## SIEMENS

## Data sheet

## 6ES7718-1DC04-0EC3

SIMATIC Field PG M6 Advanced; i7-8850H (2.6 to 4.3 GHz; 6 kernels + hyperthreading; 9 MB Smart Cache); 15.6" display; Full HD (1920x 1080); WLAN 802.11ac & Bluetooth V5.0; DVD +/-RW; UHD Graphics 630; 2x 32 GB DDR4 SD-RAM SO-DIMM; 2 TB SSD SATA (2.5"); without S5 interface, without S5-EPROMMER Line cable with power plug: USA; Keyboard: QWERTZ/QWERTY; without NVME (M.2); Windows 11 IoT Enterprise (version 22H2) 64-bit; with USB flash drive (restore image; D&D) license for STEP 7 Professional Combo; WinCC Advanced Combo (TIA Portal & WinCC flexible); Safety Advanced Combo (TIA Portal & Distributed Safety); version of the preinstalled software and licenses V18

General information	
Design of the programming device	Notebook
Display	
Design of display	15.6" full HD display in 16:9 format
Resolution (pixels)	
<ul> <li>Horizontal image resolution</li> </ul>	1 920 pixel
<ul> <li>Vertical image resolution</li> </ul>	1 080 pixel
General features	
Non-reflecting	Yes
Luminance	300 cd/m <sup>2</sup>
Backlighting	
<ul> <li>Type of backlighting</li> </ul>	LED
Control elements	
Keyboard fonts	
• Design	QWERTZ/QWERTY or AZERTY (French); 87 keys
Touch operation	
<ul> <li>Integrated touch pad</li> </ul>	Yes; Clickpad
Supply voltage	
Design of the power supply	External wide-range power supply; 3-pole
permissible range, lower limit (AC)	100 V; ±10 %, sinusoidal
permissible range, upper limit (AC)	240 V; ±10 %, sinusoidal
Line frequency	
<ul> <li>permissible range, lower limit</li> </ul>	47 Hz
<ul> <li>permissible range, upper limit</li> </ul>	63 Hz
Processor	
Processor type	Intel Core i5-8400H (2.5 to 4.2 GHz, 4 cores and hyper-threading, 8 MB Smart Cache) or i7-8850H (2.6 to 4.3 GHz 6 cores and hyper-threading, 9 MB Smart Cache)
Chipset	Intel CM246
Hyper-threading	Yes
Turbo Boost Technology 2.0	Yes
Graphic	
Graphics controller	Intel® UHD Graphics 630
Drives	
SSD	Yes; Easy to replace
Memory capacity	256 Gbyte; Up to 2 TB SSD
TPM Security Chip	Yes; 2.0 (version for China without TPM)
Memory	
Type of memory	DDR4 SO-DIMM
Work memory	
Number of slots	2; can be equipped with 1x 8 GB, 1x 16 GB, 1x 32 GB or 2x32 GB
Accumulator	
Replaceable	Yes; Lithium-ion battery
Capacity	8.25 A·h
Interfaces	
Number of interfaces PROFIBUS DP	1; 1x PROFIBUS DP / MPI; 9-pin Sub-D socket; 9.6 kBaud to 12 MBaud

Number of US 222 interfaces         1, 25 pin socket           • Type A         3, 11, USB port incl. itergated charging function for USB devices (e.g. stratterform) = dev with doors extended of stratterform           • Type A         1, USB 3,1 Gen. 2           • Number of USB 20 and state         1, Smart Can Render (USDIC 7816)           Butterch radies standard         Yes, VS 0           Multimedia cardia Start and the card in Smart Can Render (USDIC 7816)         SMATIC memory cards           Multimedia cardia (USD)         Yes, Yes 0           Card reader for SMATIC memory cards         SMATIC memory cards           • Indigs video signal (VSA)         Yes, Yes 0           • UVH         Yes, Yes 0           • UVH         Yes, Yes 0           • UDVH         Yes,		
	Number of RS 232 interfaces	1; 25-pin socket
• Type C         1. USB 3.1 Gen .2           Numee of alip card readem         1. Simari Card Reader (ISOINC 27816)           Builton and Sanadard         Yes, VSB 3           Watter of alip card readem         2. In (SDPC UrSR). MAC()           Card reader for SIMATIC memory cards (for 57:000400). SMC (for 57:100400). SMC (for 57:1004000). SMC (for 57:100400). SMC (for 57:1004000). SMC (for 57:10040000). SMC (for 57:10040000). SMC (for 57:100400000). SMC (for 57:100400000). SMC (for 57:1004000000). SMC (for 57:1004000000). SMC (for 57:1004000000). SMC (for 57:1004000000). SMC (for 57:10040000000). SMC (for 57:100400000000). SMC (for 57:100400000000). SMC (for 57:10040000000). SMC (for 5	Number of USB interfaces	4
Number of disp-card maders         1: Smart Card Reader (ISO/IEC 7816)           Buildooth india standard         Yes V 0           Multimedia card/SD card slot         2 in 1 (SDHC UHS-II, MMC)           Card mader for SUMATIC memory cards         SIMATIC memory cards (ISO 72:100), SIMATIC memory cards (ISO 72:100), SIMATIC memory	• Type A	
Bitecols radio standard         Yes, VS.0           Multimedia card/SD cad dol         2 in 150PC (UR54). MMC)           Cad reasoft FO SIMATIC memory cards         SIMATIC memory cards (WF ST-00100), SMC (WF ST-1000), SMC (WF ST-10000), SMC (WF ST-1000), SMC (WF ST-1000), SMC (WF ST-100	• Type C	1; USB 3.1 Gen. 2
