




Informe de ensayo nº:
Test report No:

NIE: 43480REM.001

Test report

FCC Rules and Regulations 47 CFR Chapter I Part 15 Subpart B (10-01-12 Edition);
ICES-003 ISSUE 5 (2012) &
American National standard for Testing Unlicensed Wireless Devices

Identificación del objeto ensayado.....: Identification of item tested	YOTAPHONE2
Marca Trade	YotaPhone
Modelo y/o referencia tipo Model and /or type reference	YD201
Other identification of the product	--
Final HW version	P2
Final SW version	3.9
Características Features	--
Peticionario Applicant	YOTA DEVICES LTD Arch. Makariou & Kalograion, 4, Nicolaides Sea View City, 9 th Floor, Flat/Offices 903-904, Block A-B 6016 Larnaca, Cyprus Jukka Ollila (+35) 840 54 33 264 jollila@yotadevices.com
Método de ensayo solicitado, norma.....: Test method requested, standard	FCC Rules and Regulations 47 CFR Chapter I Part 15 Subpart B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009: American National standard for Testing Unlicensed Wireless Devices.
Resultado.....: Summary	IN COMPLIANCE
Aprobado por (nombre / cargo y firma) Approved by (name / position & signature)	Rafael López EMC LAB Manager 
Fecha de realización Date of issue	2014-10-09
Formato de informe No. Report template No	FDT08_15

Firmado digitalmente
por Rafael López Martín
Fecha: 2014.10.22
14:29:59 +02'00'

Index

Competences and guarantees.....	3
General conditions.....	3
Uncertainty	3
Usage of samples.....	4
Test sample description	4
Test samples supplier	4
Testing period.....	4
Environmental conditions.....	4
Remarks and comments.....	5
Testing verdicts.....	6
Appendix A – Test result.....	7
Appendix B - Photographs	31

Competences and guarantees

AT4 wireless is a testing laboratory accredited by the National Accreditation Body (ENAC - Entidad Nacional de Acreditación), to perform the tests indicated in the Certificate No. 51/LE 147.

This certificate of conformity was issued in accordance with the decision N° 3/2000 of the Joint Committee established under the Agreement on Mutual Recognition between the European Community and the United States of America. By this decision, AT4 wireless can act as Conformity Assessment Body (CAB) on Electromagnetic Compatibility. This Certificate applies to the samples listed at technical reports.

This laboratory is designed by the Federal Communications Commission (ES0004)

AT4 wireless is a testing laboratory competent to carry out the tests described in this report.

In order to assure the traceability to other national and international laboratories, AT4 wireless has a calibration and maintenance program for its measurement equipment.

AT4 wireless guarantees the reliability of the data presented in this report, which is the result of the measurements and the tests performed to the item under test on the date and under the conditions stated on the report and, it is based on the knowledge and technical facilities available at AT4 wireless at the time of performance of the test.

AT4 wireless is liable to the client for the maintenance of the confidentiality of all information related to the item under test and the results of the test.

The results presented in this Test Report apply only to the particular item under test established in this document.

IMPORTANT: No parts of this report may be reproduced or quoted out of context, in any form or by any means, except in full, without the previous written permission of AT4 wireless.

General conditions

1. This report is only referred to the item that has undergone the test.
2. This report does not constitute or imply on its own an approval of the product by the Certification Bodies or competent Authorities.
3. This document is only valid if complete; no partial reproduction can be made without previous written permission of AT4 wireless.
4. This test report cannot be used partially or in full for publicity and/or promotional purposes without previous written permission of AT4 wireless and the Accreditation Bodies.

Uncertainty

Uncertainty (factor $k=2$) was calculated according to the AT4 wireless internal document PODT000.

Usage of samples

Samples under test have been selected by: The client.

Sample S/01 is composed of the following elements:

Control N°	Description	Model	Serial N°	Date of reception
43116/29	Mobile Phone	--	--	2014-07-11
43116/03	AC/DC Adapter	--	--	2014-07-08
43116/17	USB Cable	--	--	2014-07-09
43116/06	Headset	--	441	2014-07-08

Sample S/02 is composed of the following elements:

Control N°	Description	Model	Serial N°	Date of reception
43116/29	Mobile Phone	--	--	2014-07-11
43116/40	AC/DC Adapter	--	--	2014-07-30
43116/39	Wireless Charger	--	--	2014-07-30
43116/06	Headset	--	441	2014-07-08

Test sample description

The test sample consists of a smartphone.

Test samples supplier

YOTA DEVICES LTD

Arch. Makariou & Kalograion, 4, Nicolaides Sea

View City, 9th Floor, Flat/Offices 903-904, Block A-B

6016 Larnaca, Cyprus

Jukka Ollila

(+35) 840 54 33 264

jollila@yotadevices.com

Testing period

The performed test started on 2014-08-25 and finished on 2014-08-27.

The tests have been performed at AT4 wireless.

Environmental conditions

In the control chamber, the following limits were not exceeded during the test:

Temperature	Min. = 15 °C Max. = 30 °C
Relative humidity	Min. = 45 % Max. = 60 %
Shielding effectiveness	> 100 dB
Electric insulation	> 10 kΩ
Reference resistance to earth	< 0,5 Ω

In the semianechoic chamber, the following limits were not exceeded during the test.

Temperature	Min. = 15 °C Max. = 30 °C
Relative humidity	Min. = 45 % Max. = 60 %
Air pressure	Min. = 860 mbar Max. = 1060 mbar
Shielding effectiveness	> 100 dB
Electric insulation	> 10 kΩ
Reference resistance to earth	< 0,5 Ω
Normal site attenuation (NSA)	< ±4 dB at 10 m & 3m distance between item under test and receiver antenna, (30 MHz to 1000 MHz)
Site VSWR	< ±6 dB at 3m distance between item under test and receiver antenna, (1 GHz to 18 GHz)
Field homogeneity	More than 75% of illuminated surface is between 0 and 6 dB (26 MHz to 18 GHz).

In the chamber for conducted measurements, the following limits were not exceeded during the test:

Temperature	Min. = 15 °C Max. = 30 °C
Relative humidity	Min. = 45 % Max. = 60 %
Air pressure	Min. = 860 mbar Max. = 1060 mbar
Shielding effectiveness	> 100 dB
Electric insulation	> 10 kΩ
Reference resistance to earth	< 0,5 Ω

Remarks and comments

The tests have been realized by the technical personnel: Pedro Manuel Valenzuela, Fernando Agredano, José Manuel Gómez.

The total uncertainty of the measurement system for the measured radio disturbance characteristics of EUT from 150 kHz to 30 MHz is $I = \pm 3,60$ dB for quasi-peak measurements, $I = \pm 3,48$ dB for peak measurements ($k = 2$).

The total uncertainty of the measurement system for the measured radio disturbance characteristics of EUT from 30 MHz to 1 GHz is $I = \pm 4,57$ dB for quasi-peak measurements, $I = \pm 4,48$ dB for peak measurements ($k = 2$) and from 1 to 12,75 GHz is $I = \pm 3,43$ dB for average and peak measurements.

The total uncertainty of the measurement system for the measured radio disturbance characteristics of EUT from 12,75 GHz to 26 GHz is $I = \pm 4,09$ dB for average and peak measurements.

