

10100341

## FM 60-25 High Voltage Fast Diode Current Modulator

### Features

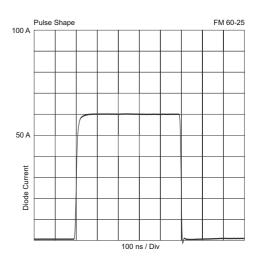
Drives arbitrary current waveforms into high voltage, high power laser diodes CW, pulsed, modulated or mixed Short rise and fall time Frequency up to 20 MHz Excellent dynamic performance Two analog inputs Small dimensions

#### **Specification**

Diode current Diode current pulsed Diode voltage Output power Power dissipation Supply voltage Supply current Supply voltage\* Rise time Fall time Frequency Inputs Diode current set point 1 Diode current set point 2 Enable Reset Outputs Diode current monitor Temperature Readv **Excess Temperature** 

0....60 A 0 ... 120 A (short pulses) 0....24 V 1440 W max 90 W max allowed 1 V ... 25 V 60 A max 3 V ... 6 V 16 ns 9 ns 20 MHz max 0 ... 500 mV (50 Ohm input) 0 ... 5 V (high impedance) TTL TTL 0 ... 50 mV (into 50 Ohm) 0 ... 4 V for 0 ... 80°C TTL TTL





# General specifications

Ambient temperature0 ... +45 °CCoolingRequiredDimensions95 x 61 x 20 mmWeight260 gOrdering Code10100341

\* for internal electronics

#### Description

The fast diode current modulator FM 60-25 is a linear modulator for driving arbitrary current waveforms into high voltage, high power laser diodes.

Current waveforms can be CW, pulsed, modulated or mixed with frequencies up to 20 MHz and currents up to 60 A for CW and 120 A for pulsed waveforms.

The FM 60-25 is small and compact and it is designed for mounting it with low inductance directly at laser diodes or for integrating it in laser diode modules.

The FM 60-25 has two analogue inputs for the current setpoint, a high frequency input (50 Ohm input impedance) with a bandwidth of 20 MHz and a low frequency input with a bandwidth of 100 KHz. Both inputs cover the full current range.

Additionally there is a 10 turns potentiometer for generating a CW-current (bias current). All set points are added and build the effective current set point.

For detailed information see operating manual or visit our website.