

Subject	Product Specification	Rev	2.3
Marketing Name	nRF52832QFAA BLE module		
Name	M52832QFAA		
Description	nRF52832QFAA BLE and 2.4GHz Proprietary multiprotocol module	Page 1	

1. Introduction

M52832QFAA is based on Nordic Semiconductor nRF52832QFAA Bluetooth Low Energy Platform, and is a highly integrated module for fast implementation in various applications to enable electronic devices to communicate wirelessly with other Bluetooth™ or proprietary enabled devices.

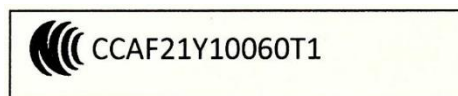
2. Features

- Support Bluetooth Smart and 2.4GHz proprietary protocols.
- ARM® Cortex™-M4 32-bit processor.
- PCB antenna on board.
- TX power -20 to +4 dBm in 4 dB steps (+4 dBm only for BLE).
- High sensitivity (-96 dBm typ.)
- Supply voltage range 1.7 V–3.6 V.
- 29 general purpose I/O available.



FCC ID: LP4-M52832

IC: 22267-M52832



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3. Applications

- Internet of Things (IoT)
 - Home automation
 - Sensor networks
 - Building automation
 - Industrial
 - Retail
- Personal area networks
 - Health/fitness sensor and monitor devices
 - Medical devices
 - Key fobs and wrist watches
- Interactive entertainment devices
 - Remote controls
 - Gaming controllers
- Beacons
- A4WP wireless chargers and devices

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- Remote control toys
- Computer peripherals and I/O devices
 - Mouse
 - Keyboard
 - Multi-touch trackpad
 - Gaming



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4. Functional Specifications

Standard	Bluetooth Low Energy v4.2
Data Rate	1 Mbps (BLE) · 2 Mbps (2.4GHz)
Data Encryption	128-bit AES
RF Frequency Range	2.402~2.480 GHz (BLE) · 2.403~2.480 GHz (2.4GHz)
Transmit Output Power	-20 dBm <= Output Power <= +4 dBm
Receiver Sensitivity	< 0.1% BER@1 Mbps at -96 dBm
Supply Voltage	1.7V to 3.6V
Antenna Type	PCB Antenna
RAM/ Flash	64 kB/ 512 kB
Operating temperature	-40 to + 85°C
Storage temperature	-40 to + 125°C

5. Bluetooth Characteristics

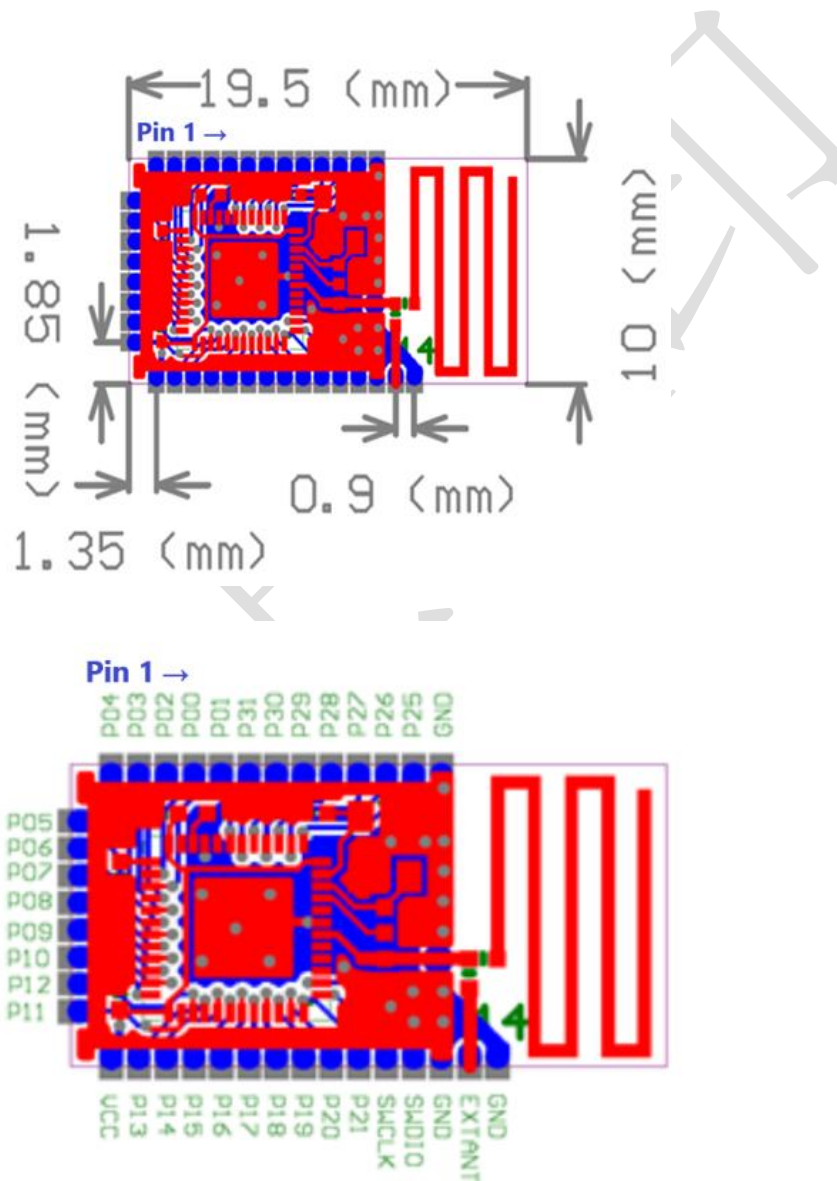
No	Characteristics	Condition	Min	Typ	Max	Unit
1	Frequency Range		2402		2480	MHz
2	Channel Spacing			2		MHz
3	Output Power		-20		4	dBm
4	Sensitivity			-96		dBm

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6. Dimension

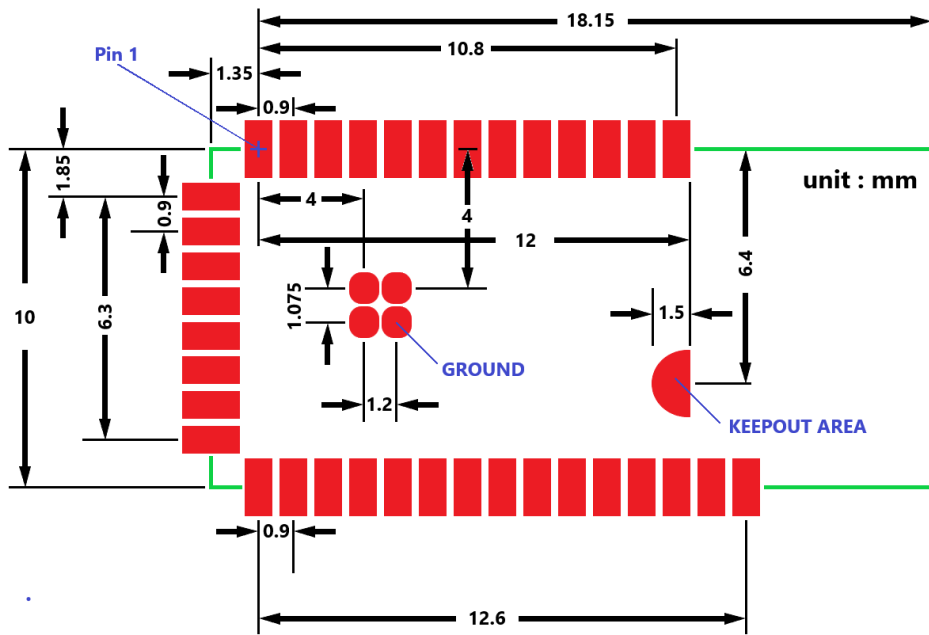
10 x 19.5 x 2.3±0.1 (mm)

■ TOP LAYER

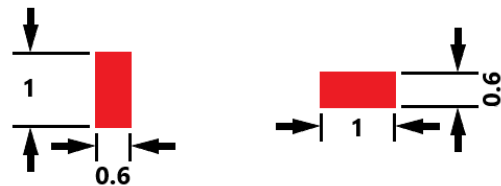


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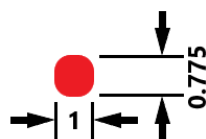
■ FOOTPRINT



Pad recommend :

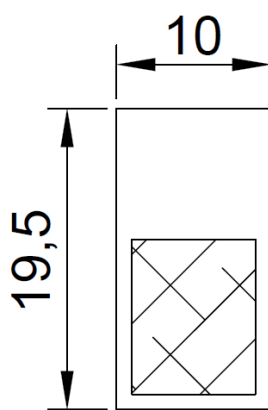


Ground Pad recommend :

