





HMI30

fanless **Industrial Automation - Products & Configurations HMI30 BASIC** Basic configuration > note 1 LCD TFT 5,7" • Touch-Screen • ARM Cortex A8, 1 GHz • 1 GB RAM • 256 MB NAND-Flash • 4GB eMMC PsuedoSLC • fanless • Windows Embedder Compact 7 Pro with Datalight Reliance Nitro file system • Premium HMI 4 BASIC WinCE runtime • ASEM UBIQUITY PRO WinCE runtime • ASEM Basic configuration 7 System Manager • Aluminum front panel • 12 months warranty A В • • Premium HMI 4 BASIC WinCE runtime HMI SOFTWARE Premium HMI 4 ADVANCED WinCE runtime ASEM UBIQUITY PRO WinCE runtime FRONT PANEL Aluminum front panel • ASEM logo sticker PROCESSOR ARM Cortex A8 processor • Freescale i.MX535 • 1 GHz • 400Mhz memory bus • Soldered on board GFG > note 2 5.7" LCD TFT 4:3 • VGA, 640x480, 256K colors • backlight LED 500 cd/m2 • Viewing angle L:R/U:L (typ.): 70°:70°/45°:55° no 5.7" touch-screen • 4 wires resistive technology • Controller integrated on board 7" LCD TFT 15:9 • WVGA, 800x480, 16M colors • backlight LED 500 cd/m2 • Viewing angle L:R/U:L (typ.): 70°:70°/70°:60° • no + 3 7" WIDE touch-screen • 4 wires resistive technology • Controller integrated on board 8,4" LCD TFT 4:3 • SVGA, 800x600, 256K colors • backlight LED, 350 cd/m2 • Viewing angle L:R/U:L (typ.): 75°:75°/60°:70° ves + 1 8,4" touch-screen • 5 wires resistive technology • Controller integrated on board 10,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • backlight LED, 400cd/m2 • Viewing angle L:R/U:L (typ.): 85°:85°/85°:85° no + 3 10,1" W Touch-Screen 16:10 • 5 wires resistive technology • Controller integrated on board 10,4" LCD TFT 4:3 • SVGA, 800x600, 16M colors • LED backlight , 400 cd/m2 • Viewing angle L:R/U:L (typ): 80°:80°/70°:70° 10,4" Touch-Screen 4:3 • 5 wires resistive technology • Controller integrated on board DISPLAY & TOUCH-SCREEN 12.1" LCD TFT 4:3 • SVGA, 800x600, 16M colors • backlight LED, 500 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/80°:60° + 8 12,1" touch-screen • 5 wires resistive technology • Controller integrated on board 12,1" LCD TFT 4:3 • XGA, 1024x768, 16M colors • backlight LED, 600 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/70°:70° + 12 12,1" touch-screen • 5 wires resistive technology • Controller integrated on board 12,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 88°:88°/88°:88° no + 9 12,1" W Touch-Screen 16:10 • 5 wires resistive technology • Controller integrated on board 15" LCD TFT 4:3 • XGA, 1024x768, 16M colors • backlight LED, 450 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/70°:70° ves + 1115" Touch-Screen 4:3 • 5 wires resistive technology • Controller integrated on board 15,6" W LCD TFT 16:9 • 1366x768 (HD), 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 85°:85°/80°:80° + 10 no 15,6" W Touch-Screen 16:9 • 5 wires resistive technology • Controller integrated on board POWER SUPPLY Power supply section with backup for microinterruptions + 2 WARRANTY 12 months on system and its variants _ OPTIONS MPI Adapter cable from DB15F to DB9F (MPI/PPI)

NOTES

WARRANTY

EXTENSION

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For power consumption calculation we reccomend to read the tips on pg. 4. The power values does not include the absorbed power of USB devices connected to the ports.

Price does not include ASEM UBIQUITY DOMAIN that must be purchased one-off at the first order of a license or system that includes the UBIQUITY runtime. See pg.220

Warranty extension to 18 months on basic system and its variants

Warranty extension to 24 months on basic system and its variants

Warranty extension to 36 months on basic system and its variants

Price does not include Premium HMI Studio 2014 development tool licence that must be purchased one-off at the first order of a license or system that includes the Premium HMI software. See po.223

^{2:} Glass Film Glass (GFG) Touch-Screen option: see pg.227 for differences with standard Touch-Screen configuration.









