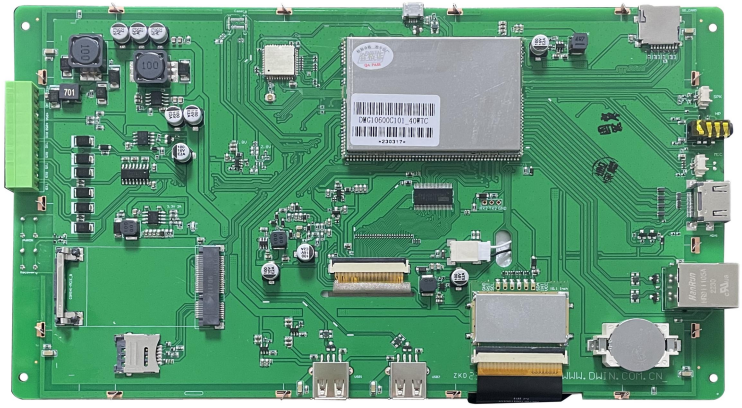
# DMG10600C101_40WTC



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## System Hardware

| Properties | Parameters |
|---|---|
| **Motherboard level** | Commercial-grade |
| **CPU** | RK3566, Quad-core ARM Cortex-A55, 1.8GHz Processor |
| **OS** | Linux 4.19 |
| **Storage** | 8Gbytes eMMC |
| **RAM** | 2Gbytes LPDDR4 |

## Display Parameters

| Properties | Parameters | Description |
|---|---|---|
| **Size** | 10.1 inch | - |
| **LCD Type** | IPS, TFT LCD | - |
| **Viewing Angle** | 85° /85° /85° /85° | Wide viewing angle, high contrast, and good color reproduction |
| **Active Area (AA)** | 222.72mm (W)*125.28mm (H) | - |
| **Resolution** | 1024x600 | - |
| **Backlight Service Life** | >20000 Hrs | Backlight service life refers to the period the LED backlight operates under test conditions until brightness decreases to 50% of the initial level |
| **Brightness** | 200nit | 100-level brightness adjustment (Flickering may occur at 1%-30% of max brightness; not recommended for use in this range) |
| Note: Use dynamic screen saver to prevent afterimages from prolonged fixed page display. | | |

## Touch Parameter

| Properties | Parameters |
|---|---|
| **Touch Type** | Capacitive touch panel |
| **Structure** | G+G structure with tempered glass surface |

## Power Supply

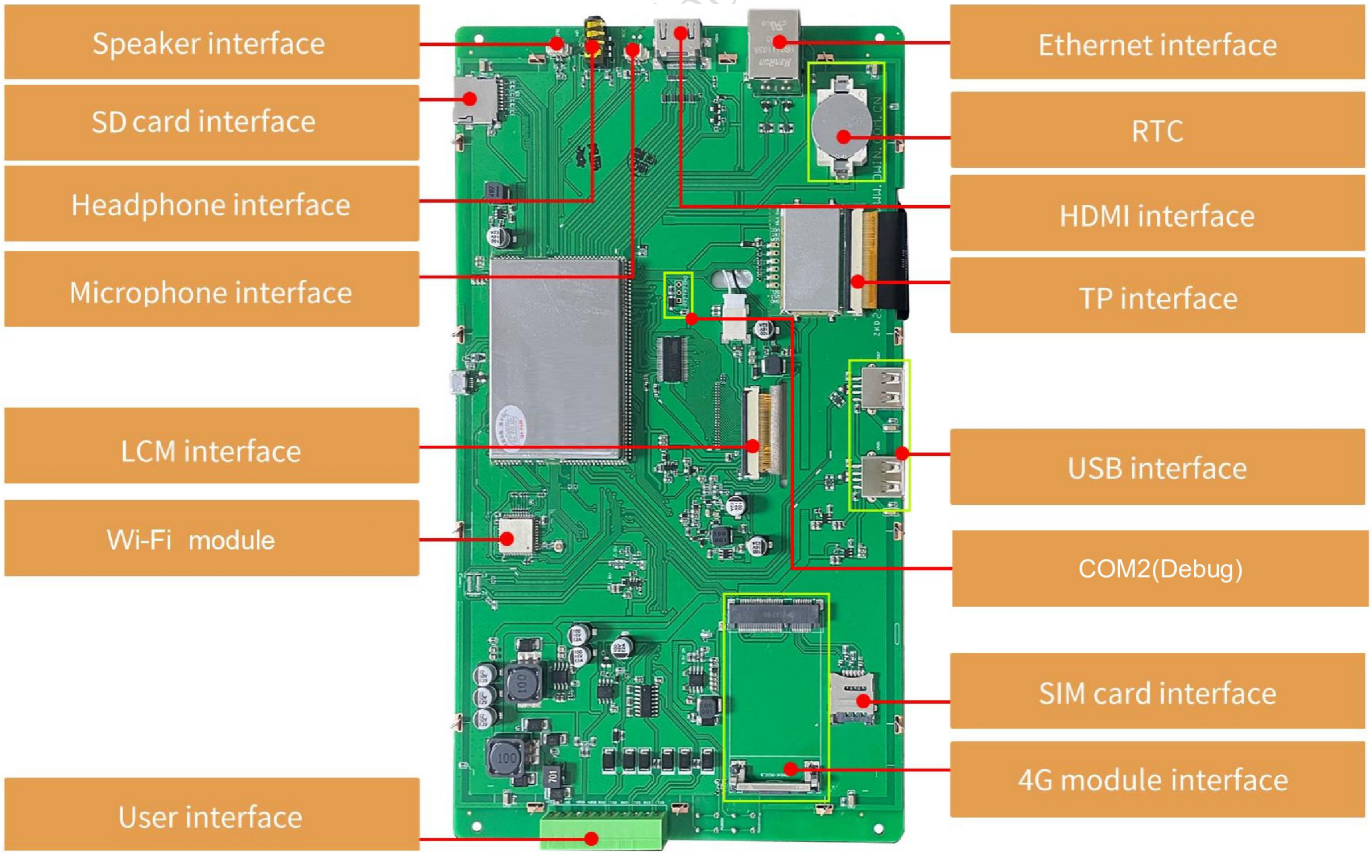
| Properties | Min | Typ | Max | Unit |
|---|---|---|---|---|
| **Power Voltage** | 9.0 | 12.0 | 36.0 | V |
| Recommended power supply:12V 1A DC. | | | | |

