

Mechanical Data

Item	Standard Value	Unit
Module Dimension	72.1x29.6x9.4	mm
Viewing Area	61.0x15.1	mm
Dot Size	2.95x5.55	mm
Mounting hole	65.1x22.6	mm

Absolute Maximum Rating

Item	Symbol	Standard Value			Unit
		min.	typ.	max.	
Power Supply	VDD-VSS	-0.3	---	6.0	V
Input Voltage	VI	---	---	VDD	V

Note: VSS=0 Volt, VDD=5.0 Volt.

Electronical Characteristics

Item	Symbol	Condition	Standard Value			Unit
			min.	typ.	max.	
Input Voltage	VDD	---	4.75	5.0	5.25	V
Supply Current	IDD	VDD=5V	0.5	0.27	1.0	mA
Recommended LC Driving	VDD-VO	-20°C	---	---	---	V
		0°C	---	---	---	
25°C		4.1	4.5	4.8		
Version module		50°C	---	---	---	
		70°C	---	---	---	
LED Forward Voltage	VF	25°C	3.4	3.5	3.6	V
LED Forward Current	IF	25°C	---	16	---	mA

Feature

1. Built-in controller (ST7032)
2. 1/16 duty, 1/5 bias
3. +5.0V power supply

Pin No.	Symbol	Description															
1	RS	Select registers. 0: Instruction register (for write) Busy flag & address counter (for read) 1: Data register (for write and read)															
2	R/W	Select read or write (In parallel mode). 0: Write 1: Read															
3	E	Starts data read/write. ("E" must connect to "VDD" when serial interface is selected.)															
4	DB0	Data bus line															
5	DB1	Data bus line															
6	DB2	Data bus line															
7	DB3	Data bus line															
8	DB4	Data bus line															
9	DB5	Data bus line															
10	DB6/SCL	Data bus line (In I2C interface DB6 (SCL) is clock input. SDA and SCL must connect to I2C bus (I2C bus is to connect a resistor between SDA/SCL and the power of I2C bus).)															
11	DB7/SDA	Data bus line (In I2C interface DB7 (SDA) is input data. SDA and SCL must connect to I2C bus (I2C bus is to connect a resistor between SDA/SCL and the power of I2C bus).)															
12	V _{SS}	Ground															
13	V _{DD}	Supply Voltage for logic															
14	Vout	Operating voltage for LCD															
15	PSB	Interface selection 0: serial mode ("E" must connect to "VDD" when serial mode is selected.) 1: parallel mode(4/8 bit) In I2C interface PSB must connect to VDD															
16	PSI2B	<table border="1"> <tr> <th>PSB</th><th>PSB</th><th>Interface</th></tr> <tr> <td>0</td><td>0</td><td>No use</td></tr> <tr> <td>0</td><td>1</td><td>S14</td></tr> <tr> <td>1</td><td>0</td><td>S12(1°C)</td></tr> <tr> <td>1</td><td>1</td><td>Parallel 68</td></tr> </table>	PSB	PSB	Interface	0	0	No use	0	1	S14	1	0	S12(1°C)	1	1	Parallel 68
PSB	PSB	Interface															
0	0	No use															
0	1	S14															
1	0	S12(1°C)															
1	1	Parallel 68															
17	CAP1P	For voltage booster circuit(VDD-VSS)															
18	CAP1N	External capacitor about 0.1u~4.7uf															
19	NC	No connection															
20	NC	No connection															

COG
type**RX1602A2 COG 16x2 dots****Dimension drawing**