripherals with vehicle docking station, desk docking station, and extension module support

IP65   4ft

Introduction

The PWS-870 is a fully rugged mobile tablet featuring a 10.1" HD resolution capacitive Multi Touch panel, an Intel Core i processor, mSATA SATA3 SSD storage, USB 3.0 and HDMI IO ports. For communcation it comes with 802.11 a/b/g/n/ac WiFi, Bluetooth, GPS, and 4G LTE. One of the most important unique design features is it's built-in data collection features: 2M/5M dual cameras, 1D/2D barcode reader, and NFC RFID reader. To mobile field workers, hot-swappable external battery for long-lasting support allows the system to operate for up to 11 hours at a time. The fully-rugged design (MIL-STD-810G, IP65 dust & water resistant and 4-foot drop) allows PWS-870 to perform in harsh environments. With sunlight readable display, PWS-870 is a perfect device for outdoor work.

Specifications

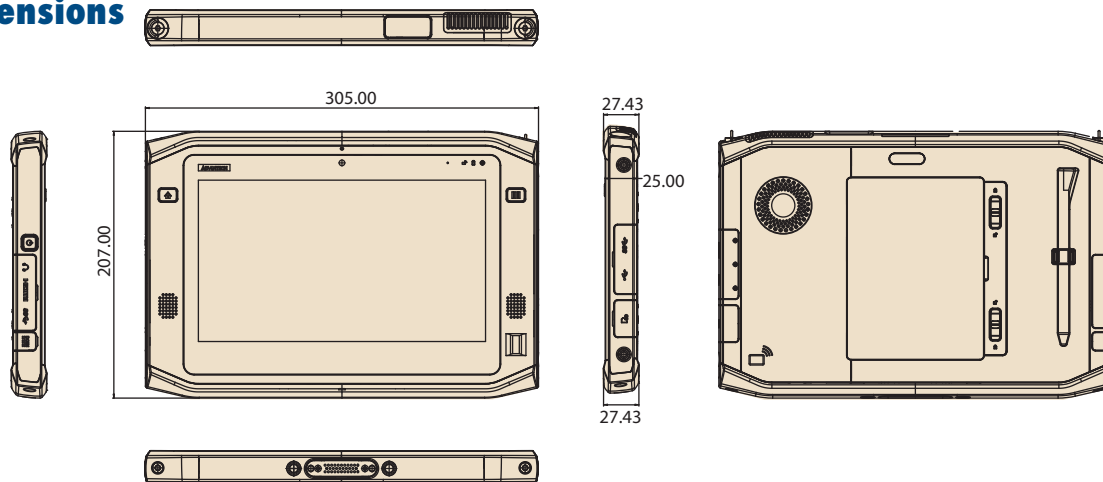|			
Motherboard	CPU & Chipset	Intel® Core™ i3 Processor 1.7 GHz 4010U Intel® Core™ i5 Processor 1.9 GHz 4300U with Turbo Boost to 2.9GHz Intel® Core™ i7 vPro™ Processor 1.7 GHz 4650U with Turbo Boost to 3.3 GHz	
	Memory	SO-DIMM DDR3L 1600 MHz up to 8 GB	
	Storage	Support mSATA SATAIII SSD 32 GB ~ 256 GB[*2] [*3]	
Display & Touchscreen	Display	10.1" HD (1366x768) Low reflection LED Backlight LCD (400 nits default; 800 nits by project)	
	Touch Panel	Capacitive multi touch Sunlight readable feature Display with Corning® Gorilla® Glass Gen2 Digitizer (By project)	
	Sensor	Ambient light, Accelerometer (G-Sensor), E-compass , Gyroscope Sensor - Screen Rotation: 0°, 90°, 270°	
System	Wireless Commnunication	Default WIFI 802.11 a/b/g/n/ac Default Bluetooth V4.0 (Class2) + EDR; (BT4.0 Class1 by project)	Optional integrated 4G LTE mobile broadband Optional dedicated GPS, Beidou, and Glonass
	Camera	Front Camera: 2M pixel CMOS sensor; supports video streaming Rear Camera: 5M pixel CMOS sensor; with LED flash light and auto focus control	
	Data Collection	Optional built-in 1D barcode scanner (Honeywell N4313) Optional built-in 2D barcode scanner (Honeywell N5600) Optional built-in NFC RFID reader (13.56MHz, supports ISO14443A/B, ISO15693, MIFARE, Felica)	
	Security	1. Optional fingerprint scanner 2. TPM 1.2 3. Kensington cable lock slot	
	Audio	Integrated speakers (2W) Integrated microphone	
	Input	Capacitive multi touch Optional Digitizer screen and Digitizer pen Programable button x2	Capacitive pen On-screen QWERTY keyboard
	LED	Power LED Battery LED RFID LED	
	I/O	USB 3.0 x2; USB 2.0 x1 HDMI 1.4 x1 SD card slot x1 (SDXC/UHS1/UHS2) Audio combo jack (Line-in/Line-out) x1	DC-in x1 Docking port x1 (32PIN) (USB3.0, USB2.0, PCIE Gen2, Display port) SIM slot x1
	Battery	Main battery: 4S1P 14.4V 2730mAh Hot-Swappable external battery: 4S2P 14.4V 4080mAh With Hot-Swappable external battery up to 11hrs	
	Power Input	19V ± 5%	
	OS	Windows Embedded 8.1 Industry Pro (Default), Windows Embedded 8 Standard (Default), Windows 7 Pro 64bit (By project), Linux Ubuntu (By project)	

