

TFT Display and Touch



General Description

The PIP with the Panel6 option is a highly integrated robust packaged industrial PC with a special designed aluminum housing and an integrated TFT display. The PIP housing offers enough space to integrate hard disk and/or Flash disk and any PC/104 extensions. The PIP product range offers next to the standard PC functionality on-board special industrial features like 4x RS232 (RS485), USB, Ethernet, Firewire and optionally CAN.

The PIP product range is available with various processors up to Intel Core 2 Duo with 1.5GHz. The special low power consumption design from MPL allows to operate the PIP family without fan or ventilation holes. Unique is also that the PIP products can be operated with 8 - 28VDC/48VDC. With the PIP product range there is no need for internal cabling as all is connected and ready for the customer. Snap-on & Work.

The PIP product is a unique industrial solution with a great flexibility to help to reduce the overall cost in your projects.

The LCD & Touch Option

Gives the PIP product range additional functionality on very small space. Supported as integrated display is a LCD with XGA resolution. The panel supports the design efforts of low power consumption. The chosen panels offer excellent readability and brightness as required in industrial applications. The panel is protected with a hard coated and non-glaring glass.

If the application requires a Touch screen solution then also this can be integrated in the product without special wiring. The Touch screen surface is specially hard coated and has the non-glare feature too. The input can be done by hand or with a pen.



Technical Features

| LCD Option | |
|---------------------------------|---|
| Panel Type | XGA TFT color LCD (LCD6XGA-1/-2) |
| Active display area | 6.3 inches diagonal |
| Pixel pitch | 0.126 mm x 0.126 mm |
| Pixel format | 1024 horizontal by 768 vertical pixels |
| | RGB stripe arrangement |
| Color depth | 24-bit (16.2M colors) |
| Surface | Pencil-hardness: 3H (min.), anti-glare treatment |
| Contrast Ratio | 500 : 1 (typ.) |
| Luminance | 500cd/m ² (typ.) Dimmable |
| Viewing Angle | X axis right 60 % left 60 ° |
| | Y axis down 60°/ up 45° |
| Scanning Directions | Normal or reverse |
| Environment temperature of PIP | 0℃ until 60℃ |
| Humidity | 95% non-condensing (Ta \leq 40 °C) |
| Additional power consumption | 0.9 Watt for Panel (typ.) |
| | 4.0 Watt for the back light (typ.) |
| Power | Internally provided by the PIP |
| Special | Automatic LCD turn off through the operating system is supported! |
| Touch Option | |
| Resistive Touch-screen (8-wire) | Input can be done by fingers or with a pen |
| Active area | 134mm x 101mm |
| Average light transparency | 79% |
| Surface | Hard coating, anti-glare treatment |
| Environment temperature of PIP | Same as with LCD Option |
| Touch controller | Resolution 1024 x 1024 |

 PS/2 (standard), USB or RS232 Interface

 Driver Software
 Available for DOS, Windows and Linux

Touch & Mouse Operation simultaneously on different ports possible

Recommended CPU Product

PIP8-11: Intel Low power Celeron M 1.0GHz CPU PIP9-11: Intel Low power Celeron M 1.0GHz CPU PIP10-1: Intel Low power Pentium M 1.4GHz CPU PIP11-1: Intel Low power Pentium M 1.8GHz CPU PIP20-1: Intel Low power Core Duo 1.67GHz CPU PIP22-1: Intel Low power Core 2 Duo 1.5GHz CPU

Standard available integrated PIP Options

- ✓ Hard disk and/or Flash disk, SSD
- ✓ Compact Flash Slot
- ✓ DVD-RW
- ✓ PCMCIA Slot
- ✓ Any PC/104 expansions (Digital & Analog I/O, WLAN, Fieldbus, GPS....)



Special

Your local distributor