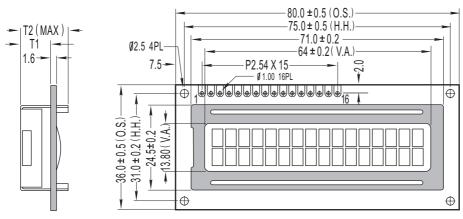
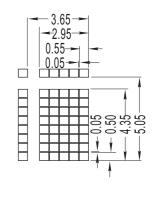


## FORDATA ELECTRONIC CO.,LTD PROFESSIONAL LCD SUPPLIER FROM CHINA

## FDCC1602N





| ITEM                   | T1  | T2   |
|------------------------|-----|------|
| LED backlight          |     | 13.5 |
| EL / without backlight | 4.5 | 9.5  |

| DBO              |   |            |        |            |
|------------------|---|------------|--------|------------|
| :<br>DB7         |   |            | COM 16 | LCD PANEL  |
| E<br>R/W<br>RS   | $\stackrel{\longrightarrow}{\longrightarrow}$ | CONTROLLER | SEG 40 | SEG 40     |
| Vss<br>Vdd<br>V0 |   |            |        | DRIVER     |
| A<br>K           |   |            | LED    | BACK LIGHT |

## **FEATURE**

- 1. 5X8 dots with cursor
- 2. Built- in controller (SPLC780D or Equivalent)
- 3. +5V power supply (Also available for +3.0V)
- 4. 1/16 duty cycle
- 5. BKL to be driven by pin1,pin2,or pin15,pin16 or A,K
- 6. N.V. Optional

| ABSOLUTE MAXIMUM RATINGS |        |           |          |      |  |  |  |  |  |  |  |
|--------------------------|--------|-----------|----------|------|--|--|--|--|--|--|--|
| ITEM                     | SYMBOL | MIN       | MAX      | UNIT |  |  |  |  |  |  |  |
| POWER SUPPLY (LOGIC)     | Vdd    | -0.3      | 7.0      | V    |  |  |  |  |  |  |  |
| POWER SUPPLY (LCD)       | V0     | Vdd -13.5 | Vdd +0.3 | V    |  |  |  |  |  |  |  |
| INPUT VOLTAGE            | Vin    | -0.3      | Vdd +0.3 | V    |  |  |  |  |  |  |  |

| PIN ASSIGNMENT |         |                         |  |  |  |  |  |  |  |
|----------------|---------|-------------------------|--|--|--|--|--|--|--|
| PIN            | SYMBOL  | FUNCTION                |  |  |  |  |  |  |  |
| 1              | Vss     | GND                     |  |  |  |  |  |  |  |
| 2              | Vdd     | Power Supply            |  |  |  |  |  |  |  |
| 3              | V0      | Contrast Adjust         |  |  |  |  |  |  |  |
| 4              | RS      | Register Select Signal  |  |  |  |  |  |  |  |
| 5              | R/W     | Data Read/Write         |  |  |  |  |  |  |  |
| 6              | E       | Enable Signal           |  |  |  |  |  |  |  |
| 7-14           | DB0-DB7 | Data Bus Line           |  |  |  |  |  |  |  |
| 15(A)          | LED+    | Power supply for BKL(+) |  |  |  |  |  |  |  |
| 16(K)          | LED-    | Power supply for BKL(-) |  |  |  |  |  |  |  |

| MECHANICAL SPECIFICATIONS |                 |    |  |  |  |  |  |  |  |  |
|---------------------------|-----------------|----|--|--|--|--|--|--|--|--|
| CHARACTER NUMBER          | 16W X 2H        |    |  |  |  |  |  |  |  |  |
| OVERALL SIZE              | 80.00W X 36.00H | mm |  |  |  |  |  |  |  |  |
| VIEWING AREA              | 64.00W X 13.80H | mm |  |  |  |  |  |  |  |  |
| HOLE - HOLE               | 75.00W X 31.00H | mm |  |  |  |  |  |  |  |  |
| CHARACTER SIZE            | 2.95W X 4.35H   | mm |  |  |  |  |  |  |  |  |
| CHARACTER PITCH           | 0.70W X 0.70H   | mm |  |  |  |  |  |  |  |  |
| DOT SIZE                  | 0.55W X 0.50H   | mm |  |  |  |  |  |  |  |  |
| DOT PITCH                 | 0.05W X 0.05H   | mm |  |  |  |  |  |  |  |  |

| ELECTRONICAL CHARACTERISTICS  |        |                       |                |        |     |      |  |  |  |  |  |
|---|--------|-----------------------|----------------|--------|-----|------|--|--|--|--|--|
| ITEM  | SYMBOL | CONDITION             | S <sup>-</sup> | TANDAI | RD  | UNIT |  |  |  |  |  |
|   |        | CONDINON              | MIN            | TYP    | MAX | 0    |  |  |  |  |  |
| Input voltage   | Vdd    | +5V                   | 4.7            | 5.0    | 5.5 | V    |  |  |  |  |  |
| mput voitage  | vuu    | +3.3V                 | 2.7            | 3.0    | 3.3 | V    |  |  |  |  |  |
| Supply current  | ldd    | Vdd=5V                |                | 1.5    | 4.0 | mA   |  |  |  |  |  |
| Recommended<br>LCD driving voltage<br>for normal temp<br>version module |        | 0 °C                  | 4.7            | 4.8    | 5.5 |      |  |  |  |  |  |
|   | Vdd-V0 | 25 °C                 | 4.3            | 4.5    | 4.7 | V    |  |  |  |  |  |
|   |        | 50 °C                 | 4.1            | 4.4    | 4.5 |      |  |  |  |  |  |
| LED forward voltage   | VF     | 25 °C                 |                | 4.2    | 4.6 | V    |  |  |  |  |  |
| LED forward current   | lF     | 25 °C                 |                | 120    |     | mA   |  |  |  |  |  |
| EL power supply current   | EL     | AC 400Hz<br>VEL =110V |                |        |     | mA   |  |  |  |  |  |

| Display position | _1 | 2  | 3  | 4 | 5 | 6 | 7 | 8 | 9 | 10 | 11 | 12 | 13 | 14 | 15 | 16 |
|------------------|----|----|----|---|---|---|---|---|---|----|----|----|----|----|----|----|
| DDRAM address    | 00 | 01 | 02 |   |   |   |   |   | _ |    |    |    |    |    |    | 0F |
| DDRAM address    | 40 | 41 | 42 |   |   |   | - |   | - |    |    |    |    |    |    | 4F |