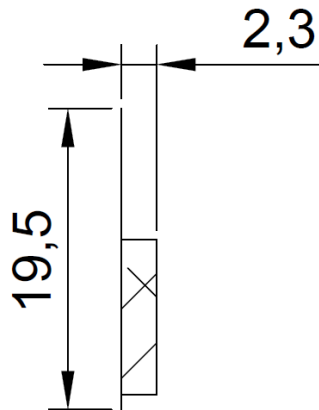


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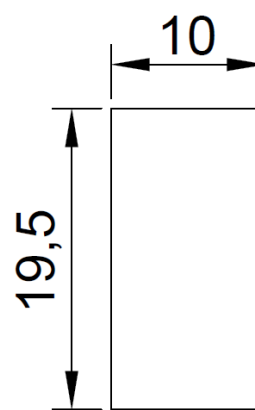
■ VIEW



Top View



Side View



Bottom View

禁

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7. Pin Assignment

Pin	Name	Type	Remark	Pin	Name	Type	Remark
1	P0.04 AIN2	Digital I/O Analog input		19	P0.21 nRESET	Digital I/O	
2	P0.03 AIN1	Digital I/O Analog input		20	P0.20 TRACECLK	Digital I/O	
3	P0.02 AIN0	Digital I/O Analog input		21	P0.19	Digital I/O	
4	P0.00 XL1	Digital I/O Analog input		22	P0.18 TRACEDATA[0] / SWO	Digital I/O	
5	P0.01 XL2	Digital I/O Analog		23	P0.17	Digital I/O	

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		input					
6	P0.31 AIN7	Digital I/O Analog input		24	P0.16 TRACEDATA[1]	Digital I/O	
7	P0.30 AIN6	Digital I/O Analog input		25	P0.15 TRACEDATA[2]	Digital I/O	
8	P0.29 AIN5	Digital I/O Analog input		26	P0.14 TRACEDATA[3]	Digital I/O	
9	P0.28 AIN4	Digital I/O Analog input		27	P0.13	Digital I/O	
10	P0.27	Digital I/O		28	VDD	VDD	
11	P0.26	Digital I/O		29	P0.11	Digital I/O	
12	P0.25	Digital I/O		30	P0.12	Digital I/O	

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13	GND	GND		31	NFC2 P0.10	NFC input Digital I/O	
14	GND	GND		32	NFC1 P0.09	NFC input Digital I/O	
15	EXT. ANT.	RF		33	P0.08	Digital I/O	
16	GND	GND		34	P0.07	Digital I/O	
17	SWDIO	Digital I/O		35	P0.06	Digital I/O	
18	SWDCLK	Digital input		36	P0.05 AIN3	Digital I/O Analog input	

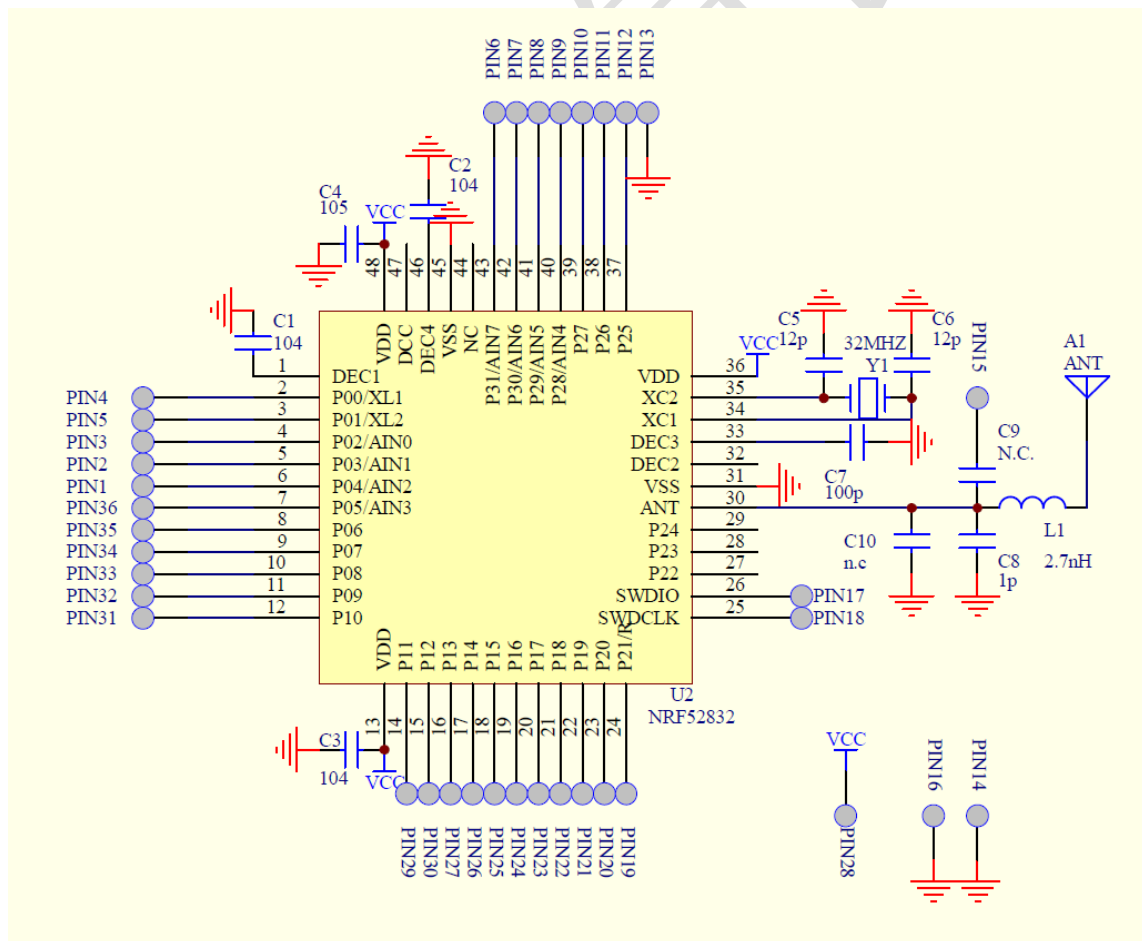


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8. Absolute maximum ratings

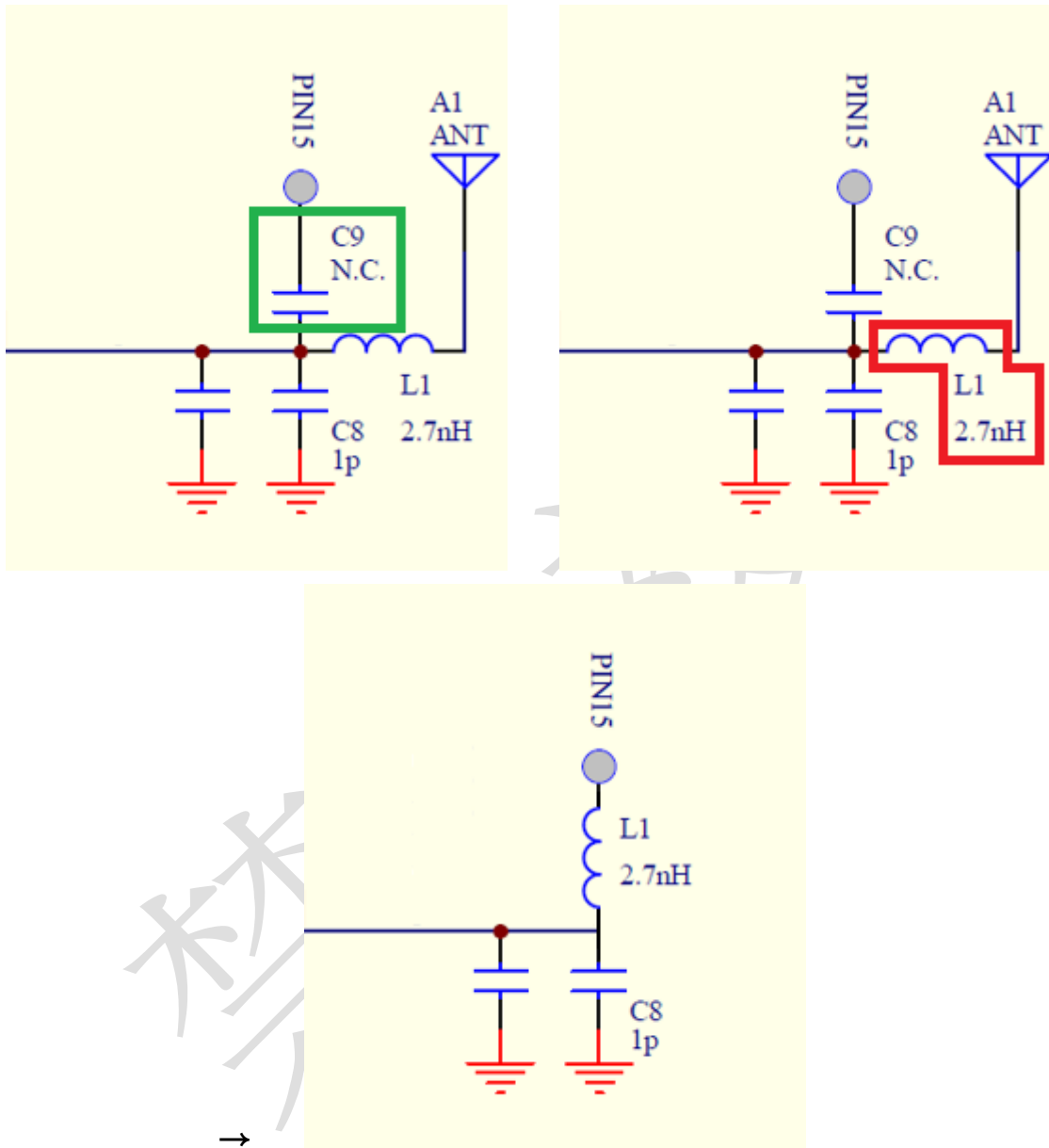
	Min.	Max.	Unit
Supply voltages			
VDD	-0.3	+3.9	V
VSS		0	V
I/O pin voltage			
V _{I/O} , VDD ≤ 3.6 V	-0.3	VDD + 0.3 V	V
V _{I/O} , VDD > 3.6 V	-0.3	3.9 V	V
NFC antenna pin current			
I _{NFC1/2}		80	mA
Radio			
RF input level		10	dBm

