



TEST REPORT nr. R11162201

Federal Communication Commission (FCC)

Industry Canada (IC)

Test item

Description.....: Transceiver Unit
Trademark.....: AUTEK
Model/Type.....: Model ARM Type NC022

Test Specification

Standard: FCC Rules & Regulations, Title 47 (2010) - Part 15 paragraph(s) : 247(a), 247(b),
247(c), 209 and 207
RSS-210 (2010) – Annex 8

Client's name.....: AUTEK S.r.l.

Address: Via Pomaroli, 65 - 36030 Caldogno (VI) - ITALY

Manufacturer's name.: Same ad client

Address:

Report

Tested by.....: A. Bertezolo - *Technician*

Approved by.....: R. Beghetto - *Laboratory Manager*

Date of issue.....: 11.01.12

Contents: 66 pages

This test report shall not be reproduced except in full without the written approval of CMC.
The test results presented in this report relate only to the item tested.



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1. Summary			
Standard: FCC Rules & Regulations, Title 47 RSS-210 (2007)			
Test specifications	Environmental Phenomena	Tests sequence	Result
FCC – Title 47 Part 15.203 and 15.204 IC – RSS-210	Antenna Requirement	1	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	20 dB Bandwidth	2	Complies
IC – RSS-210 Annex 8	Occupied Bandwidth (99% BW)	3	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	Channel Separation	4	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	Time of Occupancy	5	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	Number of Hopping Frequency	6	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	Peak Output Power	7	Complies
FCC – Title 47 Part 15.247 IC – RSS-210 Annex 8	Band Edge	8	Complies
FCC – Title 47 Part 15.247 FCC – Title 47 Part 15.209 IC – RSS-210 Annex 8	Radiated Spurious	9	Complies

The Test Report was given to the Client representatives for necessary documentation of ratification of the tested equipment and it is valid for the FCC and IC certification.



2. Description of Equipment under test (EUT)	
Power supply.....	: 12-24 Vdc from battery
Type of equipment	: <input checked="" type="checkbox"/> Transmitter Unit <input checked="" type="checkbox"/> Receiver Unit <input checked="" type="checkbox"/> Fixed station <input type="checkbox"/> Portable station <input type="checkbox"/> Mobile station
Receiver class	: --
Alignment range.....	: 915 - 928 MHz
Switching frequency	: 915 - 928 MHz
Number of channels	: --
Channel separation.....	: --
Modulation	: 19300 Baud RC-FSK
Extreme conditions	: --
Maximum transmitter output power.....	: --
Information on antenna.....	: <input type="checkbox"/> Integrated <input type="checkbox"/> Extern <input checked="" type="checkbox"/> Other: Dedicated
Duty cycle.....	: --
2.1 Test Site	
Company	: CMC Centro Misure Compatibilità S.r.l.
Address	: Via dell' Elettronica, 12/C – 36016 Thiene (VI) – ITALY
3. Testing and sampling	
Date of receipt of test item	: 07.11.11
Testing start date	: 07.11.11
Testing end date	: 06.12.11
Samples tested nr.	: 1
Sampling procedure.....	: Equipment used for testing was picked up by the manufacturer, at the end of the production process with random criterion
Internal identification.....	: adhesive label with the product number P111094
4. Operative conditions	
--	



5. Photograph(s) of EUT





6. Equipment list

<i>Id. number</i>	<i>Manufacturer</i>	<i>Model</i>	<i>Description</i>	<i>Serial number</i>	<i>Last calibration</i>	<i>Due date calibration</i>
CMC S108	Emco	3115	Horn antenna	9811-5622	April '10	April '13
CMC S124	Spin	AMTP42-20	Horn Antenna 18-26GHz	103	May '10	May '13
CMC S127	SCHAFFNER	HLA6120	Loop Antenna	1191	January '10	January '13
CMC S136	Schwarzbeck	VULB 9163	Broadband Antenna	9136-205	May '10	May '13
CMC S164	Rohde & Schwarz	ESU 26	EMC interference receiver	100052	January '11	January '12
CMC S206	Rohde & Schwarz	ESCI 7	EMC interference receiver	100781	March '11	March '12



7. Measurement uncertainty

Test	Expanded Uncertainty	note
Conducted Emission		
(50Ω/50μH AMN) - (9 kHz – 150 kHz)	±3.8 dB	1
(50Ω/50μH AMN) - (150 kHz – 30 MHz)	±3.4 dB	1
(Voltage probe) - (150 kHz – 30 MHz)	±3.0 dB	1
(50Ω/5μH AMN) - (150 kHz – 108 MHz)	±3.2 dB	1
Discontinuous Conducted Emission		
Conducted Emission (50Ω/50μH AMN) - (9 kHz – 150 kHz)	±3.8 dB	1
Conducted Emission (50Ω/50μH AMN) - (150 kHz – 30 MHz)	±3.4 dB	1
Disturbance Power (30 MHz – 300 MHz)		
	±3.2 dB	1
Radiated Emission		
(0,150 MHz – 30 MHz)	±4.5 dB	1
(30 MHz – 1000 MHz)	±4.8 dB	1
(1 GHz – 6 GHz)	±4.4 dB	1
Electromagnetic field EMF		
	±18.8 dB	1
Harmonic current emissions test		
	±2.4 %	1
Voltage fluctuation and flicker test		
	±6.0 %	1
Insertion loss test		
	±2.6 %	1
Radiated electromagnetic disturbance test (loop antenna)		
	±2.5 %	1
Radiated electromagnetic field immunity test		
	0.9 V/m at 3V/m	1
Pulse modulated radiated electromagnetic field immunity test		
	0.9 V/m at 3V/m	1
Injected currents immunity test		
	0.6 V at 3V	1
Bulk current		
	9 mA at 60 mA	1
Power frequency magnetic field immunity test		
	0.3 A/m at 3 A/m	1
Electrostatic discharge immunity test		
		2
Electrical fast transients / burst immunity test		
		2
Surge immunity test		
		2
Short interruption immunity test		
		2
Voltage transient emission test		
	±5 %	1
Transient immunity test		
		2

Notes

Note 1:

The expanded uncertainty reported according to EN55016-4-2(2004-10) is based on a standard uncertainty multiplied by a coverage factor of $k=2$, providing a level of confidence of $p = 95\%$

Note 2:

It has been demonstrated that the used test equipment meets the specified requirements in the standard with at least a 95% confidence, covering factor $k = 2$.



8. Reference documents

<i>Reference no.</i>	<i>Description</i>
FCC Rules and Regulation Title 47 part 15 (2010) RSS-210 Issue 7 – June 2010	--
ANSI C63.4	Low-power Licence-exempt Radiocommunication Devices (All Frequency Bands): Category I Equipment American National Standard for Methods of Measuring of Radio-Noise Emissions from Low-Voltage Electrical and Electronic Equipment in the Range of 9kHz – 40GHz
Internal Procedure PM001 rev. 2.0 (Quality Manual)	Measure Procedure
Internal procedure INC_M rev. 8.0 (Quality Manual)	Measurement uncertainty calculation



9. Deviation from test specification

In agreement with the client, emission tests were performed with peak detector .
At the frequencies where the measures exceed the limit or within 6dB from it, the test was repeated with quasi-peak detector and/or average detector.

10. Test case verdicts

Test case does not apply to the test object..... : N / N.A.
Test item does meet the requirement..... : P / Pass / Complies
Test item does not meet the requirement..... : F / Fail / Does not comply
Test not performed : NE / Not Executed

11. Results

In this clause tests results are reported.
All measurements are done in accordance with the Filling and Measurement Guidelines for Frequency Hopping Spread Spectrum Systems DA-705
Measurement uncertainty is in accordance with document CMC INC_M rev. 8.0.



11.1 Antenna Requirements

Test configuration and test method

Test site Laboratory
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 100 kPa Relative humidity 49 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.203 and 15.204
- RSS-210
- Internal Procedure PM001
- See clause 4 of this test report

Test Requirements

An intentional radiator shall be designed to ensure that no antenna other than that furnished by the responsible party shall be used with the device.

The use of a permanently attached antenna or of an antenna that uses unique coupling to the intentional radiator shall be considered sufficient comply with the provisions of this section.

The manufacturer may design the unit so that a broken antenna can be replaced by the user, but the use of standard antenna jack or electrical connector is prohibited. This requirement does not apply to carrier current devices or to devices operated under the provisions of §15.211, § 15.213, § 15.217, § 15.219, or § 15.221. Further, this requirement does not apply to intentional radiators that must be professionally installed, such as perimeter protection systems and some field disturbance sensors, or to other intentional radiators which, in accordance with § 15.31(d), must be measured at the installation site. However, the installer shall be responsible for ensuring that the proper antenna is employed so that the limits in this part are not exceeded.

Test specification

Port: Antenna.

EUT exercising

See clause 4 of this test report

Result

<i>Antenna Type</i>	<i>Gain</i>	<i>Remarks</i>	<i>Results</i>
Dedicated	2 dBi	--	Complies

Remarks

//////////

Reference documents

See clause 8 of this test report

Result

The requirements are met



11.2 20dB Bandwidth

Test configuration and test method

Test site Laboratory
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 99 kPa Relative humidity 50 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- RSS-210 Annex 8
- DA 00-705, march 30, 2000
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Result

Frequency	Graph(s)	Bandwidth	Remark
915,05 MHz	G11162215	28,04 kHz	--
921,50 MHz	G11162216	27,88 kHz	--
927,95 MHz	G11162212	27,88 kHz	--

Measurement uncertainty: ±1 kHz

Remarks

//////////

Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S164

Result

The requirements are met



11.3 Occupied Bandwidth (99% BW)

Test configuration and test method

Test site Laboratory
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 20 °C Atmospheric pressure 98 kPa Relative humidity 46 %

Test set-up and execution

- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Result

Frequency (MHz)	Graph(s)	Bandwidth	Remark
915,05 MHz	G11162214	26,28 kHz	--
921,50 MHz	G11162217	26,44 kHz	--
927,95 MHz	G11162213	26,76 kHz	--
Measurement uncertainty: ±1 kHz			

Remarks

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Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S164

Result

The requirements are met



11.4 Channel Separation

Test configuration and test method

Test site
 Auxiliary equipment

Laboratory
 See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 99 kPa Relative humidity 50 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

Limit: Minimum 25kHz or the 20dB Bandwidth of the hopping system

Result

Port	Graph(s)	Channel Separation	Remark
Enclosure	G11162204	201 kHz	--
Measurement uncertainty: ±1kHz			

Remarks

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Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S206

Result

The requirements are met



11.5 Time of Occupancy

Test configuration and test method

Test site
 Auxiliary equipment

Laboratory
 See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 100 kPa Relative humidity 45 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

The average time of occupancy on any frequency shall not be greater than 0.4 seconds within a 20 second period.

Result

Frequency (MHz)	Graph(s)	Dwell time	Remark
924,68	G11162205	14,1 ms	--

Frequency (MHz)	Time between two transmission	Nr. of hopping frequency	Nr. of transmission for channel	Time of Occupancy	Remarks
924,68	50,3 ms	64	$20s/0,0503/64 = 6,21$	$6,21 \times 14,1 = 87,56$ ms	--

Remarks //////////////

Reference documents See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S206

Result The requirements are met



11.6 Number of Hopping Channels

Test configuration and test method

Test site
 Auxiliary equipment

Laboratory
 See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 99 kPa Relative humidity 46 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Result

Port	Graph(s)	Number of Hopping Frequency	Remark
Enclosure	G11162201	64	--
	G11162202		
	G11162203		

Remarks

//////////

Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S206

Result

The requirements are met



11.7 Peak Output Power

Test configuration and test method

Test site
 Auxiliary equipment

Laboratory
 See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 99 kPa Relative humidity 48 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

Frequency range	RF power output
915 – 928 MHz	1,0 W / 30dBm

Result

Frequency (MHz)	Polarization	Graphs	E (dBμV/m)	Peak Output Power (mW)	Remark
915,05	Vertical	G11162207	108,99	14,89	--
915,05	Horizontal	G11162206	113,83	45,59	--
921,50	Horizontal	G11162209	113,72	45,59	--
921,50	Vertical	G11162208	108,81	14,89	--
927,95	Vertical	G11162211	106,53	8,37	--
927,95	Horizontal	G11162210	112,56	33,49	--

Measurement uncertainty: ±3dBm



Remarks

$$P = (E \times d)^2 / (30 \times G)$$

Where:

E = the measured maximum fundamental field strength in V/m

G = the numeric gain of the transmitting antenna: 1,58 (2dBi)

d = the distance in meters from which the field strength was measured (3m)

