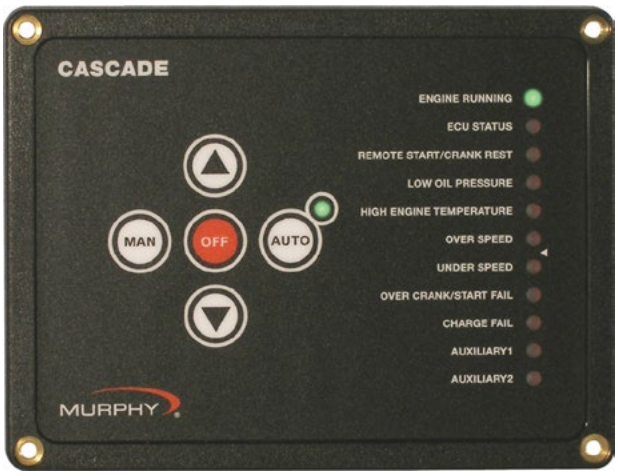
Cascade Controller
Auto-Start/Stop

The Cascade controller offers automatic start and stop control with easy configuration for a broad number of applications.

This auto-start controller is designed to fit any engine-driven application requiring a simple and robust automatic start and stop sequence. Pumps, compressors, grinders, power units and generators are just a few of the industrial applications for the controller.

The Cascade controller is fully compatible with all major engine types. Whether you are running mechanical or J1939 engines, the controller will work with your application.

Murphy offers unique features at a competitive price with the Cascade controller.



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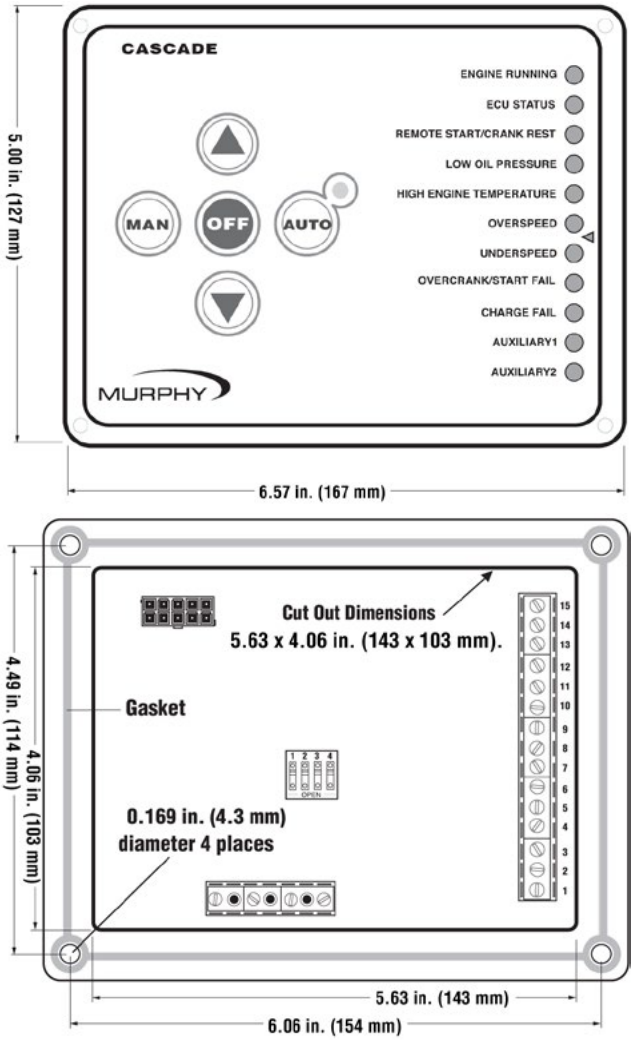
Features

- Durability: Encapsulated to protect it against dirt, water and dust, along with a compression gasket to fully seal it to the panel. Cascade is rated NEMA4 and IP65.
- Low Battery Blackouts: Operates in total blackout for a minimum of two seconds.
- Compatibility: Accepts MPU, AC Frequency and ECU speed signals and can operate with standard and J1939 engines.
- Inputs and Outputs: The Cascade Inputs and Outputs are ruggedly protected and fault tolerant.
- J1939 Ready: Works directly with Murphy's J1939-ready PowerView® gages, just plug and go. No sender is required.
- CD101 Cascade Configuration Tool: Allows quick setup and loading of parameters into a Murphy standard Cascade via a PC software tool.

Dimensions



Specifications

Power input: 9-35VDC continuous - operates during total black out for 2 seconds minimum.
Power consumption: Sleep Mode (Manual): 1mA typical; Sleep mode (Automatic): 4mA typical. Running mode (manual): 20mA typical; Running mode (Automatic): 24mA typical.
Operating/Storage temperature: -40 to 185°F (-40 to 85°C)
Humidity: 0-100%, non-condensing
Housing: UV stabilized black polycarbonate and epoxy encapsulation. Weather tight and includes sealing gasket to keep moisture and debris out of enclosure. Properly mounted controller will maintain NEMA4 / IP65 rating of enclosure.
Vibration: Rated to 6G
Impact: Rated to 10G
Inputs: Dedicated digital inputs for low oil pressure, high engine temperature, remote start, DC charge fail/alternator fail. Two auxiliary inputs are configurable for multiple functions.
Outputs: 7 – 4 auxiliary, configurable (1A DC protected). 3 dedicated outputs for crank, fuel/ECU, alternator excitation
Crank attempts: 3, 5, 10, Continuous
Crank Rest: 5-60 seconds, adjustable
Shutdown lockout time delay: 5, 10, 15, 20, 25, 30 seconds
Crank disconnect speed setting: Field settable 0-9999 RPM (16-60Hz AC freq input).
Overspeed/underspeed trip point setting: ±5 to 50% of nominal.
Speed sensing inputs: Magnetic pickup (5-120VAC RMS / 0-10 kHz) and AC frequency (30-600VAC RMS / 16-80 Hz)
CAN bus interface: Directly reads engine speed and engine status data from SAE-J1939 enabled engines
MODBUS interface: In J1939 applications, drives PVA series analog gages
Shipping Weight: 1 lb. (453 g) approximately
Shipping Dimensions: 5.1 x 6.7 x 1.6 inch (130 x 10 x 41 mm) approximately

How to Order

Part Number	Model and Description	Notes
40700259	CD101 Cascade Controller	Controller
40090045	CD101 Cascade Configuration Kit	Accessories