Muttenelle cardSD card dot.         2: In 1(SDHC UHF)II, MMC)           Card reader for SIMATC memory cards         SIMATC memory cards (ST-2000/STE1 200), Initiating programming interfaces.           Universal Audia Jack         Yes; Audia socket for 3.5 mm jack           Universal Audia Jack         Yes; Audia socket for 3.5 mm jack           • analog video signal (VGA)         Yes; Audia socket for 3.5 mm jack           • OVI+         Yes; Audia socket for 3.5 mm jack           • OVI+         Yes; Yes           • Dubustrial Etherent Interface         2.2 Ethernet (RU45)           • OVI Miph         Yes; Yes           • OVI Miph         Yes; Yes           • OVI Miph         Yes           • OVI Miph         Yes; Yes           • OVI Miph         Yes; Yes           • OVI Miph         Yes           • OVI Miph         Yes           • OVI Miph         Yes           • OVI Miph         Yes           • OVI Miph Audia Alore Management Technology)         Yes           VLAN         Battery status, device status, access to HDD/DVD, access to SD/MAC.           MPIOP, SS and S7 modules / Carr Reader (except Smart Card Reader), Num Lock, Edit Condol 4.2, ESD           Interference immunity against discharge of static electricity.         Interference immunity casipa discharge of static electricity.	Number of chip-card readers	1; Smart Card Reader (ISO/IEC 7816)
Cod     SIMATC memory cards for \$7.0014001, SMC for \$7.1001400, SMC for \$7.100140, SMC for \$7.1001400, SMC for \$7.100140, SMC for \$7.1001400, SMC for \$7.100140, SMC for \$7.10	Bluetooth radio standard	Yes; V5.0
Interference immunity against discharge of static electricity         Yes, 1440 socket for 35 mm jack           Vision interfaces         Yes, 1440 socket for 35 mm jack           • DiployPort         Yes, 14 add socket for 35 mm jack           • DiployPort         Yes, 14 add socket for 35 mm jack           • DiployPort         Yes, 14 add socket for 35 mm jack           • DiployPort         Yes, 14 add socket for 35 mm jack           • Industrial Element Interface         2.4 Ethernet (FJ45)           • Industrial Element Interface         2.4 Ethernet (FJ45)           • Oto Mops         Yes           • Too Mops         Yes           • Usak on LAN         Yes           • Usak on LAN         Yes           • Tope         B02.1 fac           Interformed immunity against discharge of static electricity         Interformed immunity against discharge of static electricity           • Interference immunity against discharge of static electricity         Yes, 14 V concording to EC 61000-4-2, ESD, 28 KV air discharge acc. to EC 61000-4-5, surge puble/ene to EC 61000-4-5, surge puble/en	Multimedia card/SD card slot	2 in 1 (SDHC UHS-II, MMC)
Video interfaces         Yes, via adapter from DV to VGA           • DVH         Yes, 'tx           • DisplayPort         Yes, 'tx           • Industrial Element interface         2x. Ethernet (RU46)           • industrial Element interface         2x. Ethernet (RU46)           • IND Maps         Yes           • Wake on LAN         Yes           • Wake on LAN         Yes           • UAXT (Industrial Element interface)         Yes           • Type         802.11ac           • Type         802.11ac           • Type         802.11ac           • Interrupts/diagnestics/status information         EEO status display           • Type         802.11ac           • Interrupts/diagnestics/status information         EEC status display           • Interference immunity against discharge of static electicity         Yes, '4 KV contact discharge acc. to EC 61000.4-2, ESD a& V ar discharge public file file (Status display)           • Interference immunity on supply cables         22 KV (according to EC 61000.4-2, ESD as KV ar discharge public file file (Status display) = 24 KV (according to EC 61000.4-4, ESD as a status display = 20 minit is	Card reader for SIMATIC memory cards	
enalog video signal (VGA)     Ves, 'via adapter from DVI to VGA     Ves, 'tx     DispayFort     Ves, 'tx     Standards, Element Indrace     vis, 'tx     vis     vis, 'tx     vis, 'tx     vis, 'tx     vis, 'tx     vis, 'tx	Universal Audio Jack	Yes; Audio socket for 3.5 mm jack
bytic biological features     bytic biological features     industrial Ethernet     industrial     i	Video interfaces	
DisplayPort     Industrial Elhernet Interface         Zx Elhernet (RJ45)         Yes         Vake on LAN         Yes         Vake	<ul> <li>analog video signal (VGA)</li> </ul>	Yes; via adapter from DVI to VGA
Industrial Element     2x Ethermet (RJ45)       - 100 Mps     Yes       - 100 Mps     Yes       - 100 Mps     Yes       - Wake con LAN     Yes       • Type     Bo2.11ac       Interrupts/diagnostics/status information     Battery status, device status, access to HDDDVD, access to SDMMC, MPUD-RS and S7 modules / Card Reader (except Smart Card Reader), Num Lock, Caps Lock, WLAN active       EVC     Interrupts/diagnostics/status information       EEC     Interference immunity against discharge of static electricity       • Interference immunity against discharge of static electricity     Yes, 14 kV contact discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-2, ESD; ±8 kV air discharge acc. to EC 61000-4-4, burst; ±1 kV (according to EC 61000-4-5, surge pulse/line to EQU4, burst; length > 30 m; ±2 kV (according to EC 61000-4-5, surge pulse/line to EQU4, burst; length > 30 m; ±2 kV (according to EC 61000-4-5, surge pulse/line to EQU4, burst; length > 30 m; ±2 kV (according to EC 61000-4-5, surge pulse/line to EQU4, burst; length > 30 m; ±2 kV (according to EC 61000-4-5, surge pulse/line to EC 61000-4-4, burst; Length > 30 m; ±2 kV (according	• DVI-I	Yes; 1x