Testing verdicts (Legend)

Not applicable	N/A
Pass	P
Fail	F
Not measured	N/M

List of equipment used during the test					
CONTROL NUMBER	DESCRIPTION	MANUFACTURER	MODEL	LAST CALIBRATION	NEXT CALIBRATION
1999	EMI Receptor	ROHDE & SCHWARZ	ESIB 26	2013-05-30	2015-05-30
1935	EMI Receptor	ROHDE & SCHWARZ	ESPI 3	2013-12-11	2015-12-11
2932	Bilog Hybrid Antenna	SUNOL	JB6	2014-05-11	2017-05-11
0246	Horn Antenna	HP	11966E	2012-04-27	2015-04-27
1920	Horn Antenna	AGILENT	11966J	2011-09-27	2014-09-27
1658	RF Amplifier	SCHAFFNER	CPA9231A	2013-06-11	2015-06-11
1975	RF Amplifier	MITEQ	JS4	2014-05-22	2016-05-22
3783	RF Amplifier	BONN ELEKTRONIK	BLMA 0118-3A	2013-04-23	2015-05-19
0258	Transient Limiter	HP	119471A	2012-09-19	2014-09-19
1650	Artificial Network	SCHWARZBECK	NNLK - 8121	2013-06-25	2015-06-25
3545	Temperature & Humidity probe	PICO TECHNOLOGY	HUMIDIPROBE	2014-01-21	2015-01-21
3548	Temperature & Humidity probe	PICO TECHNOLOGY	HUMIDIPROBE	2014-01-21	2015-01-21
3556	Temperature & Humidity probe	T & D	TR-72W	2014-01-21	2015-01-21

Appendix A – Test result

APPENDIX A CONTENT:

DESCRIPTION OF THE OPERATION MODES	9
RADIATED EMISSION. ELECTROMAGNETIC FIELD MEASURE.	10
CONTINUOUS CONDUCTED EMISSION ON POWER LEADS	22

DESCRIPTION OF THE OPERATION MODES

The operation modes described in this paragraph constitute a functionality of the sample under test for itself. Every operation mode takes a failure criteria for the immunity test that they were applying to it and a monitoring to guarantee performance of the same ones.

In the following table appears the operation modes used by the samples tested to that it refers the present test report.

OPERATION MODE	DESCRIPTION
OM#01	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)
OM#02	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)
OM#03	EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)
OM#04	EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)

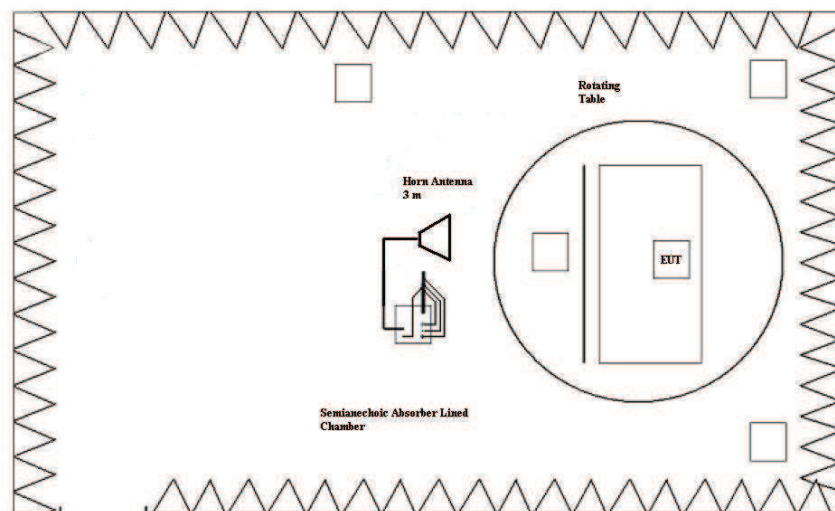
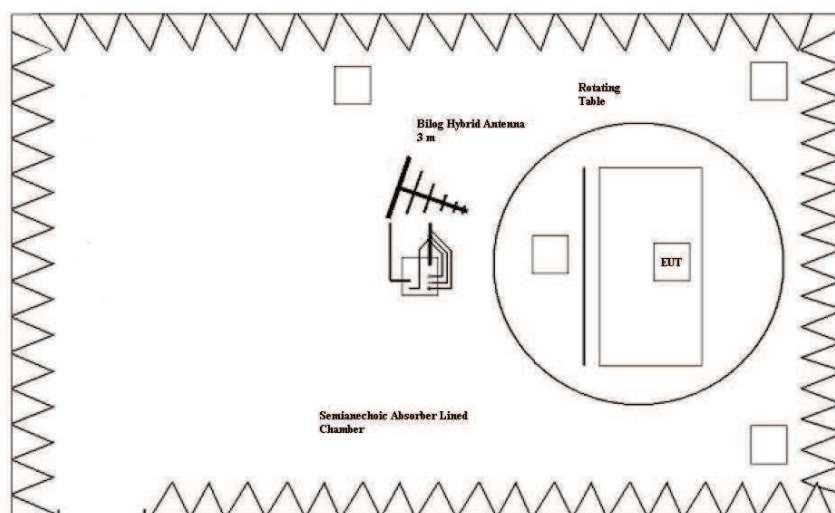
RADIATED EMISSION. ELECTROMAGNETIC FIELD MEASURE.

LIMITS:	Product standard:	FCC RULES AND REGULATIONS 47 CFR PART 15, SUBPART B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009
	Test standard:	FCC RULES AND REGULATIONS 47 CFR PART 15, SUBPART B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009

LIMITS OF INTERFERENCE CLASS B

The applied limit for radiated emissions, 3 m distance, according with the requirements of FCC Rules and Regulations 47 CFR Part 15.109, Subpart B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009 in the frequency range 30 MHz to 26 GHz, for Class B equipment, which is a transmitter in a band over 500 MHz, was:

Frequency range (MHz)	Limit for 3 m ($\mu\text{V/m}$)	Limit for 3 m ($\text{dB}\mu\text{V/m}$)
30 to 88	100	40
88 to 216	150	43,52
216 to 960	200	46,02
Above 960	500	53,98

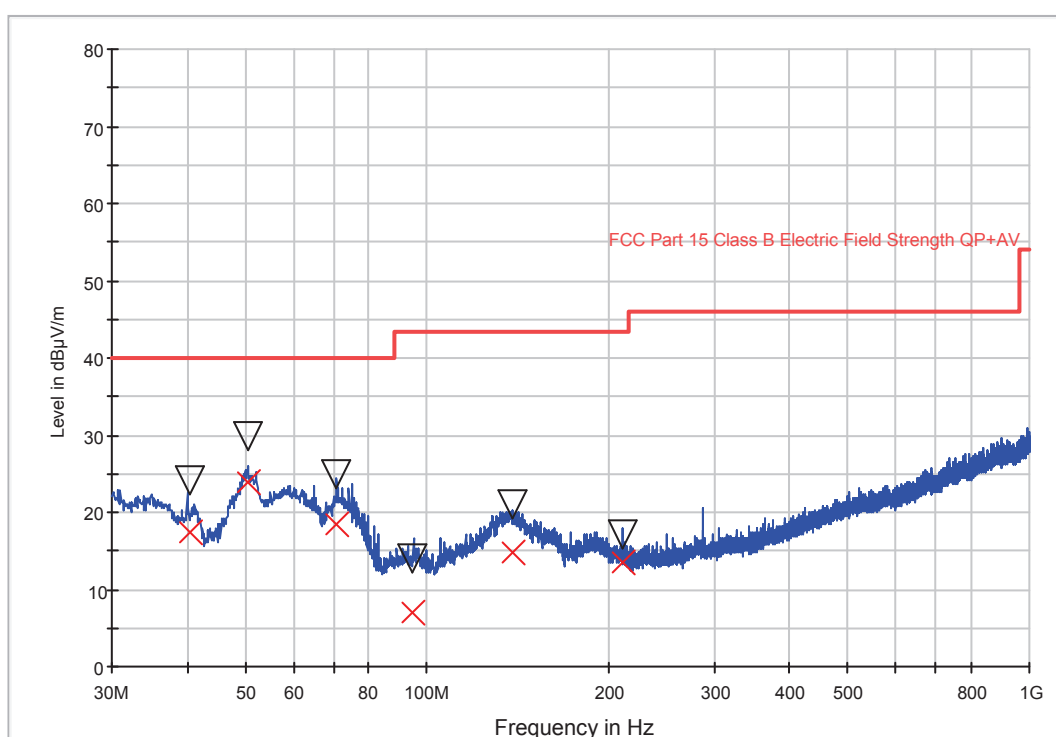


TESTED SAMPLES:	S/01 & S/02	
TESTED OPERATION MODES:	OM#01 & OM#02	
TEST RESULTS :	CRmmnn: CR, Radiation Condition; mm: Sample number; nn: Operation mode, xx: Polarisation.	
CRmmnn	Description	Result
CR0101	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)	P
CR0101_RA1_PH	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)	P
CR0101_RA1_PV	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)	P
CR0101_RA2_PH	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)	P
CR0101_RA2_PV	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter. (Worst case)	P
CR0202	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)	P
CR0202_RA1_PH	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)	P
CR0202_RA1_PV	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)	P
CR0202_RA2_PH	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)	P
CR0202_RA2_PV	EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC. GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary). (Worst Case)	P

