



SG160160B (160 DOTS X160 DOTS)

FEATURES

- BUILT-IN CONTROLLER (RA8835 OR EQUIVALENT)
- +5 V POWER SUPPLY
- 1/160 DUTY CYCLE
- 8-BIT PARALLEL INTERFACE

MECHANICAL DATA

| ITEM | DIMENSIONS | UNIT |
|---------------------------|---------------------------------|------|
| Module Size (W x H x T) | 88.8 x 88.8 x 10.0 (14.6 LED) | mm |
| Viewing Area (W x H) | 62.0 x 62.0 | mm |
| Active Area (W x H) | 60.76 x 60.76 | mm |
| Dot Size (W x H) | 0.34 x 0.34 | mm |
| Dot Pitch (W x H) | 0.38 x 0.38 | mm |

INTERFACE PIN CONNECTIONS

| NO. | SYMBOL | LEVEL | FUNCTION |
|------|-----------------|-------|------------------------------|
| 1 | V _{SS} | 0V | Power Supply Ground |
| 2 | V _{DD} | 5V | Power Supply Voltage |
| 3 | V ₀ | - | Contrast Adjustment Voltage |
| 4 | /RD | L | Read Signal |
| 5 | /WR | L | Write Signal |
| 6 | /CS | L | Chip Signal |
| 7 | A ₀ | H/L | Data Type Select |
| 8~15 | DB0~DB7 | H/L | Data Bus Line |
| 16 | /RES | L | Reset Signal |
| 17 | V _{EE} | - | Power Supply Voltage For LCD |
| 18 | A | 4.2V | LED Power (+) |
| 19 | K | 0V | LED Power (-) |
| 20 | NC | - | No Connection |

ABSOLUTE MAXIMUM RATINGS

| ITEM | SYMBOL | MIN. | TYP. | MAX. | UNIT |
|------------------------------|----------------------------------|-----------------|------|-----------------|------|
| Supply Voltage For Logic | V _{DD} -V _{SS} | 0 | - | 7 | V |
| Supply Voltage For LCD Drive | V _{DD} -V ₀ | 0 | - | 21 | V |
| Input Voltage | V _I | V _{SS} | - | V _{DD} | V |

ELECTRICAL CHARACTERISTICS

| ITEM | SYMBOL | CONDITION | MIN. | TYP. | MAX. | UNIT | |
|--------------------------|----------------------------------|---------------------------|------|------|------|-----------------|---|
| Supply Voltage For Logic | V _{DD} -V _{SS} | - | 4.5 | 5 | 5.5 | V | |
| LCD Supply Voltage | V _{DD} -V ₀ | V _{DD} =5V Ta=25 | 17.4 | 18 | 24.3 | V | |
| Supply Current | I _{DD} | V _{DD} =5V | - | 14 | 23 | mA | |
| Input Voltage | "HIGH" Level | V _{IH} | - | 2.2 | - | V _{DD} | V |
| | "LOW" Level | V _{IL} | - | - | - | 0.6 | V |
| Output Voltage | "HIGH" Level | V _{OH} | - | 2.4 | - | - | V |
| | "LOW" Level | V _{OL} | - | - | - | 0.4 | V |

EXTERNAL DIMENSIONS

