

# **Autonomous Electric Power Steering**

#### **Microsteer MGU with Autonomous Control**

DCE is the market leader in providing Electric Power Steering, with a range of solutions available. For many applications we can provide our smallest MGU (motor gearbox unit) with an autonomous controller.

- Used on vehicles that still utilize hydraulic power steering and require autonomous & manned control.
- Ideal for 12V DC, very low steering input load vehicles.
- MGU is fitted anywhere in line between the steering wheel and rack input pinion.
- Input shaft allows manual control as well as autonomous control.
- System can provide up to 37Nm / 27 ft.lbs of steering column torque.
- CAN Bus control using one of the three following options:
  - Sending a simulated torque sensor signal.
  - o Sending a +/- duty cycle demand for direct control of the EPAS motor.
  - o Sending heading and gain request for the EPAS motor to steer to.



#### Parts required include:

- 1x EPAS200M19 MGU
- 1x EPAS18A Autonomous ECU
- 1x EPAS19 Wiring Harness
- 1x PNU0097 Steering Angle Sensor

Technical Specification and Contact Details overleaf

## **Microsteer MGU with Autonomous Control**

### **Technical Specification**

| Operating Voltage             | Nominal 13.8V DC           |
|-------------------------------|----------------------------|
| Maximum current draw          | 80 Amps                    |
| System Weight (MGU & ECU)     | 4.8kg / 10.58lbs           |
| Maximum Torque Output         | 37NM / 27 ft.lb.           |
| No Load Rotation Speed        | 860 degrees per second     |
| IP Rating                     | IP67                       |
| Operating Temperature         | -40 to 85°C / -40 to 185°F |
| Motor Rated Power             | 220 Watt                   |
| Input / Output Spline Pattern | 17mm-36 (11/16" x 36)      |

#### **Optional Accessories**

| EPAS200SC | Microsteer Straight Coupler |
|-----------|-----------------------------|
| EPAS200UJ | Microsteer Universal Joint  |



Contact us for more details:

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