



# **IVT BlueSoleil™ Software Development Kit**

**Version 2.1.3**

**Release Note**

Jul. 10<sup>th</sup>, 2013

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## Revision History

Version	Date	Comments
1.0 Release	Jan. 18 <sup>th</sup> , 2008	Initial version.
1.0.1	Jan. 24 <sup>th</sup> , 2008	Added HFP/HSP Audio Gateway APIs and structures.
1.1.0 Alpha	Jan. 31 <sup>st</sup> , 2008	Added Hands-free Unit/Headset APIs and structures.
1.1.1	Mar. 24 <sup>th</sup> , 2008	Added HFP/HSP Audio Gateway sample application code. Added HFP/HSP Device sample application code. Added HSP/HFP specific event.
1.1.2	Apr. 2 <sup>nd</sup> , 2008	Added call back functions of pairing and authentication. Added call back relevant macros.
1.1.3	Apr. 7 <sup>th</sup> , 2008	Added pairing APIs and relevant macros.
1.1.4	Apr. 15 <sup>th</sup> , 2008	Added call back functions of pairing and authentication. Added relevant events Added Bluesoleil activating API. Added sample code of pairing and authentication.
1.1.5	May. 14 <sup>th</sup> , 2008	Added Hands-free Unit/Headset APIs related to wavein/waveout device configurations.
1.1.6	May. 23 <sup>rd</sup> , 2008	Added Btsdk_AGAP_SetDialHandlerFlag function. Modified the description of the callback event BTSDK_APP_EV_AGAP_HF_LASTNUM_REDIAL_IND.
1.1.7	Jun. 5 <sup>th</sup> , 2008	Added offline activation APIs for BlueSoleil 6.x.
2.0.0	Oct. 15 <sup>th</sup> , 2008	Updated Hands-free/Headset profile from Version 1.1 to Version 1.5. Added APIs about setting and getting fixed pincode of local device. Modified the description of the API: Btsdk_GetAvailableExtSPPCOMPort
2.0.1	Feb. 26 <sup>th</sup> , 2009	Added SPP Profile sample application code.
2.0.2	Apr. 10 <sup>th</sup> , 2009	Added A2DP Profile APIs.
2.0.4	Sept. 22 <sup>nd</sup> , 2009	Modified the API: Btsdk_GetRemoteRSSI
2.0.5	Nov. 27 <sup>th</sup> , 2009	Added HID Profile structures and APIs.

2.1.3	Jul. 10 <sup>th</sup> , 2013	<ol style="list-style-type: none"><li>1. Added AVRCP1.4 (CT/TG)APIs.</li><li>2. Added PBAP profile structures and APIs.</li><li>3. Added MAP profile structures and APIs.</li><li>4. Added Bluetooth 4.0 LE GATT related structures and APIs.</li></ol>
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## 5. Introduction

This document describes IVT BlueSoleil™ SDK Version 2.0.13.

## 6. Target Platform

The target platform is exactly the same as BlueSoleil 6.x.

CPU: 600MHz or above

RAM: 128M or above

Free hard disk space: at least 20MB

Screen: 800\*600 or above

OS: Windows 2000, Windows XP, Windows Vista

IDE: Microsoft Visual C++ 6.0 / Visual Studio 6.0 / Visual Studio .net 2003 / Visual Studio .net 2005// Visual Studio 2008

BlueSoleil 6.4 or above version is supported by this SDK.

## 3. Release Functionality

The software was written against version 2.0+EDR of the Bluetooth Core Specification [1] and Bluetooth Profile Specification [2].

The release provides:

Bluetooth Profile		Client/connections	Server/connections
PAN	Personal Area Networking Roles: Group Network/PAN User	√, 1	√, 1+
SPP	Serial Port: Roles: Device A/Device B	√, 1+	√, 1
OPP	Object Push Roles: Client/Server	√, 1	√, 1
FTP	File Transfer Roles: Client/Server	√, 1	√, 1
FAX	FAX Roles: Data Terminal	√, 1	N/A
A2DP	Advanced audio distribution profile Roles: Source & Sink	√, 1	√, 1
AVRCP	Audio/video remote control profile(V1.4) Roles: target/Controller	√, 1	√, 1

Headset	Headset (V1.2) Roles: Audio Gateway & Terminal Device	√, 1	√, 1
Hands-free	Hands-free (V1.5) Roles: Audio Gateway & Terminal Device	√, 1	√, 1
HID	Human Interface Device Roles: Host	√, 1	N/A
MAP	Message Access Profile Roles: Client/Server	√, 1	√, 1
PBAP	Phone Book Access Profile Roles: Client/Server	√, 1	√, 1

Also provides APIs allowing direct access to the protocols listed as follows:

- GAP
- SDP
- OBEX

## 4. Historical Changes

### ◆ Jan. 18<sup>th</sup>, 2008 / 1.0 Release

Initial version.

