# TFT DISPLAY SPECIFICATION




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Represented by:

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# SPECIFICATION

## MODULE NO.: WFN1330EA2#0SP8-FC

# General Specifications

| Item | Dimension | Unit |
|---|---|---|
| Size | 13.3 | inch |
| Dot Matrix | 1920 x RGB x 1080 | dots |
| Module dimension | 328.34 x 203.44 x 16.1 | mm |
| Active area | 293.76 x 165.24 | mm |
| Pixel Pitch | 0.153 x 0.153 | mm |
| LCD type | TFT, Normally Black, Transmissive | |
| View Angle | 85/85/85/85 | |
| TFT Interface | eDP | |
| Backlight Type | LED ,Normally White | |
| CTP IC | ILI2511 or equivalent | |
| CTP Interface | USB (I2C available) | |
| CTP FW Version | 0x06.0x00.0x00.0x00. 0x00.0x00.0x00.0x00 | |
| CTP Resolution | 16384*16384 | |
| Touch Panel | With PCAP | |
| Surface | Glare | |

*Color tone slight changed by temperature and driving voltage.

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# Absolute Maximum Ratings

| Item | Symbol | Min | Typ | Max | Unit |
|---|---|---|---|---|---|
| Operating Temperature | TOP | -20 | — | +70 | ℃ |
| Storage Temperature | TST | -30 | — | +80 | ℃ |

# Electrical Characteristics

**1. Operating conditions:**

| Parameter | Symbol | Values | | | Unit |
|---|---|---|---|---|---|
| | | Min. | Typ. | Max. | |
| Power supply input voltage | $V_{DD}$ | 3.0 | 3.3 | 3.6 | V |
| Power supply current | $I_{DD}$ | - | 450 | 675 | mA |
| Supply CTP | $USB_{_VDD\ 5V}$ | 4.5 | 5.0 | 5.5 | V |
| | $I_{VDD\ 5V}$ | - | 96 | 144 | mA |
| | $V_{DDT\ 3.3}$ | 3.0 | 3.3 | 3.6 | V |
| | $I_{DDT\ 3.3}$ | | 93 | 140 | mA |

**2. LED driving conditions**

| Parameter | Symbol | Min. | Typ. | Max. | Unit |
|---|---|---|---|---|---|
| LED current | ILED | - | 700 | - | mA |
| LED voltage | VLED+ | 16.2 | 18.0 | 19.8 | V |
| LED Life Time | - | 50,000 | - | - | Hr |

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# Interface

**1. LCM PIN Definition**

| Pin No | Symbol | Function |
|---|---|---|
| 1 | NC | No Connection |
| 2 | GND | Power Ground |
| 3 | LANE1-N | Complement Signal Link Lane 1 |
| 4 | LANE1-P | True Signal Line 1 |
| 5 | GND | Power Ground |
| 6 | LANE0-N | Complement Signal Link Lane 0 |
| 7 | LANE0-P | True Signal Line 0 |
| 8 | GND | Power Ground |
| 9 | AUX-CH-P | True Signal Auxiliary Ch. |
| 10 | AUX-CH-N | Complement Signal Auxiliary Ch. |
| 11 | GND | Power Ground |
| 12 | VDD | LCD Logic and Driver Power (3.3V) |
| 13 | VDD | LCD Logic and Driver Power (3.3V) |
| 14 | NC | No Connection |
| 15 | GND | Power Ground |
| 16 | GND | Power Ground |
| 17 | HPD | Hot plug detect output |
| 18 | GND | Power Ground |
| 19 | GND | Power Ground |
| 20 | GND | Power Ground |
| 21 | GND | Power Ground |
| 22-30 | NC | No Connection |

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**2. Backlight Driving Part**

