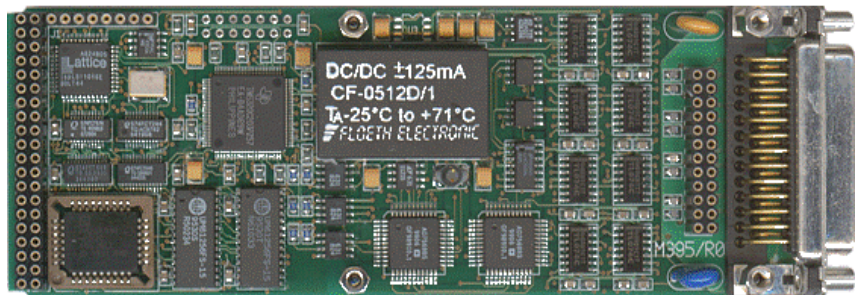


## M395

# 12-/16-bit DAC M-module, 16x Voltage Outputs



The M395 features 16 analog voltage outputs, integrated on the ANSI certified M-module standard. The digital-to-analog converters have a resolution of 12- or 16-bit. The voltage outputs on the M395 have a software programmable common output range of 0..+10V (uni-polar) or -10V..+10V (bi-polar). The hosting system has full control of the M395 by accessing its dual-ported memory. Each channel has its own conversion register and an output will be updated when a new value is written in the corresponding register.

### Features:

- > 16 DACs with 12- or 16-bit resolution
- > Simultaneously updating voltage outputs
- > Software programmable common output range  
Unipolar: 0 .. +10V  
Bipolar: -10V .. +10V
- > 10 microseconds (max.) output response time
- > No potentiometers
- > Analog front-end optically isolated
- > Optional onboard DC/DC converter for isolated power supply
- > Features local TMS320C203 DSP
- > Calibration data stored in local EEPROM
- > A08/D16 M-module interface

## M-module Compliance

- \* A08/D16 (8-bit address and 12-or 16-bit data)
- \* INTA (software-end-of-interrupt)
- \* IDENT (identification EEPROM)

## DACs

- \* DAC resolution 12- or 16-bit
- \* Each channel has a dedicated data register that controls the output
- \* Output is updated after data register contents is refreshed
- \* Additional functionality can be implemented on request

## Analog Outputs

- \* 16 common-mode voltage output channels available
- \* Uni-polar and bi-polar output range software programmable for all channels
- \* Outputs are optically isolated from the system
- \* Features pre-loading and simultaneous output update for all channels

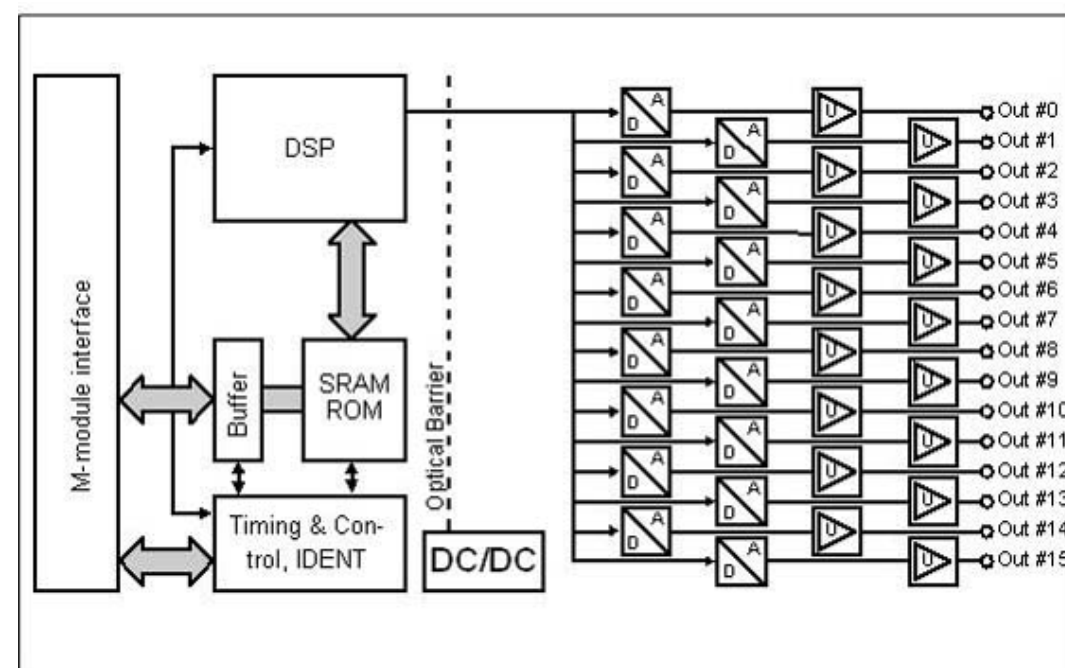
## Output Range

### Voltage outputs:

- \* Uni-polar (0..+10V)
- \* Bi-polar (-10V..+10V)

## Ordering Information

- \* **M395/T04** 12-bit DAC M-module with 16x Voltage Outputs, without DCDC
- \* **M395/T02** 12-bit DAC M-module with 16x Voltage Outputs, with DCDC
- \* **M395/T05** 16-bit DAC M-module with 16x Voltage Outputs, without DCDC
- \* **M395/T03** 16-bit DAC M-module with 16x Voltage Outputs, with DCDC
- \* **M395/SW** APIS based software
- \* **M395/MAN** manual on paper



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