HMI30-TF

fanless

Industrial Automation - Products & Configurations

| | | | HMI30-TF BASIC Basic configuration > note 1 | POWER [\ | | | | | |
|--------------------------|--------|-------|---|----------|--|--|--|--|--|
| Basic con | ıfigur | ation | LCD TFT 5,7" • Touch-Screen • ARM Cortex A8, 1 GHz • 1 GB RAM • 256 MB NAND-Flash • 4GB eMMC PseudoSLC • fanless • Windows Embedde Compact 7 Pro with Datalight Reliance Nitro file system • Premium HMI 4 BASIC WinCE runtime • ASEM UBIQUITY PRO WinCE runtime • ASEM System Manager • Aluminum and polycarbonate TrueFlat front panel • 12 months warranty | 7 | | | | | |
| | A | В | | 2 | | | | | |
| HMI SOFTWARE | • | • | Premium HMI 4 BASIC WinCE runtime | - | | | | | |
| REMOTE ASSISTANCE | Ŀ | • | Premium HMI 4 ADVANCED WinCE runtime | 2 | | | | | |
| | • | • | ASEM UBIQUITY PRO WinCE runtime | - | | | | | |
| FRONT PANEL | • | • | Aluminum TrueFlat front panel with touch-screen overlaminated with OCA (Optical Clear Adhesive) • ASEM logo serigraph printed | - | | | | | |
| PROCESSOR | • | • | ARM Cortex A8 processor • Freescale i.MX535 • 1 GHz • 400Mhz memory bus • Soldered on board | | | | | | |
| | Ī | | 5,7" LCD TFT 4:3 • VGA, 640x480, 256K colors • backlight LED 500 cd/m2 • Viewing angle L:R/U:L (typ.): 70°:70°/45°:55° | 2 | | | | | |
| | • | | | | | | | | |
| | | | 5.7" touch-screen • 4 wires resistive technology • Controller integrated on board 7" LCD TFT 15:9 • WVGA, 800x480, 16M colors • backlight LED 500 cd/m2 • Viewing angle L:R/U:L (typ.): 70°:70°/70°:60° | | | | | | |
| | • | • | | + 3 | | | | | |
| | | | 7" WIDE touch-screen • 4 wires resistive technology • Controller integrated on board | | | | | | |
| | | | 8,4" LCD TFT 4:3 • SVGA, 800x600, 256K colors • backlight LED, 350 cd/m2 • Viewing angle L:R/U:L (typ.): 75°:75°/60°:70° | + 1 | | | | | |
| | | | 8,4" touch-screen • 5 wires resistive technology • Controller integrated on board | | | | | | |
| | | | 10,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • backlight LED, 400cd/m2 • Viewing angle L:R/U:L (typ.): 85°:85°85°85°85°85°85°85°85°85°85°85°85°85°8 | | | | | | |
| | | | 10,4" LCD TFT 4:3 • SVGA, 800x600, 16M colors • LED backlight , 400 cd/m2 • Viewing angle L:R/U:L (typ): 80°:80°/70°:70° | | | | | | |
| | | | 10,4" Touch-Screen 4:3 • 5 wires resistive technology • Controller integrated on board | | | | | | |
| DISPLAY & DUCH-SCREEN | | | | | | | | | |
| | | | 12,1" LCD TFT 4:3 • SVGA, 800x600, 16M colors • backlight LED, 500 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/80°:60° | + 8 | | | | | |
| | | | 12,1" touch-screen • 5 wires resistive technology • Controller integrated on board | | | | | | |
| | • | | 12,1" LCD TFT 4:3 • XGA, 1024x768, 16M colors • backlight LED, 600 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/70°:70° | + 12 | | | | | |
| | | | 12,1" touch-screen • 5 wires resistive technology • Controller integrated on board | | | | | | |
| | | | 12,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 88°:88°/88°:88° | + 9 | | | | | |
| | | | 12,1" W Touch-Screen 16:10 • 5 wires resistive technology • Controller integrated on board | | | | | | |
| | | | 15" LCD TFT 4:3 • XGA, 1024x768, 16M colors • backlight LED, 450 cd/m2 • Viewing angle L:R/U:L (typ.): 80°:80°/70°:70° | + 1 | | | | | |
| | | | 15" Touch-Screen 4:3 • 5 wires resistive technology • Controller integrated on board | | | | | | |
| | | | 15,6" W LCD TFT 16:9 • 1366x768 (HD), 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 85°:85°/80°:80° | + 10 | | | | | |
| | L | | 15,6" W Touch-Screen 16:9 • 5 wires resistive technology • Controller integrated on board | | | | | | |
| OWER SUPPLY | • | • | Power supply section with backup for microinterruptions | + 2 | | | | | |
| WARRANTY | • | • | 12 months on system and its variants | - | | | | | |
| | | | OPTIONS | | | | | | |
| | | | | 2 | | | | | |
| MPI | • | • | Adapter cable from DB15F to DB9F (MPI/PPI) | | | | | | |