P = the power in watts

Reference documents

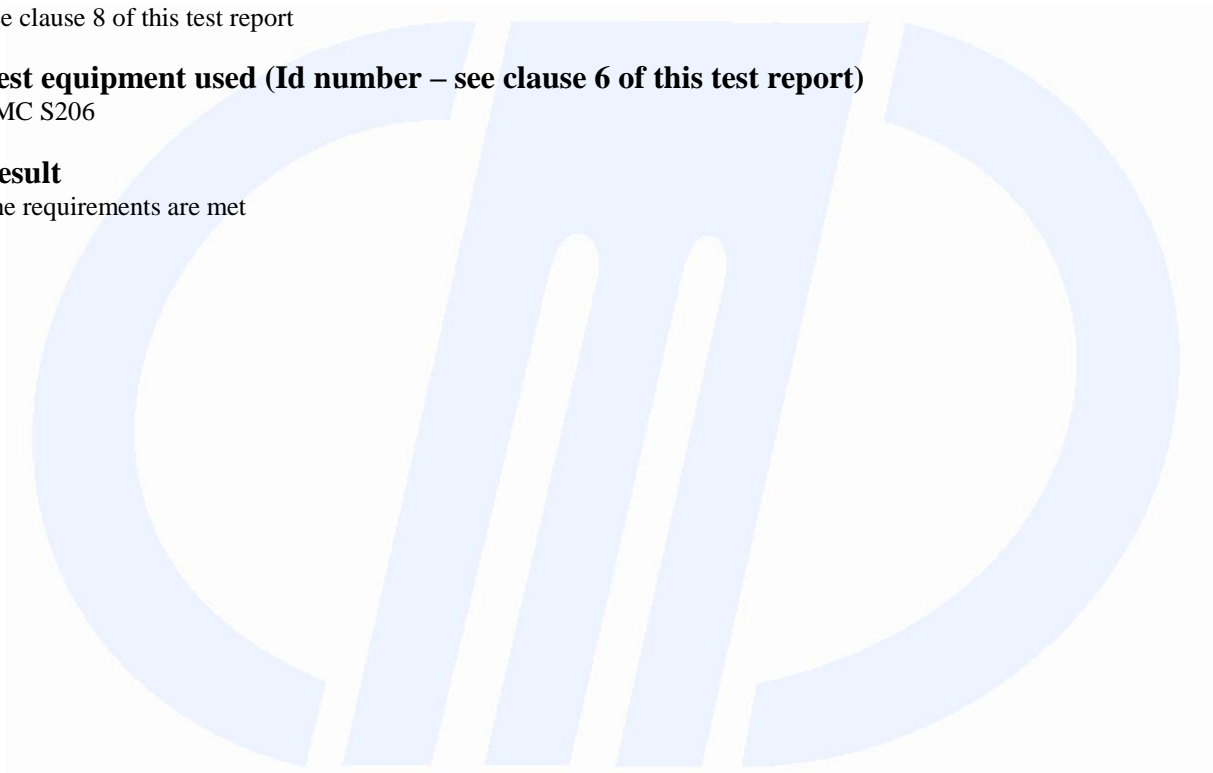
See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S206

Result

The requirements are met





11.8 Band Edge

Test configuration and test method

Test site Laboratory
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 20 °C Atmospheric pressure 99 kPa Relative humidity 46 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

In any 100kHz bandwidth outside the frequency band in which the spread spectrum or digitally modulated intentional radiator is operating, the radio frequency power that is produced by the intentional radiator shall be at least 20dB below that in the 100kHz bandwidth within the band that contains the highest level of the desired power, based on either an RF conducted or a radiated measurement. Attenuation below the general limits specified in section 15.209(a) is not required. In addition, radiated emission which fall in the restricted bands, as defined in section 15.205(a), must also comply with the radiated emission limits specified in section 15.209(a) (see section 15.205(c)).

Result

Frequency (MHz)	Graph(s)	Remark
915,05	G11162225	No Hopping
	G11162226	No Hopping
927,95	G11162227	No Hopping
	G11162228	No Hopping
915,05	G11162231	Hopping
	G11162230	Hopping
927,95	G11162232	Hopping
	G11162229	Hopping
--	G11162233	Hopping
Measurement uncertainty: ±1dB		



Remarks

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Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S164

Result

The requirements are met





11.9 Radiated Spurious (Transmitter)

Test configuration and test method

Test site Semi-anechoic chamber
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 22 °C Atmospheric pressure 99 kPa Relative humidity 48 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.247(c) and Part 15.209
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

In any 100kHz bandwidth outside the frequency band at least 20dB below the highest level of the desired power. In addition, radiated emissions which fall in the restricted bands, as defined in cl. 15.205(a), must also comply with the radiated emission limits specified in cl. 15.209(a) (see cl.15.205(c)).

Result

Antenna	Frequency Range (MHz)	Graph(s)	Remarks	Result
Loop Antenna	9kHz – 30MHz	G11162234	--	Complies

Frequency (MHz)	Polarization	Frequency Range (MHz)	Graph(s)	Remarks	Result
915,05	Horizontal	30 – 1000	G1162224	--	Complies
915,05	Vertical	30 – 1000	G1162222	--	Complies
921,50	Horizontal	30 – 1000	G1162219	--	Complies
921,50	Vertical	30 – 1000	G1162218	--	Complies
927,95	Horizontal	30 – 1000	G1162220	--	Complies
927,95	Vertical	30 – 1000	G1162221	--	Complies

Frequency (MHz)	Polarization	Frequency Range (GHz)	Graph(s)	Remarks	Result
915,05	Horizontal	1 - 10	G1162237	--	Complies
915,05	Vertical	1 – 10	G1162238	--	Complies
921,50	Horizontal	1 – 10	G1162240	--	Complies
921,50	Vertical	1 – 10	G1162239	--	Complies
927,95	Horizontal	1 – 10	G1162241	--	Complies
927,95	Vertical	1 - 10	G1162242	--	Complies



Nr. Harmonics	AV level (dB μ V/m)						AV Limits (dB μ V/m)	Remark
	915,05 MHz		921,5 MHz		927,95 MHz			
	Frequency	(dB μ V/m)	Frequency	(dB μ V/m)	Frequency	(dB μ V/m)		
II Harmonic	1830,037	< 40	1842,997	< 40	1855,892	< 40	54,00	--
III Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
IV Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
V Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
VI Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
VII Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
VIII Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
IX Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--
X Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	54,00	--

Measurement Uncertainty: ± 4 dB

Nr. Harmonics	PK level (dB μ V/m)						PK Limits (dB μ V/m)	Remark
	915,05 MHz		921,5 MHz		927,95 MHz			
	Frequency	(dB μ V/m)	Frequency	(dB μ V/m)	Frequency	(dB μ V/m)		
II Harmonic	1830,037	< 47	1842,997	< 47	1855,892	< 47	74,00	--
III Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
IV Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
V Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
VI Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
VII Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
VIII Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
IX Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--
X Harmonic	--	More than 15dB below limit	--	More than 15dB below limit	--	More than 15dB below limit	74,00	--

Measurement Uncertainty: ± 4 dB



Remarks

EUT was tested in 3 orthogonal planes. In results table are reported the worst case.

Reference documents

See clause 8 of this test report

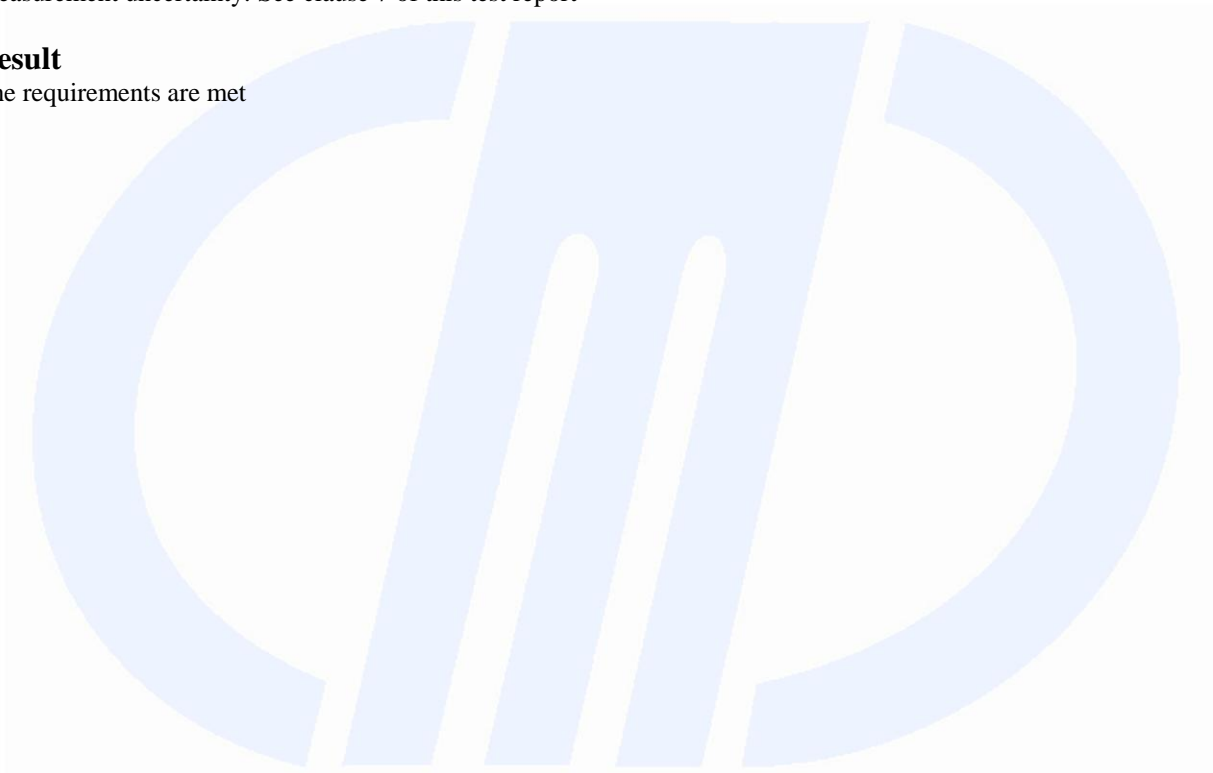
Test equipment used (Id number – see clause 6 of this test report)

CMC S108, CMC S124, CMC S127, CMC S136, CMC S164

Measurement uncertainty: See clause 7 of this test report

Result

The requirements are met





11.10 Radiated Spurious (Receiver)

Test configuration and test method

Test site Semi-anechoic chamber
 Auxiliary equipment See clause 4 of this test report

Environmental conditions

Temperature 20 °C Atmospheric pressure 98 kPa Relative humidity 50 %

Test set-up and execution

- FCC Rules and Regulation; Titles 47 Part 15.209
- DA 00-705, march 30, 2000
- RSS-210 Annex 8
- Internal Procedure PM001
- See clause 4 of this test report

Test specification

Port: Antenna;

EUT exercising

See clause 4 of this test report

Acceptance limits

In any 100kHz bandwidth outside the frequency band at least 20dB below the highest level of the desired power. In addition, radiated emissions which fall in the restricted bands, as defined in cl. 15.205(a), must also comply with the radiated emission limits specified in cl. 15.209(a) (see cl.15.205(c)).

Result

Polarization	Frequency Range (MHz)	Graph(s)	Remarks	Result
Horizontal	30 – 1000	G11162243	--	Complies
Vertical	30 – 1000	G11162244	--	Complies
Horizontal	1000 – 6000	G11162235	--	Complies
Vertical	1000 – 6000	G11162236	--	Complies

Remarks

EUT was tested in 3 orthogonal planes. In results table are reported the worst case.

Reference documents

See clause 8 of this test report

Test equipment used (Id number – see clause 6 of this test report)

