

# 3D Synchronization Profile (3DSP)

## **Bluetooth® Implementation Conformance Statement (ICS) Proforma**

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# 1 General principles

## 1.1 Implementation Under Test (IUT) identification

Using the Bluetooth SIG qualification tool, the implementer is expected to declare details about what will be implemented.

## 1.2 Enforcement of inter-layer dependencies

This ICS includes one or more tables with inter-layer dependencies (ILDs). ILDs are used for specification requirements that are dependent on other supporting specifications. ILDs can refer to an individual ICS item in a separate layer (individual ILD), or it can refer to the full layer (full-layer ILD).

ILDs residing in an X2Core layer will be enforced from the Bluetooth SIG qualification tool in the following conditions, depending on where the referred ILD is residing:

Referred ILD resides in	Individual ILD	Full-layer ILD
Controller layer	Core-Complete configuration, or Referred layer is supported	N/A
Lower HCI layer	HCI is supported	N/A
Upper HCI layer	Core-Host configuration, or UHCI is supported	N/A
Host layer	Core-Host configuration, or Core-Complete configuration, or Referred layer is supported	N/A
X2Core layer	Core-Host configuration, or Core-Complete configuration, or Referred layer is supported	Core-Host configuration, or Core-Complete configuration

Table 1.1: Enforcement of an ILD within the Bluetooth SIG qualification tool

## 2 ICS declarations

### 2.1 Versions

Table 0: X.Y Versions

Item	Version	Reference	Status
1	3DSP v1.0	[1] 3DSP v1.0	C.1, C.2
2–4	No longer used	N/A	N/A

C.1: Mandatory.

C.2: Can only be supported with an active X.Y.Z version after Deprecation or Withdrawal. Deprecated 2014-04-22. Withdrawn 2022-02-01.

Table 0a: X.Y.Z Versions

Item	Version	Reference	Status
1	No longer used	N/A	N/A
2	3DSP v1.0.1**	[6] 3DSP v1.0.1	Deprecated 2021-02-01. Withdrawn 2022-02-01.
3	3DSP v1.0.2**	[7] 3DSP v1.0.2	Deprecated 2021-02-01. Withdrawn 2022-02-01.
4	3DSP v1.0.3	[8] 3DSP v1.0.3	C.2

C.1: No longer used.

C.2: Mandatory IF 3DSP 0/1 “3DSP v1.0”, otherwise Excluded.

### 2.2 Core Configuration

Table 0b: Core Configuration Requirements

Item	Core Configuration	Reference	Status
1	Profile supported over BR/EDR	[1] 1.4	C.1, C.3
2	Profile supported over LE	[1] 1.4	C.2

C.1: Excluded for this Profile IF CORE 41/2 “LE Core Configuration”.

C.2: Excluded for this Profile.

C.3: Mandatory for this Profile.

### 2.3 Roles

Table 1: Role Requirements

Item	Role	Reference	Status
1	3DD – 3D Display	[1] 2.2	C.1
2	3DG – 3D Glasses	[1] 2.2	C.1

C.1: Mandatory to support at least one.

\*\* Deprecated versions may not appear in the Bluetooth SIG qualification tool after the deprecation date. TCRLs published after this date will not allow the use of deprecated versions.



## 2.4 3DD

### 2.4.1 3DD Features

**Table 2: 3DD Features**

*Prerequisite: 3DSP 1/1 “3DD – 3D Display”*

Item	Capability	Reference	Status
1	Frame Sync	[1] 2.6.1, 4	M
2	Proximity Association Response	[1] 2.6.2, 5	M
3	Reference Protocol Association Notification Reception	[1] 2.6.6	O
4	3DG Connection Announcement Reception	[1] 2.6.3	C.1
5	Battery Level Reporting Reception	[1] 2.6.7, 6.4.2	C.2
6	Association Notification Reception	[1] 2.6.4, 7.5	C.3
7	3D Broadcast Message Transmission	[1] 2.6.8	M

C.1: Mandatory IF 3DSP 2/3 “Reference Protocol Association Notification Reception”, otherwise Optional.

C.2: Optional IF 3DSP 2/4 “3DG Connection Announcement Reception”, otherwise Excluded.

C.3: Mandatory IF 3DSP 2/3 “Reference Protocol Association Notification Reception” OR 3DSP 2/5 “Battery Level Reporting Reception”, otherwise Optional IF 3DSP 2/4 “3DG Connection Announcement Reception”, otherwise Excluded.