(1) The battery life estimates based on MobileMark 2007 performance. Battery performance will vary by system setting and configuration.
(2) Total usable storage will be less depending upon actual system configuration. For example: PWS-870 default with Intel Rapid Start feature and it would use SSD 4GB capacity.
(3) Only Advantech is able to change SSD and Memory.

Dimensions

Unit: mm

305.00

207.00

27.43

25.00

27.43

Specifications Cont.

Environment	Temperatue & Humidity	Operating Temperature -10° C ~ 50° C; -20° C ~ 50° C (by project-based) (Charge: 0° C ~ +40° C for the battery protection) Storage Temperature -20 ~ 60° C Operating Humidity 5% ~ 95% @ 40° C
	IP Rating	IP65
	Vibration	MIL-STD-810G
	Drop	4 feet drop onto Plywood, MIL-STD-810G 516.5 Precedure VI certified
Certifications	EMC/RF	CE/FCC/CCC/PTCRB/SAR
	Safety	UL/CE/CB/CCC
Peripheral	Peripheral(*3)	▪ Digitizer pen (For digitizer solution) ▪ Universal Cover (Handle, stand, hand strap, and shoulder belt) ▪ Extension modules for MSR, UHF RFID, extra IO ports solution (By project) ▪ Desk docking station ▪ External battery ▪ Car adapter ▪ Vehicle docking staion
Dimension & Weight	Dimensions	305 (L) x 207 (W) x 25~27 (H) mm
	Weight	1.4 kg

(3) For the peripherals' availability, please check with Advantech's sales directly.

I/O Connectors

1. 2M Camera
2. Home Key (Programmable)
3. Function Key (Programmable)
4. Speakers
5. Fingerprint (Optional)
6. 5M AF Camera with Flash Light
7. FAN
8. NFC RFID Reader (Optional)
9. Capacitive Pen
10. Latch (For External Battery)

1. Kensington Lock
2. Power Button
3. Audio Combo Jack
4. HDMI Connector (1.4)
5. USB Connector (USB3.0)
6. DC-in
7. Screw Hole for Extension Module
8. USB Connector (USB3.0)
9. USB Connector (USB2.0)
10. SD Card Slot (SDXC)
11. Screw Hole for Extension Module

Ordering Information

Part Number	Description
PWS-870-3S6W0E000E	Core i3 WiFi/BT only , with WE8S
PWS-870-3S6G6E5F0E	Core i3 full function, EU LTE, WE8S
PWS-870-5S6G6P5F0E	Core i5 full function, EU LTE, Win 8.1 Pro
PWS-870-7S6G6P5F0E	Core i7 full function, EU LTE, Win 8.1 Pro
PWS-870-3S6G4E5F0E	Core i3 full function, US LTE, WE8S

Part Number	Description
PWS-870-5S6G4P5F0E	Core i5 full function, US LTE, Win 8.1 Pro
PWS-870-7S6G4P5F0E	Core i7 full function, US LTE, Win 8.1 Pro

Note:
▪ LTE band varies by different carrier. To select suitable LTE SKU, please contact with your Advantech sales.
▪ Standard package includes PWS-870 tablet PC, power adapter, capacitive pen and tether
▪ PWS-870 is equiped with 4GB RAM & 64GB SSD by default. Full function includes Wifi, BT, LTE, 2D barcode, NFC and fingerprint.