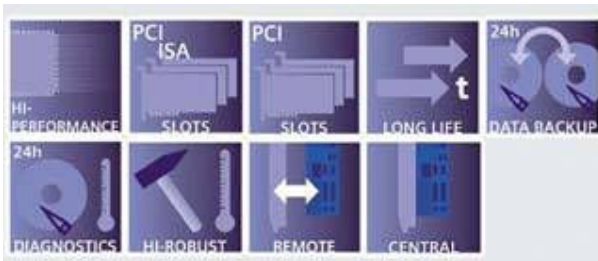


# Human Machine Interface (HMI) - SIMATIC Panel PC 877



## Overview



- PC platform with high degree of industrial compatibility for demanding tasks in the area of PC-based automation
- Rugged construction:
  - The PC can withstand the harshest mechanical stress and maintains reliable operation
- Flexible expansion capability
- High degree of investment protection
- Fast integration capability
- Front panel versions:
  - 15" and 19" TFT Touch
  - 12" and 15" TFT Key
- Operator control unit can be located at a distance of up to 30 m from the computer unit (optional with remote kit)

## Benefits

- High industrial capability thanks to extremely rugged design, even resistant against strong vibration and impact loads
- High degree of investment protection due to guaranteed spare parts availability of components (for 5 years following the end of active marketing)
- Optimum continuity of components for long-term machine concepts without the need for repeated engineering outlay
- Time and cost savings thanks to service-friendly equipment design:
  - Operator control unit and computer unit can be simply hinged open for fast replacement of components or for future expansion
  - Front and rear USB 2.0 interfaces for quick and easy connection of additional hardware components
- High industrial capability thanks to integrated PROFIBUS DP/MPI and Ethernet interfaces
- Operational reliability:

The optional direct key module can be used to run the process independently of the operating system and without delay directly via PROFIBUS DP
- 2 x 60 GB SATA RAID1 hard disk system
- Minimization of downtimes through increased system availability
  - Efficient self-diagnosis (SIMATIC PC DiagMonitor)
  - Data backup solutions (preventative data backup)
- Integral component of Totally Integrated Automation (TIA):

increased productivity, minimized engineering outlay, reduced life cycle costs
- Additional installation possibilities by separating the computer unit and operator control unit using the Remote Kit (up to 30 m, available optionally as an accessory)

## Design

The Panel PC 877 comprises a computer unit and an operator control unit.

### Components of the computer unit:

- Rugged metal casing, resistant to vibrations and shocks, with high electromagnetic compatibility.
- Processor:
  - Intel Celeron 2.0 GHz or
  - Intel Pentium 4 2.8 GHz or
  - Intel Pentium 4 Mobile 2.2 GHz
- Main memory, standard configuration:

256 MB

- EIDE hard disk:  $\geq 40$  GB;  
the special vibration-absorbing hard disk holder ensures reliable operation even in case of extremely high mechanical loading
- Diskette drive: 1.44 MB, 3.5"
- Graphics on-board
- Interfaces:
  - 2 x 10/100 Ethernet on-board
  - PROFIBUS DP/MPI on board, electrically isolated
  - 2 x USB 2.0 connection
  - 2 x serial V.24 (9- and 25-pin)
- Free slots for expansion:
  - 2 x PCI, 2 x PCI/ISA shared, 1 x ISA (all slots with card retainers)
- Power supply: 110 V / 230 V AC (autorange) 50/60 Hz or 24 V DC

**Optional additional components:**

- Main memory expansion to 512 MB, 1 GB or 2 GB
- EIDE hard disk  $\geq 80$  GB
- DVD-ROM drive
- CD-RW/DVD combined drive
- Direct control key module
- Double hard disk (2 x  $\geq 40$  GB)
- RAID system (PCI slot card) with 2 x  $\geq 60$  GB 2.5" hard disks

**Components of the operator control unit:**

The operator control units are available in the following versions:

**12" Key**

- 12.1" TFT color display, 800 x 600 pixels (SVGA)
- Membrane keyboard with international PC character set and 36 additional function keys with LED and an integrated mouse

**15" Key**

- 15.1" TFT color display, 1024 x 768 pixels (XGA)
- Membrane keyboard with international PC character set and 36 additional function keys with LED and an integrated mouse

**15" Touch**

- 15.1" TFT color display, 1024 x 768 pixels (XGA)
- Resistive analog touch screen

**19" Touch**

- 19.1" TFT color display, 1280 x 1024 pixels (SXGA)
- Resistive analog touch screen

The operator control units feature a USB 2.0 port on the front for connecting external peripheral devices, such as a mouse or keyboard. They fulfill the requirements of degree of protection IP65 and NEMA 4.

The computer unit is connected via a connecting cable attached at the rear of the operator control unit.

**Side view of the Panel PC 877**