| | | | OPTIONS | |
|-----------------------|---|---|--|---|
| | | | | Ψ |
| MPI | • | • | Adapter cable from DB15F to DB9F (MPI/PPI) | |
| | | • | | Ψ |
| | • | • | Warranty extension to 18 months on basic system and its variants | |
| WARRANTY EXTENSION | • | • | Warranty extension to 24 months on basic system and its variants | |
| | • | | Warranty extension to 36 months on basic system and its variants | |

NOTES

For power consumption calculation we reccomend to read the tips on pg. 4. The power values does not include the absorbed power of USB devices connected to the ports.

1: Price does not include Premium HMI Studio 2014 development tool licence that must be purchased one-off at the first order of a license or system that includes the Premium HMI software. See pg.223

Price does not include ASEM UBIQUITY DOMAIN that must be purchased one-off at the first order of a license or system that includes the UBIQUITY runtime. See pg.220







HMI30-TFC

fanless

Industrial Automation - Products & Configurations HMI30-TFC BASIC Basic configuration > note 1 LCD TFT 7" W • P-CAP projected capacitive Touch-Screen • ARM Cortex A8, 1 GHz • 1 GB RAM • 256 MB NAND-Flash • 4GB eMMC pseudoSLC • Fanless - Windows Embedded Compact 7 Pro with Datalight Reliance Nitro file system - Premium HMI 4 BASIC WINCE runtime • ASEM UBIQUITY PRO WinCE runtime • ASEM System Manager • Aluminum and tempered glass TrueFlat front panel • 12 months warranty Basic configuration 10 АВ • • Premium HMI 4 BASIC WinCE runtime HMI SOFTWARE • Premium HMI 4 ADVANCED WinCE runtime REMOTE ASSISTANCE ASEM UBIQUITY PRO WinCE runtime FRONT PANEL Aluminum and glass TrueFlat front panel with P-CAP projected capacitive touch-screen PROCESSOR ARM Cortex A8 processor • Freescale i.MX535 • 1 GHz • 400Mhz memory bus • Soldered on board Ą 7" LCD TFT 15:9 • WVGA, 800x480, 16M colors • backlight LED 500 cd/m2 • Viewing angle L:R/U:L (typ.): 70°:70°/70°:60° 7" W Touch-Screen 15:9 • P-CAP projected capacitive touchscreen 10,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • backlight LED, 400cd/m2 • Viewing angle L:R/U:L (typ.): 85°:85°/85°:85° - 0 10,1" W Touch-Screen 16:10 • P-CAP projected capacitive touchscreen DISPLAY & TOUCH-SCREEN 12,1" W LCD TFT 16:10 • WXGA, 1280x800, 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 88°:88°/88°:88° + 7 12,1" W Touch-Screen 16:10 • P-CAP projected capacitive touchscreen 15,6" W LCD TFT 16:9 • 1366x768 (HD), 16M colors • LED backlight, 400 cd/m2 • Viewing angle L:R/U:L (typ): 85°:85°/80°:80° + 8 15,6" W Touch-Screen 16:9 • P-CAP projected capacitive touchscreen POWER SUPPLY Power supply section with backup for microinterruptions + 2 WARRANTY 12 months on system and its variants OPTIONS Adapter cable from DB15F to DB9F (MPI/PPI) Warranty extension to 18 months on basic system and its variants WARRANTY EXTENSION Warranty extension to 24 months on basic system and its variants

NOTES

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For power consumption calculation we reccomend to read the tips on pg. 4. The power values does not include the absorbed power of USB devices connected to the ports.

Warranty extension to 36 months on basic system and its variants

Price does not include ASEM UBIQUITY DOMAIN that must be purchased one-off at the first order of a license or system that includes the UBIQUITY runtime. See pg.220

^{1:} Price does not include Premium HMI Studio 2014 development tool licence that must be purchased one-off at the first order of a license or system that includes the Premium HMI software. See pg.223







Industrial Automation - Products & Configurations

| Premium HMI runtimes differences | BASIC | ADVANCED |
|------------------------------------|-------|----------------------------|
| RealTime DB (max, byte) | 1.024 | 8.192 |
| Alarms (max) | 1.024 | 4.096 |
| Recipes / Data Logger (ODBC) | Max 2 | Unlimited |
| Communication drivers | Max 2 | Max 4 |
| Alarm notification (SMS, E-Mail) | | ✓ |
| SMS notification via SMPP protocol | | SMS using Internet gateway |
| Web Clients | | Max 4 clients connected |
| Premium HMI Mobile | | ✓ |

