



Btracking Part No.	BTL3640
Cell Networks	
LTE:	B12/B17(700), B5(850), B4(AWS1700), B2(1900)
HSPA/UMTS:	B2(1900) B5(850)
Satellite Location (GNSS)	
Constellation Support	Hybrid GPS, GLONASS, SBAS engine (WAAS, EGNOS, MSAS)
Channels	55 Channel GPS
Tracking Sensitivity	-167 dBm
Acquisition Sensitivity	
Cold Start	-148 dBm
Hot Start	-157 dBm
Location Accuracy	2.0m CEP Open Sky (SBAS 24 hours static)
Location Update Rate	Up to 4 Hz
AGPS Location assistance capable	Y
COMPREHENSIVE I/O	
Ignition Inputs	1 fixed bias
Digital Inputs	4 (high/low selectable 0-30 VDC)
Digital Outputs	3 (open collector relay 150 mA)
Analog Inputs	2 External ADC Inputs
1-Wire Interface	1 (driver ID/temperature sense)
Power Outputs	1 Switched VIN
Status LEDs	4 (GPS, Cellular, VBUS, LAN)
Serial Interface	2 TTL Ports
Integrated Buzzer	Programmable audible alert
External ADC Inputs	2 (reference voltage - 3.3V)
Accelerometer	Built in, triple-axis (driver behavior, impact detection, motion sensing, tilt detection)
CERTIFICATIONS	
FCC	Y
CE	N
IC	Y
PTCRB	Y
RoHS	Y
ELECTRICAL	
Operating Voltage	12/24 VDC Vehicle Systems 9-30 VDC (start-up, operating) 7-32 VDC (momentary) Typical 450uA @ 12 V (deep sleep)
Power Consumption	Typical 15mA @ 12 V (radio-active sleep) Typical 100mA @ 12 V (active tracking with GPS and cell enabled)
Battery Pack	
Battery Capacity	Up to 1000 mAh
Battery Technology	Lithium-Ion
Charging Temperature	0° to +45°C
ENVIRONMENTAL	
Temperature	-30° to +75° C (connected to primary power) -10° to +60° C (operating on internal battery) -20° to +25° C ≤ 6 months (long term storage with battery)
Humidity	95% R.H. @ 50° C non-condensing
Shock and Vibration	U.S. Military Standards 202G
ESD	IEC 61000-4-2 (4KV test)
Ingress Protection Rating	N/A
PHYSICAL	
Dimensions	5.7 x 2.1 x 1.3" 145 x 53 x 33 mm
Weight	5 oz (142g)
CONNECTORS, SIM ACCESS	
Vehicle BUS I/F	16-Pin 3mm Pitch
Power, I/O	24-Pin 3mm Pitch
SIM Access	Internal (2FF SIM)
External Cellular	N/A
GPS Antenna	N/A
INTERFACE STANDARDS	
Bluetooth	Classic Bluetooth v2.1+EDR and BLE v4.0
Heavy Duty Truck Data	J1708, J1939
Light Duty Vehicle Data	J1850 PWM, J1850 VPW, SW-CAN ISO 9141-2, KWP 2000, ISO 15765 CAN
WiFi	
PRODUCT OPTIONS	
	RS-232 on Aux 2 I/O wiring harness 200mAh Lithium-Ion backup battery Wi-Fi 802.11 a/g/b/n client mode



Additional Details Summary	
Hardware	
GPS, high sensitivity	Y
Processor	8 bit
Serial Ports	1
ECM Data (Hvy Duty J1939/J1708)	N
ECM Data (Light Duty OBDII)	N
Inputs (digital and includes ignition)	3
A/D Inputs	2 internal / 1 ext
Input bias control	Y
Outputs	3
iButton / Driver ID (1 bit protocol)	N
Temp sensor - (1 bit protocol)	N
Vehicle Power	12 & 24v
Non-volatile Memory	Y
Serial Data Support	Ltd
Programmable 3 Axis Accelerometer	Motion/Tilt
Ext Wiring Harness Options	Y
Internal Antenna Option	Y
External Antenna Option	Future
Water resistant enclosure	N
Variable Sleep Modes	Y
Firmware	
Logged locations	20000
<i>Peripheral Support</i>	
User Msgs(MDT, Txt, SMS,etc)	Y
Garmin Messaging	Y
NMEA (via serial)	Y
Dial-up Networking	Y
<i>Configuration</i>	
OVER-THE-AIR Firmware	Y
OVER-THE-AIR Configuration	
via SMS	Y
via PULS	Y
via LMU Manager	Y
<i>PEG Features</i>	
PEG Event Lines	1250
Accumulators	128
Timer timeouts	128
De-bounce delays (Inputs)	1 per input
Max Speed Thresholds	4
Time - Distance reporting	4
A/D Thresholds	4
A/D accumulators	Y
<i>Geo-Fence</i>	
Rectangle or radial zone	21
Radial Zones or Vertices	5400
Hosted Application	Y