



GRIDPOINT EC MOTOR CONTROLLER

OPERATION MANUAL

Safety Precautions

When operating GridPoint, please keep a safe distance from the fan. Maintenance and repair work should be carried out by trained professionals.

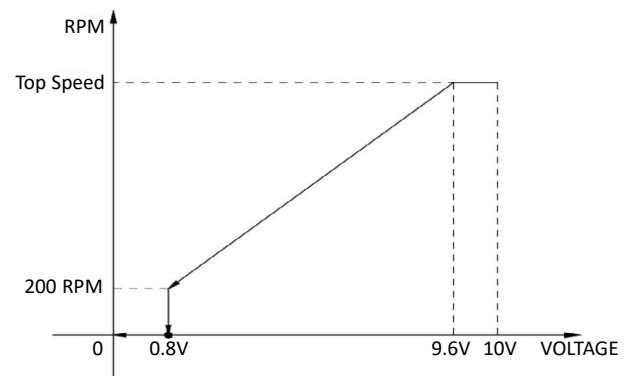


Key	Function	Note
SET	Set Point	Press and hold 2s to enter parameter setting interface.
OK	Confirm	Confirm button
UP	Increase	Cycle through parameters or change setting.
DOWN	Decrease	Cycle through parameters or change setting.
C	Not Used	Reserved for factory use.
O	Send Maximum Speed	Send the maximum speed to the motor. Cannot exceed nameplate RPM.
M	Send Mode and Set Speed	Send the 'Mode' and 'Speed'
Power LED	Power Indicator	Power on, Default is ON.
Connect LED	Connect Indicator	Power on, Default is OFF. When connected to motor, it turns ON.
Direction LED	Direction Indicator	Power on, Default is ON. Rotation is CCW from opposite shaft end.
Error LED	Error Indicator	Default is OFF.

Parameters P001 and P008 are not read by the controller and default to '0' when turned on. If the 'M' button is pushed without updating these values, the motor will be set at constant speed, 0 RPM.

WARNING: Motor is still energized at constant speed, 0 RPM.

Parameters	Description
P000	Set the maximum speed of the motor. Motor will not allow input above nameplate.
P001	Set speed for Constant Speed operation (P008, 0)
P002	N/A
P008	Motor operation mode. 0: Default. Constant speed mode. Will run at lower value of parameter P000 and P001. 1: 0-10V mode. Will run at parameter P000 at 10V input. See graph for speed control curve.



Instructions

- Fan must be running when the controller is used.
- Turn the controller on and plug it into the motor. It will automatically connect.
- The display will show the current speed. Power, Connect and Direction LEDs will be on.
- If the Up arrow is pressed, the display will show E000 (no error), max speed, constant speed, d000 (direction) and C000 (motor operation mode 0).
- To set the maximum speed:
 - Press 'SET' for 2s.
 - Press the Up or Down arrow to display P000.
 - Press 'OK'. This will display the current maximum speed.
 - Press the Up or Down arrow to change the digit. To move to the next digit, press and hold the Up arrow until the next digit flashes. Keep changing values until the desired speed is reached.
 - Press 'OK' to save the value. Press 'OK' again to go back to the first display.
- To set the speed for Constant speed operation:
 - Press 'SET' for 2s.
 - Press Up or Down arrow to select P001.
 - Press 'OK'. The default value is '0'. Change to desired speed by following steps 5d and 5e.
 - Press 'M' for 2s to send the command to the motor.
- To set motor operation mode (0-10V or constant speed):
 - Press 'SET' for 2s.
 - Press the Up or Down arrow to display P008.
 - Press 'OK'.
 - Arrow Up or Down to select desired mode.
(See *Parameters* section above for functionality.)
 - Press 'OK' to save the value.
 - Press 'M' for 2s to send the command to the motor.

Troubleshooting Guidelines

Cannot connect to motor: Check the cord and connections between the controller and the motor.
 Motor does not run in Constant speed mode (P008 = 0): Update the value in parameter P001.
 Motor does not run in 0-10V mode: Check the voltage supply.
 Unable to change screens: Cycle power on GridPoint.
 Impeller rotation is incorrect: Contact TCFC Customer Service Department for support.