For Premium HMI 4 details, see pg.223

ASEM UBIQUITY PRO main features

Control Center application to access the service with intuitive and ergonomic user interface for a comprehensive machine park management Control Center SDK to interface with 3rd part applications

PROXY server support

Internet sharing with LAN devices

Interactive tool: remote desktop, file transfer, task manager, chat, screenshots

Optimized VPN with access limited to the remote device with Ubiquity Runtime

Optimized VPN with entire access to the complete remote device sub-network and serial passthrough

Multiple connections to a single Runtime with individual VPN per each Control Center client

Connection log accessible from Runtime device

Log and audit of last 10 days connections activities also exportable from Runtime side

High level of security with exclusive use of encrypted connections and certificates

Integrated VPN Firewall

Support for Runtime update with automatic services restart

Ethernet-MPI gateway for remote assistance on devices with MPI interface

For ASEM UBIQUITY details, see pg.220

ASM (ASEM System Manager). Control Panel utilities

Backup&Restore - Complete system cloning or selective backup and restore of the installed softwares

Antialiasing - Softens the characters matrix

Screensaver - Display brightness control or display switch off after an inactivity period

Touch Buzzer - Enable touch sound-feedback

eMMC Usage - Check the eMMC memory usage and evaluate the expected endurance

Kiosk Mode - Hide the O.S. explorer interface and run PHMI runtime in 'kiosk' mode

Language Settings - Easy installation of not european languages characters in HMI applications

Scrollbar - Consente di cambiare le dimensioni delle barre di scorrimento

System reboot - Reboot the system without switching off the power supply

| TECHNICAL SPECIFICATIO | NS . | | | | | | | | |
|-------------------------------|--|--|--|--|--|--|--|--|--|
| Case | Panel mount | | | | | | | | |
| Overall dimensions & weight | See details on the related section | | | | | | | | |
| Front Panel | HMI30 Aluminum • ASEM logo sticker | | | | | | | | |
| | HMI30-TF Aluminum TrueFlat • Polycarbonate Pantone Cool Grey 4C color • ASEM logo serigraph printed | | | | | | | | |
| | HMI30-TFC Aluminum and tempered glass TrueFlat | | | | | | | | |
| Touchscreen | HMI30 4/5 wires resistive technology | | | | | | | | |
| | HMI30-TF 4/5 wires resistive technology • overlaminated with OCA (Optical Clear Adhesive) | | | | | | | | |
| | HMI30-TFC projective capacitive touch-screen | | | | | | | | |
| Frontal protection | IP66, Enclosure type 4X (Indoor use only) | | | | | | | | |
| Operating System | Microsoft Windows Embedded Compact 7 Pro license with Datalight Reliance Nitro file system • Microsoft olographic sticker | | | | | | | | |
| Software HM | Premium HMI 4 WinCE BASIC / ADVANCED runtime license | | | | | | | | |
| Remote assistanc | ASEM UBIQUITY WinCE PRO runtime license with ASEM sticker | | | | | | | | |
| Utilit | ASEM System Manager • Backup&Restore, Screensaver, Antialiasing | | | | | | | | |
| Power supply | Input voltage 18÷36V DC • Power supply section integrated on board | | | | | | | | |
| optiona | Backup for microinterruption with supercapacitors • Max interruption: 500ms • First load: 6' • Rearm time: 90" | | | | | | | | |
| Motherboard | "All-In-One" type • ASEM R131 | | | | | | | | |
| Processor | ARM Cortex A8 • Freescale i.MX535 • 1 GHz, 400 MHz system memory bus • Soldered on board • GPU (Graphic Processor Unit) integrated | | | | | | | | |
| RAM memory | 1 GB DDR3-800 • Soldered on board | | | | | | | | |
| Mass storage | NAND-Flash 256MB Read-Only • for operating system and runtime | | | | | | | | |
| | eMMC (Solid State Disk) 4GB PseudoSLC, 8bit, file system organization • for projects and applications | | | | | | | | |
| SD slot | 1 x Slot SD/SDHC v2.0 integrated on board • external access | | | | | | | | |
| Rear access interfaces | LAN1 Ethernet 100 Mbps (RJ45) • LAN2 Ethernet 10/100 Mbps (RJ45) • 2 x USB 2.0 (Type-A / host) | | | | | | | | |
| Rear access serial interfaces | 1 x RS-232/422/485 (DB15M) MPI protocol compatibile up to 187,5Kbit/s | | | | | | | | |
| Environmental specifications | Operating temperature: 0° ÷ +50°C • Storage temperature: -20° ÷ +60°C • Humidity: 80% (non-condensing) | | | | | | | | |
| Approvals | CE (EN 55022, EN 61000-3-2/3, EN 55024, EN 60950-1) • cULus LISTED (UL508) (HMI30-TFC pending)• ATEX 2014/34/UE Zone 2/22 (NO HMI30-TFC) | | | | | | | | |
| Standard warranty | 12 months • Warranty management by ASEM headquarters | | | | | | | | |