9. BLE Schematic



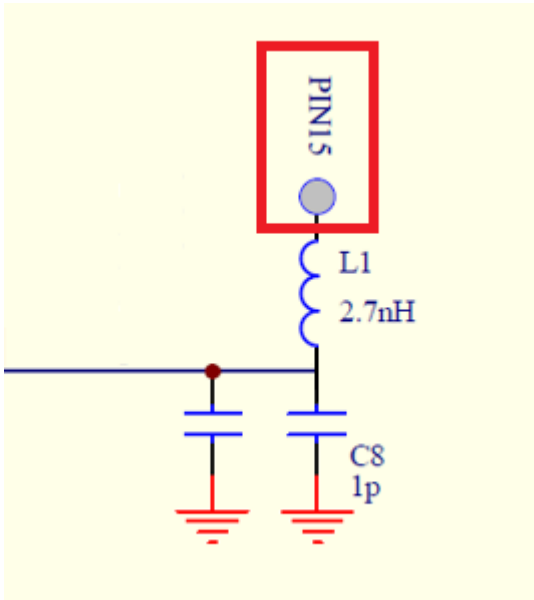
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10. External antenna



1. Please remove the capacitor of C9.
2. Please move the inductor of L1 to the capacitor of C9.

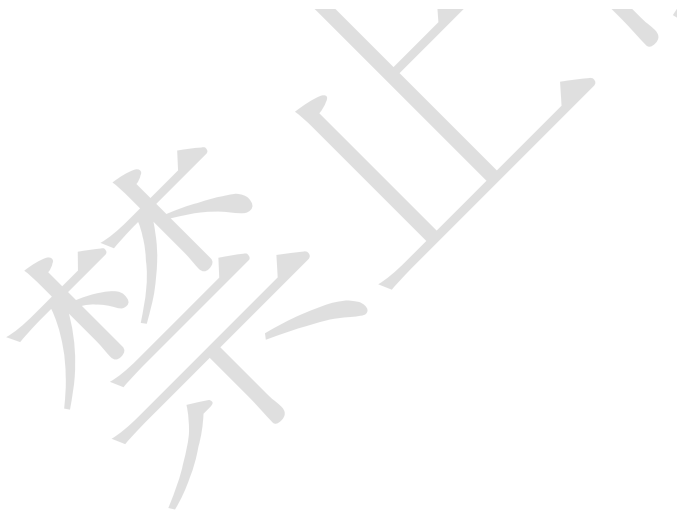
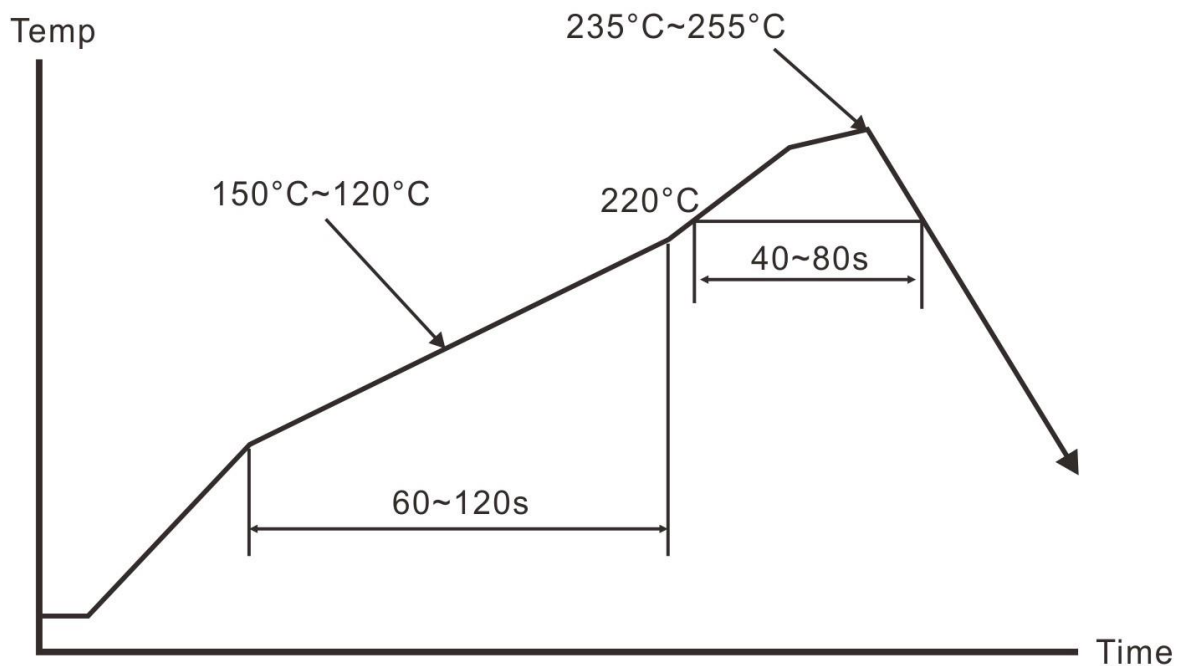
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3. Please use the 'Ipex' connector connect to the external antenna through Pin15.

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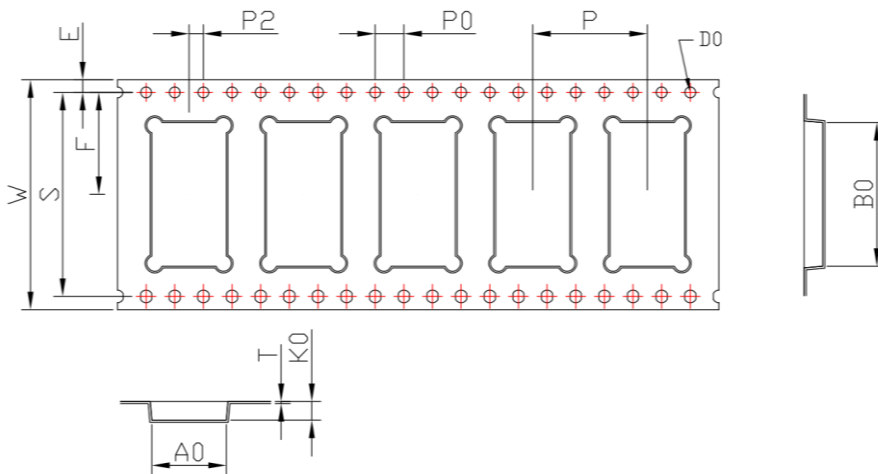
11. Recommended reflow profile



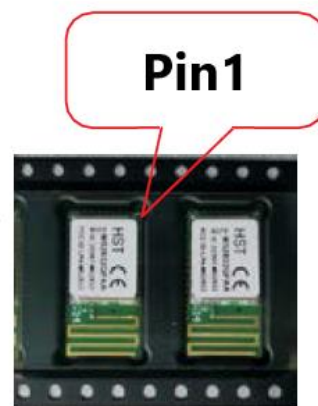
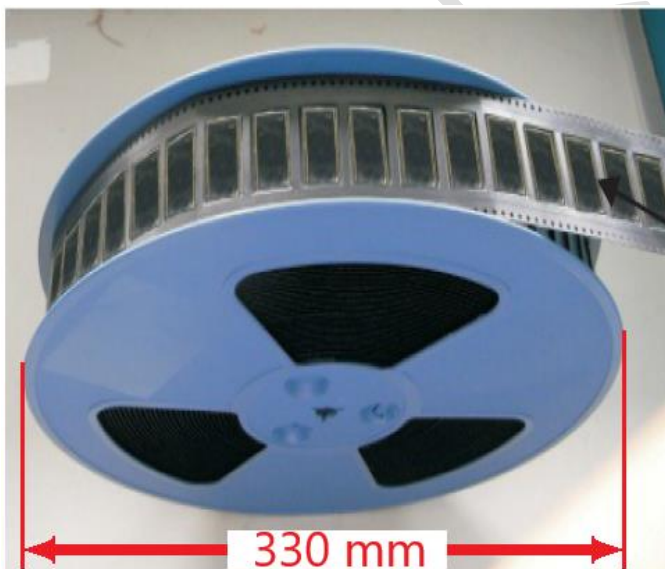
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12. Packaging