Industrial Ethemet Interface     2x Ethernet (R,45)     -100 Mbps     Yes     Voke on LAN     Vos     Voke     Voke on LAN     Vos     Vos     Voke on LAN     Vos     Vo	DisplayPort	Yes; 1x
	Industrial Ethernet	
	<ul> <li>Industrial Ethernet interface</li> </ul>	2x Ethernet (RJ45)
• Wake on LAN     Yes       • IAMT (intel Active Management Technology)     Yes       • Yukan     •       • Type     802.11ac       Interrupts/diagnostics/status information     •       EED status display     Battery status, device status, access to HDD/DVD, access to SD/MAC, MPUDP. Ss and SY modules / Card Reader (except Smart Card Reader), Num       EAC     •       Interference immunity against discharge of static electricity     •       • Interference immunity against discharge of static electricity     •       • Interference immunity cables borne interference     •       • Interference immunity on supply cables     •       • Interference immunity on supply cables     •       • Interference immunity on signal cables	— 100 Mbps	Yes
• IAMT (Intel Active Management Technology)         Yes           • Type         802.11ac           Interruptal/diagnostics/status information         Editerruptal/diagnostics/status information           LED status display         Battery status, device status, access to HDD/DVD, access to SD/MMC, MPL/DF.'SS and S7 modules / Card Reader (except Smart Card Reader), Num Let Status display           EMC         Enterruptal/diagnostics/status information           Enterrence immunity against discharge of static electricity         • Interference immunity against discharge of static electricity           • Interference immunity on supply cables         * 2 kV (according to IEC 61000-4.2, ESD; # 8 kV air discharge of static electricity acc. to IEC 61000-4.4, burst); *1 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to Ine); *2 kV (according to IEC 61000-4.5, surge pulse/line to IE	— 1000 Mbps	Yes
WLAN        • Type		Yes
WLAN        • Type	<ul> <li>IAMT (Intel Active Management Technology)</li> </ul>	Yes
• Type         882.11ac           Interruptic/dignostics/status information         Battery status, device status, access to HDD/DVD, access to SDMMC, MPI/DP, S5 and S7 modules / Card Reader; Accept Smart Card Reader), Num Lock, Caps Lock, WLAN active           EMC         Interference immunity against discharge of static electricity           • Interference immunity against discharge of static electricity         Yes; 14 KV contact discharge acc. to IEC 61000-4-2, ESD; 28 KV air discharge acc. to IEC 61000-4-2, ESD; 24 KV air discharge acc. to IEC 61000-4-2, ESD; 24 KV (according to IEC 61000-4-2, ESD)           • Interference immunity on supply cables         +2 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±2 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±2 KV (according to IEC 61000-4-1, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±2 KV (according to IEC 61000-4-1, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±2 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±2 KV (according to IEC 61000-4-5, surge pulse/		
Interruptic/diagnostica/status information           LED status display         Battery status, device status, access to HD/D/DVD, access to SD/MMC, MP/DDP, S5 and S7 modules / Card Reader (except Smart Card Reader), Num Lock, Caps Lock, WLAN active           EMC         Interference immunity against discharge of static electricity acc. to IEC 61000-4-2, ESD           Interference immunity against discharge of static electricity acc. to IEC 61000-4-2, ESD         Yes; ±4 KV contact discharge acc. to IEC 61000-4-2, ESD           Interference immunity to cable-borne interference         ±2 KV (according to IEC 61000-4-2, ESD           Interference immunity on supply cables         ±2 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)           • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge sym.illne to ground, length > 30 m); ±2 KV (according to IEC 61000-4-5, surge sym.illne to ground, length > 30 m); ±2 KV (according to IEC 61000-4-5, surge sym.illne to ground, length > 30 m); ±2 KV (according to IEC 61000-4-5, surge sym.illne to ground, length > 30 m); ±2 KV		802.11ac