CMC S108, CMC S124, CMC S127, CMC S136, CMC S164

Measurement uncertainty: See clause 7 of this test report

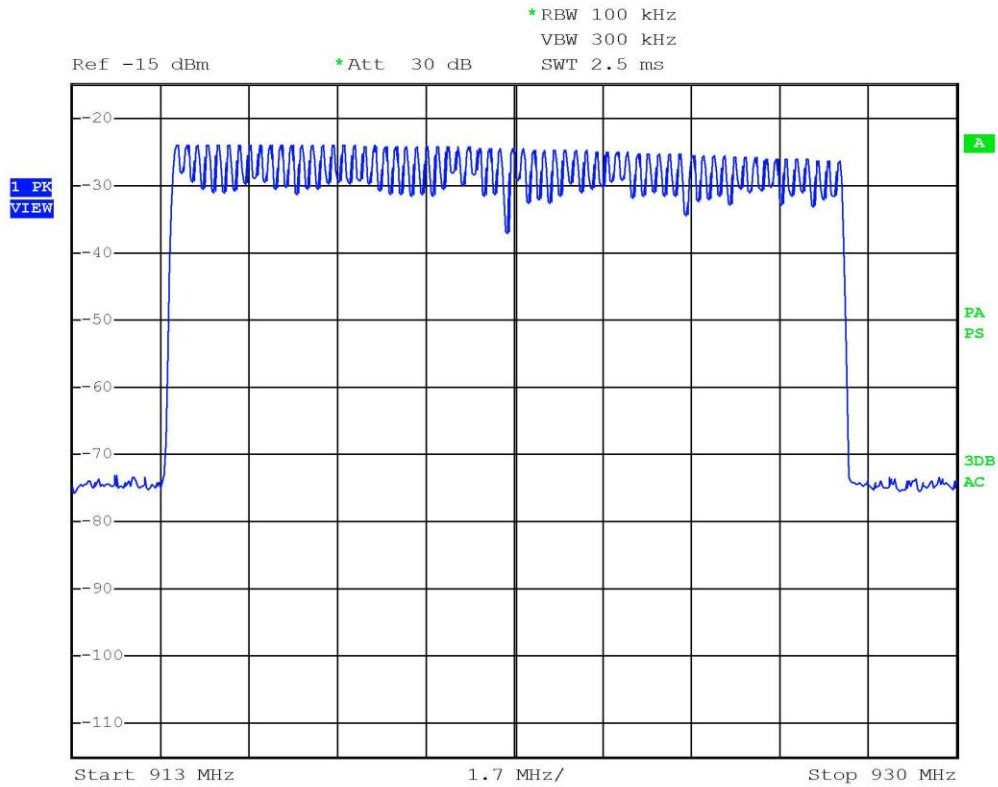
Result

The requirements are met



12. Graphs and Tables

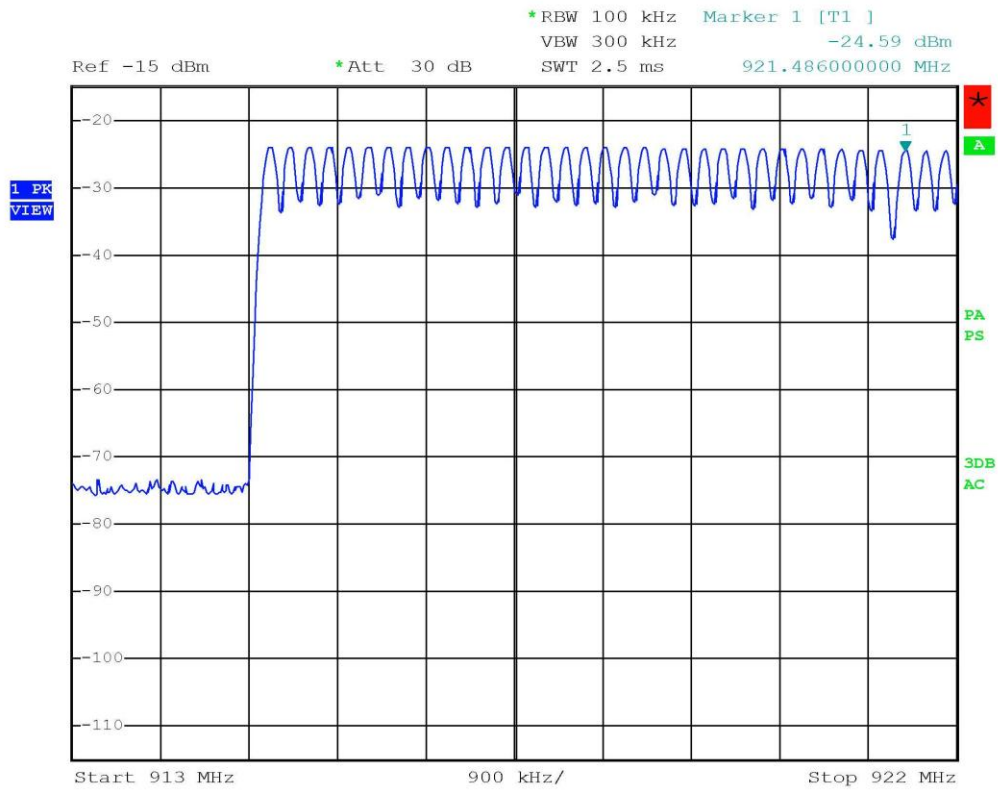
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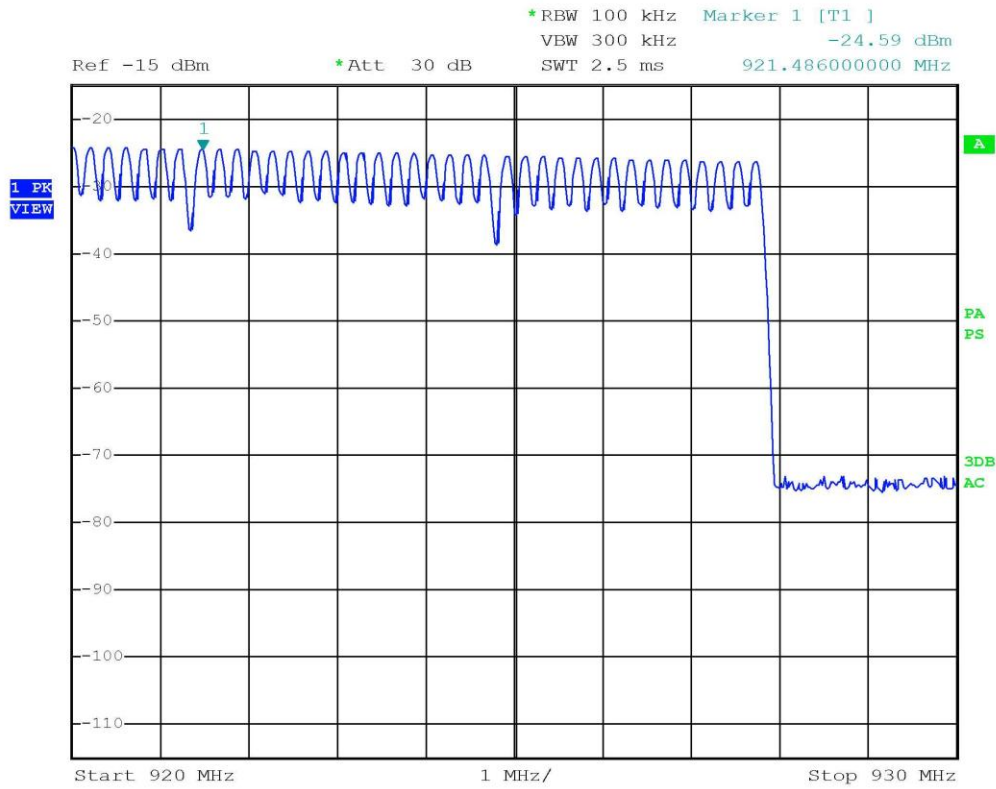
G11162202



Bertezzo 11162202



G11162203

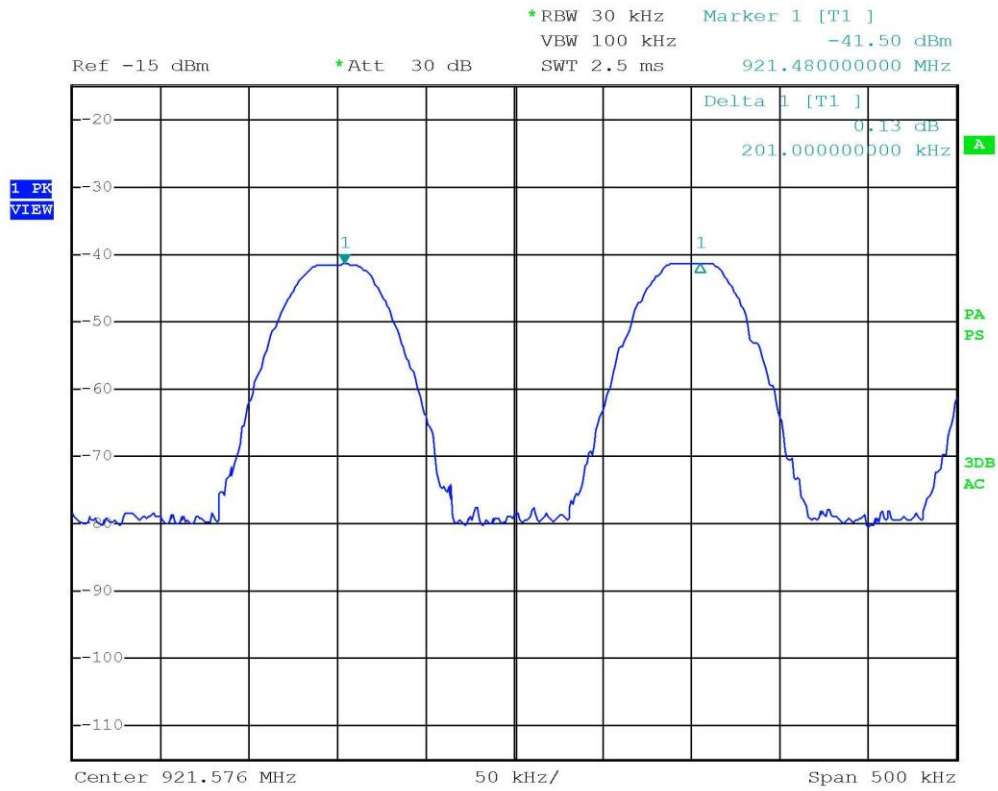


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CMC Centro Misure Compatibilità S.r.l.