Radiated Emission: CR0101 (30MHz to 1GHz)

Project: 43480rem001
Company: YOTA
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case)

FCC class B Bilog Hybrid



— FCC Part 15 Class B Electric Field Strength QP+AV
▽ MaxPeak
— Peak Preview
× QuasiPeak

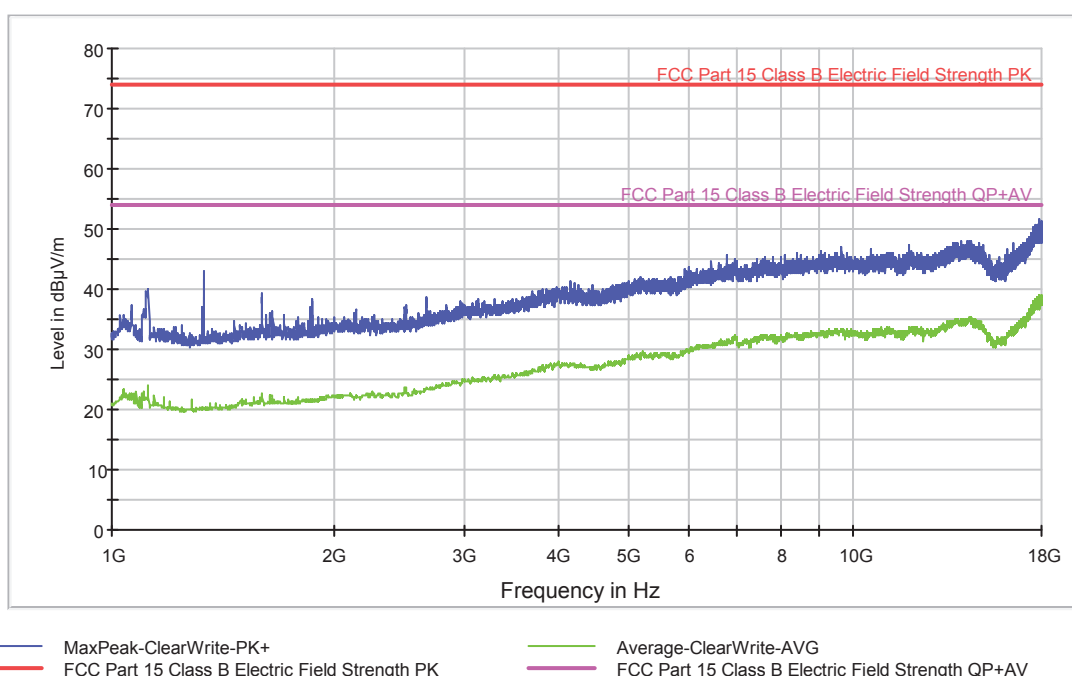
Maximizations

Frequency (MHz)	MaxPeak (dBµV/m)	QuasiPeak (dBµV/m)	Height (cm)	Polarization	Azimuth (deg)
40.313627	24.3	17.4	101.0	V	86.0
50.419038	29.8	24.0	100.0	V	75.0
70.903006	24.8	18.5	120.0	V	145.0
94.620240	14.0	7.0	113.0	V	2.0
138.865531	21.0	14.7	190.0	H	332.0
211.249098	17.2	13.6	120.0	H	355.0

Radiated Emission: CR0101_RA1_PH (1 – 18 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Horizontal Polarization.

FCC 1-18GHz class B ESIB Bocina0245 AMP3783



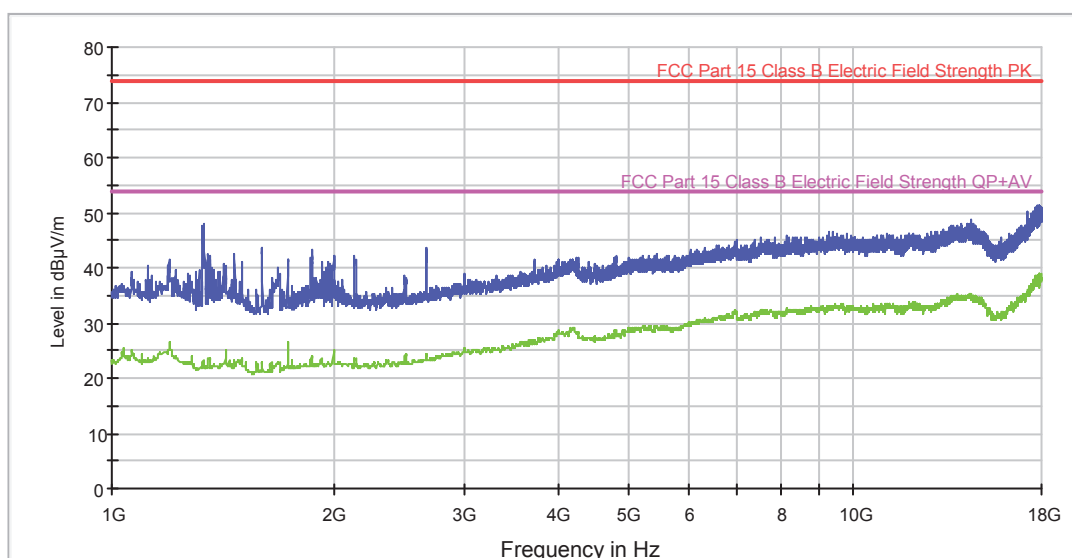
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
1329.000000	43.1	20.3
1596.000000	39.4	22.3
1863.000000	38.2	21.5
2656.000000	38.6	23.7
4173.000000	41.3	27.5
5193.000000	42.0	29.2
6779.000000	45.5	31.2
9679.000000	47.0	33.2
11931.000000	47.3	33.6
17905.000000	51.5	38.8

Radiated Emission: CR0101_RA1_PV (1 – 18 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Vertical Polarization.

FCC 1-18GHz class B ESIB Bocina0245 AMP3783



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

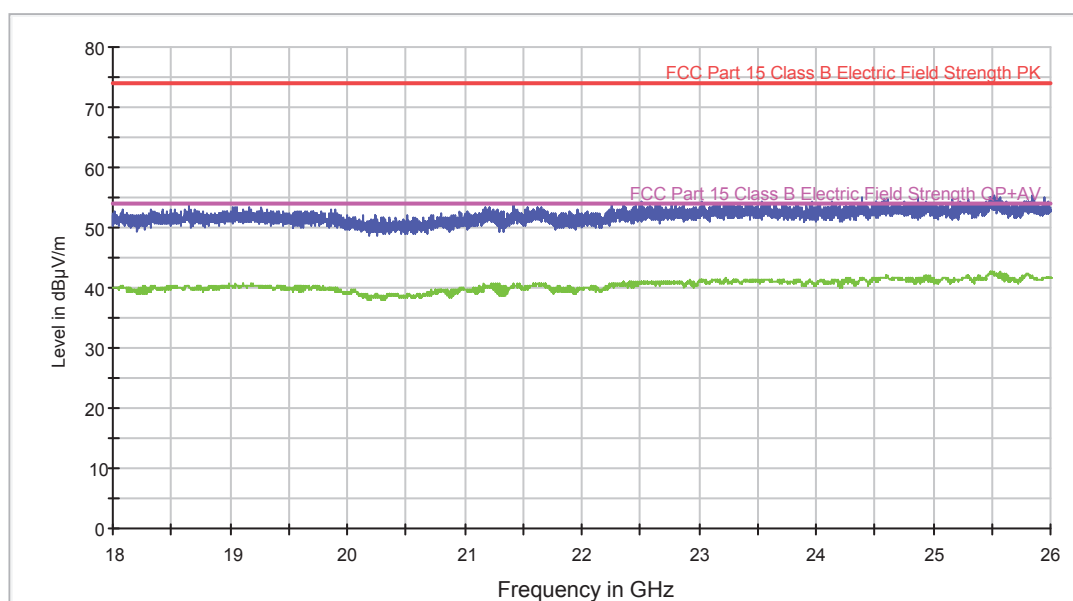
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBµV/m)	Average-ClearWrite (dBµV/m)
1329.000000	47.9	23.1
1599.000000	43.7	22.2
1863.000000	43.4	23.8
2658.000000	43.7	24.4
4011.000000	41.5	28.6
5437.000000	42.7	29.1
7515.000000	45.4	32.0
9322.000000	46.4	33.0
13254.000000	46.7	33.7
17881.000000	51.4	38.4

Radiated Emission: CR0101_RA2_PH (18 – 26 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Horizontal Polarization.