- Carrier tape dimensions



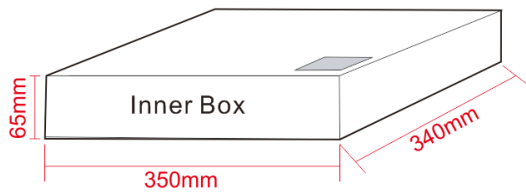
W	32.00±0.30	E	1.75±0.10	P2	2.00±0.10	P0	4.00±0.10	P	16.00±0.10	B0	20.00±0.10
S	28.40±0.10	F	14.20±0.10	A0	10.40±0.10	D0	∅1.50 ^{+0.10} ₀	T	0.30±0.05	K0	2.60±0.10



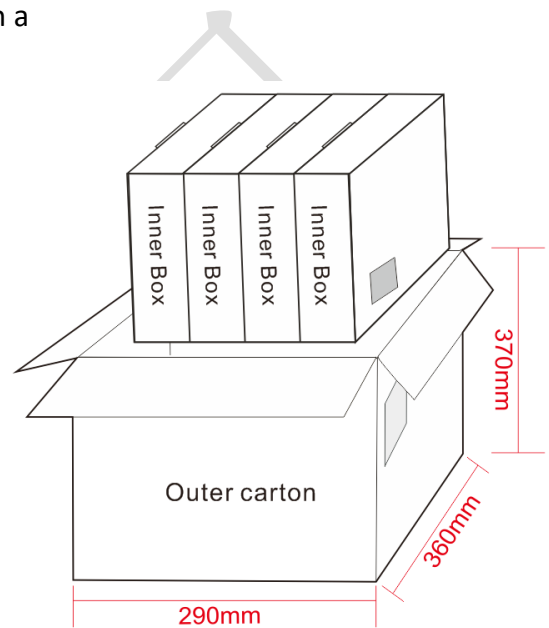
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● Reel packaging

- ※ Φ 330mm reels loaded with 1000 modules.
- ※ MPQ : 1000 pcs modules.
- ※ Each tape reel (with a antistatic bag) is placed in a



- ※ Gross weight : approx. 1.098 kg
- Modules : 1000 pcs.



- ※ Gross weight : approx. 5.028 kg
- Modules : 4 x1000 pcs.

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13. Bluetooth QD ID matrix

Model No.	SoftDevice	QD ID
M52832QFAA	BLE : S132 v3.0.x	94359
M52832QFAB	BLE : S132 v3.0.x	94359

QDL Bluetooth® qualified design listing

The Bluetooth SIG Hereby Recognizes

Hardware and Software Technology Co., Ltd.

Member Company

nRF52832QFAA BLE Module / nRF52832QFAB BLE Module

Qualified Design Name

Declaration ID: D034504

Qualified Design ID: 94359

Specification Name: 4.2

Project Type: End Product

Model Number: M52832QFAA / M52832QFAB

Listing Date: 08 March 2017

Hardware Version Number:

Assessment Date: 08 March 2017

Software Version Number:

This certificate acknowledges the *Bluetooth*® Specifications declared by the member are achieved in accordance with the Bluetooth Qualification Process as specified within the Bluetooth Specifications and as required within the current PRD



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BLE 5.3

Declaration Details

Listing Details

Declaration ID	D060224
Referenced Qualified Designs	
Company	Nordic Semiconductor ASA
Membership Status	Active Member Learn More
Listing Date	2022-06-28
Specification Name	5.3
Wi-Fi Certification ID	
Reference Integration Notes (RIN)	Download

Product List

Product Name	Product Website	Product Category	Publish Date	Archive Date	Model Number	Subset ID	Description
nRF Connect SDK Host Subsystem	www.nordicsemi.com	Software	2022-06-28		Host Subsystem for 2.0.0		Host Subsystem with support for indicated features in GAP, GATT, show more

Qualified Design:

QDID	187856
TCRL Version	TCRL 2021-2
Product Type	Host Subsystem
Combined Designs	
Design Name	nRF Connect SDK Host Subsystem
Design Model Number	Host Subsystem for 2.0.0
Design Description	Host Subsystem with support for indicated features in GAP, GATT, ATT, L2CAP, HCI and SM. Future releases as 2.0.x may share the same ICS selections and QDID. Check www.nordicsemi.com/Software-and-tools/Software/nRF-Connect-SDK for further information and applicability.
Hardware Version Number	n/a
Software Version Number	2.0.0
Core Specification	5.3
Other References	



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14.FCC Certificate (USA)

TCB

GRANT OF EQUIPMENT
AUTHORIZATION

TCB

Certification
Issued Under the Authority of the
Federal Communications Commission
By:

Timco Engineering, Inc.
849 NW State Road 45
P.O. Box 370,
Newberry, FL 32669

Date of Grant: 04/25/2017
Application Dated: 04/24/2017

Hardware & Software Technology Co Ltd
5F-1, No. 128, Jilin Rd., Luchu,
Taoyuan, 33850
Taiwan

Attention: Jones Chen

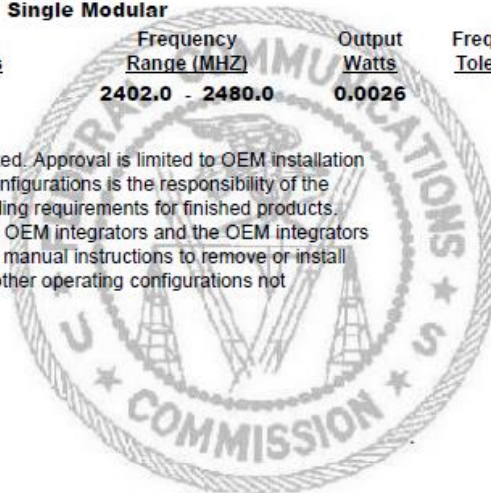
NOT TRANSFERABLE

EQUIPMENT AUTHORIZATION is hereby issued to the named GRANTEE, and is VALID ONLY for the equipment identified hereon for use under the Commission's Rules and Regulations listed below.

FCC IDENTIFIER: LP4-M52832
Name of Grantee: Hardware & Software Technology Co Ltd
Equipment Class: Digital Transmission System
Notes: BLE module
Modular Type: Single Modular

<u>Grant Notes</u>	<u>FCC Rule Parts</u>	<u>Frequency Range (MHZ)</u>	<u>Output Watts</u>	<u>Frequency Tolerance</u>	<u>Emission Designator</u>
	15C	2402.0 - 2480.0	0.0026		

Single Modular Approval. Power listed is conducted. Approval is limited to OEM installation only. Compliance of this device in all final host configurations is the responsibility of the Grantee. OEM integrators must be provided labeling requirements for finished products. This grant is valid only when the device is sold to OEM integrators and the OEM integrators are instructed to ensure that the end user has no manual instructions to remove or install the device. Separate approval is required for all other operating configurations not specifically referenced in the original filing.



33850 桃園市蘆竹區吉林路 128 號 5 樓

5F, No.128, Ji Lin Rd., Lu-Chu Dist., 33850 Taoyuan City, Taiwan

TEL : 886-3-3526894

FAX : 886-3-3521384

Website : <http://www.hstnet.com.tw>

E-mail : sales@hstnet.com.tw

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15.IC Certificate (Canada)

TIMCO ENGINEERING INC.

849 NW State Road 45
Newberry, Florida 32669
<http://www.timcoengr.com>
888.472.2424 F 352.472.2030 email: cb@timcoengr.com

4/26/2017

Our File: 597IC17
Radio Cert. No.: IC: 22267-M52832

HARDWARE & SOFTWARE TECHNOLOGY CO., LTD.
No.5F-1, No. 128, Jilin Rd., Luchu,
Taoyuan, 33850, Taiwan

Attention: Jones Chen

Dear Sir/Madame:

I have reviewed the test report and related documents, and am pleased to advise that this device meets our procedural and specification requirements for certification. The field offices have been notified.

The assigned certification number and the model number must be shown on each equipment model. This certification identification information may be shown on the equipment model identification plate or on a separate label that shall be indelible and tamper proof. The certification number shall be prefixed with the letters "IC." Radio equipment is certified as described on the attached certification certificate.

Certificate(s) are attached for the following HVIN/ model(s):
M52832QFAA

Please feel free to contact us if you have any questions or comments.

Sincerely,

Timco Engineering Inc.

Canadian Certification

\\timco-file\tesys2\TimcoOffice\Templates\Form\IC_Certification_Letter.docx ver. 161024

33850 桃園市蘆竹區吉林路 128 號 5 樓

5F, No.128, Ji Lin Rd., Lu-Chu Dist., 33850 Taoyuan City, Taiwan

TEL : 886-3-3526894

FAX : 886-3-3521384

Website : <http://www.hstnet.com.tw>

E-mail : sales@hstnet.com.tw

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- CE Statement (RED)

RED Regulation:

In all cases assessment of the final product must be met against the Essential requirements of the RE Directive Articles 3.1(a) and (b), safety and EMC respectively, as well as any relevant Article 3.3 requirements.

