

Flex4™ Disconnect Unit

Magna Powertrain's disconnect unit is an electromechanical actuated system that utilizes a solenoid, lead screw and dog clutch technologies.



Features and Specifications

Compatible with AWD & 4WD architectures

- PTU's, Front & Rear Axle Drive Units
- Bolt-on & integrated configurations

Technical features

- Engagement time: <50 msec
- Delta reconnect speed: 200 rpm max.
- Shift cycles: 700,000 cycles
- Scalable torque capacity: 2500 Nm to 3600 Nm
- Current: 10A_{max} for 500 msec

Competitive advantage/differentiators

- Ultra-fast disconnect / reconnect process
- Preemptively switches between true 2WD and AWD/4WD modes
- Provides both automatic and driver forced activation

Applications

- All-Wheel Drive (AWD)
- Four-Wheel Drive (4WD)

SOP

Ideation

Discovery

Concept

Development

Serial Preparation

in Production