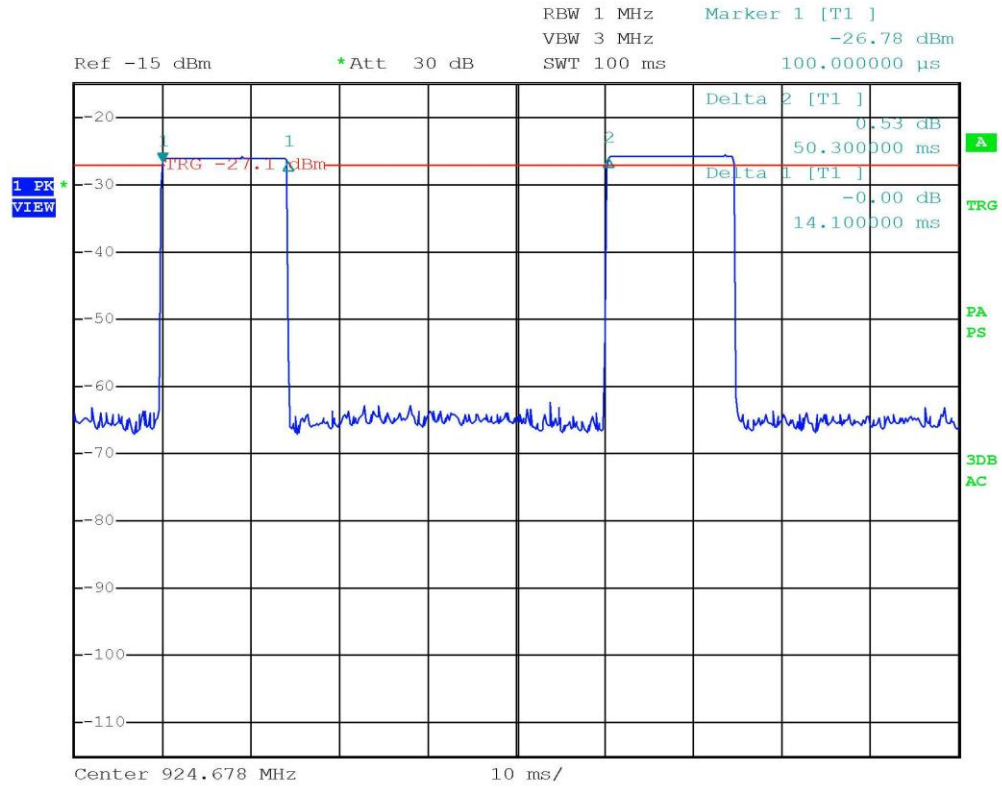
G11162204



Bertezzo 11162204



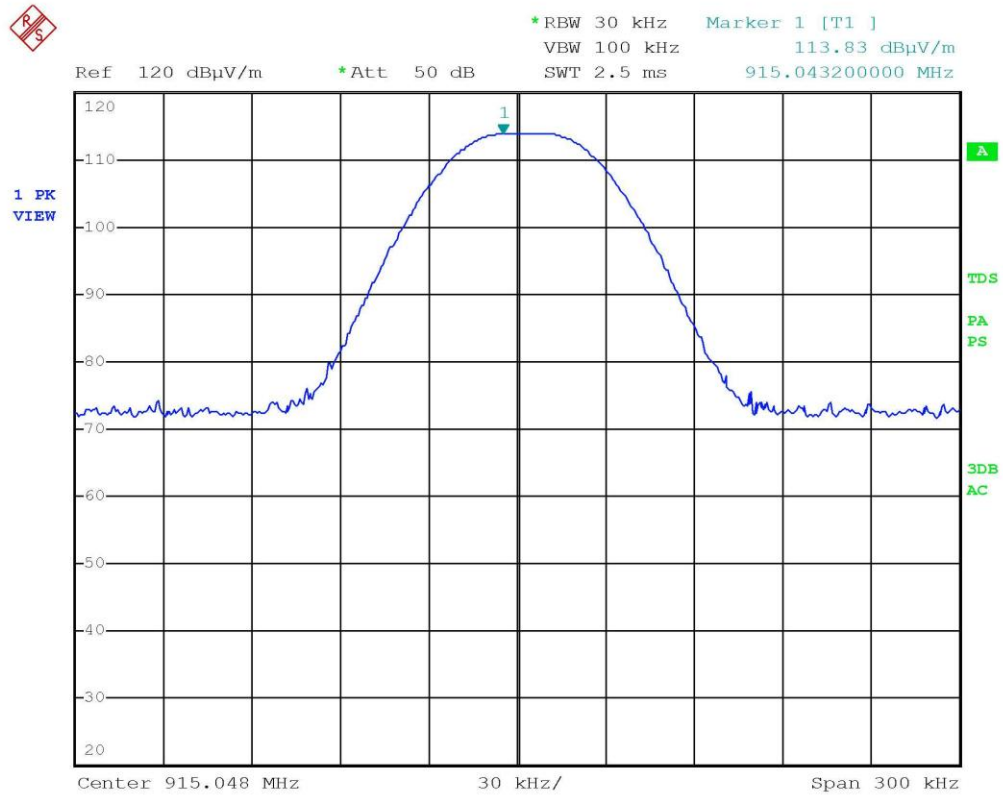
G11162205



Bertezolo 11162205



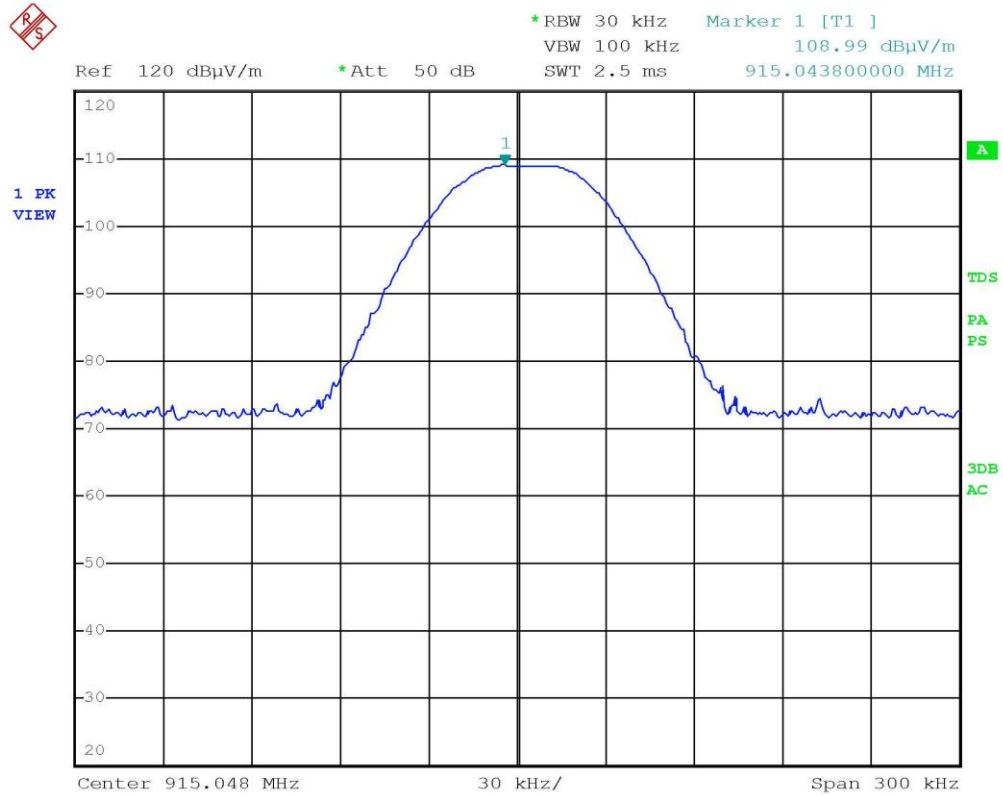
G11162206



Bertezzo 11162206 Horiz -Fmin



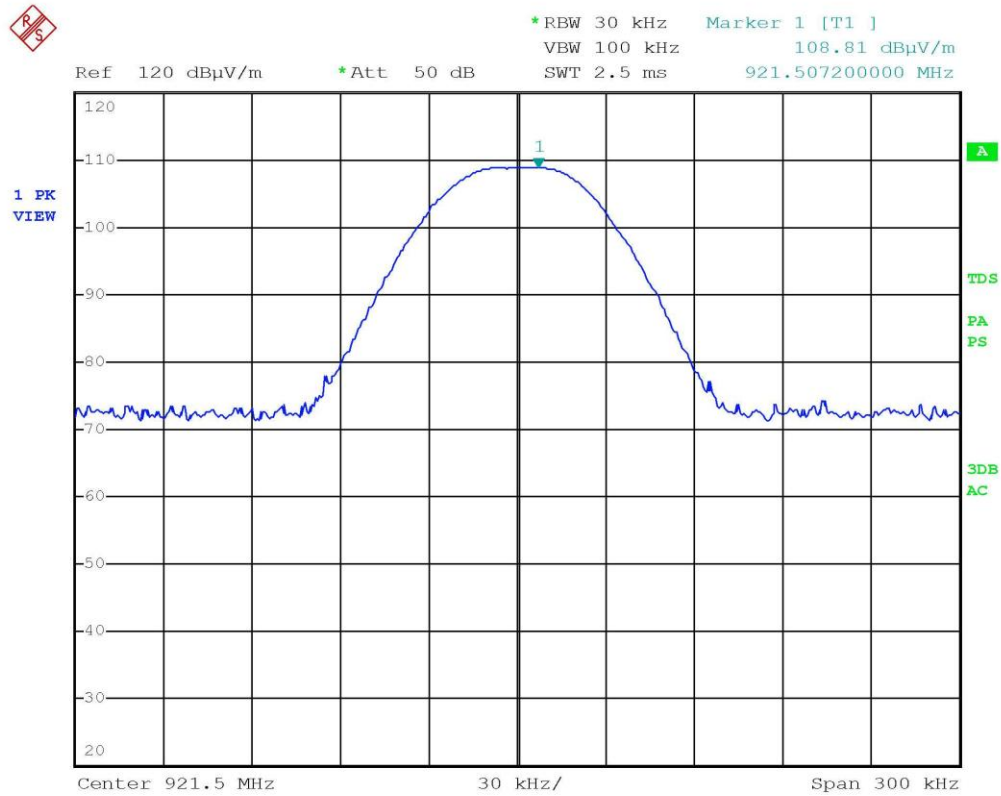
G11162207



Bertezzo 11162207 Vert -Fmin



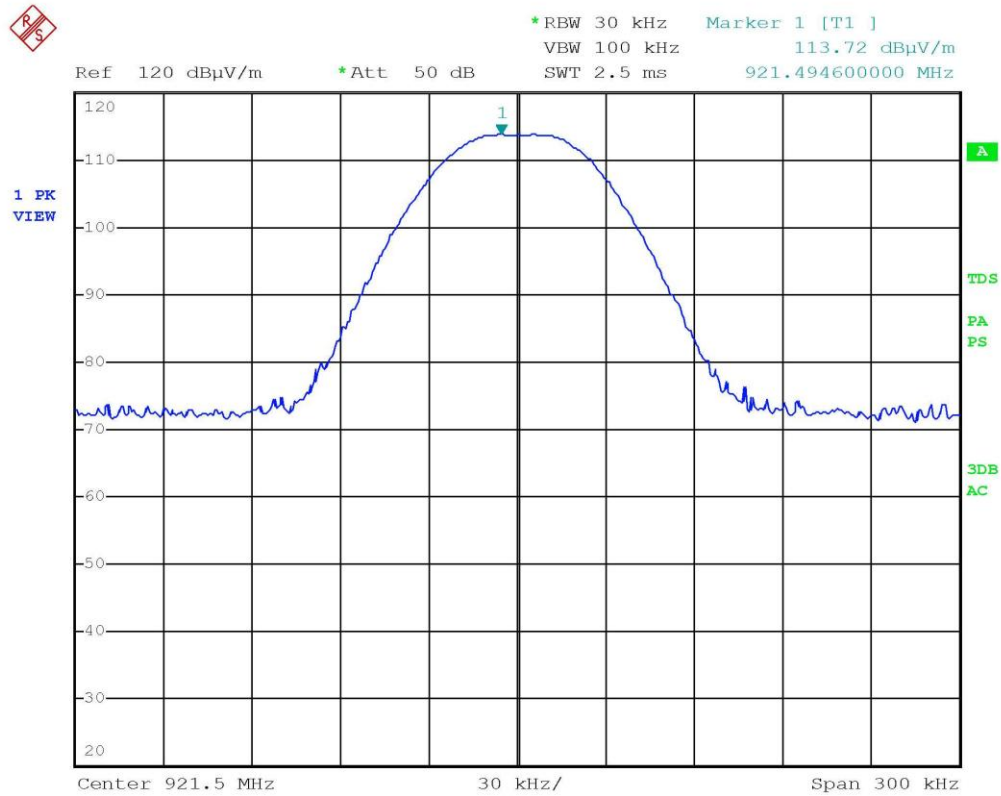
G11162208



Bertezzo 11162208 Vert -Fmed



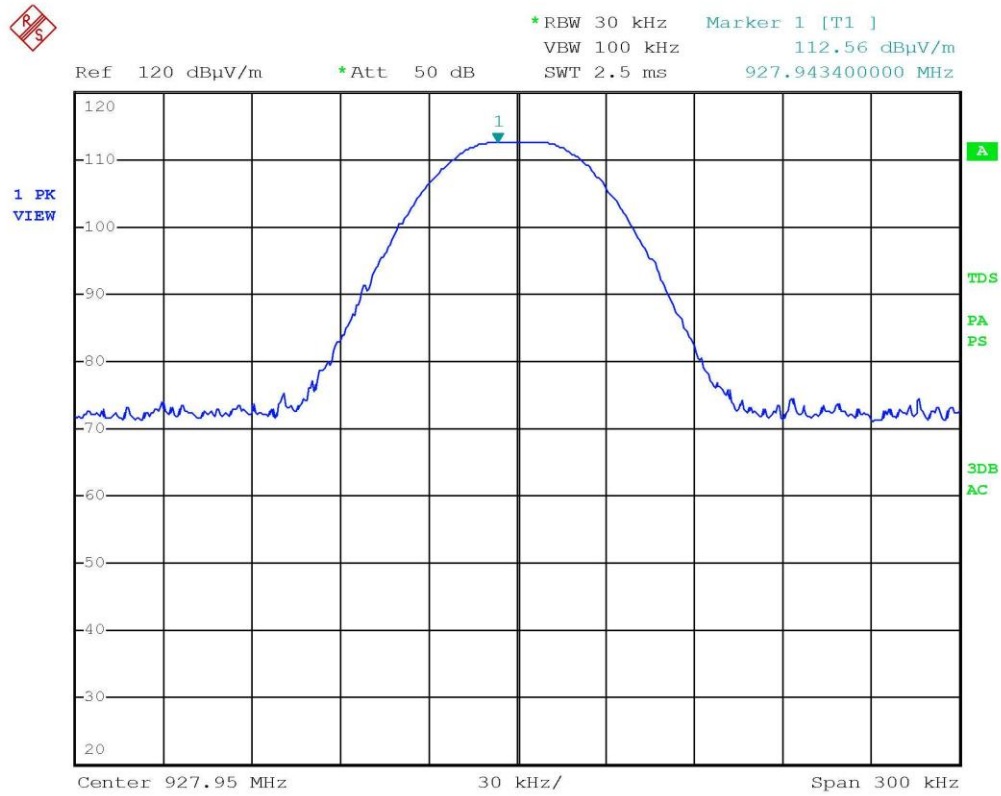
G11162209



Bertezzo 11162209 Horiz -Fmed



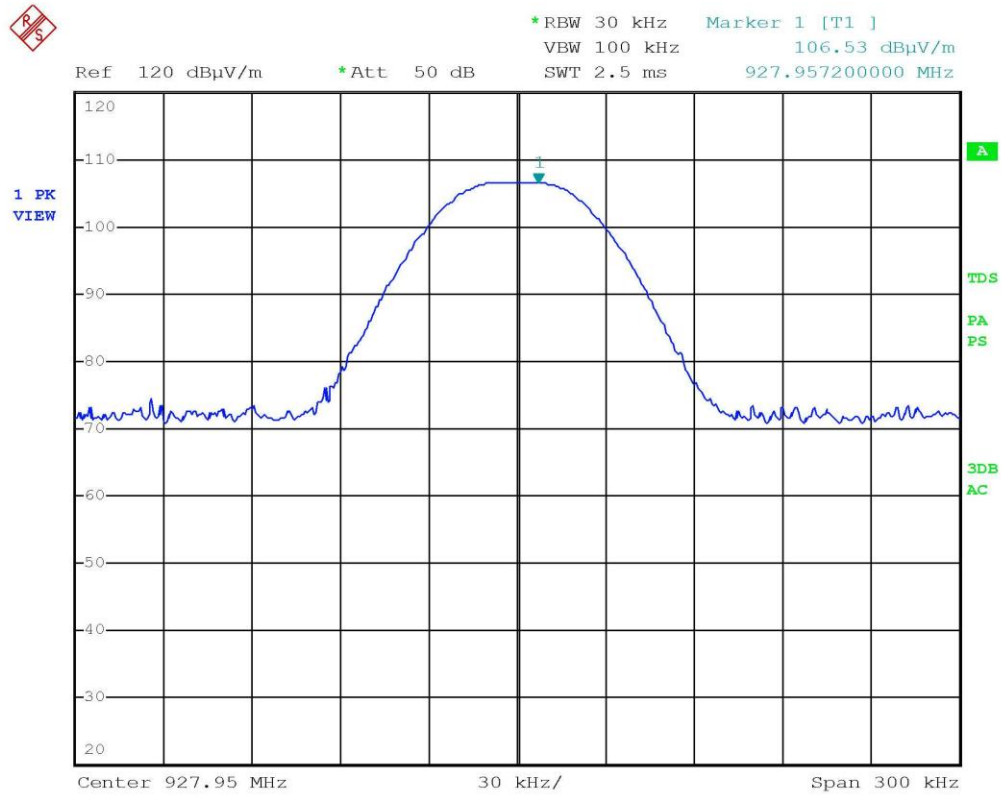
G11162210



Bertezzo 11162210 Horiz -Fmax



G11162211

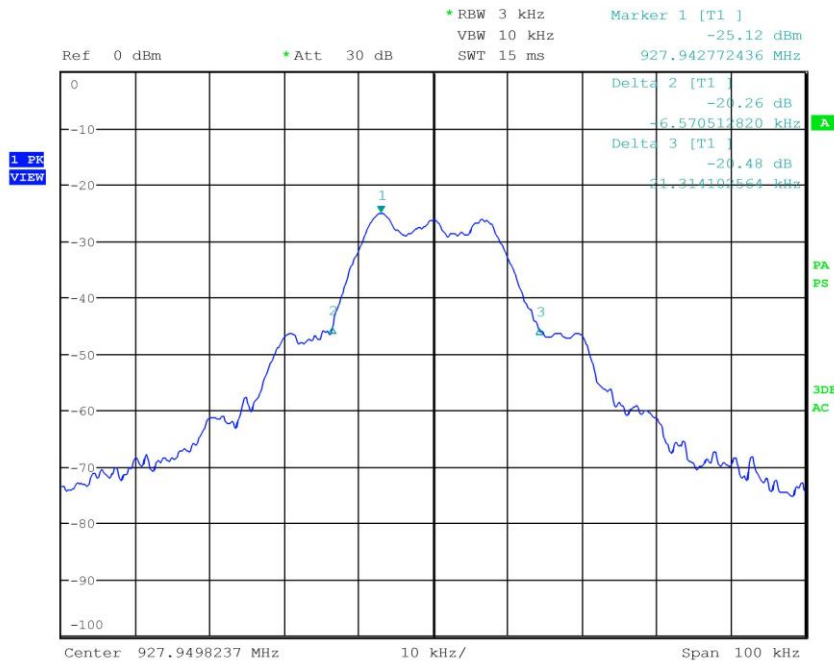


Bertezzo 11162211 Vert -Fmax



G11162212

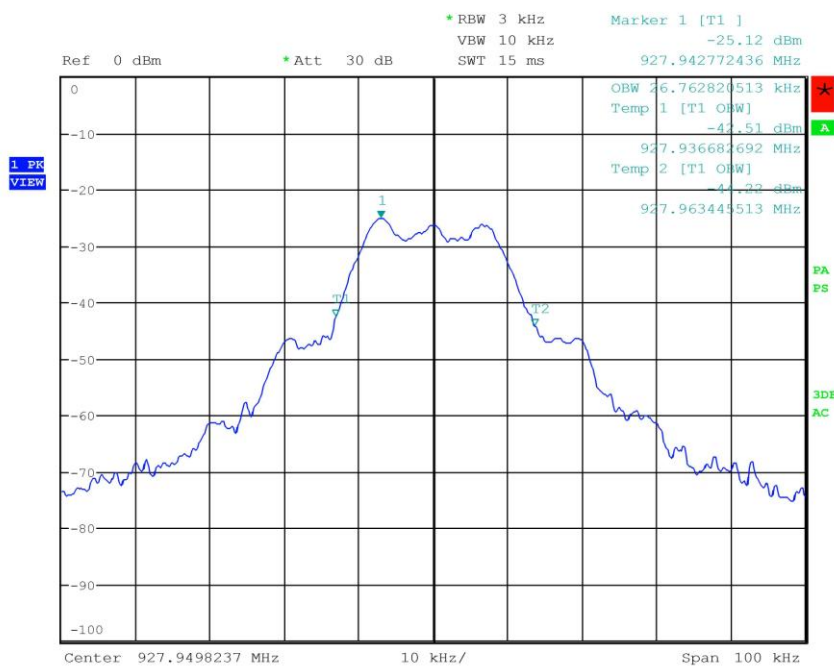
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezzolo 11162212