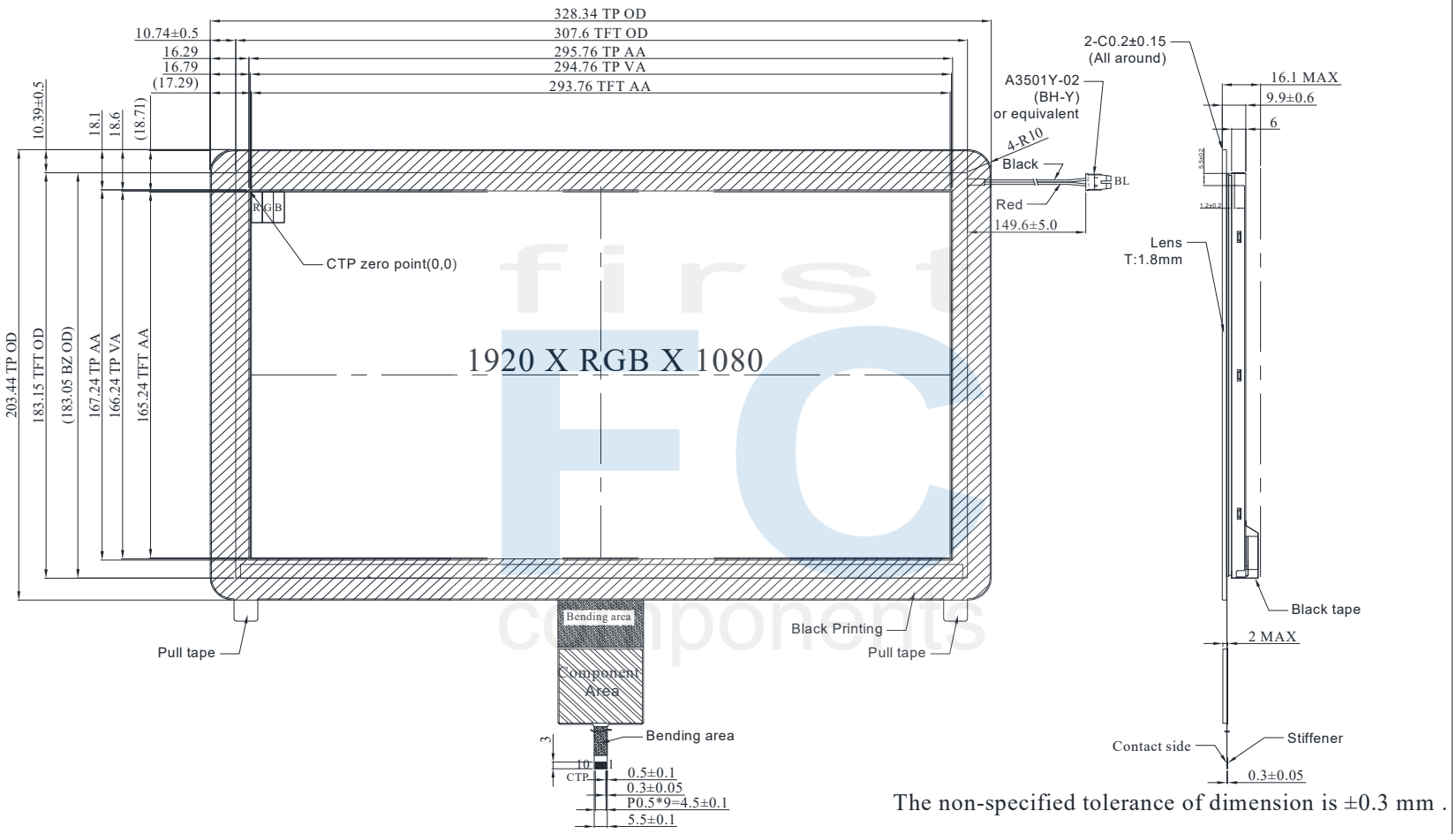
| Pin No. | Symbol | Description |
|---|---|---|
| 1 | VLED+ | Red, LED_ Anode |
| 2 | VLED- | Black, LED_ Cathode |

