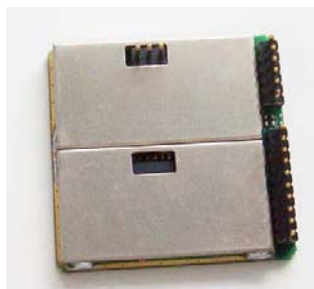


# ZX4125 GPS Module Specification



## Brief Introduction

ZX4125, the 16-channel, self-contained GPS receiver module, is intended to be used as an add-on board on system requiring GPS real time data. It contains a passive antenna, a 16- channel, ultra low power and high sensitivity GPS chipset, and flash memory needed to support the navigation SW. The navigation data base is located in the ZX4125, while the application SW and the mapping information stay on the host device.

ZX4125 interfaces with the host device via UART (TTL).

## Key Features and Benefits

- Plug & Go GPS receiver module
- Compact design :25mm x 25mm x 2.5mm
- Two antenna outlets with auto-detect switch
- Simple UART interface
- Ultra low power consumption  $\approx$ 27mA 3.0V
- High sensitivity -147dBm
- Position accuracy: 3m CEP (50%), 7m CEP (90%) without SA (horizontal)

## Performance Specifications

|                              |                            |                                       |  |
|------------------------------|----------------------------|---------------------------------------|--|
| <b>Frequency</b>             | 1575.42MHz-L1 C/A Code     | <b>Cold Start Time</b>                | 45 sec.                                  |
| <b>I/O Port</b>              | UART interface             | <b>Warm Start Time</b>                | 38 sec                                   |
| <b>Protocol</b>              | NMEA 0183                  | <b>Hot Start Time</b>                 | 10 sec.                                  |
| <b>GPS Channel</b>           | 16 Channels                | <b>Reacquisition</b>                  | 100ms                                    |
| <b>Operating Voltage</b>     | 3.0 V ~ 6.0 V              | <b>Update Rate</b>                    | 1Hz                                      |
| <b>Operating Temperature</b> | -40°C ~ +85°C              | <b>External Antenna Current Range</b> | 2mA ~ 25mA                               |
| <b>Power Consumption</b>     | 27mA                       | <b>I/O Connector</b>                  | 1.27mm Pin Header                        |
| <b>Position Accuracy</b>     | 3m CEP(50%), 7m EP(90%)    | <b>Tracking Sensitivity</b>           | -147dBm                                  |
| <b>V Bat Voltage</b>         | 1.0 V (MIN.), 2.0 V (MAX.) | <b>Dimensions</b>                     | 25mmX25mmX2.5mm<br>(Excluding Connector) |
|                              |                            |                                       |  |

**Mobile GPS Online®**

**Address:** 387 Stoneway Drive, Ottawa, Ontario, Canada, K2G 6G7

**Tel:** 613-8230926 (Ottawa Area)

**Toll Free:** 1-866-GPS-9898

**Fax:** 613-8230926

**E-MAIL:** sales@mobilegpsonline.com

**Web:** <http://www.mobilegpsonline.com>