### 2.4.2 Proximity Association

**Table 3: 3DD Proximity Association**

*Prerequisite: 3DSP 1/1 “3DD – 3D Display”*

Item	Capability	Reference	Status
1	Class of Device	[1] 5.1.1	M
2	3D Information EIR Field	[1] 5.1.2.1	M
3	Legacy 3D Information EIR Field	[1] 5.1.2.2	M
4	TX Power Level Field	[1] 5.1.2.3	M

## 2.5 3DG

### 2.5.1 3DG Features

**Table 4: 3DG Features**

*Prerequisite: 3DSP 1/2 “3DG – 3D Glasses”*

Item	Capability	Reference	Status
1	Proximity Association Initiation	[1] 5.3	M
2	Legacy Association Notification Transmission	[1] 2.6.4	O
3	3DG Connection Announcement Transmission	[1] 6.2	C.1
4	Battery Level Reporting Transmission	[1] 6.4.1	C.2
4a	Support for User Request for Battery Level Display	[1] 6.4.1	O



Item	Capability	Reference	Status
5	Association Notification Transmission	[1] 6.3.1	C.2
6	3D Broadcast Message Reception	[1] 8.5	C.3
7	Shutter Control	[1] 9.3	M

C.1: Mandatory IF 3DSP 4/2 “Legacy Association Notification Transmission”, otherwise Optional.

C.2: Optional IF 3DSP 4/3 “3DG Connection Announcement Transmission”, otherwise Excluded.

C.3: Mandatory IF 3DSP 4/2 “Legacy Association Notification Transmission” OR 3DSP 4/4 “Battery Level Reporting Transmission”, otherwise Optional IF 3DSP 4/3 “3DG Connection Announcement Transmission”, otherwise Excluded.

## 2.5.2 Proximity Association

**Table 5: 3DG Proximity Association**

*Prerequisite: 3DSP 1/2 “3DG – 3D Glasses”*

Item	Capability	Reference	Status
1	Class of Device	[1] 5.1.1	M
2	Path Loss Threshold	[1] 5.3	M
3	3D Information EIR Field	[1] 5.1.2.1	M

## 2.6 Profile and Protocol Dependencies

### 2.6.1 BB requirements

**Table 6: BB Requirements (3DD)**

*Prerequisite: 3DSP 1/1 “3DD – 3D Display”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Connectionless Peripheral Broadcast Transmitter	[1] 10.1	M	[3] BB 3a/1
2	Synchronization Train	[1] 10.1	M	[3] BB 9c/1

**Table 7: BB Requirements (3DG)**

*Prerequisite: 3DSP 1/2 “3DG – 3D Glasses”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Connectionless Peripheral Broadcast Receiver	[1] 10.1	M	[3] BB 3a/2
2	Synchronization Scan	[1] 10.1	M	[3] BB 9c/2

## 2.6.2 GAP requirements

**Table 8: GAP Requirements (3DD)**

*Prerequisite: 3DSP 1/1 “3DD – 3D Display”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Synchronizable mode	[1] 10.3	M	[2] GAP 1/9
2	No longer used	N/A	N/A	N/A
3	General discoverable mode	[1] 10.3	M	[2] GAP 1/3

**Table 9: GAP Requirements (3DG)**

*Prerequisite: 3DSP 1/2 “3DG – 3D Glasses”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Synchronization Establishment as receiver	[1] 10.3	M	[2] GAP 4/7
2	No longer used	N/A	N/A	N/A

## 2.6.3 L2CAP requirements

**Table 10: L2CAP Requirements (3DD)**

*Prerequisite: 3DSP 1/1 “3DD – 3D Display”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Unicast Connectionless Data, Reception	[1] 10.2	C.1	[4] L2CAP 2/35

C.1: Mandatory IF 3DSP 2/5 “Battery Level Reporting Reception” OR 3DSP 2/6 “Association Notification Reception”, otherwise Optional.

**Table 11: L2CAP Requirements (3DG)**

*Prerequisite: 3DSP 1/2 “3DG – 3D Glasses”*

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Ability to transmit an unencrypted packet over a Unicast connectionless L2CAP channel	[1] 10.2	C.1	[4] L2CAP 2/36

C.1: Mandatory IF 3DSP 4/4 “Battery Level Reporting Transmission” OR 3DSP 4/5 “Association Notification Transmission”, otherwise Optional.



