# Panasonic



Panasonic recommends Windows.

## TOUGHPAD FZ-M1

- MIL-STD-810G, 5' Drop and All-weather IP65 Dust and Water-resistant Design

- User-replaceable Battery, Bridge Battery and Optional Long Life Battery

- Optional NFC, Ethernet, Serial, SmartCard, Magstripe, UHF RFID and Barcode Reader[1]

- Wi-Fi, Bluetooth® and Optional Dedicated GPS or 4G LTE Multi Carrier Mobile Broadband

- Industry leading driver packages for ease of deployment and support

- Additional Options; Flir Thermal Camera model, Real Sense Camera model, RTK/GPS model as well as Passport reader/MSR option

**5-FOOT** DROP RATING

**IP65**

**MIL-STD-810G**

## THE WORLD'S MOST CONFIGURABLE 7" WINDOWS® TABLET, WITH INTEL® 7TH GENERATION CORE I5 PROCESSOR.

The Panasonic Toughpad® FZ-M1 is the fully rugged Windows® tablet, built to enable mission-critical mobile worker productivity without compromise. Powered by Windows® 10 Pro, the Toughpad FZ-M1 features a long life, user-replaceable battery and a daylight-readable, high-sensitivity multi-touch display for use with heavy gloves. With the broadest range of configuration options available in its class, the highly customizable Toughpad FZ-M1 is the ideal tool for today's mobile workforce. In addition to the highly configurable options, added models of Thermal Camera, Real Sense Camera, RTK/GPS, as well as several more. Allows the M1 to be the most comprehensive 7" tablet in the market.

**1.800.662.3537**
**us.panasonic.com/toughpad-fz-m1**

**TOUGHBOOK®**

# TOUGHPAD FZ-M1

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**SOFTWARE**
- Windows® 10 Professional
- Panasonic Utilities (including Dashboard), Recovery Partition
- Enterprise ready driver packages including CAB files and one-click driver bundles

**DURABILITY**
- MIL-STD-810G certified (5' drop, shock, vibration, rain, dust, sand, altitude, freeze/thaw, high/low temperature, temperature shock, humidity, explosive atmosphere)
- IP65 certified sealed all-weather fanless design
- Optional class I division 2, groups ABCD certified model
- Solid state drive heater
- Magnesium alloy chassis encased with ABS and elastomer corner guards
- Optional hand strap or rotating hand strap
- Port covers
- Raised bezel for LCD impact protection
- Pre-installed replaceable screen film for LCD protection
- Black Cabinet Option

**CPU**
- Intel® Core™ i5-7Y57 Processor
  – 2-core Turbo 2.9 GHz (1.2GHz/3.3GHz)
  – 4MB cache

**STORAGE & MEMORY**
- 8GB SDRAM (LPDDR3)
- 256GB SSD with heaters[2]
- Optional OPAL encrypted SSD with heater

**DISPLAY**
- 7" WXGA 1280 x 800
- 10-point capacitive gloved multi touch
- 700 nit
- IPS with direct bonding
- Anti-reflective (AR) clear
- Intel® HD graphics 4200 video controller, max. 1664MB shared VRAM with Win 8 64-bit[4]
- Dual monitor support
- Concealed mode (configurable)

**AUDIO**
- Built-in Directional Array Microphones
- Intel® High Definition Audio subsystem support
- Integrated speaker
- On-screen and button volume and mute controls

**CAMERAS**
- Front: 2MP(USB) webcam w/ stereo mic/ALS
- Rear: 8MP MIPI, with Camera Flash LED

**KEYBOARD & INPUT**
- Stylus pen with integrated stylus holder
- Touch Screen Mode Options: Pen Only, Pen and Touch, Touch Only, Touch Only-Glove, Touch Only-Water
- 6 tablet buttons (2 user-definable)
- On-screen QWERTY keyboard

**INTERFACE & EXPANSION**
| | |
|---|---|
| Docking connector | 24-pin |
| Headphones/Mic | Mini-jack stereo |
| USB 3.0 (x 1) | Type A |
| Optional USB 2.0 (x 1) | Type A |
| MicroSDXC | UHS-I |
| Optional 10/100/1000 Ethernet | RJ-45 |

**WIRELESS**
- Optional 4G LTE multi carrier mobile broadband with satellite GPS[8]
- Optional GPS (u-blox NEO-M8N)
- Optional dual high-gain antenna pass-through
- Intel® Dual Band Wireless-AC 8260 Wi Fi 802.11a/b/g/n/ac
- Bluetooth® v4.0 (Class 1) + EDR
- Security
  – Authentication: LEAP, WPA, 802.1x, EAP-TLS, EAP-FAST, PEAP
  – Encryption: CKIP, TKIP, 128-bit and 64-bit WEP, Hardware AES