Test Spec





G11162213

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezolo 11162213
Test Spec

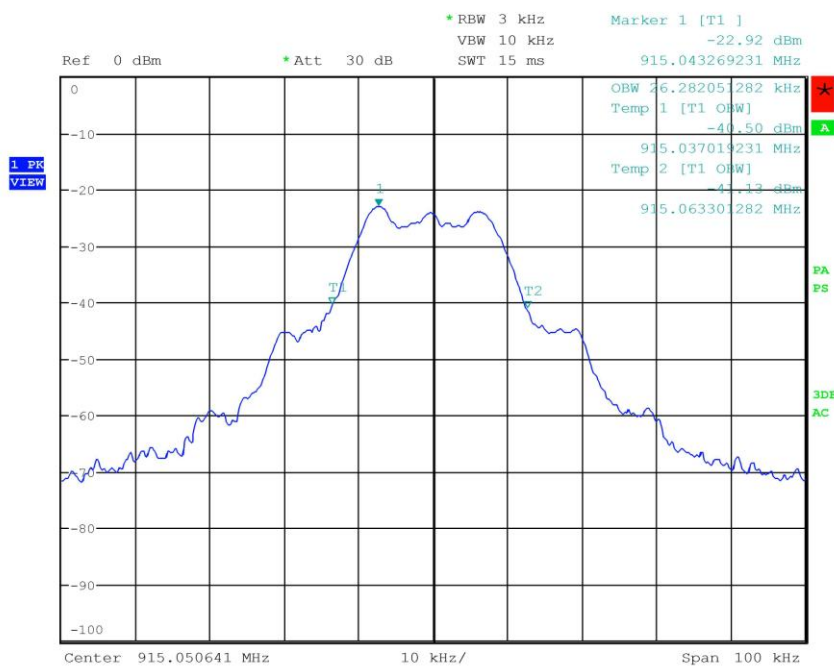


CMC Centro Misure Compatibilità S.r.l.



G11162214

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162214
Test Spec

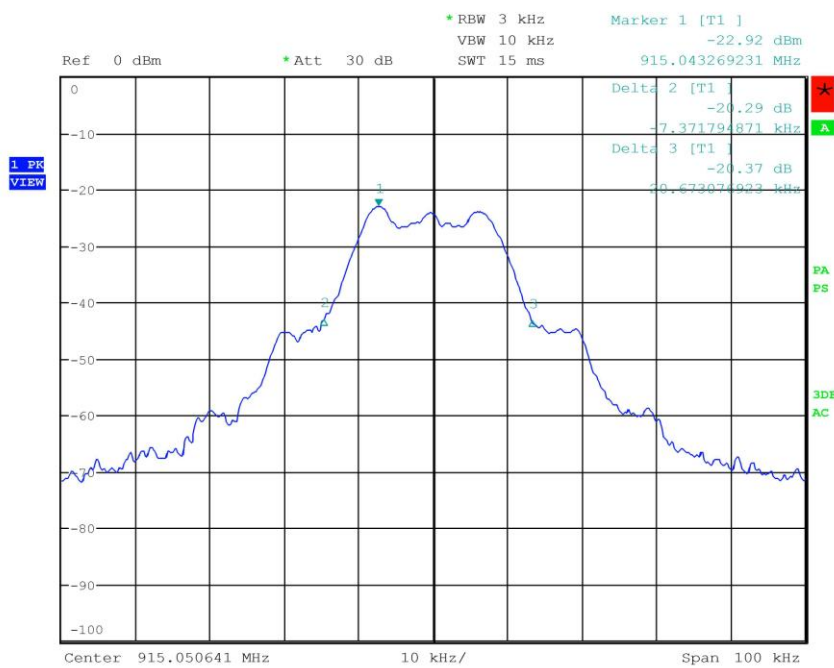


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G11162215

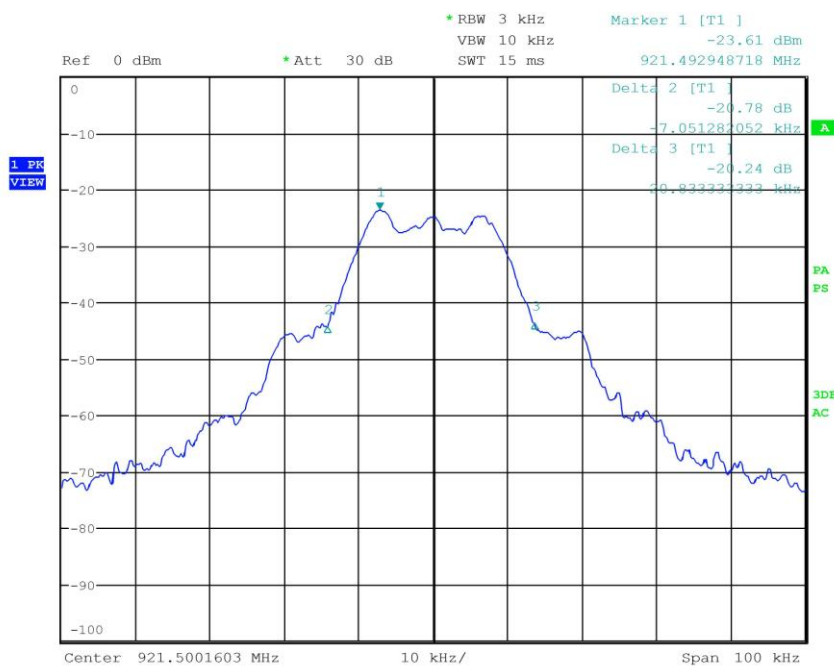
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162215
Test Spec





G11162216

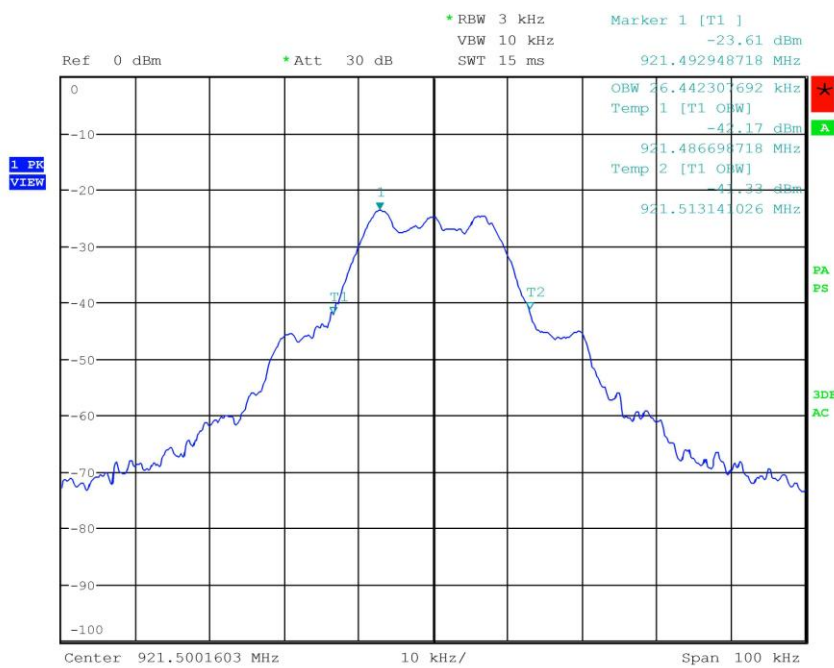
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezolo 11162216
Test Spec





G11162217

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezolo 11162217
Test Spec

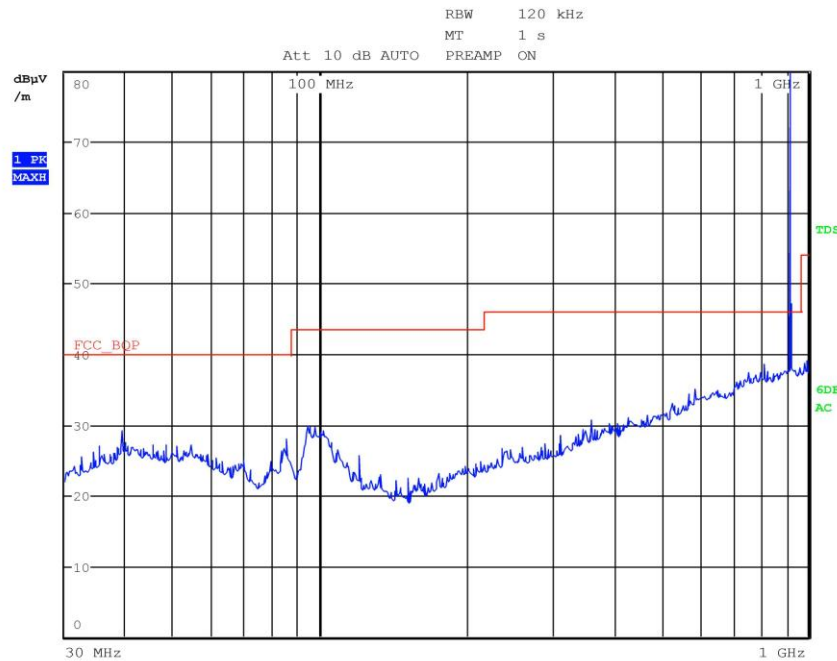


CMC Centro Misure Compatibilità S.r.l.



