



深圳市晶彩智能有限公司  
Shenzhen Jingcai Intelligent Co., Ltd

# JC8048Q350C\_I

## Introduction

| Project                | Parameter                |
|------------------------|--------------------------|
| Series                 | Q3                       |
| Grade                  | Military grade process   |
| Model                  | JC8048Q350C_I            |
| Resolution             | 800*480                  |
| Size                   | 5.0 Inch                 |
| Programming Language   | C Language               |
| Touc-hscreen type      | Capacitive touch control |
| Main control model     | D121                     |
| Main control frequency | 400MHz                   |



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Version record

| Version | Time       | Describe               |
|---------|------------|------------------------|
| V1.0    | 2024/12/02 | First edition released |
|         |            |                        |



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## Contact Us

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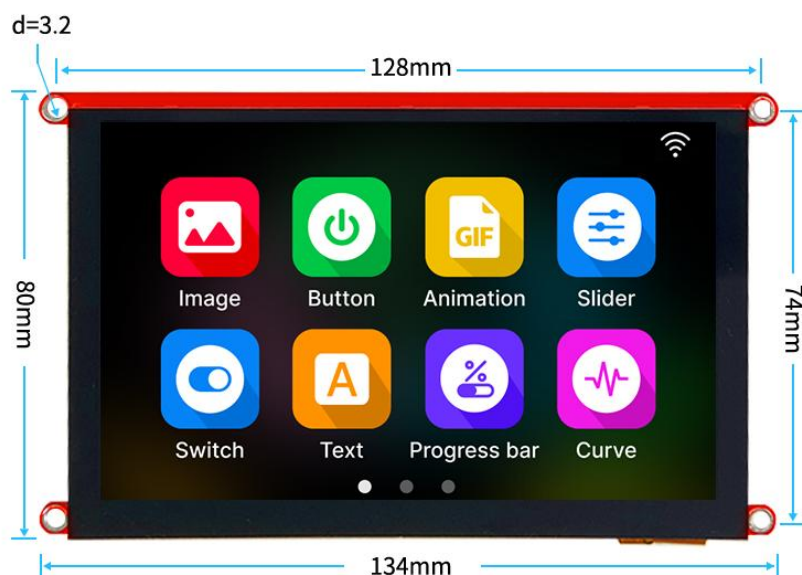
Data Center : <https://www.guition.com>

Company address :

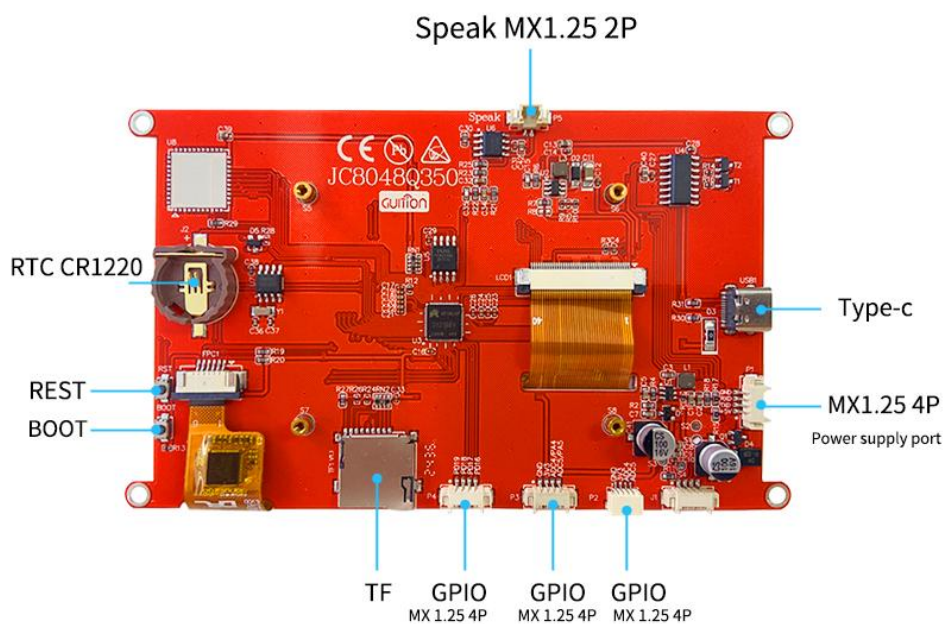
201, No.19 Tianxi Road, FuchengStreet, Guanlan, Longhua District, Shenzhen,China