MP/DP, 55 and 57 modules / Card Reader (except Smart Card Reader), Num Lock, Caps Lock, WLAN active           EMC           Interference immunity against discharge of static electricity                electricity acc, to IEC 61000-4-2, ESD; ±8 kV air discharge electricity acc, to IEC 61000-4-2, ESD;           Interference immunity to cable-borne interference                electricity acc, to IEC 61000-4-2, ESD;                interference immunity to cable-borne interference                electricity acc, to IEC 61000-4-2, ESD;                electricity acc, to IEC 61000-4-4, Lost, length <30 m);		
EMC         Interference immunity against discharge of static electricity         • Interference immunity against discharge of static electricity acc. to IEC 61000-4-2, ESD; ±8 kV air discharge according to IEC 61000-4-2, ESD; ±8 kV air discharge according to IEC 60068-2-78, IEC 60068-2-14; EV res: Conordin-2, So, IEC 60068-2-14;		MPI/DP, S5 and S7 modules / Card Reader (except Smart Card Reader), Num
Interference immunity against discharge of static electricity         Yes: ±4 kV contact discharge acc, to IEC 61000-4-2, ESD; ±8 kV air discharge acc, to IEC 61000-4-2, ESD           Interference immunity to cable-borne interference         ± 2 kV (according to IEC 61000-4-2, ESD           • Interference immunity on supply cables         ± 2 kV (according to IEC 61000-4-2, ESD           • Interference immunity on signal cables         ± 2 kV (according to IEC 61000-4-3, surge pulse/line to ground)           • Interference immunity on signal cables         ± 2 kV (according to IEC 61000-4-4, burst); ±1 kV (according to IEC 61000-4-5, surge pulse/line to line); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length < 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length < 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length < 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-4, burst, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line) to IEC 61000-4-5, surge pulse/line) to IEC 61000	EMC	
• Interference immunity against discharge of static electricity acc. to IEC 61000-4-2, ESD       Yes; ±4 kV contact discharge acc. to IEC 61000-4-2, ESD         Interference immunity to able-borne interference       ±2 kV (according to IEC 61000-4-4, burst); ±1 kV (according to IEC 61000-4-5, surge pulse/line to ine); ±2 kV (according to IEC 61000-4-5, surge pulse/line to ground)         • Interference immunity on signal cables       ±1 kV (according to IEC 61000-4-4, burst); ±1 kV (according to IEC 61000-4-5, surge pulse/line to ground)         • Interference immunity on signal cables       ±1 kV (according to IEC 61000-4-4, burst); ength < 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line to ground)		
electricity acc. to IEC 61000-4-2, ESD         Interference immunity to cable-borne interference         • Interference immunity on supply cables         ±2 KV (according to IEC 61000-4-4, burst); ±1 KV (according to IEC 61000-4-5, surge pulse/line to ground)         • Interference immunity on signal cables         ±1 KV (according to IEC 61000-4-4, burst, length < 30 m); ±2 kV (according to IEC 61000-4-5, surge pulse/line to ground)		Yes: +4 kV contact discharge acc. to IEC 61000-4-2 ESD: +8 kV air discharge
• Interference immunity on supply cables       ±2 kV (according to IEC 61000-4.4, burst); ±1 kV (according to IEC 61000-4.5, surge pulse/line to ground)         • Interference immunity on signal cables       ±1 kV (according to IEC 61000-4.4, burst, length < 30 m); ±2 kV (according to IEC 61000-4.5, surge pulse/line to ground)		
surge pulse/line to line); ±2 kV (according to IEC 61000-4-5, surge pulse/line to ground)       • Interference immunity on signal cables       ±1 kV (according to IEC 61000-4-4, burst, length < 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 61000-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 6100-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 6100-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 60100-4-5, surge sym./line to ground, length > 30 m); ±2 kV (according to IEC 60068-2-7, IEC 6	Interference immunity to cable-borne interference	
• Interference immunity on signal cables       ±1 kV (according to IEC 61000-4.4, burst, length < 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61000-4.5, surge sym.line to ground, length > 30 m); ±2 kV (according to IEC 61006-2.5)         • Charter of the symmetry of the symmet	Interference immunity on supply cables	surge pulse/line to line); ±2 kV (according to IEC 61000-4-5, surge pulse/line to
