

OPENCAL PRODUCT SUMMARY | REV 1.0

OPENCAL CALIBRATION PLATFORM

PRODUCT DESCRIPTION

With OpenCal, and OpenCal Studio, the power is in your hands to take complete ownership of the pairing and calibration process of the Motion Applied MCU Product Family with your motor.

Access to manuals, supporting artifacts, and custom user interfaces makes calibration and optimisation for any application and use-case possible; maximising development efficiency and offering a path to a market leading electrification platform.



CALIBRATION PARAMETERS

- Motor parameter constants (phase resistance, flux, Ld, Lq, pole-pairs)
- Torque slew rate
- PI current control gains
- Field weakening control optimization
- Position and current sensor offset tuning
- Switching frequency
- Torque derate and fault limits
- Active short circuit threshold

DELIVERABLES

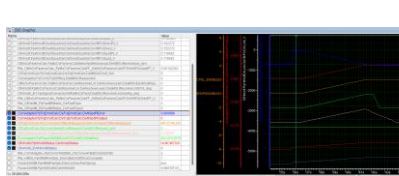
- MCU User Manual
- MCU Calibration Guide
- MCU Product Configuration Document
- Excel MCU Motor Parameter Calibration Tool
- MCU CAN database (DBC) file
- MCU Longform Datasheet
- Vflashpack
- Vector CANape Project Front-end
- Associate software files (.hex, A2L)

OPENCAL STUDIO FEATURES

- ECU status monitoring (fault codes, DTCs, usage figures)
- XCP parameter read and write
- MDF4 logging
- MCU flashing
- MCU resolver learn

ASSUMPTIONS

- OpenCal is for development purposes, for use on private land only
- MCU will be installed on a dyno to perform calibration activity
- Diagnostic protocol ISO-14229 will be used
- Standard documentation is provided



XCP logging



Tuneable motor parameter map

For more information contact:

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