FCC 18-26GHz class B ESIB Bocina1920 AMP1975



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

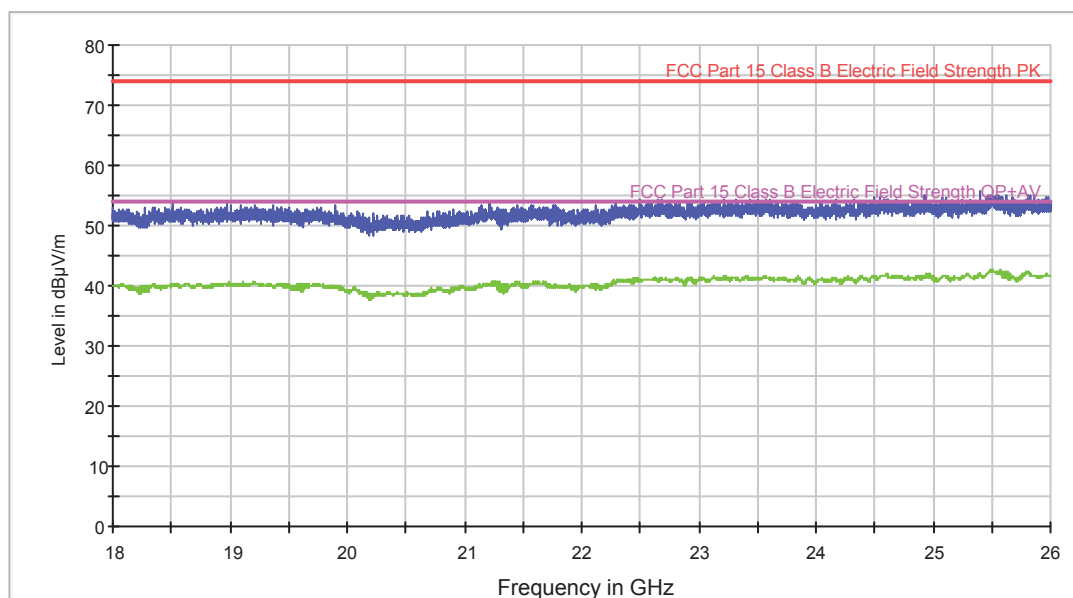
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
18656.000000	53.7	40.1
19273.000000	53.4	40.3
19856.000000	53.1	39.7
20796.000000	52.4	39.6
21415.000000	53.9	40.2
22255.000000	54.1	40.6
23029.000000	54.3	41.1
23545.000000	54.2	41.2
24875.000000	55.1	41.3
25524.000000	55.2	42.5

Radiated Emission: CR0101_RA2_PV (18 -26 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Vertical Polarization.

FCC 18-26GHz class B ESIB Bocina1920 AMP1975



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

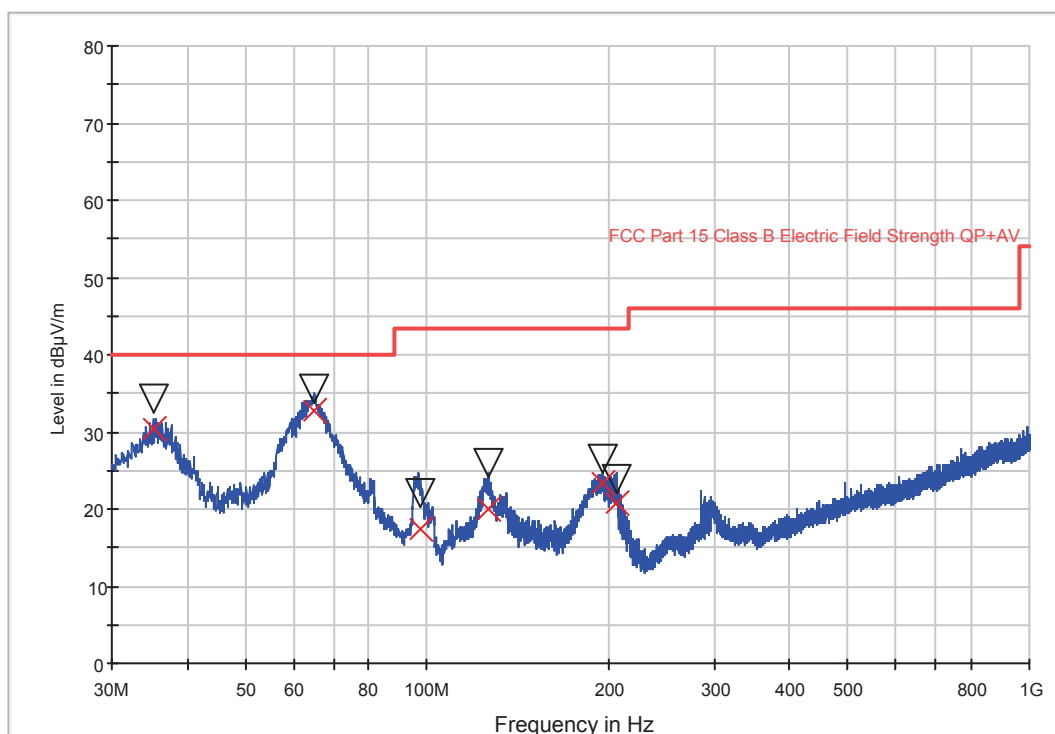
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBµV/m)	Average-ClearWrite (dBµV/m)
18505.000000	53.7	40.1
18971.000000	53.6	40.4
19896.000000	53.3	39.8
20791.000000	52.3	39.4
21215.000000	53.9	40.3
22285.000000	53.6	40.6
23207.000000	54.5	41.1
23443.000000	54.3	41.1
24940.000000	54.9	41.6
25398.000000	55.5	42.0

Radiated Emission: CR0202 (30MHz to 1GHz)

Project: 43480rem001
 Company: YOTA
 Sample: S/02
 Operation mode: OM#02
 Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
 GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
 (Worst Case)

FCC class B Bilog Hybrid



▽ FCC Part 15 Class B Electric Field Strength QP+AV
 MaxPeak

× Peak Preview
 QuasiPeak

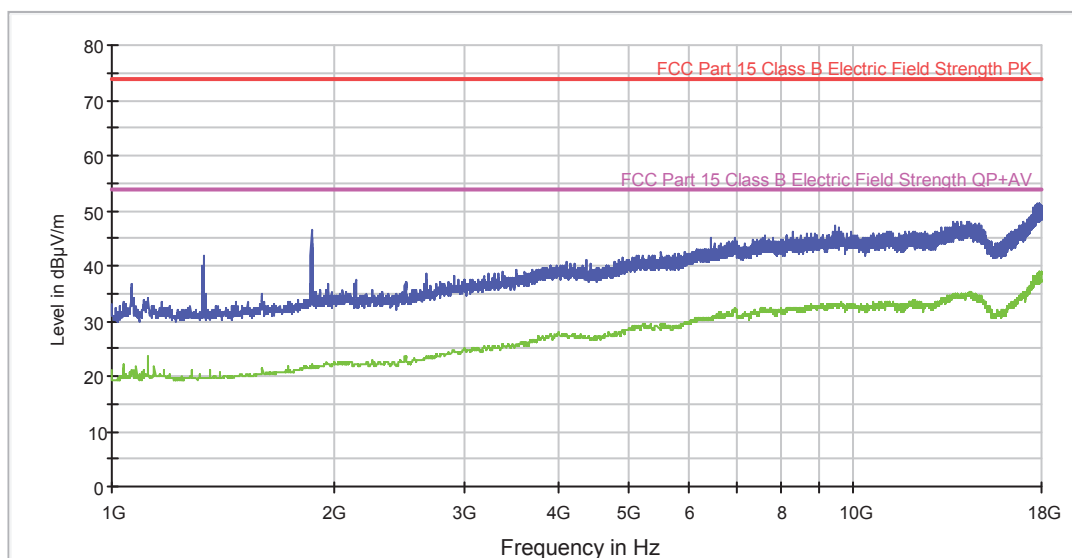
Maximizations

Frequency (MHz)	MaxPeak (dBµV/m)	QuasiPeak (dBµV/m)	Height (cm)	Polarization	Azimuth (deg)
35.211222	34.4	30.4	101.0	V	8.0
65.122846	35.5	32.8	174.0	V	183.0
97.279760	22.1	17.3	151.0	V	10.0
126.443487	26.0	20.1	120.0	V	202.0
195.616232	26.5	23.5	162.0	H	281.0
206.685772	23.8	20.9	126.0	H	282.0

Radiated Emission: CR0202_RA1_PH (1 – 18 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case). Horizontal Polarization.