G11162218

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezzolo
Test Spec
 Vert



Final Measurement

Meas Time: 1 s
 Margin: 6 dB
 Subranges: 11

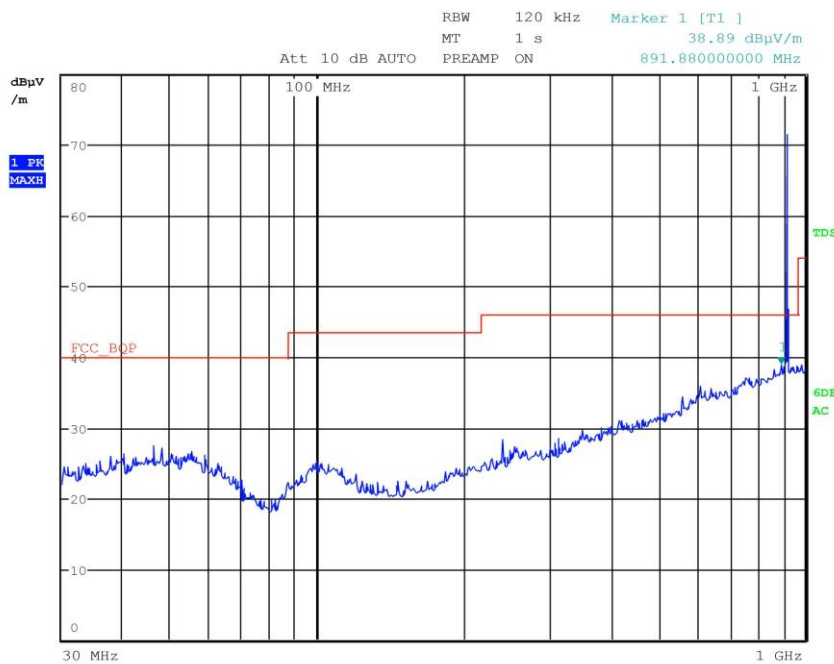
Trace	Frequency	Level (dBµV/m)	Detector	Delta Limit/dB
1	183.560000000 MHz	58.12	Quasi Peak	-14.09
1	191.720000000 MHz	60.33	Quasi Peak	-11.46
1	221.280000000 MHz	52.84	Quasi Peak	-17.54
1	274.000000000 MHz	51.86	Quasi Peak	-18.14
1	315.120000000 MHz	53.47	Quasi Peak	-16.53
1	346.880000000 MHz	52.62	Quasi Peak	-17.38
1	398.280000000 MHz	44.96	Quasi Peak	-25.04
1	495.640000000 MHz	47.70	Quasi Peak	-22.30
1	512.200000000 MHz	49.94	Quasi Peak	-20.06
1	623.400000000 MHz	47.27	Quasi Peak	-22.73
1	855.480000000 MHz	40.93	Quasi Peak	-29.07

CMC Centro Misure Compatibilità S.r.l.



G11162219

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezzolo
Test Spec
 Horiz



Final Measurement

Meas Time: 1 s
 Margin: 6 dB
 Subranges: 11

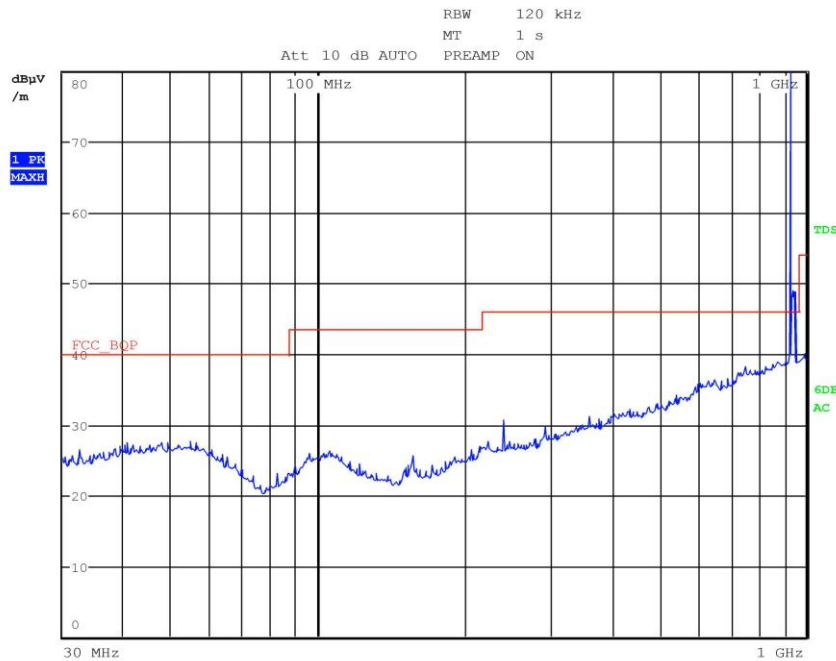
Trace	Frequency	Level (dBµV/m)	Detector	Delta Limit/dB
1	183.560000000 MHz	58.12	Quasi Peak	-14.09
1	191.720000000 MHz	60.33	Quasi Peak	-11.46
1	221.280000000 MHz	52.84	Quasi Peak	-17.54
1	274.000000000 MHz	51.86	Quasi Peak	-18.14
1	315.120000000 MHz	53.47	Quasi Peak	-16.53
1	346.880000000 MHz	52.62	Quasi Peak	-17.38
1	398.280000000 MHz	44.96	Quasi Peak	-25.04
1	495.640000000 MHz	47.70	Quasi Peak	-22.30
1	512.200000000 MHz	49.94	Quasi Peak	-20.06
1	623.400000000 MHz	47.27	Quasi Peak	-22.73
1	855.480000000 MHz	40.93	Quasi Peak	-29.07

CMC Centro Misure Compatibilità S.r.l.



G11162220

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezzo 11162220
Test Spec
Horiz



Final Measurement

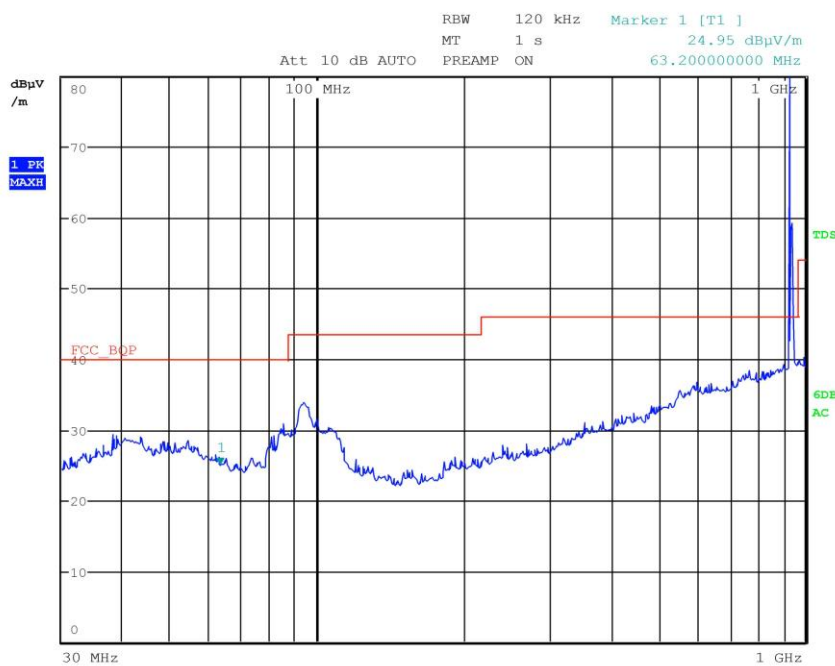
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162221

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162221
Test Spec
Vert



Final Measurement

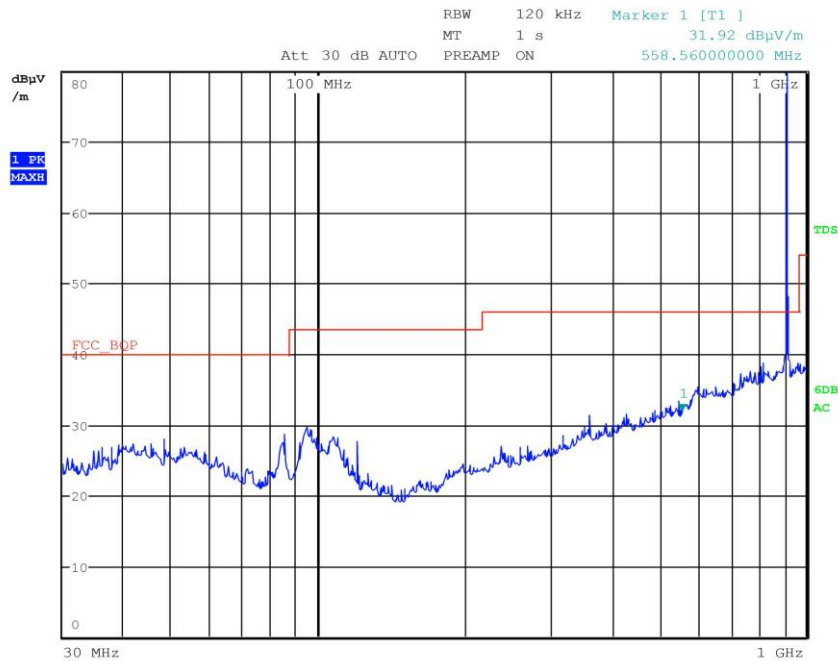
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162222

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezzo 11162222
Test Spec
Vert



Final Measurement

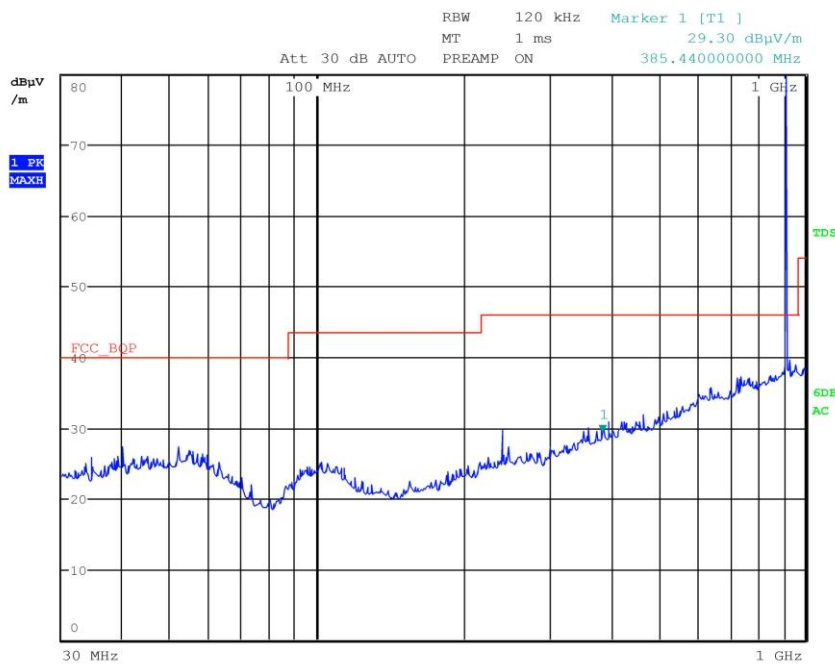
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162224

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezzolo
Test Spec
Horiz



Final Measurement

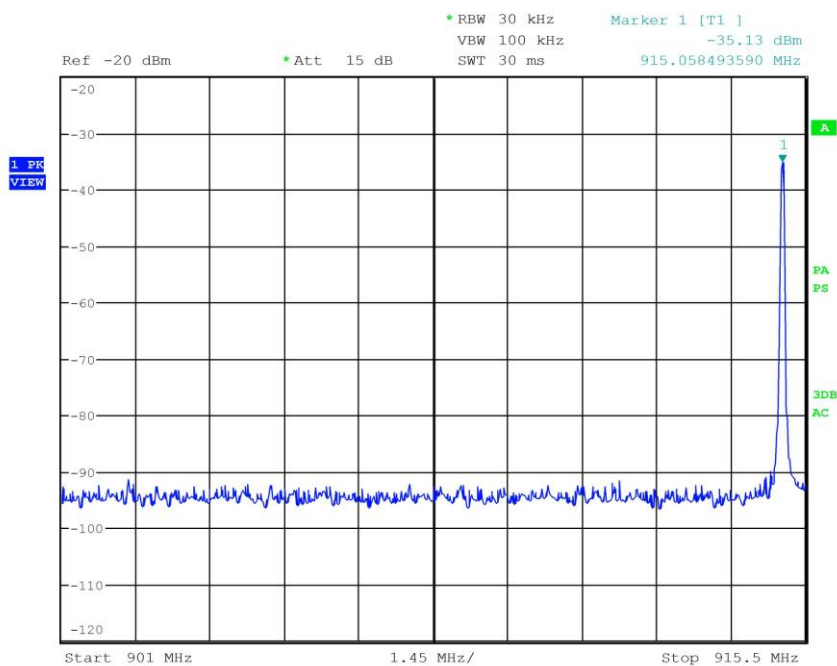
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162225

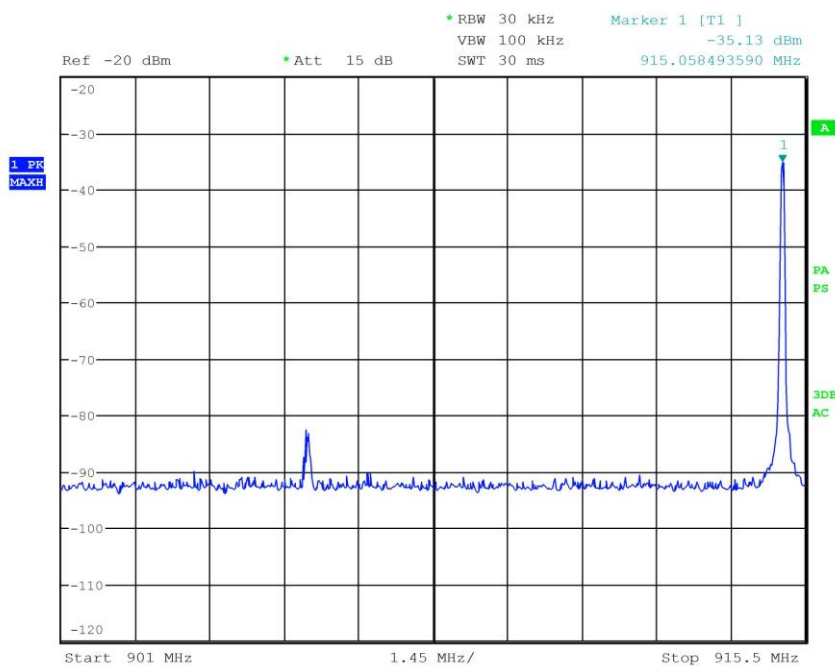
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezzolo
Test Spec