1. The PCB antenna (gain: -4 dBi) was verified in the conformity testing, and for compliance the antenna shall not be modified. A separate approval is required for all other operating configurations, including different antenna configurations.
2. If any other simultaneous transmission radio is installed in the host platform together with this module, or above restrictions cannot be kept, a separate RF exposure assessment and CE equipment certification is required.

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Declaration of Conformity

Hereby, HARDWARE & SOFTWARE TECHNOLOGY declares that the radio equipment type nRF52832QFAA BLE Module is in compliance with Directive 2014/53/EU.

The full text of the EU declaration of conformity is available at the following internet address:

<https://hstnet.com.tw/zh-TW/products/31/33/34>



Waste Electrical and Electronic Equipment (WEEE)

This symbol means that according to local laws and regulations your product and/or its battery shall be disposed of separately from household waste. When this product reaches its end of life, take it to a collection point designated by local authorities. Proper recycling of your product will protect human health and the environment.

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- **FCC IC OEM integration manual**

Manual Information to the End User

The OEM integrator has to be aware not to provide information to the end user regarding how to install or remove this RF module in the user' s manual of the end product which integrates this module. The end user manual shall include all required regulatory information/warning as show in this manual.

Federal Communication Commission Interference Statement

This device complies with Part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful

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interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Any changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate this

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equipment.

This transmitter must not be co-located or operating in conjunction with any other antenna or transmitter.

Industry Canada Statement

This device complies with Industry Canada's licence-exempt RSSs.

Operation is subject to the following two conditions:

- (1) This device may not cause interference; and
- (2) This device must accept any interference, including interference that may cause undesired operation of the device.

Le présent appareil est conforme aux CNR d'Industrie Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes:

- (1) l'appareil ne doit pas produire de brouillage, et

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(2) l'utilisateur de l'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement."

CAN ICES-3(B)/ NMB-3(B)

End Product Labeling

When the module is installed in the host device, the FCC/IC ID label must be visible through a window on the final device or it must be visible when an access panel, door or cover is easily re-moved. If not, a second label must be placed on the outside of the final device that contains the following text:

"Contains FCC ID: LP4-M52832"

"Contains IC: 22267-M52832 "

The grantee's FCC ID/IC ID can be used only when all FCC/IC compliance

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requirements are met.

This device is intended only for OEM integrators under the following conditions:

- (1) The transmitter module may not be co-located with any other transmitter or antenna.
- (2) The PCB antenna with -4 dBi gain was verified in the conformity testing. Radiated transmit power must be equal to or lower than that specified in the FCC/IC Grant of Equipment Authorization for FCC ID: LP4-M52832 and IC: 22267-M52832. A separate approval is required for all other antenna type, or higher gain antenna.

In the event that these conditions cannot be met (for example certain laptop configurations or co-location with another transmitter), then the FCC/IC authorization is no longer considered valid and the FCC ID/IC ID cannot be used on the final product. In these circumstances, the OEM

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	M52832QFAA		
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integrator will be responsible for re-evaluating the end product (including the transmitter) and obtaining a separate FCC/IC authorization.

For FCC Part 15.31 (h) and (k): The host manufacturer is responsible for additional testing to verify compliance as a composite system. When testing the host device for compliance with Part 15 Subpart B, the host manufacturer is required to show compliance with Part 15 Subpart B while the transmitter module(s) are installed and operating. The modules should be transmitting and the evaluation should confirm that the module's intentional emissions are compliant (i.e. fundamental and out of band emissions). The host manufacturer must verify that there are no additional unintentional emissions other than what is permitted in Part 15 Subpart B or emissions are complaint with the transmitter(s) rule(s).

If the Host Manufacturer needs assistance in obtaining compliance to Part 15 Subpart B requirements, we will provide guidance.

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16.NCC Certificatie

耕興股份有限公司

電信管制射頻器材型式認證證明

證照字號：型式字第 AF 號

一、申請者：貝倫企業股份有限公司
 二、地址：桃園市蘆竹區吉林路128號5樓之1
 三、製造廠商：Rayson Technology co., Ltd.
 四、器材名稱：BLE module
 五、廠牌：HST
 六、型號：M52832QFAA
 七、發射功率(電場強度)：詳如備註表格
 八、工作頻率：詳如備註表格
 九、審驗日期：110年4月23日
 十、審驗合格標籤式樣：


十一、警語或標示要求：(器材本體、使用手冊、外包裝盒等應遵守下列標示要求)
 1. 請依上列型號、標籤式樣於電信管制射頻器材本體明顯處標示其型號及審驗合格標籤，並於包裝盒標示主管機關標章。最終產品應於本體明顯處標示非隨插即用射頻模組(組件)之審驗合格標籤及最終產品型號，並於包裝盒標示主管機關標章。
 2. 電信管制射頻器材應依本會或相關技術規範規定於指定位置標示中文警語。
 3. 經授權使用射頻模組(組件)之審驗合格標籤者，應於最終產品說明書及包裝盒提供充分與正確之資訊。
 4. 於網際網路販賣取得審驗證明之電信管制射頻器材者，應於該網際網路網頁提供審驗合格標籤或符合性聲明標籤資訊。
 5. 使用手冊應標示下列資訊：
 (1) 取得審驗證明之低功率射頻器材，非經核准，公司、商號或使用者均不得擅自變更頻率、加大功率或變更原設計之特性及功能。低功率射頻器材之使用不得影響飛航安全及干擾合法通信；經發現有干擾現象時，應立即停用，並改善至無干擾時方得繼續使用。
 前述合法通信，指依電信管理法規定作業之無線電通信。低功率射頻器材須忍受合法通信或工業、科學及醫療用電波輻射性電機設備之干擾。

十二、特殊記載事項：
 1. 經取得審驗證明之電信管制射頻器材，如變更其廠牌、型號、技術規格或射頻性能時，除電信管制射頻器材審驗管理辦法另有規定外，應重新申請審驗。
 2. 經取得審驗證明之審驗證明之電信管制射頻器材或非隨插即用射頻模組(組件)，於電信管制射頻器材相關技術規範修訂審驗相關章節時，應依技術規範明定之實施期限，申請重新審驗辦理，未依規定重新審驗者，原驗證機關(構)得廢止其審驗證明。
 3. 取得型式認證證明、符合性聲明證明或簡易符合性聲明證明者，應妥善保管申請審驗之電信管制射頻器材或非隨插即用射頻模組(組件)、外接電源、配件、外接天線、與檢驗報告或測試報告相符之測試治具及與檢驗報告或測試報告使用相同版本之測試軟體至該器材停止生產或停止輸入後五年。
 4. 取得型式認證證明或符合性聲明證明者得授權他人於同廠牌同型號之電信管制射頻器材或非隨插即用射頻模組(組件)使用審驗合格標籤或符合性聲明標籤，授權他人使用審驗合格標籤或符合性聲明標籤由取得審驗證明者於主管機關指定網站登錄或委託原驗證機關(構)登錄。
 5. 以取得審驗證明之完全射頻模組(組件)組裝成完全最終產品後，取得該完全射頻模組(組件)之審驗證明者，應於該完全最終產品販賣前，檢附標註完全最終產品廠牌、型號及外觀照片之電子檔案並應提供組裝該完全射頻模組(組件)之完全最終產品其內部及電路板4x6吋以上具尺規之至少二面彩色照片，電路板主要元件須清晰可辨識，向原驗證機關(構)登錄。

說明：
 (一) 本公司係經主管機關委託之驗證機構(機構地址：桃園市龜山區華亞一路52號、電話：03-3273456)，核發本型式認證證明。
 (二) 本設備之製造或輸入須遵守電信管理法相關規定。
 (三) 配件：
 充電器廠牌/型號：無此配件
 電池、充電線、配件廠牌/型號：無此配件

備註：
 1. 依「商品標示法」及「電器及電子商品標示基準」規定，標示事項貼於商品或內外包裝上，以竟違法而受處分。
 2. 本器材之審驗範圍僅限無線射頻硬體功能，不及於器材之資通安全檢測。
 3. 本器材電信介面使用天線資訊如下：

廠牌	型號	天線型式	天線增益
HST 貝倫	ANTM52832	Printed	-4.0 dBi

4. 本設備之電信介面符合技術規範及工作頻段資訊如下：

電信介面	技術規範(年份)	章節	工作頻率	功率 or 場強	備註
Bluetooth	LP0002(109 年版)	4.10	2402~2480MHz	0.50 dBm	BT LE GFSK
2.4G	LP0002(109 年版)	4.10	2403~2480MHz	91.46 dBμV/m @3m	GFSK