FCC 1-18GHz class B ESIB Bocina0245 AMP3783



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

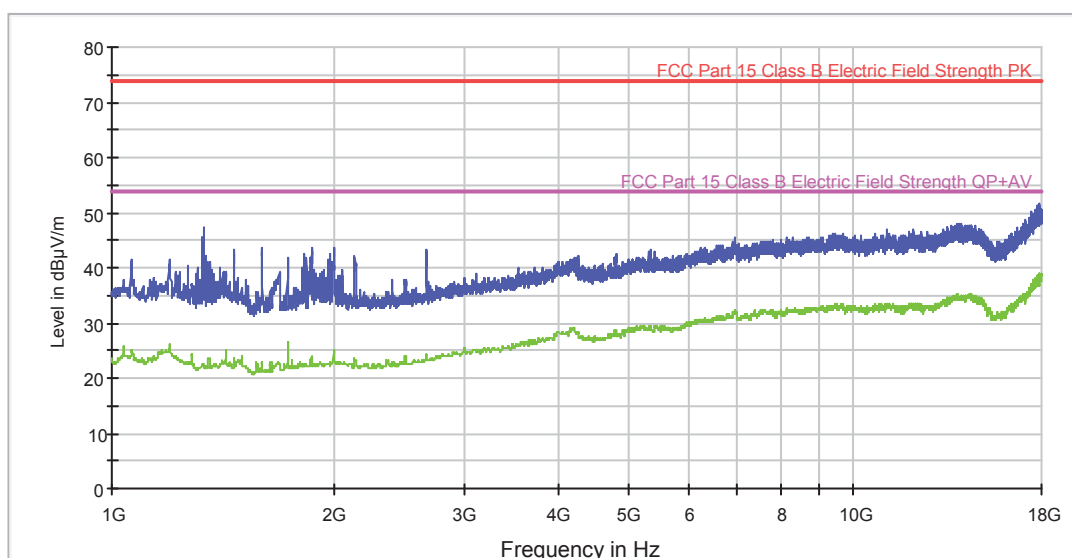
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
1329.000000	41.8	19.7
1337.000000	35.0	19.6
1859.000000	46.7	21.5
2658.000000	38.4	23.6
4109.000000	40.7	27.8
5528.000000	42.5	29.3
6455.000000	45.1	30.5
9504.000000	47.3	33.1
13221.000000	47.1	34.0
17796.000000	51.4	38.5

Radiated Emission: CR0202_RA1_PV (1 – 18 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case). Vertical Polarization.

FCC 1-18GHz class B ESIB Bocina0245 AMP3783



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

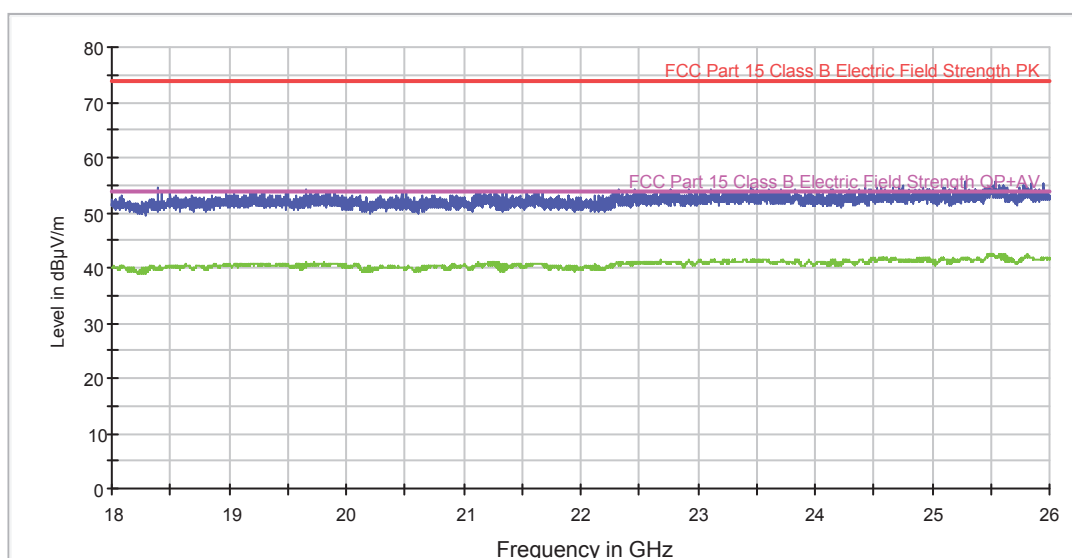
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
1334.000000	47.4	22.0
1594.000000	43.6	22.8
1865.000000	43.6	23.8
2655.000000	43.4	24.4
4207.000000	41.7	28.9
5328.000000	43.1	29.3
6938.000000	45.5	31.9
9420.000000	46.1	33.0
13441.000000	47.4	34.3
17893.000000	51.5	38.8

Radiated Emission: CR0202_RA2_PH (18 – 26 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case). Horizontal Polarization.

FCC 18-26GHz class B ESIB Bocina1920 AMP1975



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

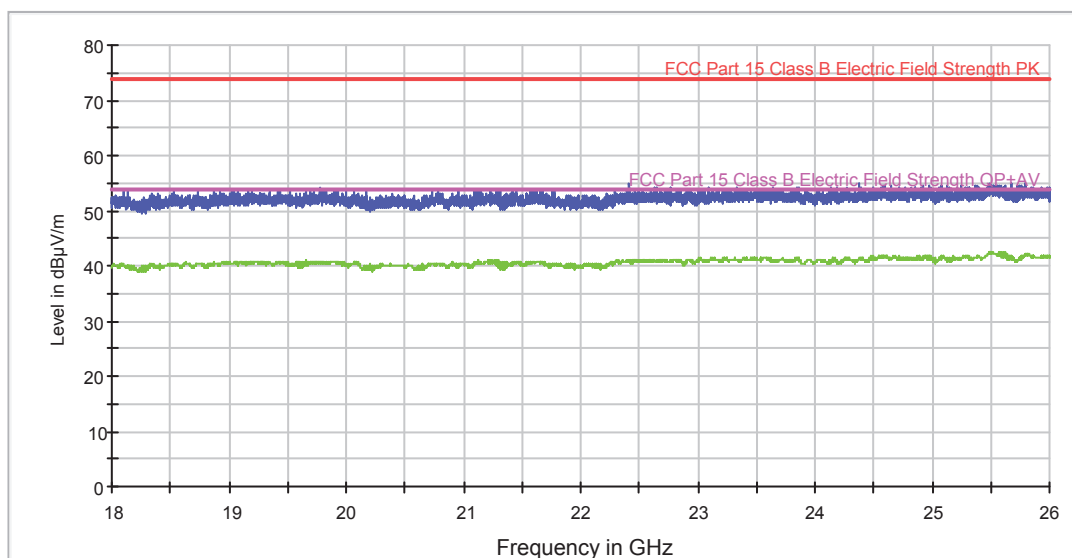
Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
18398.000000	54.5	40.1
19221.000000	53.7	40.6
19656.000000	54.3	40.8
20471.000000	53.7	40.0
21600.000000	54.0	40.8
22318.000000	54.3	40.9
23114.000000	54.3	41.2
23446.000000	54.5	41.2
24744.000000	55.0	41.4
25533.000000	55.5	42.2

Radiated Emission: CR0202_RA2_PV (18 -26 GHz)

Project: 43480rem001
Company: YOTA
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case). Vertical Polarization.