G11162226

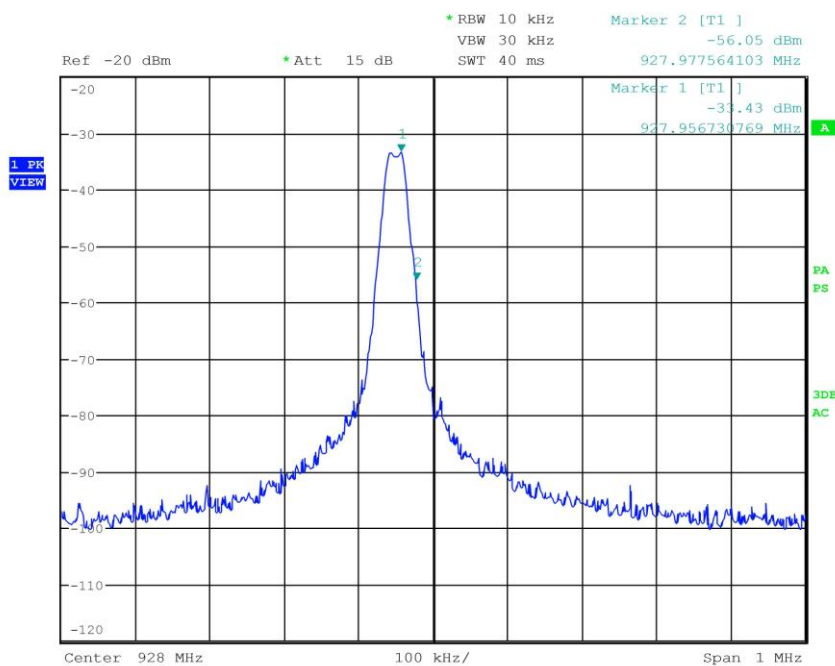
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162226
Test Spec





G11162227

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162227
Test Spec

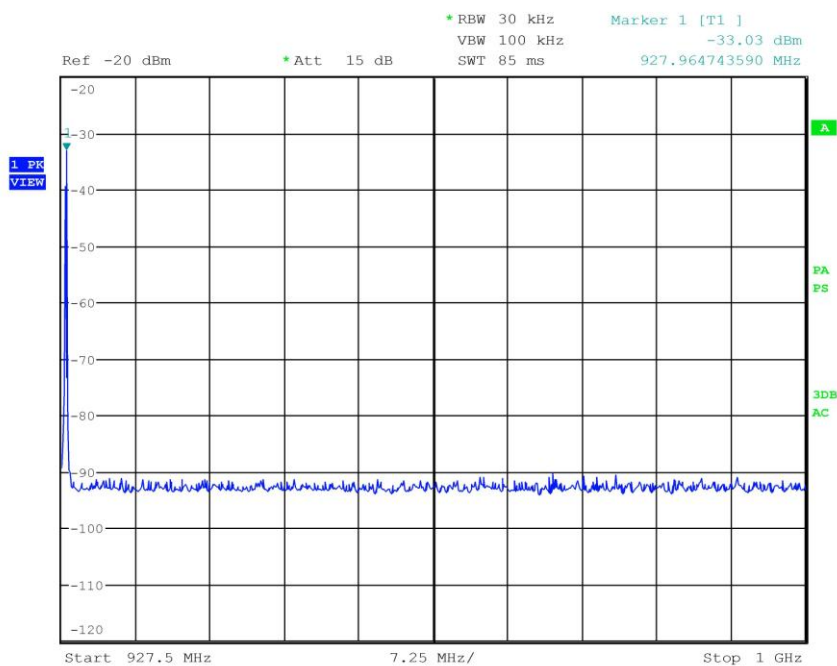


CMC Centro Misure Compatibilità S.r.l.



G11162228

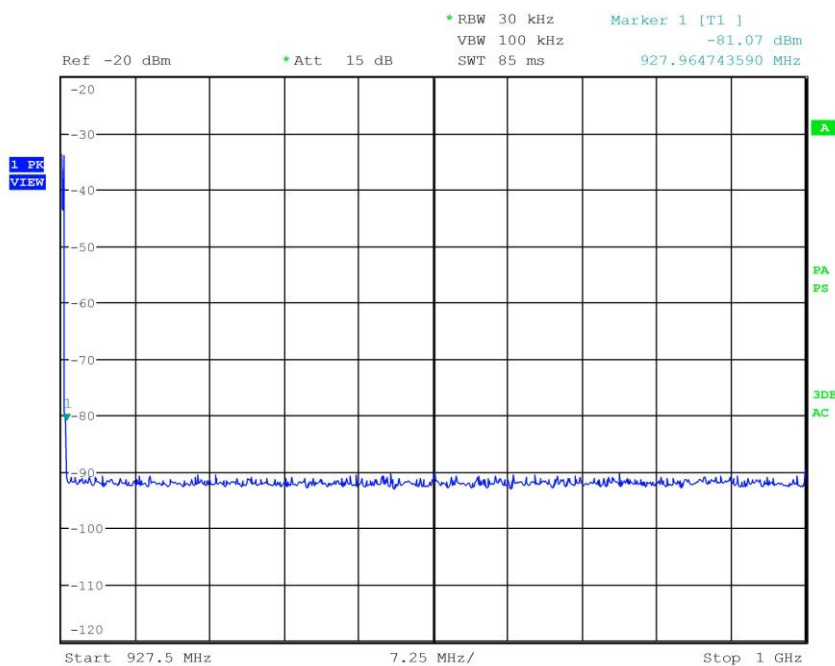
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162228
Test Spec





G11162229

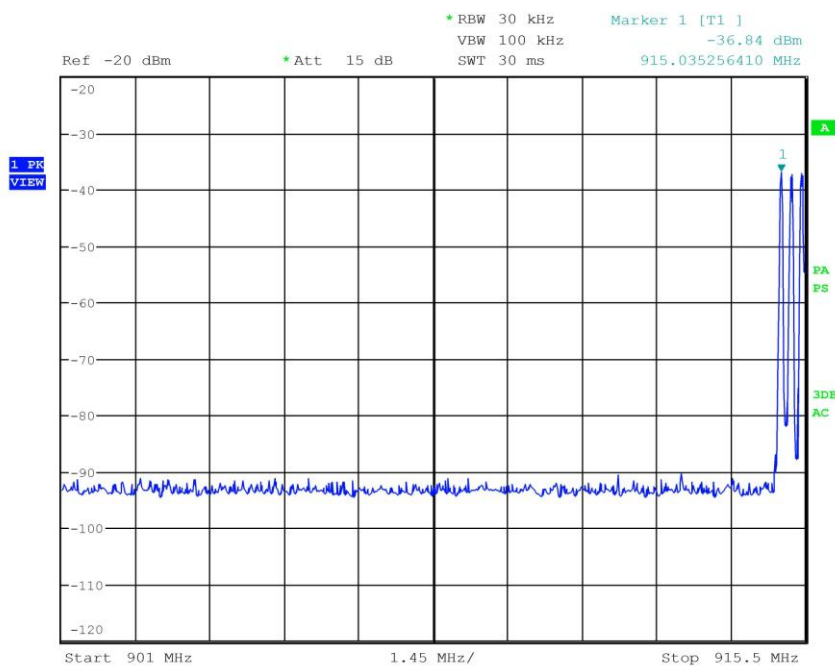
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162229
Test Spec





G11162230

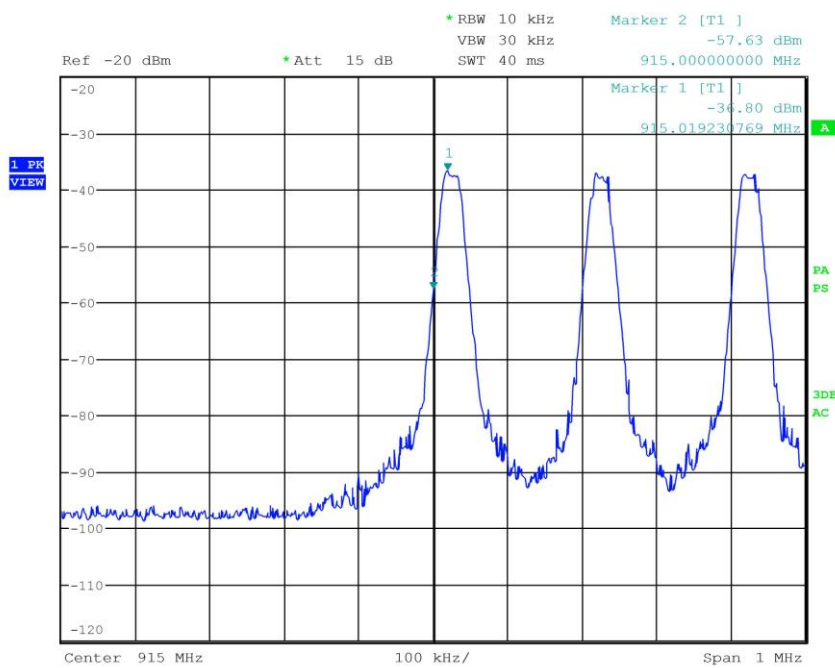
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162230
Test Spec





G11162231

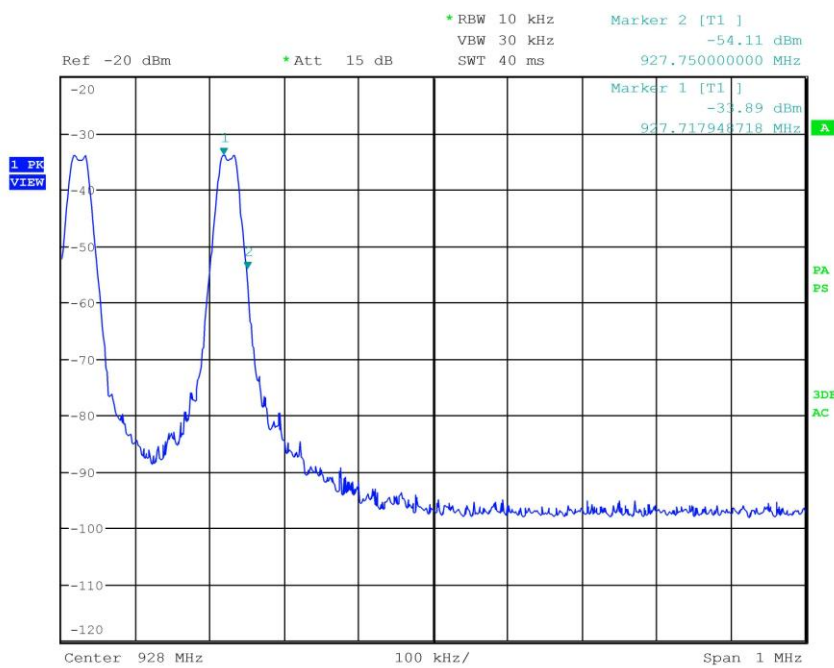
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162231
Test Spec





G11162232

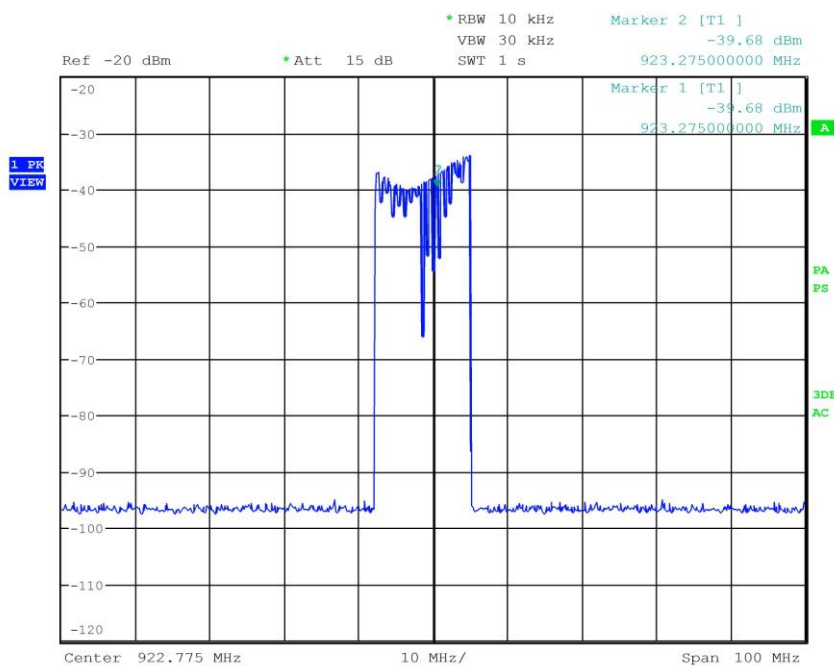
Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162232
Test Spec