BW=Bandwidth

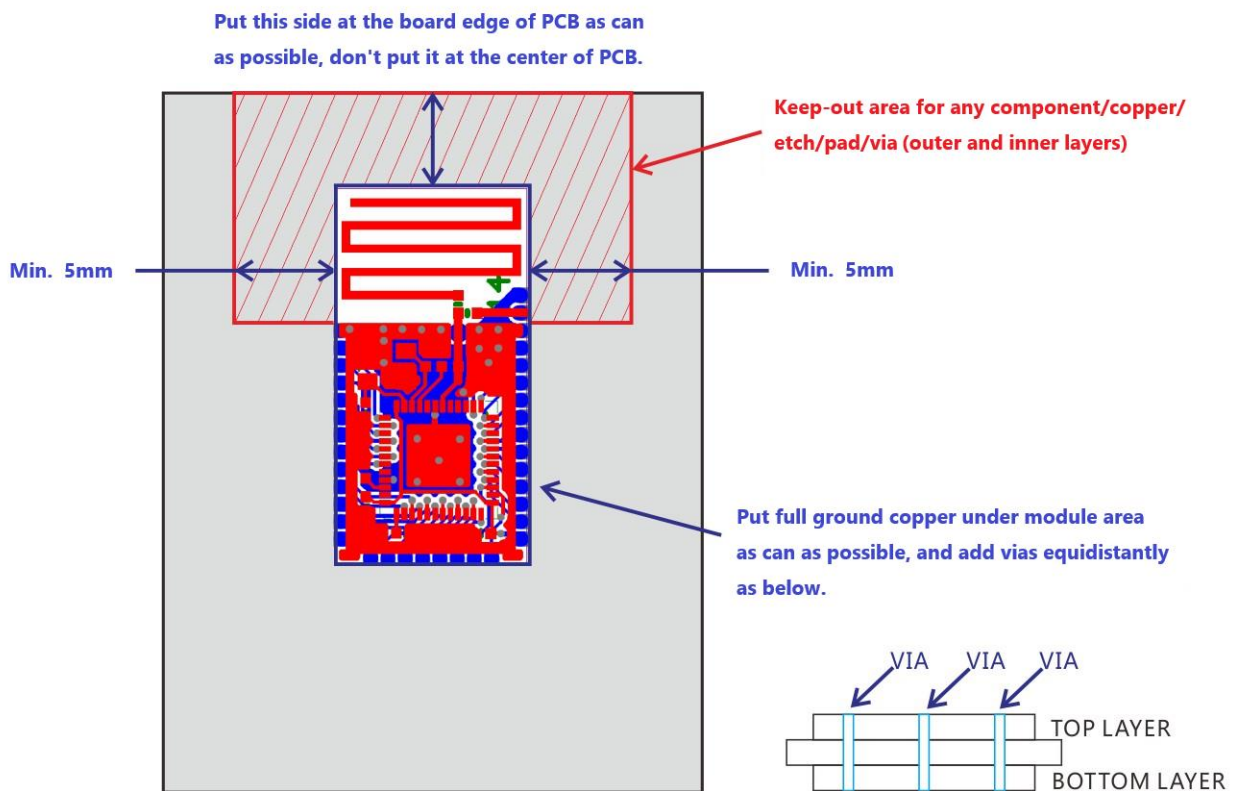
中華民國 1 1 0 年 4 月 2 3 日

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Subject	Product Specification	Rev	2.3
Marketing Name	nRF52832QFAA BLE module		
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17. Layout Guide



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18.RoHS



整機驗證報告

Verification Report

報告編號
Report No.

A2180014413101E
A2180014413101E

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CENTRE TESTING INTERNATIONAL



申請單位
Applicant
地 址
Address

貝倫企業股份有限公司
HARDWARE & SOFTWARE TECHNOLOGY CO., LTD.
33850 桃園市蘆竹區吉林路 128 號 5 樓之 1
5F-1, NO. 128, JILIN RD., LUCHU, TAOYUAN, 33850, TAIWAN

結論 Conclusion

測試樣品 Tested Sample	依據指令 According to directive	結果 Result
提交樣品 Submitted Sample	歐盟 RoHS 指令 2011/65/EU 及其修訂指令 (EU) 2015/863 RoHS Directive 2011/65/EU with amendment (EU) 2015/863	符合 Pass

符合表示檢測結果滿足歐盟 RoHS 指令 2011/65/EU 及其修訂指令 (EU) 2015/863 要求的限值。

Pass means that the results shown on the report comply with the limits set by RoHS Directive 2011/65/EU with amendment (EU) 2015/863.

主 檢
Tested by

邱玲

審 核
Reviewed by

尹一娜

審 批
Approved by

鄭晴濤

日 期
Date

2018.03.16



技術經理 Technical Manager

No.T245872172

貝倫企業股份有限公司
Centre Testing International Group Co., Ltd.

深圳市寶安區新安街道留仙三路 4 號華測檢測大樓
CTI Building, No.4, Liuxian 3rd road, Xin'an Street, Bao'an District, Shenzhen, P. R. China

Subject	Product Specification	Rev	2.3
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19. Bluetooth Antenna Test Report

Voltage Standing Wave Ration

Peak Gain

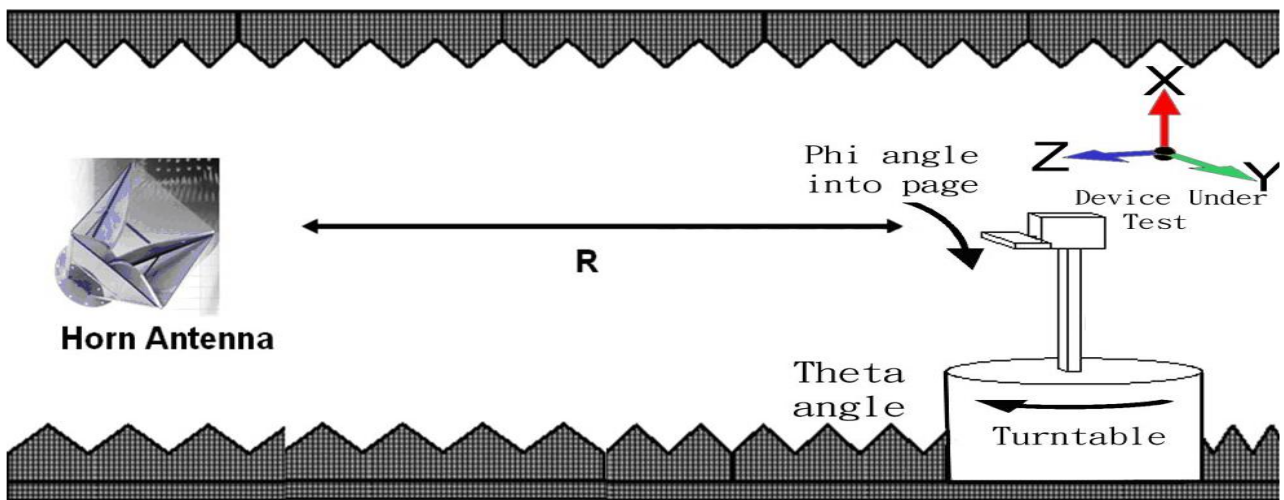
3D

Frequency(MHz)	2400	2450	2500
Peak EIRP (dBm)	0.89	1.94	2.26
Tot. Rad. Pwr. (dBm)	-4.57	-3.9	-4.03
Efficiency (%)	34.94	40.75	39.55
Antenna Gain (dBi)	-4.6	-3.9	-4

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I. Antenna Testing Conditions

Testing set up:



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II. Test results

A. Return Loss (2.4GHz-2.5GHz)



B. VSWR (2.4GHz-2.5GHz)

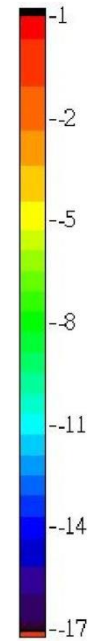
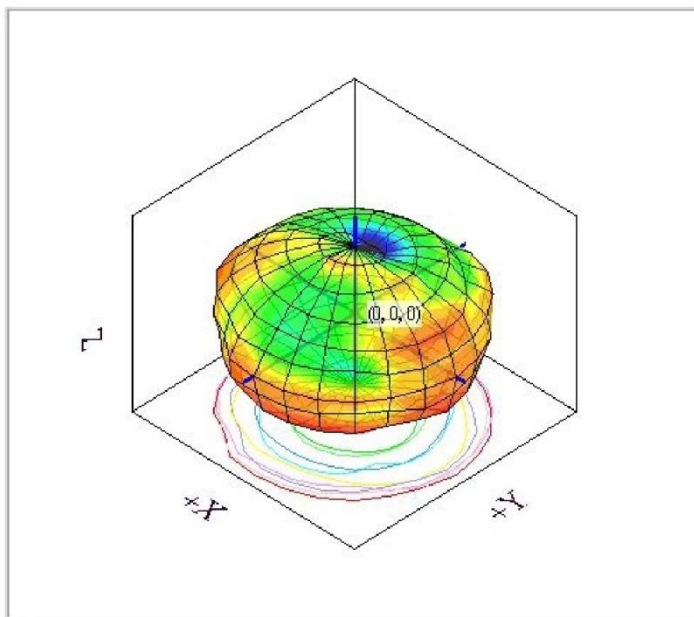


Subject	Product Specification	Rev	2.3
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Description	nRF52832QFAA BLE and 2.4GHz Proprietary multiprotocol module	Page 35	