## Environment & Reliability Test

| Properties | Conditions | Min | Typ | Max | Unit |
|---|---|---|---|---|---|
| **Working Temperature** | 60%RH at 12V voltage | -20 | 25 | 65 | ℃ |
| **Storage Temperature** | - | -30 | 25 | 80 | ℃ |
| **Working Humidity** | 25℃ | 10% | 60% | 90% | RH |
| **Conformal Coating** | Y | | | | |
| **ESD** | Air: ±8KV; Contact: ±4KV | | | | |
| **EFT** | Group pulse interference±2KV | | | | |
| **CE Certification** | Y | | | | |
| Additional cooling required for operation above 65℃. | | | | | |

## Peripherals and Interfaces

| Properties | Description |
|---|---|
| **User Interface** | 10Pin_3.81mm Horizontal socket |
| **COM** | RS232*2(COM5 & COM9), RS485*1(COM8), TTL*1(COM0),TTL*1(COM2, debug) |
| **Wi-Fi** | IEE 802.11b/g/n, 2.4GHz, Wi-Fi 4 |
| **Bluetooth Version** | BT4.2 |
| **Ethernet** | 10/100Mbps |
| **USB** | USB 2.0*2(HOST), Micro USB*1(OTG) |
| **SD Card** | Max 64G |
| **RTC** | Accuracy: ±20ppm @25℃ |
| **Speaker** | 2Pin_1.25mm interface*1 |
| **Microphone** | 2Pin_1.25mm interface*1 |
| **Headphone** | 3.5mm spacing interface |
| **Camera** | USB, not supported by MIPI |
| **4G module** | Factory not configured, customizable to add |
| **HDMI interface** | HDMI*1 |



## Development Platform

| Development | |
|---|---|
| **QT** | QTCreator2.7.2 and above |

## Packing Capacity & Dimension

| Dimension | | | | |
|---|---|---|---|---|
| **Dimension** | 257.81(W)*148.08(H)*23.20(T)mm | | | |
| **Net Weight** | 620g | | | |
| **Packing Capacity** | | | | |
| **Model** | **Size** | **Layer** | **Quantity/Layer** | **Quantity(Pcs)** |
| **Carton1:** | 220mm(L)*160mm(W)*47mm (H) | - | - | - |
| **Carton2:** | 250mm(L)*200mm(W)*80mm (H) | - | - | - |
| **Carton3:** | 320mm(L)*270mm(W)*80mm (H) | 2 | 1 | 2 |
| **Carton4:** | 450mm(L)*350mm(W)*300mm(H) | 1 | 10 | 10 |
| **Carton5:** | 600mm(L)*450mm(W)*300mm(H) | 1 | 16 | 16 |