### ◆ Jan. 24<sup>th</sup>, 2008 / 1.0.1

Audio Gateway APIs and structures of HFP/HSP are added in BlueSoleil SDK Version 1.0.1 listed as follows:

#### [Newly added APIs]

Btsdk\_AGAP\_Init  
 Btsdk\_AGAP\_Done  
 Btsdk\_AGAP\_Event\_Ind\_Func  
 Btsdk\_AGAP\_APPRegCb4ThirdParty  
 Btsdk\_AGAP\_AnswerCall  
 Btsdk\_AGAP\_OriginateCall  
 Btsdk\_AGAP\_CancelCall  
 Btsdk\_AGAP\_NetworkEvent  
 Btsdk\_AGAP\_VoiceRecogDeactivatedInd  
 Btsdk\_AGAP\_SetCurIndicatorVal  
 Btsdk\_AGAP\_SetSpkVol  
 Btsdk\_AGAP\_VoiceTagPhoneNumRsp  
 Btsdk\_AGAP\_AudioConnTrans

Btsdk\_AGAP\_ExtendCmd  
Btsdk\_AGAP\_ConnWithHF  
Btsdk\_AGAP\_DiscWithHF  
Btsdk\_AGAP\_PairWithHF  
Btsdk\_AGAP\_GetStatus  
Btsdk\_AGAP\_DialRsp  
Btsdk\_AGAP\_GetAGState  
Btsdk\_AGAP\_IsAudioConnExisted

**[Newly added structures]**

Btsdk\_AGAP\_ConnInfo

◆ **Jan. 31<sup>st</sup>, 2008 / 1.1.0 Alpha**

Hands-free Unit/Headset APIs and structures are added in BlueSoleil SDK Version 1.1.0

Alpha listed as follows:

**[Newly added APIs]**

Btsdk\_HFAP\_Event\_Ind\_Func  
Btsdk\_HFAP\_APPRegCbK4ThirdParty  
Btsdk\_HFAP\_Init  
Btsdk\_HFAP\_Done  
Btsdk\_HFAP\_AnswerCall  
Btsdk\_HFAP\_CancelCall  
Btsdk\_HFAP\_LastNumRedial  
Btsdk\_HFAP\_MemNumDial  
Btsdk\_HFAP\_Dial  
Btsdk\_HFAP\_VoiceRecognitionReq  
Btsdk\_HFAP\_3WayCallingHandler  
Btsdk\_HFAP\_AudioConnTrans  
Btsdk\_HFAP\_TxDTMF  
Btsdk\_HFAP\_SetSpkVol  
Btsdk\_HFAP\_VoiceTagPhoneNumReq  
Btsdk\_HFAP\_TerminateRepConn  
Btsdk\_HFAP\_ExtendCmd  
Btsdk\_HFAP\_GetStatus  
Btsdk\_HFAP\_GetCurrHFState

**[Newly added structures]**

Btsdk\_HFAP\_ConnInfo

◆ **Mar. 24<sup>th</sup>, 2008 / 1.1.1**

HFP/HSP Audio Gateway sample and Device sample are added in BlueSoleil SDK Version 1.1.1. For more details refer to the document “SDK sample instruction”.

**[Newly added macros]**

HSP/HFP specific event added:

BTSDK\_APP\_EV\_HFAP\_EXTEND\_FUNC\_ENABLED\_IND  
BTSDK\_APP\_EV\_HFAP\_EXTEND\_FUNC\_DISENABLED\_IND  
BTSDK\_APP\_EV\_HFAP\_SIGNAL\_STRENGTH\_IND  
BTSDK\_APP\_EV\_HFAP\_BATTCHG\_IND  
BTSDK\_APP\_EV\_HFAP\_ROAMING\_RESET\_IND  
BTSDK\_APP\_EV\_HFAP\_ROAMING\_ACTIVE\_IND

**[Newly added structures]**

Btsdk\_HFAP\_SubscriberInfoStru

◆ **Apr. 2<sup>nd</sup>, 2008 / 1.1.2**

Call back functions and relevant macros of pairing and authentication are added in BlueSoleil SDK Version 1.1.2, as follows:

**[Newly added APIs]**

Btsdk\_RegisterCallbackEx  
Btsdk\_UserHandle\_Pin\_Req\_Ind\_Func  
Btsdk\_UserHandle\_Authorization\_Req\_Ind\_Func

**[Newly added macros]**

BTSDK\_CLIENTCBK\_PRIORITY\_HIGH  
BTSDK\_CLIENTCBK\_PRIORITY\_MEDIUM  
BTSDK\_PIN\_CODE\_IND  
BTSDK\_AUTHORIZATION\_IND  
BTSDK\_CLIENTCBK\_HANDLED  
BTSDK\_CLIENTCBK\_NOTHANDLED