**POWER SUPPLY**
- Li-Ion battery pack:
  – Standard battery: 7.2V, typical 3220mAh, min. 3120mAh
  – Long life battery: 7.2V, typical 7100mAh, min. 6800mAh
- Battery operation[5]:
  – Standard battery: 9 hours
  – Optional long life battery: 16 hours
  – Standard bridge battery: 1 minute swap time
- Battery charging time[5]:
  – Standard battery: 2.5 hours off, 4 hours on
  – Optional long life battery: 4.5 hours off, 6.5 hours on
- Bridge battery: 1 minute hot swap time
- AC Adapter: AC 100V-240V 50/60Hz, auto sensing/switching worldwide power supply

**POWER MANAGEMENT**
- Suspend/Resume Function, Hibernation, Standby

**SECURITY FEATURES**
- Password Security: Supervisor, User, Hard Disk Lock
- Kensington cable lock slot
- Trusted platform module (TPM) security chip v 2.0
- Persistence® technology by Absolute embedded in BIOS[7]
- Optional insertable SmartCard reader (half size or full size)[1]
- Optional contactless RFID and SmartCard/NFC reader[1]
  – ISO 15693 and 14443 A/B compliant

**WARRANTY**
- 3-year limited warranty, parts and labor

**DIMENSIONS & WEIGHT[8]**
- 7.98"(L) x 5.20"(W) x 0.71"(H)
- 1.2 lbs.

**INTEGRATED OPTIONS[9]**
- Choice of 4G LTE multi carrier mobile broadband with satellite GPS, or dedicated GPS
- UHF 900MHz RFID reader (EPC Gen 2)[1]
- Choice of 1D/2D barcode reader (EA30), serial dongle, Ethernet, or 2nd USB 2.0 port[10]
- Choice of magstripe reader (rotating hand strap included), insertable half-size SmartCard reader, contactless SmartCard/NFC reader or UHF 900MHz RFID reader (EPC Gen2)[9]

**ADDITIONAL MODEL OPTIONS**
- Thermal Camera (Flir Lepton 3.5)
- Intel Real Sense Camera (D410)
- RTK/GPS Model
- MRZ Model (Passport Reader+MSR)

**ACCESSORIES[9]**
| | |
|---|---|
| AC Adapter (3-prong) | CF-AA6373AM |
| Standard Battery Pack | FZ-VZSU94W |
| Long Life Battery Pack | FZ-VZSU95W |
| 4-Bay Battery Charger | FZ-VCBM11U |
| LIND Car Adapter 120W | CF-LNDDC120 |
| LIND Car/AC Adapter 90W (with USB Port) | CF-LNDACDC90 |
| LIND Car Adapter 90W MIL-STD | CF-LNDMLDC90 |
| Hand Strap with Stylus Holder | FZ-VSTM11U |
| Rotating Hand Strap with Stylus Holder | FZ-VSTM12U |
| Hand Strap (for Magstripe reader only) | FZ-VSTM13U |
| Panasonic Shoulder Strap | FZ-VNSM12U |
| ToughMate Always-on M1 Case | TBCM1AO-P |
| ToughMate Holster | TBCM1HSTR-P |
| ToughMate Portfolio Case | TBCM1PFLIO-BLK-P |
| Gloved Multi Touch Stylus | FZ-VNPM11U |
| Cradlepoint Router | |
| – Verizon | CP-IBR1100LPE-VZ |
| – AT&T | CP-IBR1100LPE-AT |
| Full Desktop Cradle (simultaneous display output) | FZ-VEBM12AU |
| Lite-function Desktop Cradle | FZ-VEBM11U |
| Tether | CF-VNT002U |
| 7" Gloved Multi Touch LCD Protective Film | FZ-VPFM11U |

Please consult your reseller or Panasonic representative before purchasing.

Caution: Do not expose bare skin to this product when handling this unit in extreme hot or cold environments.

[1]UHF RFID is mutually exclusive with insertable SmartCard/NFC, contactless SmartCard/NFC, magstripe, 1D/2D barcode, serial dongle, ethernet, and 2nd USB port.

[2]1GB = 1,000,000,000 bytes. Total usable memory will be less depending upon actual system configuration.

[3]Battery performance features such as charge time and life span can vary according to the conditions under which the computer and battery are used. Battery operation and recharge times will vary based on many factors, including screen brightness, applications, features, power management, battery conditioning and other customer preferences. Battery testing results from MobileMark 2007.

[4]Requires software and activation to enable theft protection.

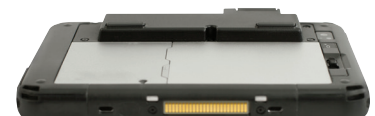[5]Length measurements do not include protrusions or configurable options.

[6]Accessories and Integrated Options may vary depending on your configuration. Visit Panasonic website for more accessories and details.

[7]TPM 2.0 available upon request - please contact your Panasonic representative.

[8]4G LTE and dedicated GPS (u-blox) are mutually exclusive.

[9]Insertable SmartCard, Contactless SmartCard/NFC, magstripe, UHF-RFID readers are mutually exclusive.

[10]1D/2D barcode reader, serial dongle, ethernet and 2nd USB (2.0) are mutually exclusive.





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