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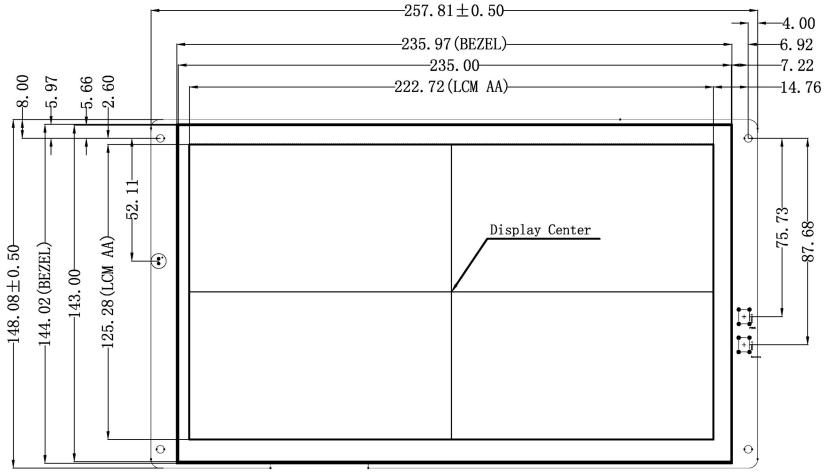


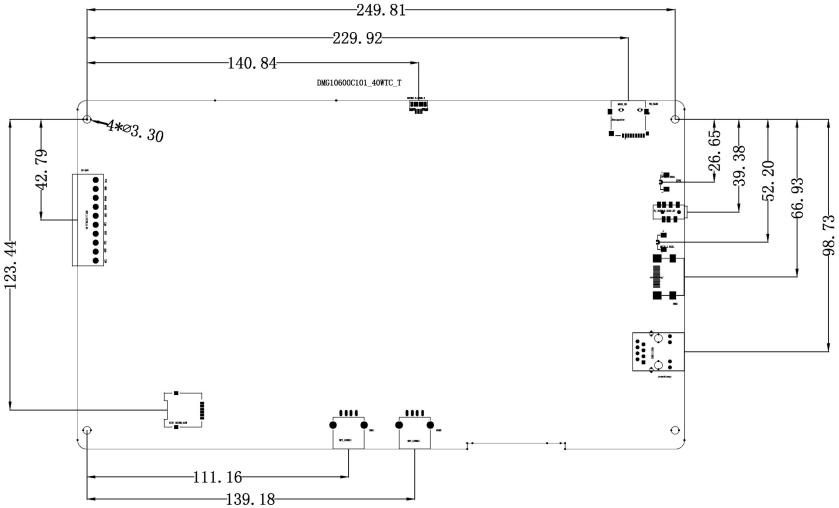

| Definition | Pin# | IO | Description |
|---|---|---|---|
| VCC | 1 | P | Power Input |
| GND | 2 | P | GND |
| 485A | 3 | A | RS485+ |
| 485B | 4 | B | RS485- |
| RX0 | 5 | I | Input |
| TX0 | 6 | O | Output |
| RX5 | 7 | I | Input |
| TX5 | 8 | O | Output |
| RX9 | 9 | I | Input |
| TX9 | 10 | O | Output |

Location hole is used as position reference.

Unmarked Tolerance is +/-0.3mm

Active area is marked in Dash lines

| | | | | | | |
|---|---|---|---|---|---|---|
| Model | DMG10600C101-40WTC | | | | | DWIN Technologies |
| Drawing | A 4 | Drawn | G.Y | Date | 2023.01.06 | |
| Scale | 1:1 | Review | | Date | | |
| Unit | MM | Approval | | Date | | |

## Revision Records

| Rev. | Revise Date | Content | Editor |
|---|---|---|---|
| 00 | 2023-02-24 | First edition | YML |
| 01 | 2023-05-15 | Remove the 4G module and update the physical image | YML |
| 02 | 2025-01-03 | Modify the voltage value range, add development | Chen |
| 03 | 2025-03-12 | Add the description of Bluetooth | Chen |
| 04 | 2025-04-07 | Update the range of temperature | Chen |
| 05 | 2025-06-17 | Update the description of Wi-Fi module | Chen |

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Thank you all for continuous support of DWIN, and your approval is the driving force of our progress!

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