# Product data sheet Characteristics

## HMIGTO2310

# advanced touchscreen panel 320 x 240 pixels QVGA- 5.7" TFT - 96 MB





#### Main Range of product Magelis GTO Product or component Advanced touchscreen panel type Display colour 65536 colours Display size 5.7 inch Supply External source Operating system Battery type Lithium battery for internal RAM, autonomy: 100 days, charging time = 5 day(s), battery life = 10 year(s)

#### Complementary

| Complementary                                                |                                                                                                                                                                                                                                                                                                                                                                                                                                                              |  |  |  |
|--------------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--|--|
| Terminal type                                                | Touchscreen display                                                                                                                                                                                                                                                                                                                                                                                                                                          |  |  |  |
| Display type                                                 | Backlit colour TFT LCD                                                                                                                                                                                                                                                                                                                                                                                                                                       |  |  |  |
| Display resolution                                           | 320 x 240 pixels QVGA                                                                                                                                                                                                                                                                                                                                                                                                                                        |  |  |  |
| Touch sensitive zone                                         | 1024 x 1024                                                                                                                                                                                                                                                                                                                                                                                                                                                  |  |  |  |
| Touch panel                                                  | Resistive film, 1000000 cycles                                                                                                                                                                                                                                                                                                                                                                                                                               |  |  |  |
| Backlight lifespan                                           | 50000 hours white at 25 °C                                                                                                                                                                                                                                                                                                                                                                                                                                   |  |  |  |
| Brightness                                                   | 16 levels - control by touch panel<br>16 levels - control by software                                                                                                                                                                                                                                                                                                                                                                                        |  |  |  |
| Character font                                               | Korean Taiwanese (traditional Chinese) ASCII (European characters) Chinese (simplified Chinese) Japanese (ANK, Kanji)                                                                                                                                                                                                                                                                                                                                        |  |  |  |
| [Us] rated supply voltage                                    | 24 V DC                                                                                                                                                                                                                                                                                                                                                                                                                                                      |  |  |  |
| Supply voltage limits                                        | 19.228.8 V                                                                                                                                                                                                                                                                                                                                                                                                                                                   |  |  |  |
| Inrush current                                               | 30 A                                                                                                                                                                                                                                                                                                                                                                                                                                                         |  |  |  |
| Maximum power consumption in W                               | <ul><li>6.5 W when power is not supplied to external devices</li><li>4.5 W when backlight is OFF</li><li>5 W when backlight is dimmed</li><li>10.5 W</li></ul>                                                                                                                                                                                                                                                                                               |  |  |  |
| Local signalling                                             | Status LED green, steady for offline Status LED green, steady for operating Status LED orange, flashing for software starting up Status LED red, steady for power supply (ON) Status LED clear, faded for power supply (OFF) COM2 LED yellow, steady for data is being transmitted COM2 LED yellow, faded for no data transmission SD card LED green, steady for card is inserted SD card LED green, faded for card is not inserted or is not being accessed |  |  |  |
| Software designation                                         | Vijeo Designer configuration software >= V6.1                                                                                                                                                                                                                                                                                                                                                                                                                |  |  |  |
| Memory description                                           | Flash EPROM, 96 MB                                                                                                                                                                                                                                                                                                                                                                                                                                           |  |  |  |
| Data backed up                                               | 512 kB internal RAM (SRAM)                                                                                                                                                                                                                                                                                                                                                                                                                                   |  |  |  |
| Data storage equipment SD card, <= 32 GB SDHC card, <= 32 GB |                                                                                                                                                                                                                                                                                                                                                                                                                                                              |  |  |  |
|                                                              |                                                                                                                                                                                                                                                                                                                                                                                                                                                              |  |  |  |