**3. CTP PIN Definition**

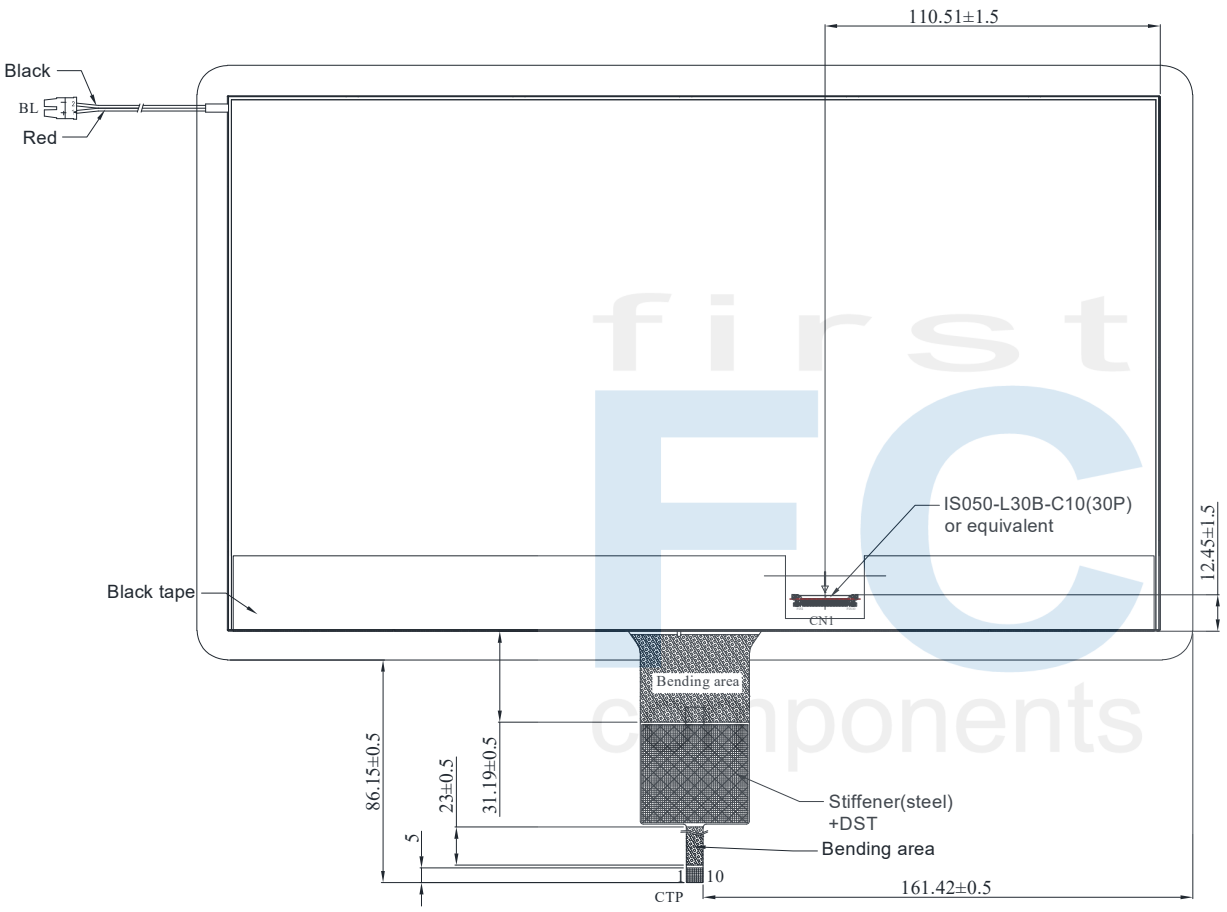
| Pin No. | Symbol | Function |
|---|---|---|
| 1 | USB_VSS | System ground |
| 2 | USB_VDD 5V | Power supply |
| 3 | USB_D+ | Data + |
| 4 | USB_D- | Data - |
| 5 | VSS | System ground |
| 6 | SDA | I2C data input and output |
| 7 | SCL | I2C clock input |
| 8 | RST | External Reset, Low is active |
| 9 | INT | External interrupt to the host |
| 10 | VDDT 3.3 | Power supply |

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# Contour Drawing




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BL

| PIN NO | SYMBOL |
|---|---|
| 1 | VLED+ |
| 2 | VLED- |

CTP

| PIN NO. | SYMBOL |
|---|---|
| 1 | USB_VSS |
| 2 | USB_VDD 5V |
| 3 | USB_D+ |
| 4 | USB_D- |
| 5 | VSS |
| 6 | SDA |
| 7 | SCL |
| 8 | RST |
| 9 | INT |
| 10 | VDDT 3.3 |

CN1

| PIN NO | SYMBOL |
|---|---|
| 1 | NC |
| 2 | GND |
| 3 | LANE1_N |
| 4 | LANE1_P |
| 5 | GND |
| 6 | LANE0_N |
| 7 | LANE0_P |
| 8 | GND |
| 9 | AUX_CH_P |
| 10 | AUX_CH_N |
| 11 | GND |
| 12 | VDD |
| 13 | VDD |
| 14 | NC |
| 15 | GND |
| 16 | GND |
| 17 | HPD |
| 18 | GND |
| 19 | GND |
| 20 | GND |
| 21 | GND |
| 22 | NC |
| 23 | NC |
| 24 | NC |
| 25 | NC |
| 26 | NC |
| 27 | NC |
| 28 | NC |
| 29 | NC |
| 30 | NC |

The non-specified tolerance of dimension is ±0.3 mm .

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