## 2.6.4 SDP requirements

**Table 12: SDP Requirements**

Item	Capability	Reference	Status	Inter-Layer Dependency
1	Server	[1] 10.4	M	[5] SDP 1b/1
2–4	No longer used	N/A	N/A	N/A
5	ServiceName	[1] 10.4	O	[5] SDP 9/9
6	BluetoothProfileDescriptorList	[1] 10.4	M	[5] SDP 9/14
7	No longer used	N/A	N/A	N/A

## 3 References

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- [1] 3D Synchronization Profile Specification, Version 1.0 or later
- [2] ICS Proforma for Generic Access Profile (GAP)
- [3] ICS Proforma for Baseband (BB)
- [4] ICS Proforma for Logical Link Control and Adaptation Protocol (L2CAP)
- [5] ICS Proforma for Service Discovery Protocol (SDP)
- [6] 3D Synchronization Profile Specification, Version 1.0.1
- [7] 3D Synchronization Profile Specification, Version 1.0.2
- [8] 3D Synchronization Profile Specification, Version 1.0.3

## 4 Revision history and acknowledgments

### Revision History

Publication Number	Revision Number	Date	Comments
0	1.0.0	2013-03-18	Prepare for Publication
	1.0.1r01	2013-09-03	Added Erratum 5256 and 3DSP 1.0.1 to Table 0. Created C.1 and C.2 conditionals. Added reference [6] to be 3DSP version 1.0.1 or later. Added reference [7] to be the Erratum location.
1	1.0.1	2013-10-22	Prepare for Publication
	1.0.2r01	2013-10-22	TSE 5241: Addition of item 4a in Table 4.
	1.0.2r02	2013-10-22	TSE 5364: Changed table condition for Table 1 , C.1: Mandatory to support at least one of 1/1 or 1/2
2	1.0.2	2013-12-03	Prepare for Publication
	1.0.2.0r00	2015-05-20	ESR08 update: Added item 4 to Table 0 for 3DSP 1.0.2 Added reference [8] for 3DSP 1.0.2
	1.0.2.0r01	2015-06-03	Converted to current document template.
3	1.0.2.0	2015-07-14	Prepared for TCRL 2015-1 publication
	1.0.3.0r00	2015-10-28	Updated version numbering to align with Specification version change to 1.0.3 for ESR09.
	1.0.3.0r01 to 1.0.3.0r03	2015-11-02 to 2015-11-23	Added item 0/5 for new Specification version 1.0.3 (ESR09). Added Table 0a for minor profile versions.
4	1.0.3.0	2015-12-22	Prepared for TCRL 2015-2 publication.
	1.0.3.1r00	2018-04-04	TSE 10571 (rating 1): Template Conversion.
5	1.0.3.1	2018-07-01	Approved by BTI. Prepared for TCRL 2018-1 publication.
	1.0.3.2r00	2018-09-24	Drafted Deprecation /Withdrawal changes
6	1.0.3.2	2018-11-21	Approved by BTI. Prepared for TCRL 2018-2 publication.
	1.0.3.2ed2 r00	2021-01-12	TSE 15973 (rating 1): Changes for Deprecation. Minor editorials. Fixed instances of Master and Slave to Central and Peripheral, respectively.
	1.0.3.2 edition 2	2021-02-01	Approved by BTI on 2021-01-18. Prepared for edition 2 publication.
	1.0.3.2ed3 r00–r03	2021-03-15 – 2021-05-19	TSE 16564 (rating 1): Corrected logic issues by updating conditionals in Tables 0a and 4; updating items in Tables 6–12; and updating the Prerequisite in Table 12. Editorials to bring references up to latest drafting guidelines. Editorials from consistency checker.
	1.0.3.2 edition 3	2021-05-26	Approved by BTI on 2021-05-06. Prepared for edition 3 publication.

Publication Number	Revision Number	Date	Comments
	1.0.3.2 ed4r00	2021-07-15	TSE 17164 (rating 1): Corrected the deprecation date for 3DSP v1.0.
	1.0.3.2 edition 4	2021-08-19	Approved by BTI on 2021-08-19. Prepared for edition 4 publication.
	1.0.3.2 ed5r00–r01	2021-09-17 – 2021-09-24	TSE 17483 (rating 1): Corrected C.1 of Table 0 to align with more recent language conventions. Consistency checker editorials based on the latest ICS template.
	1.0.3.2 edition 5	2021-09-28	Approved by BTI on 2021-09-27. Prepared for edition 5 publication.
	p7r00–r02	2023-08-30 – 2024-02-12	TSE 23946 (rating 2): Relabeled the subsections and tables in the Profile and Protocol Dependencies section. Cleaned up the SDP ILDs by removing items 12/2, 12/3, 12/4, and 12/7 as well as the prerequisite from Table 12. Updated the Capability description for 12/1. Editorials to align the document with the latest ICS template.
7	p7	2024-07-01	Approved by BTI on 2024-05-22. Prepared for TCRL 2024-1 publication.
	p8r00–r01	2025-02-21 – 2025-05-09	TSE 26843 (rating 2): Updated Table 0 conditional C.2. Added “Core Configuration” section and Table 0b. Applied the current ICS template. TSE 27669 (rating 1): Marked 3DSP 8/2 and 3DSP 9/2 as no longer used.
8	p8	2025-07-08	Approved by BTI on 2025-05-30. Prepared for TCRL pkg100 publication.

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