FCC 18-26GHz class B ESIB Bocina1920 AMP1975



— MaxPeak-ClearWrite-PK+ — Average-ClearWrite-AVG
— FCC Part 15 Class B Electric Field Strength PK — FCC Part 15 Class B Electric Field Strength QP+AV

Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBμV/m)	Average-ClearWrite (dBμV/m)
18524.000000	53.6	40.3
18875.000000	54.0	40.5
19770.000000	54.4	40.7
20778.000000	53.4	40.4
21098.000000	53.9	40.4
22418.000000	55.0	40.9
22629.000000	54.3	41.1
23639.000000	54.4	41.1
24372.000000	55.1	41.3
25669.000000	55.0	41.5

CONTINUOUS CONDUCTED EMISSION ON POWER LEADS

LIMITS:	Product standard :	FCC RULES AND REGULATIONS 47 CFR PART 15, SUBPART B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009
	Test standard :	FCC RULES AND REGULATIONS 47 CFR PART 15, SUBPART B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009

CLASS B

The applied limit for continuous conducted emissions in power leads, according with the requirements of FCC Rules and Regulations 47 CFR Part 15, Subpart B (10-01-12 Edition); ICES-003 ISSUE 5 (2012) & ANSI C63.10-2009, in the frequency range 0,15 to 30 MHz, for Class B equipment was:

Frequency range (MHz)	Limit (dB μ V)	
	Quasi-peak	Average
0,15 to 0,5	66-56	56-46
0,5 to 5	56	46
5 to 30	60	50

TESTED SAMPLES:	S/01 & S/02
TESTED OPERATION MODES:	OM#01 & 02 & 03 & 04
TEST RESULTS :	CCmmnnhh: CC, Conducted Condition; mm: Sample number; nn: Operation mode; hh: wire

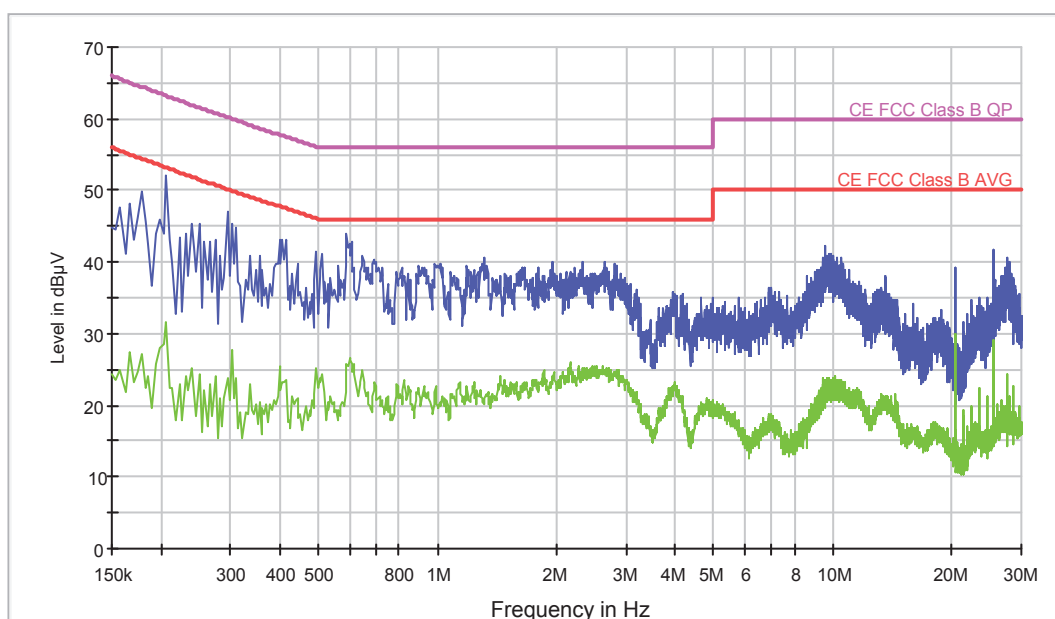
CCmmnnhh	Description	Result
CC01010N	Neutral wire noise	P
CC0101L1	Phase wire noise	P
CC01030N	Neutral wire noise	P
CC0103L1	Phase wire noise	P
CC02020N	Neutral wire noise	P
CC0202L1	Phase wire noise	P
CC02040N	Neutral wire noise	P
CC0204L1	Phase wire noise	P

Continuous Conducted emission : CC01010N

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
Company: YOTA DEVICES LTD
Sample: S/01
Operation mode: OM#01
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Neutral wire noise

EC FCC Class B ESPI CC



Subrange Maxima

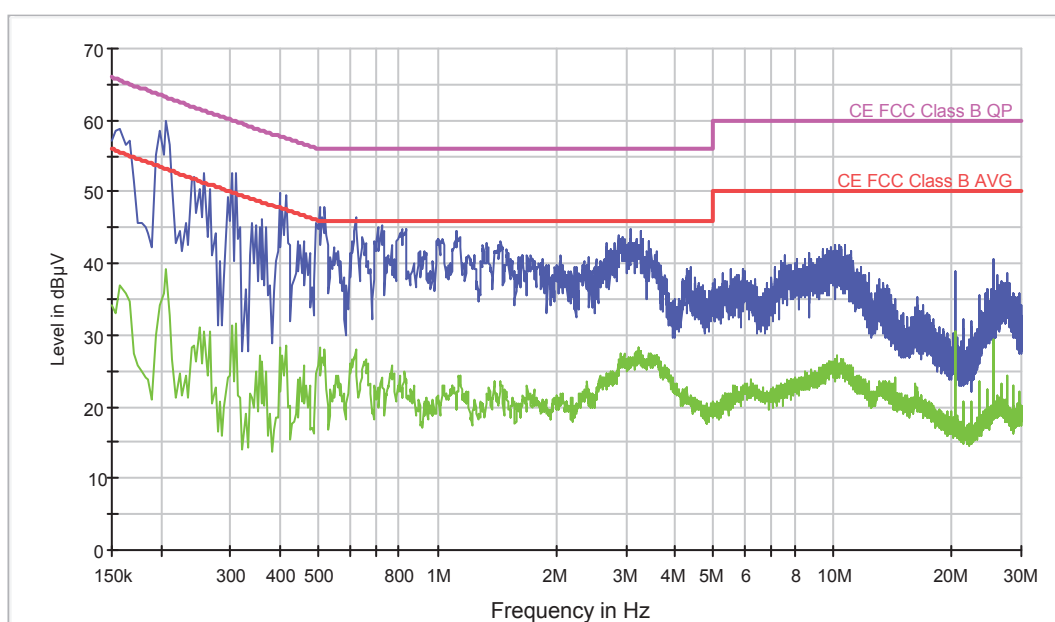
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.206000	52.2	31.7
0.294000	47.1	23.7
0.590000	44.1	25.8
1.018000	39.9	20.0
1.318000	40.5	21.0
2.330000	40.1	25.2
3.946000	35.8	22.7
9.598000	42.4	22.0
10.474000	40.6	22.8
25.602000	41.8	29.1

Continuous Conducted emission : CC0101L1

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
 Company: YOTA DEVICES LTD
 Sample: S/01
 Operation mode: OM#01
 Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
 GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
 (Worst case). Phase wire noise

