

SMARTRAIL DATASHEET

HE599DAC101 (voltage) & HE599DAC106 (current) 0 - 10V, 4 - 20mA Analog Output Module - 12 Bit Resolution

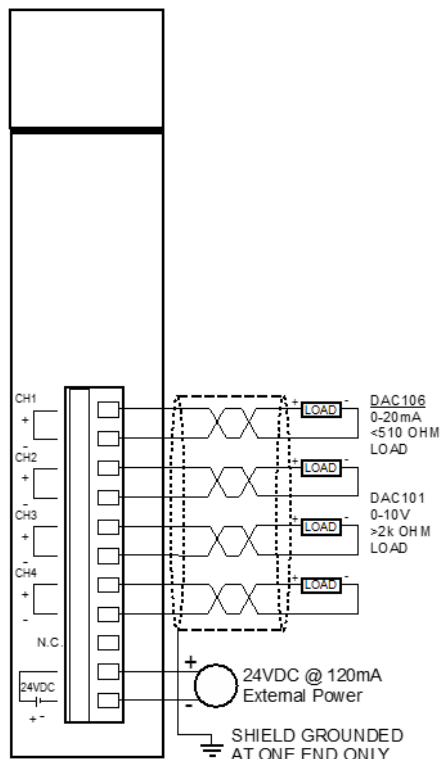
TECHNICAL SPECIFICATIONS

SPECIFICATIONS			
	DAC101	DAC106	
Number of Channels	4		Terminal Type
Output Range(s)	0-10V	0-20mA, 4-20mA	M2 Screw Type, Removable 11-posn
Absolute Maximum Output	DC ±15V	DC ±25mA	Optional Spring-Clamp Terminal Strip
Resolution	12-Bit (2.5mV)	12-bit (5µA, 4µA)	HE599TRM011, 11 position
Maximum Load	>2kΩ	<510Ω	Terminal Torque Rating
Accuracy	< ±0.5%		Accepted Wire Size
Isolation	500V (backplane)		16-28AWG (use copper)
Conversion Time	1mS/ch		Wire Stripping Length
Backplane Power Consumed	110mA @ 5V		7mm
External Power Required	62mA @ 24V	120mA @ 24V	Storage Temp.
Weight	CLASS 2 POWER SUPPLY ONLY		Operating Temp.
			-25° to 70°C
			Relative Humidity
			5 to 95% Non-condensing
			Dimensions WxHxD
			20mm x 90mm x 60mm 0.79" x 3.54" x 2.36"
			Certifications (CE)
			USA: https://hornerautomation.com/certifications/ Europe: https://hornerautomation.eu/support/certifications-2/

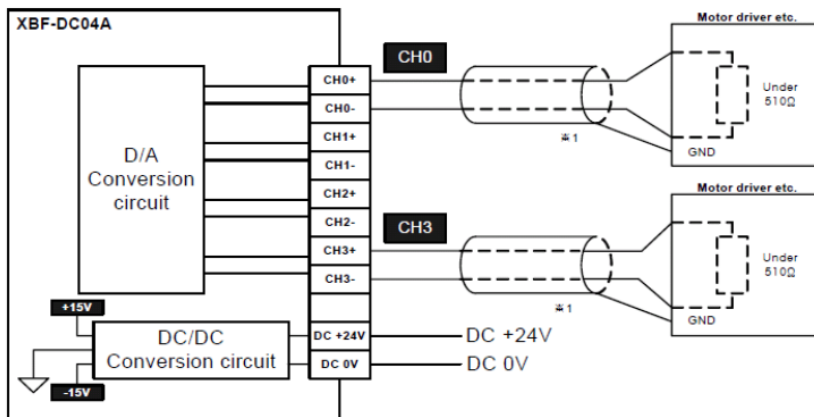
DIAGNOSTIC LED INDICATORS

DAC LED Status Indication	
LED	Meaning
RUN	ON = Normal Operation
	FLASH = I/O Error
	OFF = No Power or I/O Error

WIRING - I/O



Wiring example for analog current output module.
NOTE: Use a 2-core twisted shield wire.



Terminal Block Tightening Torque: 2.0 in-lb (0.22 N-m)
Wire range for terminal blocks: 16-28 AWG copper conductors, solid or stranded

CSCAPE CONFIGURATION

The SmartRail Analog Output modules have a variety of parameters configured on a channel-by-channel basis. These parameters are set using Cscape (9.1 or later), and are listed below:

Cscape Configuration Data - Selectable per Channel		
Parameter	DAC101	DAC106
Hold Last State	Hold Last State	
	Go to Minimum	
	Go to Mid-Range	
	Go to Maximum	
Analog Output Range	0-10V	4-20mA
		0-20mA

OUTPUT SCALING

The SmartRail Analog Outputs scale digital values from 0-4000, to the analog value (0-10V, 0-20mA, or 4-20mA). For every digital count the output is incremented, the analog output value will increment an appropriate amount (2.5mV for 0-10V, 5uA for 0-20mA, 4uA for 4-20mA).

SAFETY

This equipment is suitable for use in Class I, Division 2, Groups A, B, C and D or Non-hazardous locations only.

WARNING - EXPLOSION HAZARD - Do not disconnect equipment unless power has been removed or the area is known to be non-hazardous
AVERTISSEMENT - RISQUE D'EXPLOSION - Ne débranchez pas l'équipement tant que l'alimentation n'a pas été coupée ou que la zone n'est pas dangereuse.

WARNING - EXPLOSION HAZARD - Substitution of any component may impair suitability for Class I, Division 2
AVERTISSEMENT - RISQUE D'EXPLOSION - Le remplacement de tout composant peut nuire à la compatibilité avec la classe I, division 2

WARNING - POSSIBLE EQUIPMENT DAMAGE - Remove power from the I/O Base and any peripheral equipment connected to this local system before adding or replacing this or any module.

AVERTISSEMENT - DOMMAGES POSSIBLES À L'ÉQUIPEMENT - Coupez l'alimentation de la base d'E / S et de tout équipement périphérique connecté à ce système local avant d'ajouter ou de remplacer ce module ou tout autre module.

- a. All applicable codes and standards should be followed in the installation of this product.
- b. Shielded, twisted-pair wiring should be used for best performance.
- c. Shields should be grounded at one end only, preferably at the end providing the best noise shunting.
- d. Use the following wire type or equivalent: Belden 8441.

For detailed installation and a handy checklist that covers panel box layout requirements and minimum clearances, refer to the hardware manual of the controller you are using.

PART NUMBER

The global part numbers are **HE599DAC101** & **HE599DAC106**

TECHNICAL SUPPORT

For assistance, contact Technical Support at the following locations:

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