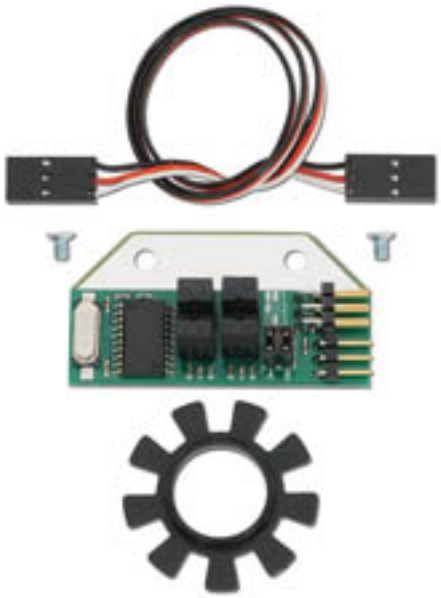
# Position Controller Kit tracks the position and speed of a wheel



A Position Controller uses a quadrature encoder system to reliably track the position and speed of a wheel at all times. With the included plastic encoder disk, the Position Controller has a resolution of 36 positions per rotation; this equates to approximately 0.5 inches of linear travel per position using 6-inch tires (not included). The Position Controller calculates and reports position and average speed data on command. This leaves the main processor free to handle more important tasks like reading GPS coordinates, processing sensor information, and maneuvering complex environments.

The Position Controller is compatible with any microcontroller via a single-wire half-duplex asynchronous serial communication (UART) bus. Up to four Position Controller devices can be controlled on the same bus to minimize I/O requirements.

For increased functionality, multiple Position Controllers can be interfaced with HB-25 motor controllers (available from Parallax and sold separately) to control the position of the wheel and automatically provide smooth speed ramping as well as accurate position advancement capability.

Features:

- Single I/O line can control up to 4 Position Controllers
- 36 encoder positions per revolution
- Compatible with any microcontroller
- +5 volt Supply for Position Controllers

Kit Contents:

- Position Controller
- Plastic Encoder Disk
- 14" Servo Extension Cable
- 4/40 Phillips flat head screw 3/16" (x2)

Visit www.Parallax.com [1] search “Position Controller” (27906). Retail: $29.99

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**Links:**
[1] http://www.Parallax.com