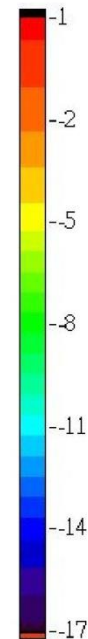
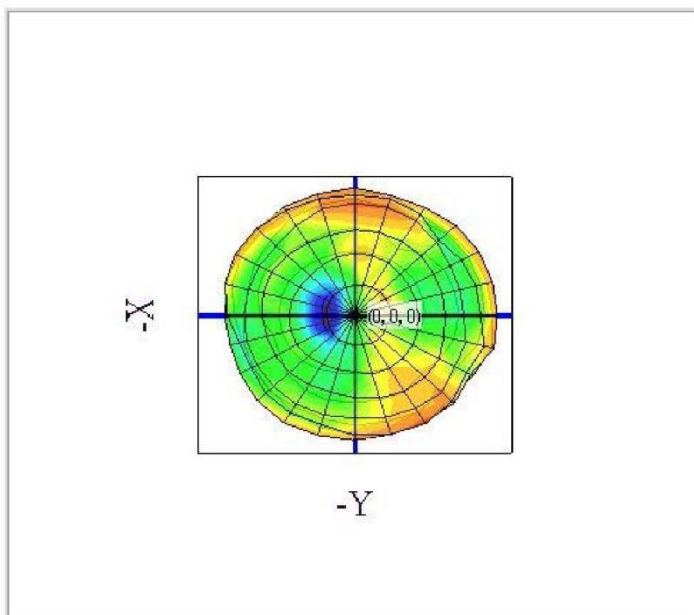
III. Radiation Pattern of 3D

◆ 2400MHz_____

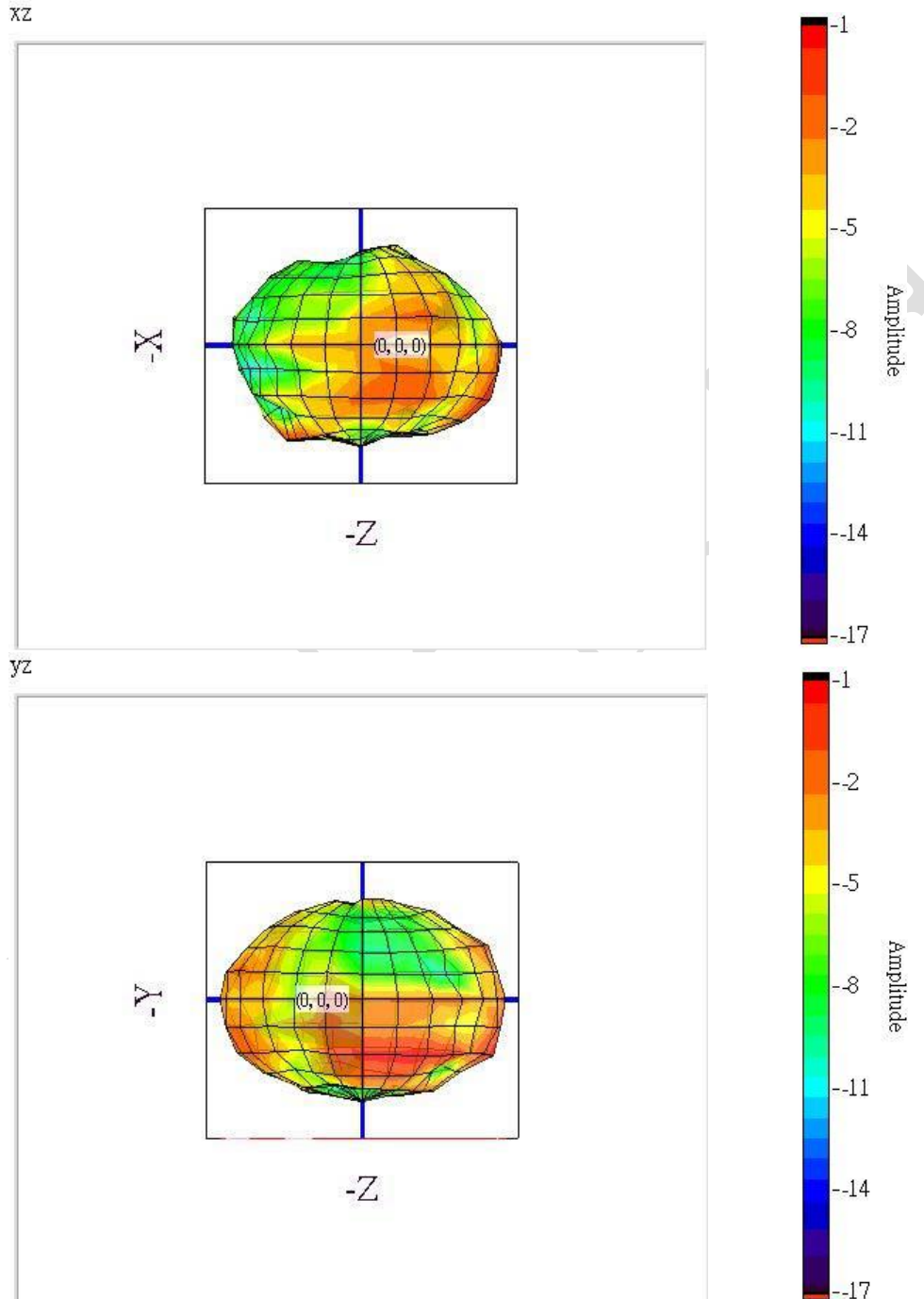
userdefine



xy

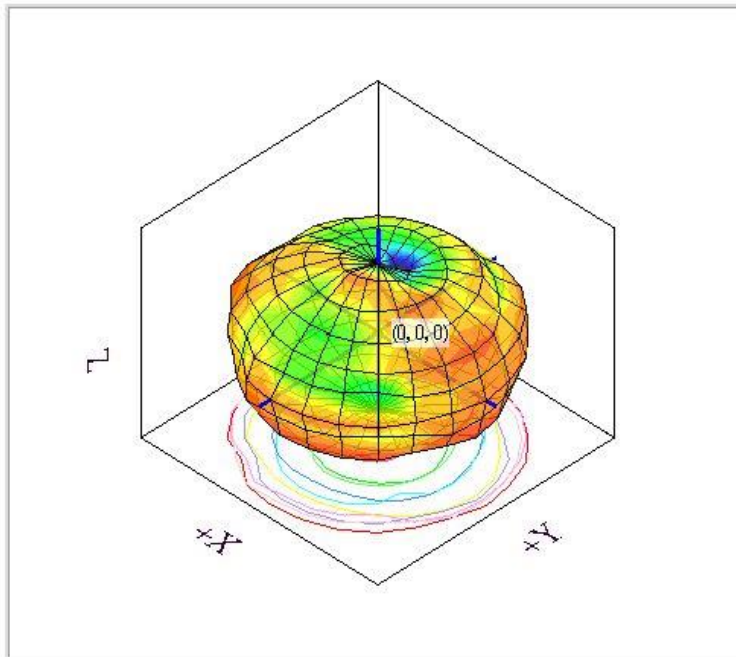


Subject	Product Specification	Rev	2.3
Marketing Name	nRF52832QFAA BLE module		
Name	M52832QFAA		
Description	nRF52832QFAA BLE and 2.4GHz Proprietary multiprotocol module	Page 36	

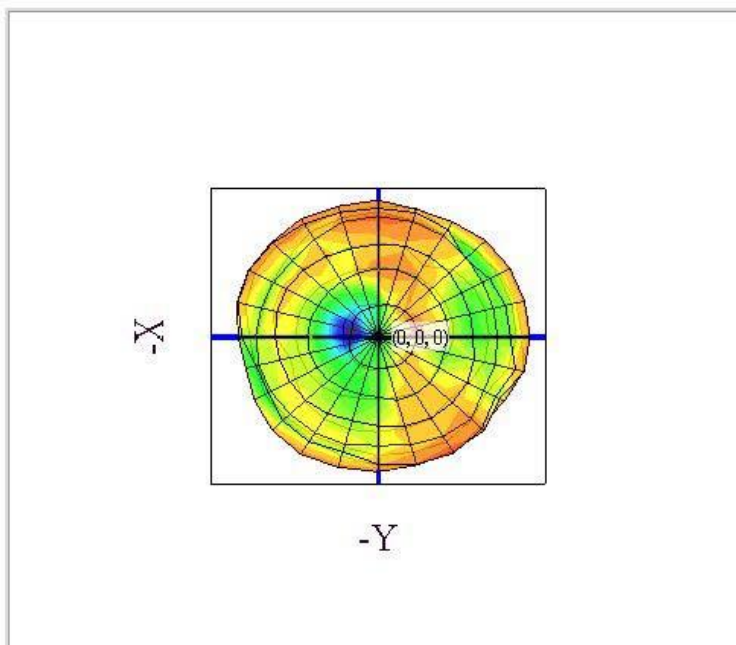


Subject	Product Specification	Rev	2.3
Marketing Name	nRF52832QFAA BLE module		
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userdefine

