

Shenzhen Fuman Electronics Group Co., Ltd.

SHEN ZHEN FINE MAD ELECTRONICS GROUP CO., LTD.

FM6124 (File No.: S&CIC1501)

16- channel double buffer constant current output **LED** driver chip

Overview

FM6124 is a driver IC specially designed for LED modules and displays, with 16 constant current output driving capabilities. FM6124 adopts The patented technology of “out-clamping” can effectively eliminate the dark phenomenon of the first line and prevent damage to the lamp beads. FM6124 adopts an enhanced blanking function design, Has an excellent blanking effect. At the same time, FM6124 has excellent anti-interference characteristics, constant current and low ash effects are not affected by the PCB board. And can choose different The external resistor can adjust the current of the output stage arbitrarily and accurately control the brightness of the LED.

FM6124 will buffer 16bit display data during the display process (the falling edge of OE), so the system can continue to save the data during the display process of FM6124 16bit serial data, compared with general constant current source chip, the refresh rate can be increased by more than 50%.

FM6124 internally adopts current precision control technology, which can make the inter-chip error less than $\pm 3.5\%$ and the inter-channel error less than $\pm 2\%$.

Features

- 16 equal current output channels
- Output current setting range:
 - 0.5 ~ 35mA×16@V_{DD} = 5V constant current output
 - 0.5 ~ 25mA×16@V_{DD} = 3.3V constant current output
- Current accuracy
 - Current non-uniformity between channels: $\pm 1.25\%$ (typical value)
 - $\pm 2\%$ (maximum)
 - Current non-uniformity between chips: $\pm 2\%$ (typical value)
 - $\pm 3.5\%$ (maximum)