HMI30 family

Technical Specifications

FRONT VIEW CUT OUT SIDE VIEW A D D D

| HMI30 | | CUT | OUT "A" | | | CUT C | OUT "B" | | | | | |
|---------|-----|-------|---------|-------|-----|-------|---------|-------|---|------|--------|------|
| LCD TFT | Α | В | С | D | Α | В | С | D | Н | F | Weight | (Kg) |
| 5,7" | 175 | 145 | 164 | 134 | - | - | - | - | 5 | 40 | 0,9 | |
| 7"W | 215 | 155 | 204 | 144 | 204 | 147,6 | 197 | 140,5 | 5 | 40 | 1,2 | |
| 8,4" | 255 | 190 | 243 | 179 | - | - | - | - | 5 | 48,5 | 1,4 | |
| 10,1"W | 293 | 201,5 | 285 | 193,5 | - | - | - | - | 5 | 48,5 | 1,6 | |
| 10,4" | 295 | 230 | 283 | 219 | - | - | - | - | 5 | 48,5 | 1,8 | |
| 12,1" | 325 | 260 | 313 | 249 | - | - | - | - | 5 | 48,5 | 2,1 | |
| 12,1"W | 321 | 222,5 | 313 | 215 | - | - | - | - | 5 | 48,5 | 2,0 | |
| 15" | 390 | 305 | 378 | 294 | - | - | - | - | 6 | 48,5 | 3,3 | |
| 15,6"W | 420 | 265 | 410 | 255 | - | - | - | - | 6 | 48,5 | 3,3 | |

| HMI30-TF | | CUT (| "A" TUC | | | CUT (| OUT "B" | | | | | |
|--------------|-----|-------|---------|-------|-----|-------|---------|-------|---|------|-----------|----|
| LCD TFT | Α | В | С | D | Α | В | С | D | Н | F | Weight (K | g) |
| <i>5,7</i> " | 175 | 145 | 164 | 134 | - | - | - | - | 5 | 40 | 0,9 | |
| 7"W | 215 | 155 | 204 | 144 | 204 | 147,6 | 197 | 140,5 | 4 | 40 | 1,2 | |
| 8,4" | 255 | 190 | 243 | 179 | - | - | - | - | 5 | 48,5 | 1,4 | |
| 10,1"W | 293 | 201,5 | 285 | 193,5 | - | - | | - | 5 | 48,5 | 1,6 | |
| 10,4" | 295 | 230 | 283 | 219 | - | - | ı | - | 5 | 48,5 | 1,8 | |
| 12,1" | 325 | 260 | 313 | 249 | - | - | - | - | 5 | 48,5 | 2,1 | |
| 12,1"W | 321 | 222,5 | 313 | 215 | - | - | ı | - | 5 | 48,5 | 2,0 | |
| <i>15"</i> | 390 | 305 | 378 | 294 | - | - | - | - | 6 | 48,5 | 3,3 | |
| 15,6"W | 420 | 265 | 410 | 255 | - | - | - | - | 6 | 48,5 | 3,3 | |

| Н | MI30-TFC | | CUT (| "A" TUC | | | CUT (| DUT "B" | | | | | |
|---|----------|-----|-------|---------|-------|-----|-------|---------|-------|---|------|--------|------|
| | LCD TFT | Α | В | С | D | Α | В | С | D | Н | F | Weight | (Kg) |
| | 7"W | - | - | - | - | 204 | 147,6 | 197 | 140,5 | 4 | 40 | 1,2 | |
| | 10,1"W | 293 | 201,5 | 285 | 193,5 | - | - | - | - | 5 | 48,5 | 1,6 | |
| | 12,1"W | 331 | 222,5 | 313 | 215 | - | - | - | - | 5 | 48,5 | 2,0 | |
| | 15,6"W | 433 | 267 | 410 | 255 | - | - | - | - | 6 | 48,5 | 3,3 | |