EC FCC Class B ESPI CC



Subrange Maxima

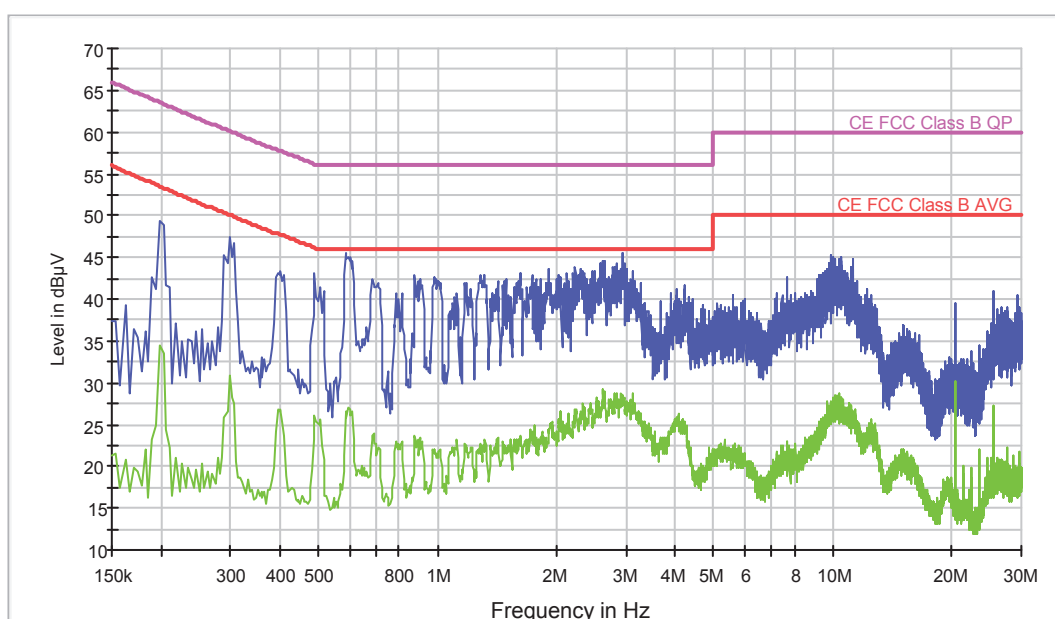
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.206000	59.8	39.2
0.310000	52.8	31.5
0.502000	48.0	28.2
0.834000	44.9	23.8
1.450000	43.1	22.9
3.082000	44.7	26.6
3.606000	40.4	26.0
10.150000	42.6	25.6
10.694000	42.6	25.8
25.602000	40.6	29.3

Continuous Conducted emission : CC01030N

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
 Company: YOTA DEVICES LTD
 Sample: S/01
 Operation mode: OM#03
 Description: EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC.
 GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
 (Worst case). Neutral wire noise

EC FCC Class B ESPI CC



Subrange Maxima

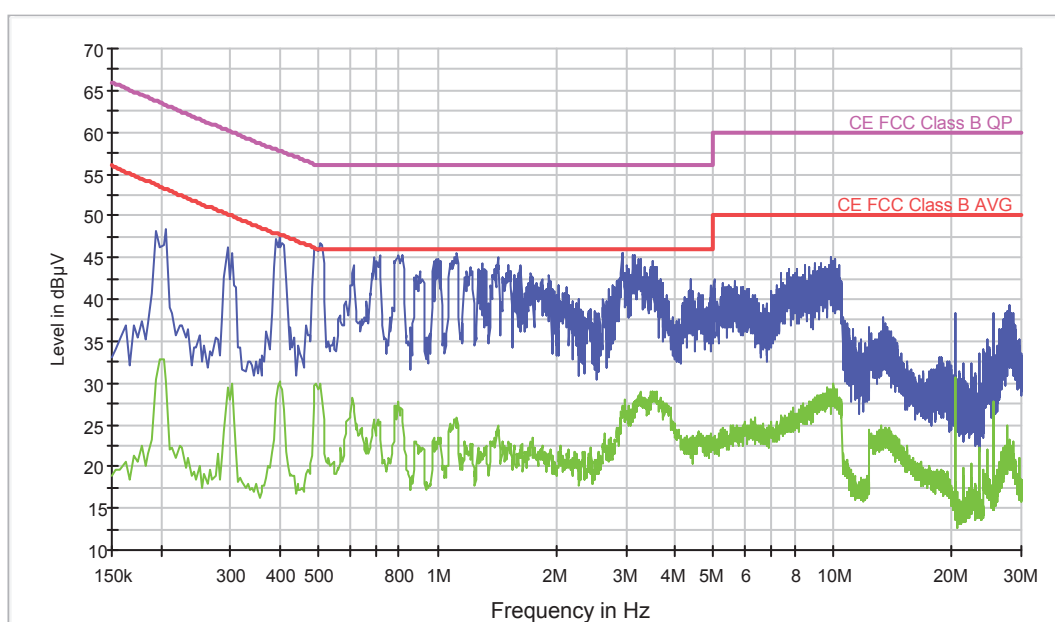
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.198000	49.4	34.5
0.298000	47.4	30.8
0.586000	45.6	26.6
0.878000	43.0	23.8
1.914000	43.7	24.5
2.934000	45.5	28.4
4.222000	41.8	24.9
9.950000	45.3	27.0
10.438000	44.9	28.2
25.602000	41.0	27.3

Continuous Conducted emission : CC0103L1

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
Company: YOTA DEVICES LTD
Sample: S/01
Operation mode: OM#03
Description: EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC.
GPS/GNSS ON. Power supply 115 Vac with AC/DC adapter.
(Worst case). Phase wire noise

EC FCC Class B ESPI CC



Subrange Maxima

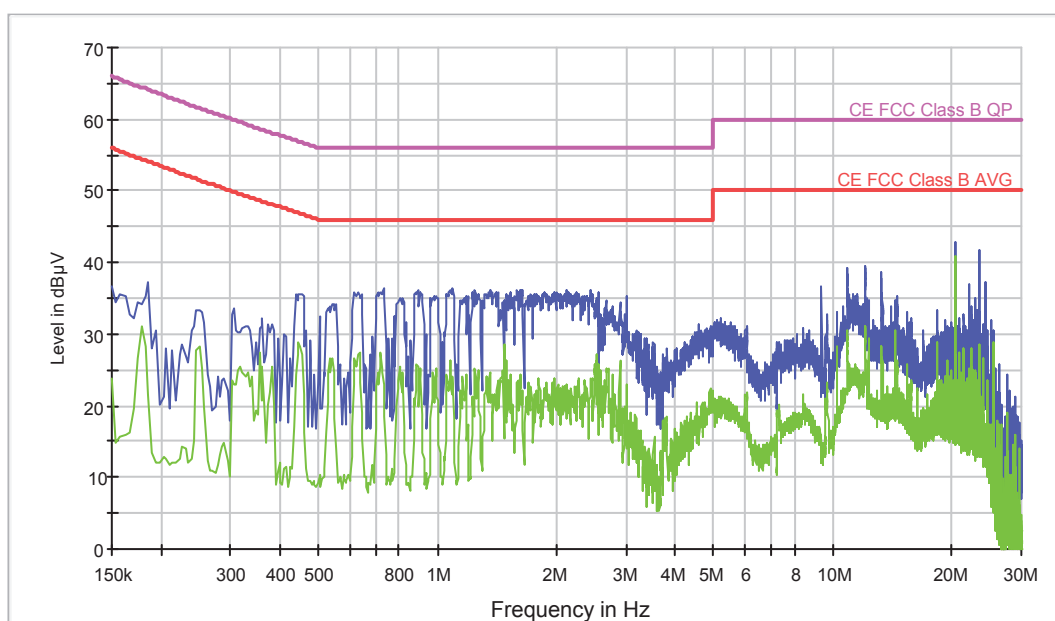
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.206000	48.4	30.1
0.398000	47.8	30.2
0.506000	46.6	30.0
1.122000	45.6	25.9
1.422000	45.0	24.8
2.926000	45.5	26.4
5.002000	42.4	23.5
9.894000	45.1	28.4
10.402000	44.1	28.1
27.934000	39.2	22.0

Continuous Conducted emission : CC02020N

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
Company: YOTA DEVICES LTD
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case) Neutral wire noise

