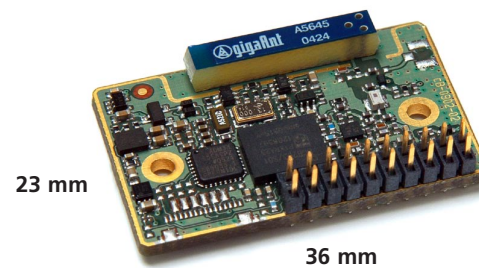


INDUSTRIAL BLUETOOTH™



## Product Brief OEMSPA312/332

The OEM SERIAL PORT ADAPTER™ 312/332 series is a complete set of different Bluetooth modules specially designed to make migration from prior connectBlue Bluetooth generations an easy task.

### Key Features

- Electrical and mechanical compatible with OEMSPA13/33
- Compatible Short Range and Long Range modules
- RS232 and UART logic-level support
- Designed for high performance/throughput
- Configurable for short latency/delay
- AT Command support
- Wireless LAN co-existence support
- Configuration over Bluetooth
- Bluetooth Qualified as Product (Bluetooth version 2.0)
- Radio Type Approved for Europe, US and Canada
- Compliant with EMC, Safety and Medical standards
- Lead Free and RoHS compliant
- Only high quality components used
- Internal antenna or external antenna connector
- Different connector and mounting options
- Industrial and Automotive temperature range -30 - +85°C
- Individually tested and tuned in production
- Custom factory configuration possible

*connectBlue*

# Technical Data

## SPECIFICATIONS

### Bluetooth Support

Bluetooth version 2.0 (Qualified and Listed as Product)  
Supported Bluetooth Profiles:  
Generic Access Profile (GAP)  
Serial Port Profile (SPP)  
Dial-up networking Profile (DUN GW, DUN DT)

OEMSPA312i/x: Class I +7 dBm (10 - 200 m)  
OEMSPA332i/x: Class I +17 dBm (>300 m)

### Bluetooth Chipset and Stack

Product based on Philips well known BGB203 chipset and Philips Embedded Stack

### Software

All software is included in the module.  
Configurable locally or over Bluetooth using AT Commands or PC Wizard

### Serial Interface

RS232 or UART Logic-Level  
Supported baud rates: 300 – 921.6k  
Support for non-standard baud rates  
Flow control: CTS/RTS or none

### Power Supply

OEMSPA312i/x: 3.0 - 6.0 VDC  
OEMSPA332i/x: 3.3 - 6.0 VDC

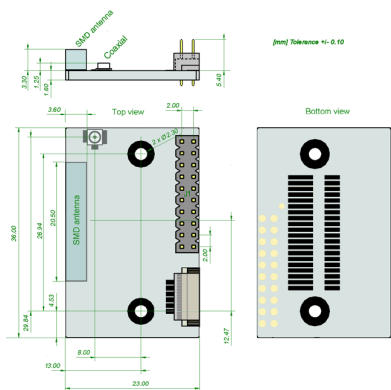
### Current Consumption

OEMSPA312i/x:  
Min: 1.0 mA  
Average: 17 mA  
Max: 70 mA (Peak)

OEMSPA332i/x:  
Min: 10 mA  
Average: 22 mA  
Max: 170 mA (Peak)

### Dimension/Size (Typically)

23 x 36 x 5 mm



### Type Approval

R&TTE (Europe)  
FCC/CFR 47 part 15 unlicensed modular transmitter approval  
IC (Industrie Canada)

### Environmental

Maximum operating temperature: -30 - +85 °C  
Storage temperature: -40 - +85°C  
Humidity RH 5-90% non-condensing  
Shock and vibration: IEC 61131-2

### Certifications and Compliance

**R&TTE Directive 1999/5/EC**  
EN 300 328 V1.6.1 (2004-11)

**EMC Directive: 89/336/EEC**  
EN 301 489-1 V1.4.1 (2002-08)  
EN 301 489-17 V1.2.1 (2002-08)  
EN 61000-6-2 (2001)

### Safety Compliance

EN 60950-1:2001 and/or IEC 60950-1:2001 (1st Edition)  
EN 60950-1/A11:2004 + Corrigendum:2004

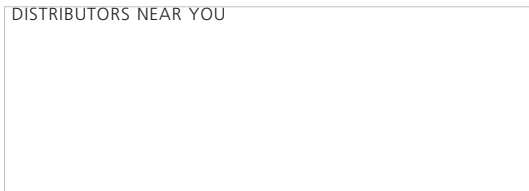
### Medical Electrical Equipment

IEC 60601-1-2 (2001)

### Order Number

- cb-OEMSPA312i-02 OEM Serial Port Adapter 312i Internal Antenna and Standard J1 Connector
- cb-OEMSPA312i-04 OEM Serial Port Adapter 312i Internal Antenna (no J1 Connector)
- cb-OEMSPA312x-02 OEM Serial Port Adapter 312x External Antenna and Standard J1 Connector
- cb-OEMSPA312x-04 OEM Serial Port Adapter 312x External Antenna (no J1 Connector)
- cb-OEMSPA332i-02 OEM Serial Port Adapter 332i Internal Antenna and Standard J1 Connector
- cb-OEMSPA332i-04 OEM Serial Port Adapter 332i Internal Antenna (no J1 Connector)
- cb-OEMSPA332x-02 OEM Serial Port Adapter 332x External Antenna and Standard J1 Connector
- cb-OEMSPA332x-04 OEM Serial Port Adapter 332x External Antenna (no J1 Connector)

DISTRIBUTORS NEAR YOU



connectBlue AB • Norra Vallgatan 64 • SE-211 22 Malmö • Sweden  
Phone +46 40-6307100 • Fax +46 40-237137 • info@connectblue.se • www.connectblue.se

Printed in Sweden. ©2006 connectBlue AB. All rights reserved. All specifications are subject to change without notice. BLUETOOTH™ is a trademark owned by the Bluetooth SIG Inc. Windows is a registered trademark by Microsoft.