Standards, approvals, certificates         CE mark       Yes         CSA approval       Yes         UL approval       Yes         DIN/ISO 9001       Yes         Ambient conditions       Ambient conditions         Ambient conditions       5 °C; Max. 10 °C/h (no condensation)         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, min.       5 %; At 30 °C/h (no condensation)         • Operation, max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, max.       5 %; At 30 °C/h (no condensation)         • Operation, max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, max.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-74, IEC 60068-2-74, IEC 60068-2-74         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       •         • tested according to IEC 60068-2-77       Yes         Operating systems       Multi-Language User Interface (MUI): 6 language	Interference immunity on signal cables	$\pm$ 1 kV (according to IEC 61000-4-4, burst, length < 30 m); $\pm$ 2 kV (according to IEC 61000-4-4, burst, length > 30 m); $\pm$ 2 kV (according to IEC 61000-4-5, surge
CE mark       Yes         CSA approval       Yes         UL approval       Yes         UL approval       Yes         DIN/ISO 9001       Yes         Ambient conditions       Yes         Ambient conditions       ************************************	Standards, approvals, certificates	
CSA approval       Yes         UL approval       Yes         DIN/ISO 9001       Yes         Ambient conditions       Ambient temperature during operation         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-74, IEC 60068-2-70, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         Vibrations       • Operation, max.         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       •         • tested according to IEC 60068-2-27       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)		Ves
UL approval       Yes         DIN/ISO 9001       Yes         Ambient conditions       Ambient temperature during operation         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         Ambient temperature during storage/transportation       -20 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing		
DIM/SO 9001       Yes         Ambient conditions       Ambient temperature during operation         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         Vibrations       -         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       -         • tested according to IEC 60068-2-27       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Ch		
Ambient conditions         Ambient temperature during operation         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         Ambient temperature during storage/transportation       • min.         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         Vibrations       • Operation, tested according to IEC 60068-2-6         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       • tested according to IEC 60068-2-27         • tested according to IEC 60068-2-27       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)		
Ambient temperature during operation         • min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         Ambient temperature during storage/transportation       -20 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30,		
• min.       5 °C; Max. 10 °C/h (no condensation)         • max.       40 °C; Max. 10 °C/h (no condensation)         Ambient temperature during storage/transportation       -20 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing		
• max.       40 °C; Max. 10 °C/h (no condensation)         Ambient temperature during storage/transportation       -20 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         Relative humidity       60 °C; Max. 20 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-4         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         Vibrations       -         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       -         • tested according to IEC 60068-2-27       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)	· · · · ·	$5^{\circ}$ (1) May 40 °C/b (no condensation)
Ambient temperature during storage/transportation       -20 °C; Max. 20 °C/h (no condensation)         • min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         Relative humidity       -0 peration, min.         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         Vibrations       -         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       -         • tested according to IEC 60068-2-77       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)		
• min.       -20 °C; Max. 20 °C/h (no condensation)         • max.       60 °C; Max. 20 °C/h (no condensation)         Relative humidity       • Operation, min.         • Operation, min.       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         • Operation, max.       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         Vibrations       - 0peration, tested according to IEC 60068-2-6         Yes       Shock testing         • tested according to IEC 60068-2-77       Yes         Operating systems       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)		