EC FCC Class B ESPI CC



Subrange Maxima

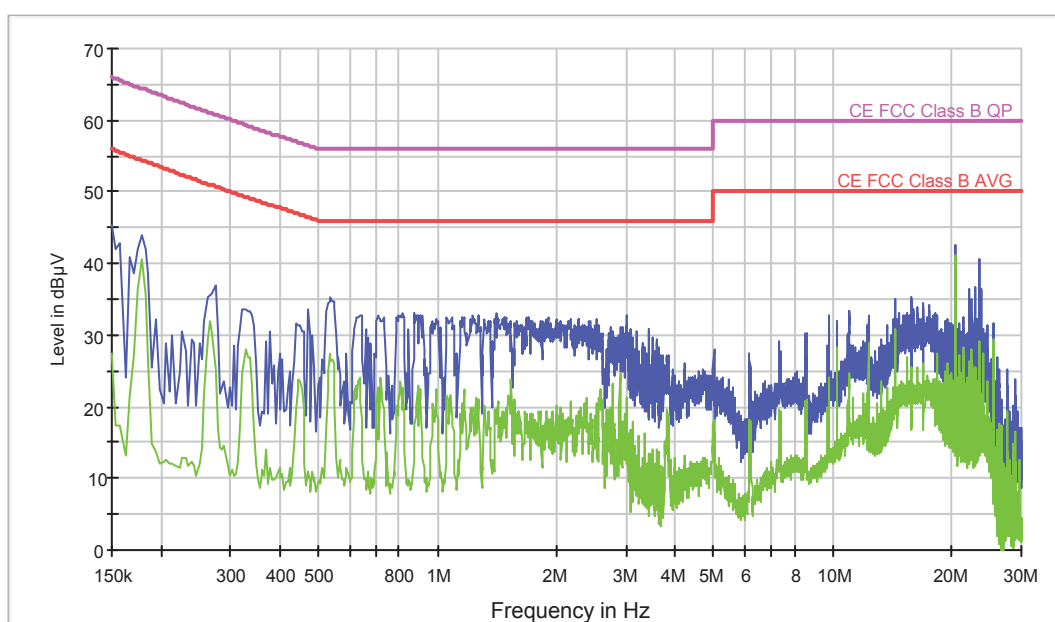
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.186000	37.3	21.5
0.306000	33.6	23.0
0.730000	36.3	23.0
1.094000	36.3	24.0
1.622000	36.2	23.5
2.450000	36.0	23.2
5.186000	32.2	18.9
9.390000	36.6	15.0
12.074000	39.5	29.9
20.478000	42.7	40.5

Continuous Conducted emission : CC0202L1

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
Company: YOTA DEVICES LTD
Sample: S/02
Operation mode: OM#02
Description: EUT ON. IDLE 3G FDD I. IDLE WIFI. IDLE Bluetooth. IDLE NFC.
GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
(Worst Case) Phase wire noise

EC FCC Class B ESPI CC



Subrange Maxima

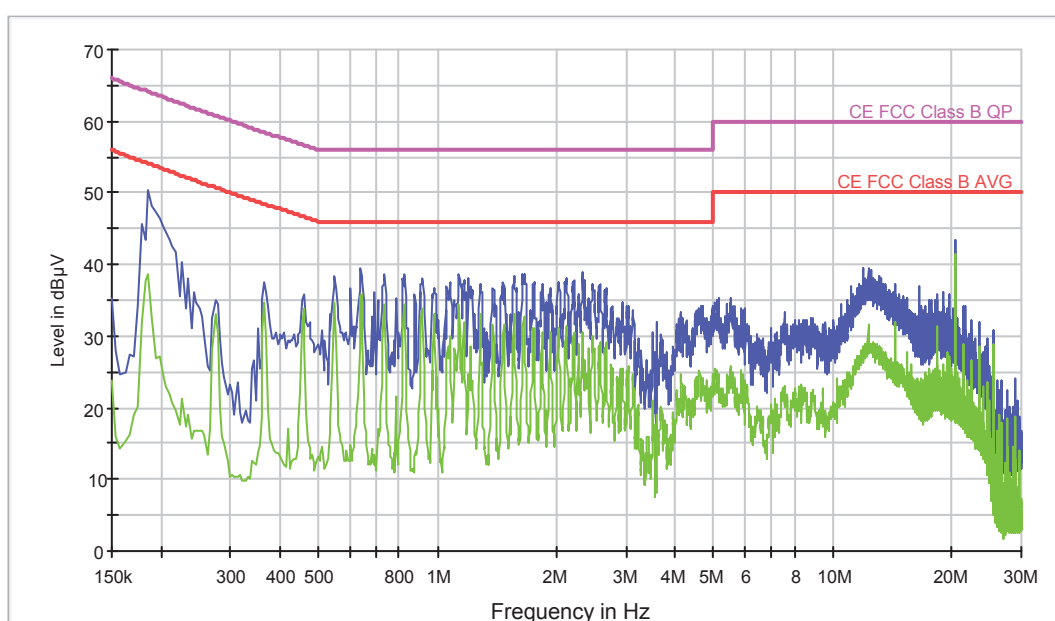
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.150000	45.4	27.3
0.274000	37.0	25.1
0.538000	35.2	26.4
0.818000	33.0	22.8
1.418000	32.9	19.2
3.006000	32.7	20.1
3.606000	28.9	10.8
9.762000	32.9	23.2
15.762000	35.3	25.0
20.482000	42.5	41.1

Continuous Conducted emission : CC02040N

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
 Company: YOTA DEVICES LTD
 Sample: S/02
 Operation mode: OM#04
 Description: EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC.
 GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
 (Worst Case). Neutral wire noise

EC FCC Class B ESPI CC



Subrange Maxima

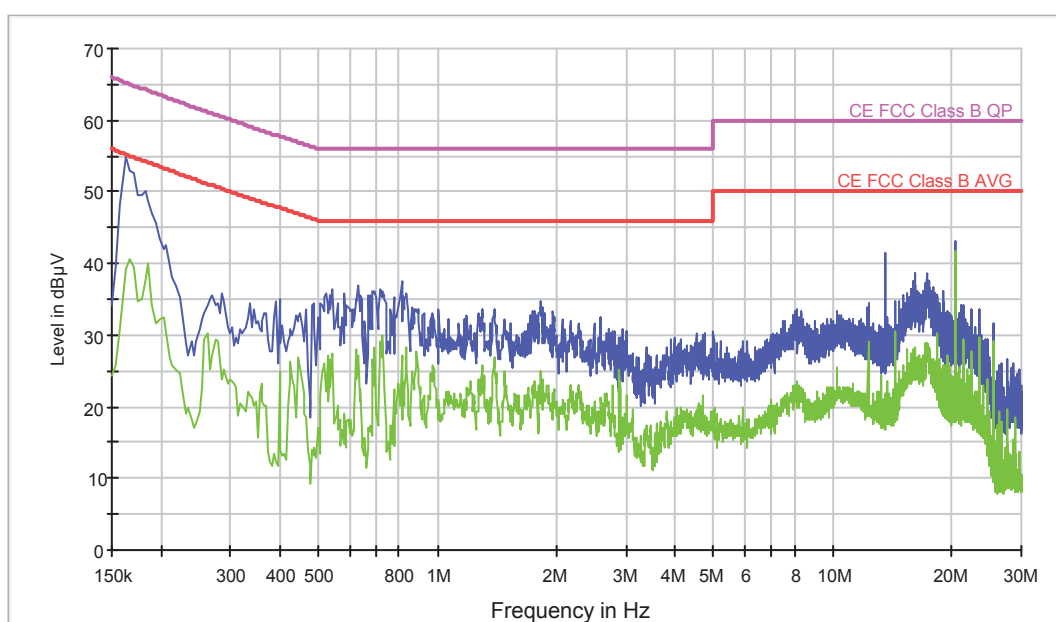
Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.186000	50.5	38.7
0.366000	37.7	34.8
0.638000	39.4	35.4
1.134000	38.7	34.5
1.646000	38.7	29.6
2.326000	39.0	30.1
5.166000	35.3	24.2
7.582000	33.5	22.1
12.286000	39.6	31.5
20.478000	43.5	41.2

Continuous Conducted emission : CC0204L1

Detector : Peak / Average / Cuasi-peak

Project: 43480REM.001
 Company: YOTA DEVICES LTD
 Sample: S/02
 Operation mode: OM#04
 Description: EUT ON. TCH LTE Band 3. TX WIFI. TX Bluetooth. TX NFC.
 GPS/GNSS ON. Power supply 5 Vdc with USB port (Pc auxiliary).
 (Worst Case). Phase wire noise

EC FCC Class B ESPI CC



Subrange Maxima

Frequency (MHz)	MaxPeak-ClearWrite (dBµV)	Average-ClearWrite (dBµV)
0.162000	55.0	39.3
0.286000	35.8	23.8
0.630000	37.1	27.1
0.810000	37.5	27.0
1.826000	34.8	25.0
2.594000	32.6	21.1
4.998000	30.7	18.6
8.086000	33.6	21.3
13.546000	41.3	20.5
20.482000	43.2	41.7