## Product appearance and structural parameters:



### TOP view of JC8048Q350



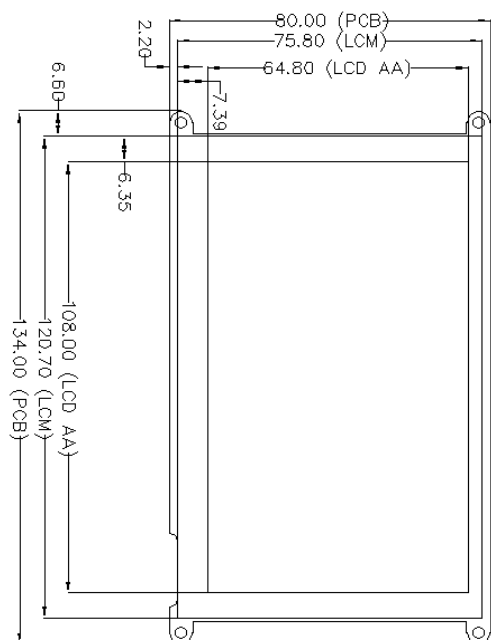
### Bottom view of JC8048Q350

JC8048Q350C\_I

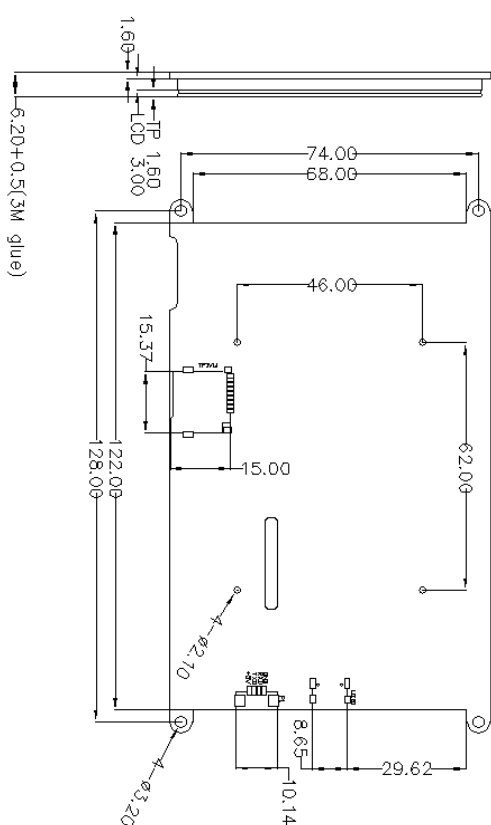


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正面图



侧面图



背面图

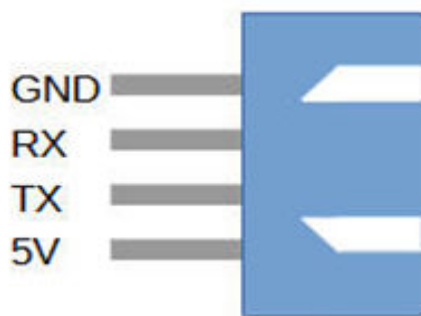


## Basic parameters of display screen

| Project                      | 参数   |
|------------------------------|--|
| External dimensions          | 134.00mm(L) * 80.00mm(W)   |
| Display Size                 | 120.70mm(L) * 76.00mm(W)   |
| Visual size                  | 108.00mm(L) * 64.80mm(W)   |
| Driver chip                  | ST7265   |
| Resolution                   | 800*480  |
| LCD screen color             | 65K (65536) colour, 16bit palette, RGB565                          |
| Display mode                 |  |
| Viewingangle (U/D/L/R)       | Typical values: 75/75/75/75  |
| Touch frequency              |  |
| Backlight Mode               | LED  |
| Backlight lifespan (average) | >30000 hour  |
| Brightness                   | 400nit   |
| Installation direction       | 0/90/180/270Degree rotation installation display                   |
| Communication interface type | UART, Connector model: MX1.25mm 4pin                               |
| Serial Port Baud Rate        | 2400~921600  |
| Serial communication mode    | 8 Number of digits, 1 bit stop bit                                 |
| Serial port level            | 3.3V CMOS/TTL Level  |
| Expand IO                    | Support  |
| Audio                        | Support  |
| Speaker connector model      | MX 1.25MM 2Pin   |
| Speaker Power                | 不大于 3W, Ensure sufficient power supply                             |
| RTC                          | Support  |
| SD card                      | Support FAT32 file format, maximum 32G MicroSD/TF card             |
| USB interface                | Not Supported  |
| Buzzer                       | Not Supported , Can be implemented using horn and buzzer materials |



## Description of power supply and serial port pin definitions (MX1.25 4P)



### JC8048Q350 Power supply and serial port

| 编号 | 引脚  | 描述             |
|----|-----|----------------|
| 1  | GND | Power Ground   |
| 2  | RXD | RXD            |
| 3  | TXD | TXD            |
| 4  | 5V  | 5V power input |



## 产品概述

- Based on the Artinchip D121 chip, RT THhead operating system, with a clock frequency of up to 400MHz, 32KB SRAM, 8MB PSRAM, and a Flash size of 16MB
- 800\*480 resolution
- JPEG encoding and decoding format supports up to 1024\* 768@60fps , PNG encoding and decoding format supports up to 1024\* 768@30fps
- 5.0-inch color screen, supporting 16 bit RGB 65K color display, displaying rich colors
- Factory burned sample program, plug in available
- Reserved TF card interface, serial port interface, sensor interface, and reserved IO port interface
- Military grade process standards, long-term stable operation

## Electrical performance parameters

| Project                  | Parameter                      |
|--------------------------|--------------------------------|
| Working voltage          | Working voltage range:4.65V-6V |
| Working current          | 500mA                          |
| Recommended power supply | 5V1A DC Power supply           |





### Chip and Memory Characteristics

| Project                     | Parameter   |
|-----------------------------|---|
| Main control chip model     | D121BBV   |
| Main control chip core      | RISC-V  |
| Main control chip frequency | 400MHz  |
| Flash memory type           | Nor Flash   |
| Flash memory capacity       | 16MB  |
| Running memory              | 32KB SRAM, 8MB PSRAM                                  |
| Micro SD/TF card            | Supports FAT32 format, with a size not exceeding 32GB |

### Working environment parameters

| Project                    | Parameter   |
|----------------------------|-------------|
| Operation temperature      | -20℃ ~ +70℃ |
| Storage temperature        | -30℃ ~ +80℃ |
| Working humidity           | 30~90RH     |
| Three prevention treatment | NO          |