

Panasonic recommends Windows Vista® Business.

MOBILE BUSINESS EXCELLENCE

THE SEMI RUGGEDIZED NOTEBOOK WITH TOUCHSCREEN TOUGHBOOK CF-52 TS



- Intel® Centrino® 2 with vPro™ Technology
- Genuine Windows® Vista Business or Genuine Windows® XP Professional
- Withstands drops from a height of up to 76cm*
- Spill resistant keyboard and touchpad
- Daylight-viewable 13.3" LCD with Touchscreen (up to 1000cd/m²)



Mobile Computing Platform	Intel® Centrino® 2 with vPro™ Technology – Intel® Core™ 2 Duo Processor P8400 (2.26GHz, 3MB L2 cache, 1066MHz FSB) – Mobile Intel® GM45 Express Chipset – Intel® Wireless WiFi Link 5100AGN (802.11a/b/g/draft-n)	
OS	Genuine Windows Vista® Business Service Pack 1 or Genuine Windows® XP Professional (Downgrade)	
RAM	2GB DDR2 SDRAM (max. 4GB)	
Graphic Chip	Intel® GM45 graphics controller; UMA (1GB RAM: max. 1024MB with Win XP; max. 1423MB with Win Vista®)	
HDD	160GB SATA (shock mounted; withstands a 76cm* drop)	
Optical Disc Drive	DVD Multi Drive	
LCD	13.3" daylight-viewable XGA Active Matrix (TFT) colour LCD with Touchscreen (up to 1000cd/m²) 1024 x 768 pixels (XGA)	
Cabinet	Full magnesium alloy with integrated carrying handle	
Bluetooth®	Version 2.0 + EDR	
WLAN	IEEE 802.11a/b/g/draft-n	
LAN	IEEE 802.3 10Base-T, IEEE 802.3u 100Base-TX, IEEE 802.3ab 1000Base-T	
Modem	Data: 56kbps (V.92) FAX: 14.4kbps	
Sound	Analog Devices AD 1883 (conforms to Intel® High Definition Audio), Integrated stereo speakers	
Input Devices	Touchscreen, Touchpad and keyboard (both spill resistant)	
Indicators	11 LEDs (2x Power, Battery, HDD, Multimedia Pocket, NumLK, CapsLK, ScrlK, SD, WWAN, Wireless ready)	
Interfaces	Serial (16550A compatible):	Dsub, 9-pin
	External display (VGA port):	Mini Dsub, 15-pin
	Headphones:	Mini-jack, 3.5 DIA, stereo
	Microphone:	Mini-jack, 3.5 DIA, stereo
	DC input:	Jack
	USB 2.0:	4x 4-pin
	Firewire (IEEE1394a):	1x 4-pin
	Modem / LAN:	RJ-11 / RJ-45
	Port replicator:	100-pin
Expansion Slots	PC Card:	1x Type I or Type II (3.3V: 400mA, 5V: 400mA)
	ExpressCard:	1x ExpressCard/34 or ExpressCard/54
	SD/SDHC Memory Card:	1x
	Optional RAM Module:	200-pin, 1.8V, SO-DIMM, DDR2 SDRAM, PC2-6400 Compliant
Power	Power Consumption:	Approx. 45W/max. 100W (maximum when recharging)
	Battery life:	Approx. 8 h (Mobile Mark™ 2007, 60cd/m², Vista® Model)
	AC Adapter:	Input: 100V – 240V, 50Hz/60Hz; Output: 15.6V, 8A
	Battery:	Lithium-Ion (11.1V, 7.8Ah)
	Battery life:	Approx. 8 h (Mobile Mark™ 2007, 60cd/m², Vista® Model)
	Charging time:	Approx. 4.0 h (Power on)
Power Management	Standby function, ACPI BIOS	
Software	Adobe Reader, PC Information Viewer, Loupe Utility, B's Recorder GOLD9 BASIC, B's CLIP, Intel® PROSet / Wireless Software, Bluetooth™ Stack for Windows® by TOSHIBA, Wireless Switch Utility, Wireless Connection Disable Utility, Hotkey Settings, Battery Recalibration Utility, Infineon TPM Professional Package, Protector Suite QL, Aptio Setup Utility, Hard Disk Data Erase Utility, PC-Diagnostic Utility	
Security Features	TPM (Trusted Platform Module – TCG V1.2 compliant), Password security (supervisor password, user password, hard disk lock), Integrated hardware security lock slot	
Dimensions (W x H x D)	355.7mm x 51.7–52.9mm x 286.3mm / 14.0" x 2.1" x 11.3" (including carrying handle)	
Weight	Approx. 3.6 kg/8.0 lb (including carrying handle)	
Integrated Options	Fingerprint Reader, Smart Card Reader, 3G Mobile Broadband (UMTS/HSPA with Gobi-Chip, up to 7.2Mbps – project driven)	
Accessories	1GB RAM module: CF-WMBA801G	2GB RAM module: CF-WMBA802G
	AC Adapter: CF-AA5803A	Battery charger: CF-VCBTB1U
	Battery pack: CF-VZSU29ASU	Port replicator: CF-VEB522

Specification and configuration may vary depending on country. Accessories may vary depending on your notebook configuration. Consult a Panasonic sales office near you for more details and availability of integrated options.

* Non-operating, 6 surfaces (tested at Panasonic laboratory; no guarantee that unit never gets broken)

As an ENERGY STAR® Partner, Panasonic Corporation has determined that this product meets the ENERGY STAR® guidelines for energy efficiency. Active Matrix colour display conforms to industry standards. Some displays may contain isolated illuminated or dark pixels as an artefact of the manufacturing process (effective pixels: minimum 99.998%). RAM capacity calculated as follows: 1MB = 1,048,576 bytes. HDD capacity calculated as follows: 1GB = 1,000,000,000 bytes.

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