| Downloadable protocols                | Schneider Electric Modicon Modbus Schneider Electric Modicon Uni-TE Schneider Electric Modicon Modbus Plus Schneider Electric Modicon FIPWAY Mitsubishi Melsec third party protocols Omron Sysmac third party protocols Rockwell Automation Allen-Bradley third party protocols                                                                                                    |  |  |  |  |
|---------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--|--|--|
|                                       |                                                                                                                                                                                                                                                                                                                                                                                    |  |  |  |  |
|                                       |                                                                                                                                                                                                                                                                                                                                                                                    |  |  |  |  |
|                                       |                                                                                                                                                                                                                                                                                                                                                                                    |  |  |  |  |
|                                       | Siemens Simatic third party protocols                                                                                                                                                                                                                                                                                                                                              |  |  |  |  |
|                                       | Schneider Electric Modicon Modbus TCP                                                                                                                                                                                                                                                                                                                                              |  |  |  |  |
| Integrated connection type            | COM1 serial link SUB-D 9, interface: RS232C, transmission rate: 2400115200 bps COM2 serial link RJ45, interface: RS485, transmission rate: 2400115200 bps COM2 serial link RJ45, interface: RS485, transmission rate: 187.5 kbps compatible with Siemens MPI Ethernet RJ45, interface: 10BASE-T/100BASE-TX Ethernet RJ45, interface: IEEE 802.3 USB 2.0 type A USB 2.0 type mini B |  |  |  |  |
| Product mounting                      | Flush mounting                                                                                                                                                                                                                                                                                                                                                                     |  |  |  |  |
| Fixing mode                           | By 4 screw clamps                                                                                                                                                                                                                                                                                                                                                                  |  |  |  |  |
| Front material                        | PPT                                                                                                                                                                                                                                                                                                                                                                                |  |  |  |  |
| Enclosure material                    | PPT                                                                                                                                                                                                                                                                                                                                                                                |  |  |  |  |
| Type of cooling                       | Natural convection                                                                                                                                                                                                                                                                                                                                                                 |  |  |  |  |
| Width                                 | 169.5 mm                                                                                                                                                                                                                                                                                                                                                                           |  |  |  |  |
| Height                                | 137 mm                                                                                                                                                                                                                                                                                                                                                                             |  |  |  |  |
| Depth                                 | 59.5 mm                                                                                                                                                                                                                                                                                                                                                                            |  |  |  |  |
| Product weight                        | 0.8 kg                                                                                                                                                                                                                                                                                                                                                                             |  |  |  |  |
| Environment                           |                                                                                                                                                                                                                                                                                                                                                                                    |  |  |  |  |
| Standards                             | IEC 61000-6-2<br>UL 508<br>EN 61131-2                                                                                                                                                                                                                                                                                                                                              |  |  |  |  |
| Draduct codifications                 | CULus                                                                                                                                                                                                                                                                                                                                                                              |  |  |  |  |
| Product certifications                | CoLus<br>C-Tick                                                                                                                                                                                                                                                                                                                                                                    |  |  |  |  |
|                                       | CE                                                                                                                                                                                                                                                                                                                                                                                 |  |  |  |  |
|                                       | KCC                                                                                                                                                                                                                                                                                                                                                                                |  |  |  |  |
| Ambient air temperature for operation | 055 °C                                                                                                                                                                                                                                                                                                                                                                             |  |  |  |  |

|                                       | CE<br>KCC                                                                                                                                                                                                     |  |  |  |  |
|---------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--|--|--|--|
| Ambient air temperature for operation | 055 °C                                                                                                                                                                                                        |  |  |  |  |
| Ambient air temperature for storage   | -2060 °C                                                                                                                                                                                                      |  |  |  |  |
| Relative humidity                     | 1090 % without condensation                                                                                                                                                                                   |  |  |  |  |
| Operating altitude                    | < 2000 m                                                                                                                                                                                                      |  |  |  |  |
| IP degree of protection               | IP20 (rear panel) conforming to IEC 60529 IP65 (front panel) conforming to IEC 60529                                                                                                                          |  |  |  |  |
| NEMA degree of protection             | NEMA 4X front panel (indoor use)                                                                                                                                                                              |  |  |  |  |
| Shock resistance                      | 147 m/s² 3 chocks in each direction X, Y and Z conforming to EN/IEC 61131-2                                                                                                                                   |  |  |  |  |
| Vibration resistance                  | 3.5 mm (f = 59 Hz) - X, Y, Z directions for 10 cycles (approx. 100 min) - conforming to EN/IEC 61131-2 1 gn (f = 9150 Hz) - X, Y, Z directions for 10 cycles (approx. 100 min) - conforming to EN/IEC 61131-2 |  |  |  |  |
| Resistance to electrostatic discharge | 6 kV contact discharge conforming to IEC 61000-4-2 level 3                                                                                                                                                    |  |  |  |  |

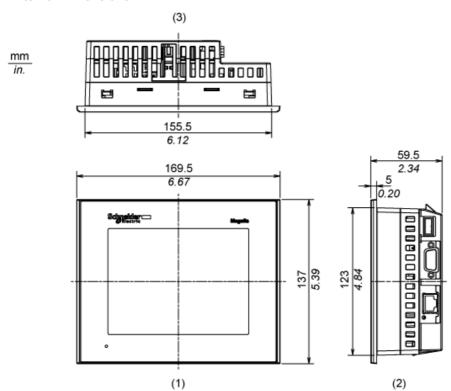
#### Offer Sustainability

| Sustainable offer status   | Green Premium product                                                                                                       |  |  |
|----------------------------|-----------------------------------------------------------------------------------------------------------------------------|--|--|
| REACh Regulation           | ☑ REACh Declaration                                                                                                         |  |  |
| REACh free of SVHC         | Yes                                                                                                                         |  |  |
| EU RoHS Directive          | Pro-active compliance (Product out of EU RoHS legal scope) EVEL RoHS                                                        |  |  |
| Mercury free               | Yes                                                                                                                         |  |  |
| RoHS exemption information | ₫Yes                                                                                                                        |  |  |
| China RoHS Regulation      | ☑ China RoHS Declaration                                                                                                    |  |  |
| WEEE                       | The product must be disposed on European Union markets following specific waste collection and never end up in rubbish bins |  |  |