• max.       60 °C; Max. 20 °C/h (no condensation)         Relative humidity       5 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-78, IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-78, IEC 60068-2-78, IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         Vibrations       85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-14         Vibrations       60068-2-30, IEC 60068-2-14         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing       •         • tested according to IEC 60068-2-77       Yes         Operating systems       Yes         Local language of operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)		20 °C: May 20 °C/b (no condencation)
Relative humidity         • Operation, min.         • Operation, max.         • Operation, max.         85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14         Vibrations         • Operation, tested according to IEC 60068-2-6         Yes         Shock testing         • tested according to IEC 60068-2-27         Yes         Operating systems         Local language of operating system         Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system		
Operation, min.     S %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14     Operation, max.     S %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-30, IEC 60068-2-14     Vibrations     Operation, tested according to IEC 60068-2-6     Yes     Shock testing     otested according to IEC 60068-2-78     Yes     Operating systems     Local language of operating system     Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)     pre-installed operating system		
60068-2-30, IEC 60068-2-14         • Operation, max.         85 %; At 30 °C/h (no condensation); Tested according to IEC 60068-2-78, IEC 60068-2-30, IEC 60068-2-14         Vibrations         • Operation, tested according to IEC 60068-2-6         Yes         Shock testing         • tested according to IEC 60068-2-77         Yes         Operating systems         Local language of operating system         Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system		5 %: At 20 °C/b (no condensation); Tested assorting to IEC 00000.0.70 IEC
60068-2-30, IEC 60068-2-14         Vibrations         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing         • tested according to IEC 60068-2-27       Yes         Operating systems         Local language of operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system       French, Spanish, Italian, Chinese		60068-2-30, IEC 60068-2-14
Vibrations         • Operation, tested according to IEC 60068-2-6       Yes         Shock testing         • tested according to IEC 60068-2-27       Yes         Operating systems         Local language of operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system	<ul> <li>Operation, max.</li> </ul>	
Operation, tested according to IEC 60068-2-6 Yes Shock testing     tested according to IEC 60068-2-27 Yes Operating systems Local language of operating system Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese) pre-installed operating system	Vibrations	
Shock testing         • tested according to IEC 60068-2-27       Yes         Operating systems         Local language of operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system		Yes
tested according to IEC 60068-2-27 Yes     Operating systems     Local language of operating system     multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)     pre-installed operating system		
Operating systems         Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)           pre-installed operating system         Spanish, Italian, Chinese)		Yes
Local language of operating system       Multi-Language User Interface (MUI): 6 languages (English, German, French, Spanish, Italian, Chinese)         pre-installed operating system	, and the second s	
pre-installed operating system		
	pre-installed operating system	
		Yes; Windows 10 Enterprise 64-bit

Software	
Preinstalled	
<ul> <li>STEP 7 Professional (TIA Portal)</li> </ul>	Yes; software version: V16
• STEP 7	Yes; Professional 2017 SR2
WinCC flexible Advanced 2008	Yes; Software version: SP5
<ul> <li>WinCC Advanced (TIA Portal)</li> </ul>	Yes; software version: V16
• STEP 5	Yes; Optional; software version: STEP 5 V7.23 HF2 (incl. GRAPH 5/II V7.15)
Mechanics/material	
Material of housing	metal
Handle	Yes; retractable
Socket for Kensington lock	Yes
rubber corner guards	Yes
Dimensions	
Width	385 mm
Height	53 mm
Depth	275 mm
Weights	
Weight, approx.	3.4 kg; incl. rechargeable battery
Scope of supply	
Accumulator	Yes
Power supply	Yes
Backpack	Yes
SIMATIC Software	Yes
Recovery media	Yes; Restore & Recovery
Other	
free hotline	Yes
Note:	Made in Germany: development and production in Germany

last modified:

3/21/2023 🖸