◆ **Apr. 7<sup>th</sup>, 2008 / 1.1.3**

Additional pairing APIs and Macros are added in BlueSoleil SDK Version 1.1.3 as follows:

**[Newly added APIs]**

Btsdk\_PinCodeReply  
Btsdk\_AuthorizationResponse

**[Newly added macros]**

BTSDK\_AUTHORIZATION\_GRANT  
BTSDK\_AUTHORIZATION\_DENY

◆ **Apr. 15<sup>th</sup>, 2008 / 1.1.4**

Sample code of pairing and authentication is added in BlueSoleil SDK Version 1.1.4. For more details refer to the SDK sample codes (section of Remote Device Manager) and the document “SDK sample instruction”.

BlueSoleil SDK Version 1.1.4 adds call back functions of pairing and authentication, and relevant call back events. This version also adds a Bluesoleil activating API. As shown below:

**[Newly added APIs]**

Btsdk\_Link\_Key\_Notif\_Ind\_Func  
Btsdk\_Authentication\_Fail\_Ind\_Func  
Btsdk\_ActivateEx

**[Newly added macros]**

BTSDK\_LINK\_KEY\_NOTIF\_IND  
BTSDK\_AUTHENTICATION\_FAIL\_IND

◆ **May. 14<sup>th</sup>, 2008 / 1.1.5**

Two Hands-free Unit/Headset APIs related to wavein/waveout device configurations are added in BlueSoleil SDK Version 1.1.5. As shown below:

**[Newly added APIs]**

Btsdk\_HFAP\_SetWaveInDevice  
Btsdk\_HFAP\_SetWaveOutDevice

◆ **May. 23<sup>rd</sup>, 2008 / 1.1.6**

A Hands-free AG API is added in BlueSoleil SDK Version 1.1.6. Also, the description of a Hands-free AG callback event is modified in this version. As shown below:

**[Newly added APIs]**

Btsdk\_AGAP\_SetDialHandlerFlag

**[Modified macros]**

BTSDK\_APP\_EV\_AGAP\_HF\_LASTNUM\_REDIAL\_IND

◆ **Jun. 5<sup>th</sup>, 2008 / 1.1.7**

offline activation APIs for BlueSoleil 6.x is added in BlueSoleil SDK Version 1.1.7. As shown below:

**[Newly added APIs]**

Btsdk\_GetActivationInformation  
Btsdk\_EnterUnlockCode

◆ **Oct. 15<sup>th</sup>, 2008 / 2.0.0**

Hands-free/Headset profile is updated from Version 1.1 to Version 1.5 in BlueSoleil SDK Version 2.0.0. For the detailed information, please check the document file “HFP\_Revision\_History.pdf”.

Modifications of APIs are also made in SDK 2.0.0 as shown below:

**[Newly added APIs]**

Btsdk\_SetFixedPincode  
Btsdk\_GetFixedPincode

**[Modified APIs]**

Btsdk\_GetAvailableExtSPPCOMPort



◆ **Feb. 26<sup>th</sup>, 2009 / 2.0.1**

SPP sample code is added in BlueSoleil SDK Version 2.0.1. For more details refer to the sample code and the document “SDK sample instruction”.

◆ **June. 13<sup>th</sup>, 2013 / 2.1.3**

More profile function codes are added in BlueSoleil SDK Version 2.1.13. For more details refer to the sample code and the document “SDK sample instruction”.

◆ **Apr. 10<sup>th</sup>, 2009 / 2.0.2**

A2DP source and sink APIs are added in BlueSoleil SDK Version 2.0.2.

**[Newly added APIs]**

Btsdk\_RegisterA2DPSRCSERVICE

Btsdk\_UnregisterA2DPSRCSERVICE

Btsdk\_RegisterA2DPSNKSERVICE

Btsdk\_UnregisterA2DPSNKSERVICE

◆ **Sept. 22<sup>nd</sup>, 2009 / 2.0.4**

Modifications of API are also made in SDK 2.0.4 as shown below:

**[Modified APIs]**

Btsdk\_GetRemoteRSSI

◆ **Nov. 27<sup>th</sup>, 2009 / 2.0.5**

HID Profile (host) structures and APIs are added in BlueSoleil SDK Version 2.0.5.

**[Newly added APIs]**

Btsdk\_Hid\_ClnUnPluggedDev

**[Newly added structures]**

BtSdkRmtDISvcExtAttrStru

BtSdk\_SDAP\_PNPINFO

## 5. References

- [1]. Specification of the Bluetooth System, Core, V2.0+EDR, November 4th, 2004.
- [2]. Specification of the Bluetooth System, Profiles, date up to January 30th, 2007.

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