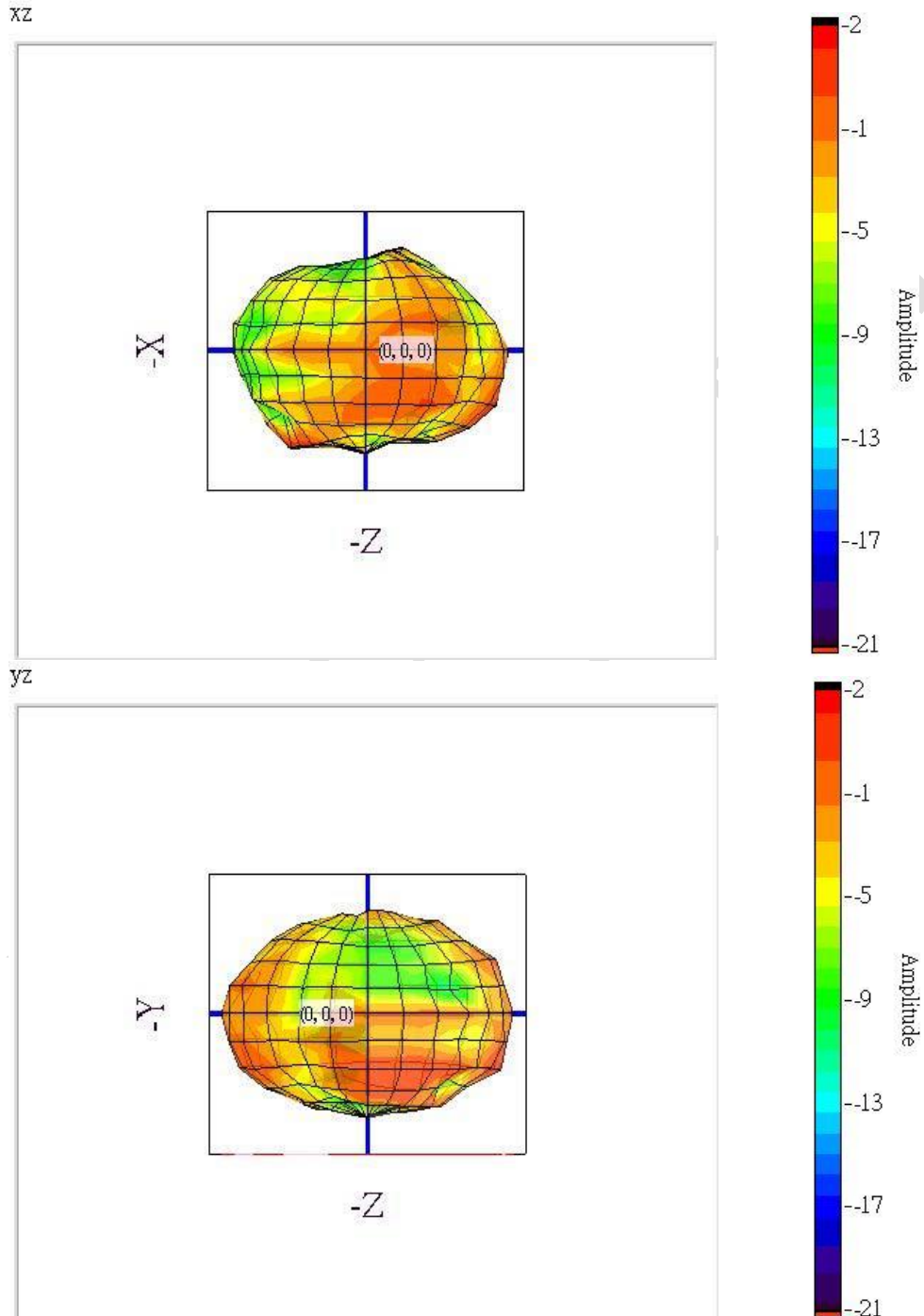


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◆ 2450MHz _____

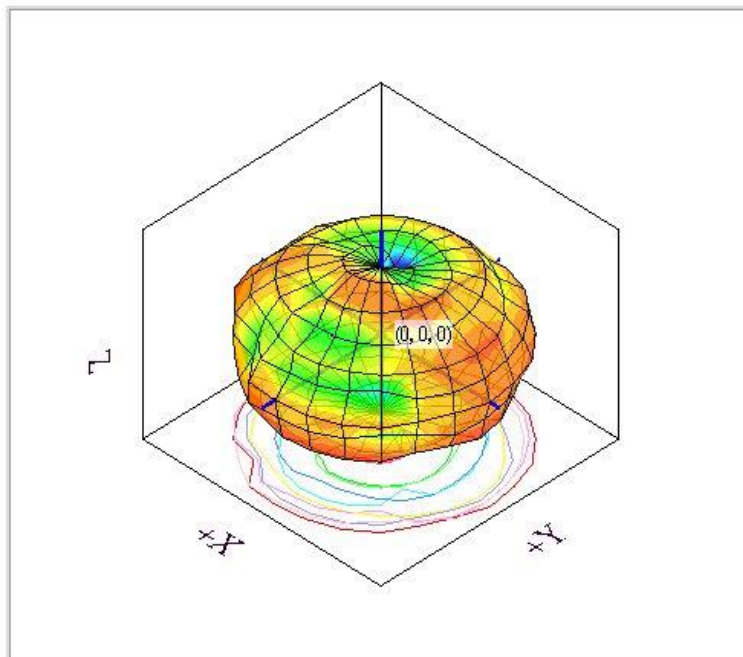
Subject	Product Specification	Rev	2.3
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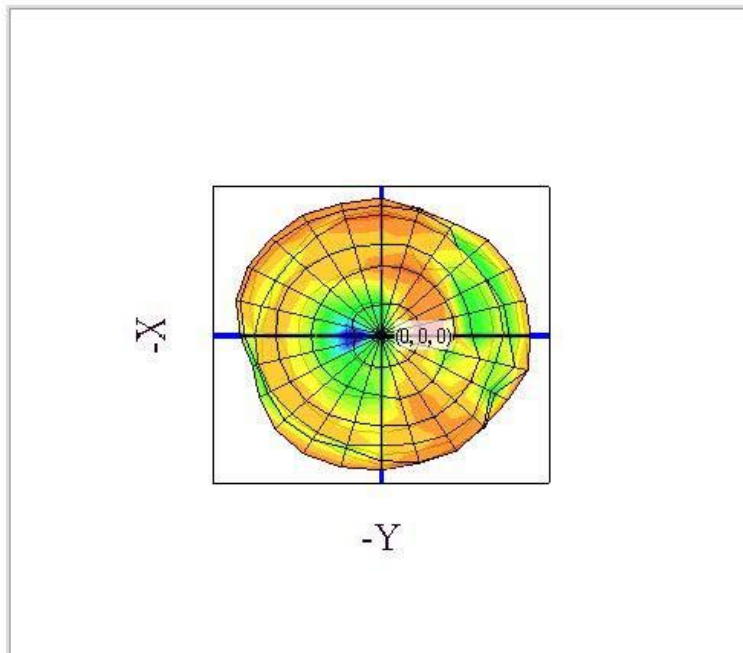
Subject	Product Specification	Rev	2.3
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◆ 2500MHz_____

userdefine

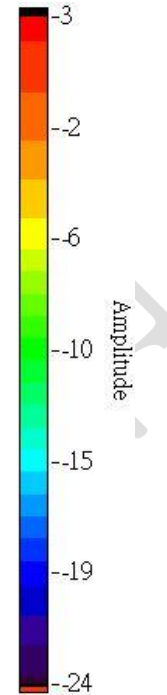
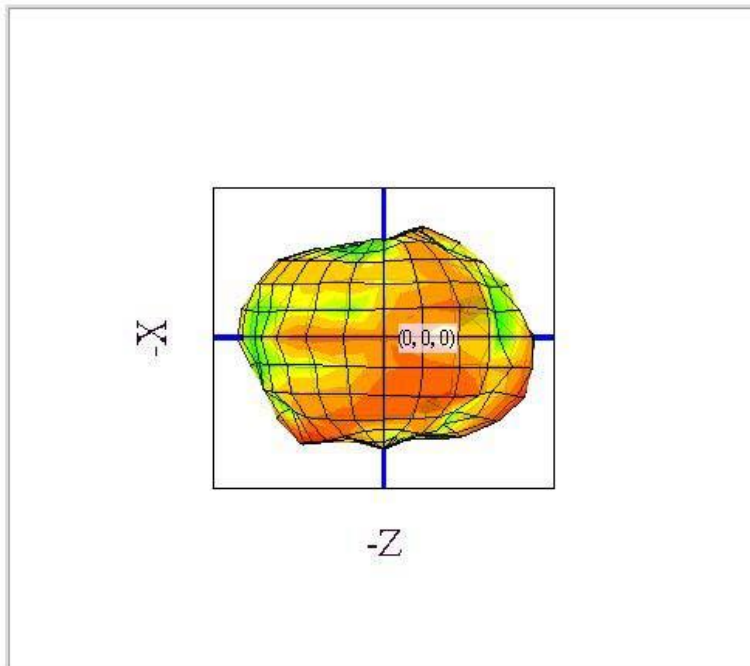


xy



Subject	Product Specification	Rev	2.3
Marketing Name	nRF52832QFAA BLE module		
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