



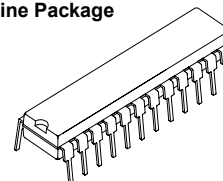
16-bit Constant Current LED Sink Driver

Features

- 16 constant-current output channels
- Constant output current invariant to load voltage change
- Excellent output current accuracy:
between channels: $< \pm 3\%$ (max.), and
between ICs: $< \pm 6\%$ (max.)
- Output current adjusted through an external resistor
- Constant output current range: 5-90 mA
- Fast response of output current, \overline{OE} (min.): 200 ns
- 25MHz clock frequency
- Schmitt trigger input
- 5V supply voltage
- Optional for "Pb-free & Green" Package

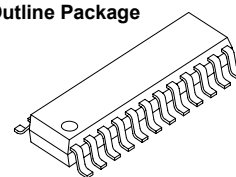
| Current Accuracy | | Conditions |
|------------------|-------------|-----------------------------------|
| Between Channels | Between ICs | |
| $< \pm 3\%$ | $< \pm 6\%$ | $I_{OUT} = 10 \sim 60 \text{ mA}$ |

Dual In-Line Package



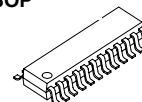
CN: P-DIP24-300-2.54
 GN: P-DIP24-300-2.54
 CNS: SP-DIP24-300-1.78
 GNS: SP-DIP24-300-1.78

Small Outline Package



CD: SOP24-300-1.27
 GD: SOP24-300-1.27
 CF: SOP24-300-1.00
 GF: SOP24-300-1.00

Shrink SOP



CP\CPA: SSOP24-150-0.64
 GP\GPA: SSOP24-150-0.64

Product Description

MBI5026 is designed for LED displays. As an enhancement of its predecessor, MBI5016, MBI5026 exploits PrecisionDrive™ technology to enhance its output characteristics. MBI5026 contains a serial buffer and data latches which convert serial input data into parallel output format. At MBI5026 output stage, sixteen regulated current ports are designed to provide uniform and constant current sinks for driving LEDs within a large range of V_F variations.

MBI5026 provides users with great flexibility and device performance while using MBI5026 in their system design for LED display applications, e.g. LED panels. Users may adjust the output current from 5 mA to 90 mA through an external resistor, R_{ext} , which gives users flexibility in controlling the light intensity of LEDs. MBI5026 guarantees to endure maximum 17V at the output port. The high clock frequency, 25 MHz, also satisfies the system requirements of high volume data transmission.