



## Twin Motor Controller (TMC)

### General description

As the demand of electric powered auxiliaries increases – Continental Engineering Services (CES) developed the TMC. The main function of the Twin Motor Controller is, to control/drive one BLDC motor and one DC motor, used in systems like water/oil-pumps and servo units. Furthermore, the TMC functionality includes the rotor position estimation of the BLDC motor, the generation of the rotating field in the stator as well as DC motor position control and overcurrent protection.

### Highlights

- › Control up to one BLDC and one DC motor
- › Rotor position estimation of the BLDC motor
- › Cost effective design due to the use of electrical components produced in high volume
- › Field oriented control for rotational speed applications
- › Support for systems without sensors
- › Sine commutation
- › DC motor position control
- › Communication to higher-level systems via CAN
- › Integrated diagnostics

### Customer Benefits

- › SOP Q4/2020
- › Rapid prototyping for your BLDC and DC motor application
- › Cost-effective adaptation to your requirements possible
- › Control of one BLDC and one DC motors with a single control device possible

### Specification

- › Ambient Temperature -40° to 85 °C peak 125 °C
- › Environmental IP6k9k