Warranty 18 months

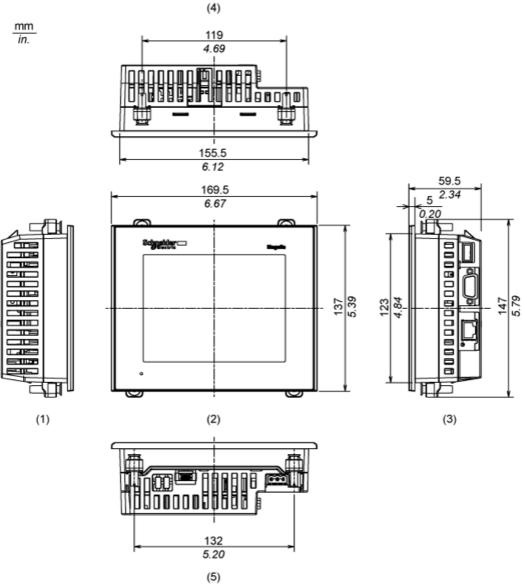
#### **Dimensions**

#### **External Dimensions**



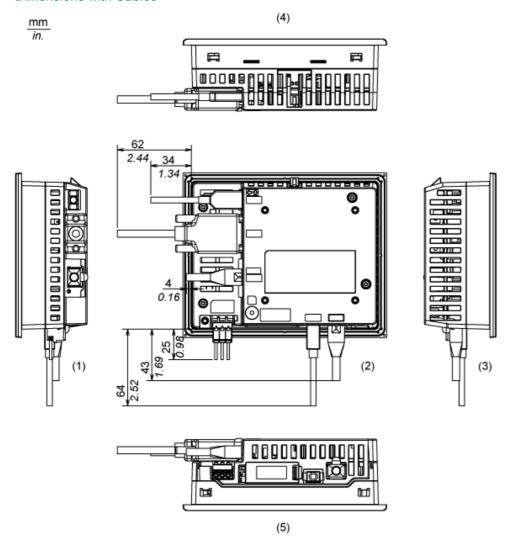
- Front Right Side
- 1 2 3 Top

#### Installation with Installation Fasteners



- 1 Left Side
- Front
- Right Side
- 2 3 4 Top
- Bottom

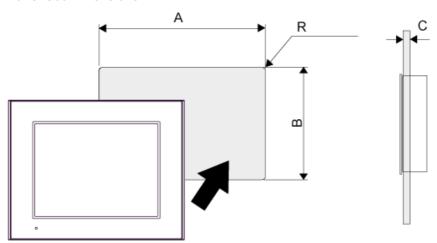
#### **Dimensions with Cables**



- Left Side 1 2 3 4 5
- Rear
- Right Side
- Top
- Bottom

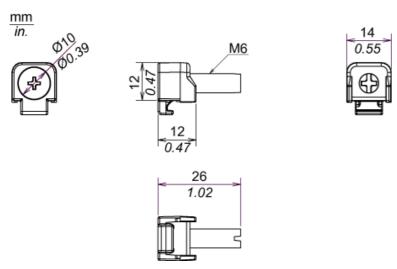
#### Mounting

#### Panel Cut Dimensions



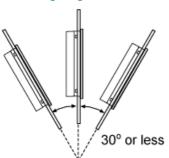
| Α            |                  | В              |                  | С    |         | R      |           |
|--------------|------------------|----------------|------------------|------|---------|--------|-----------|
| mm           | in.              | mm             | in.              | mm   | in.     | mm     | in.       |
| 156 (+1, -0) | 6.14 (+0.04, -0) | 123.5 (+1, -0) | 4.86 (+0.04, -0) | 1.65 | 0.060.2 | 3 max. | 0.12 max. |

#### **Installation Fastener Dimensions**



### Installation Requirements

### Mounting Angle



When installing the panel in a slanted position with an incline more than 30 $^{\circ}$ , the ambient temperature must not exceed 40 $^{\circ}$ C (104 $^{\circ}$ F). You may need to use forced air cooling (fan,A/C) to ensure the ambient operating temperature is 40 $^{\circ}$ C or less (104 $^{\circ}$ F or less).

#### Clearance