G11162233

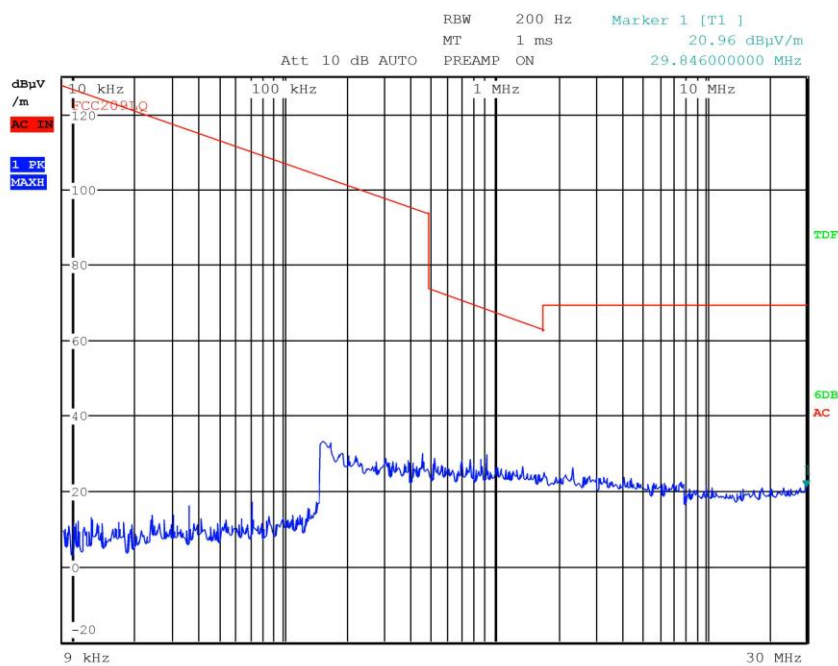
Meas Type
Equipment under Test
Manufacturer
OP Condition
Operator Bertezolo 11162233
Test Spec





G11162234

Meas Type
Equipment under Test
Manufacturer
OP Condition
Operator Bertezolo 11162234
Test Spec



Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162235

Meas Type

Equipment under Test

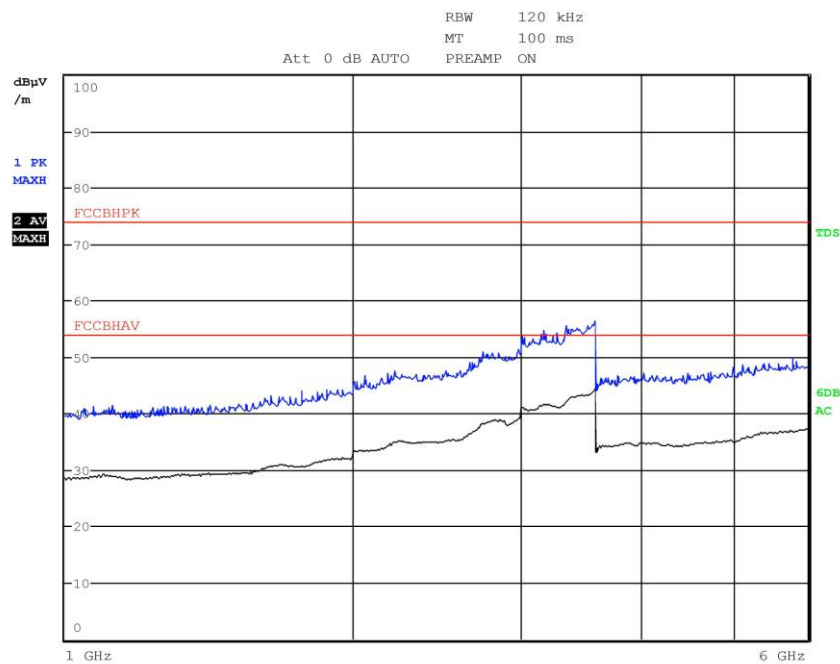
Manufacturer

OP Condition In RX

Operator Bertezolo 11162235

Test Spec

Horiz



Final Measurement

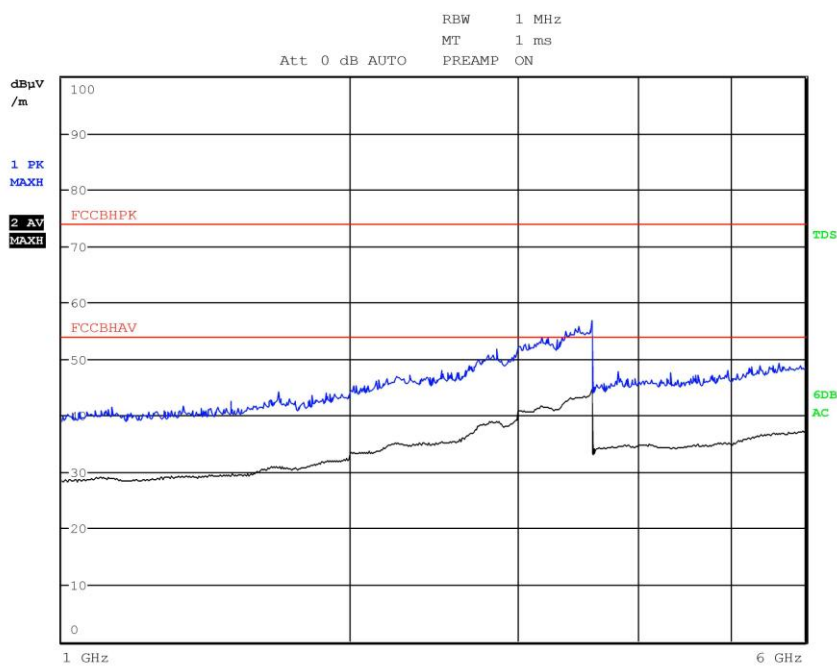
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162236

Meas Type
Equipment under Test
Manufacturer
OP Condition In RX
Operator Bertezolo 11162236
Test Spec
Vert



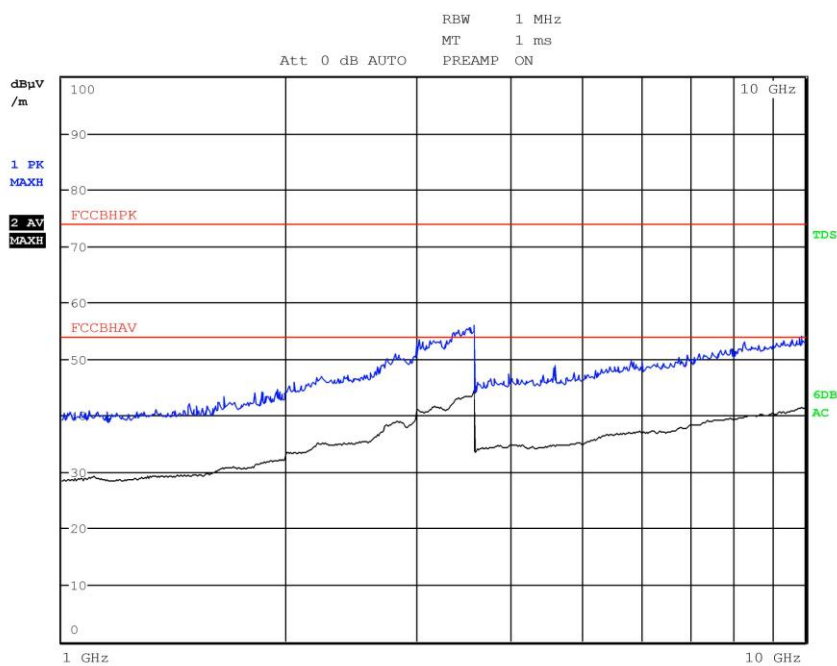
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162237

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162237
Test Spec
Horiz



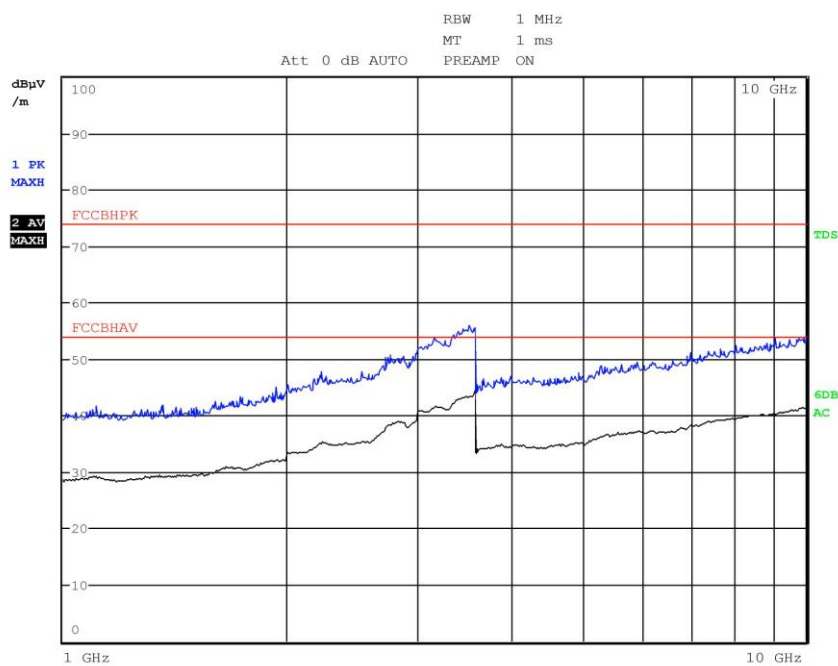
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162238

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmin
Operator Bertezolo 11162238
Test Spec
Vert



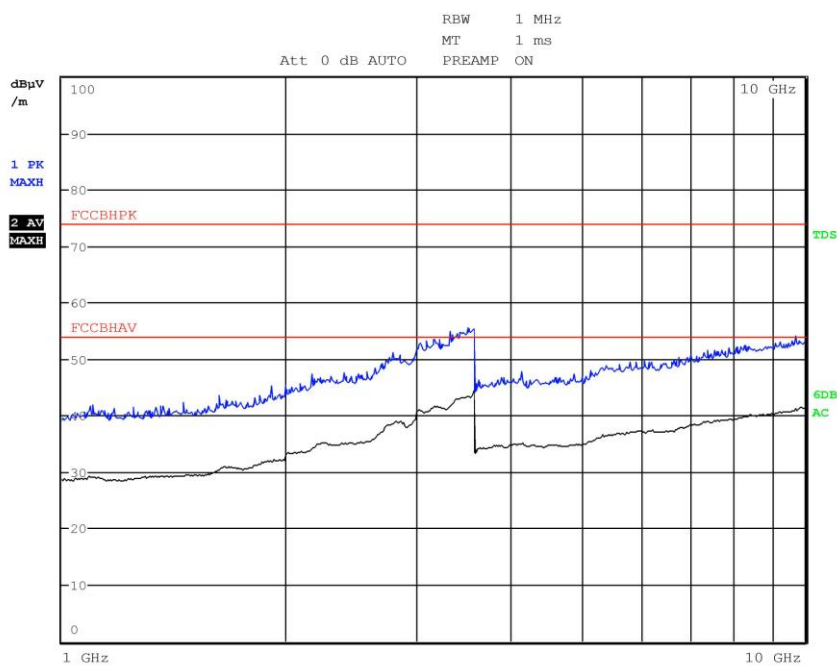
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162239

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezolo 11162239
Test Spec
Vert



Final Measurement

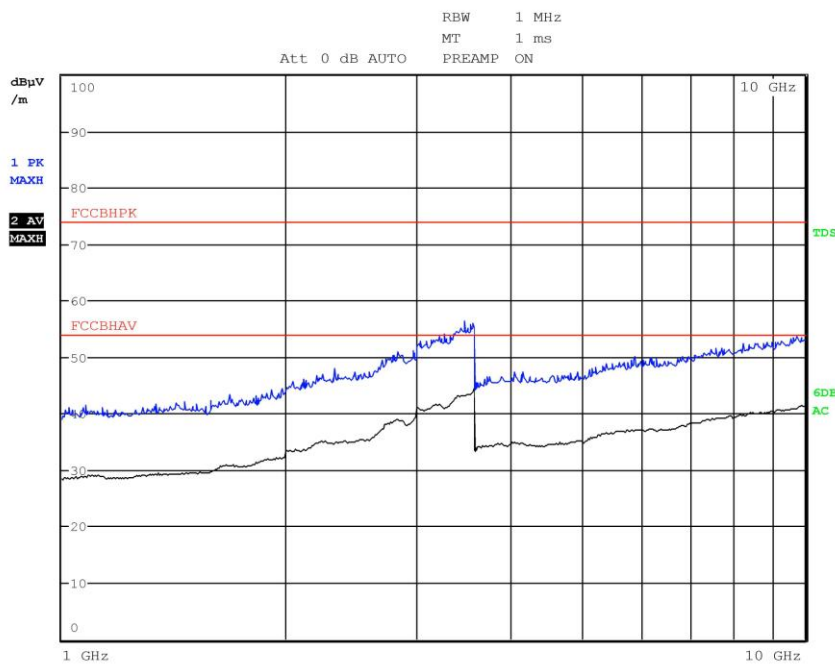
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162240

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmed
Operator Bertezolo 11162240
Test Spec
Horiz



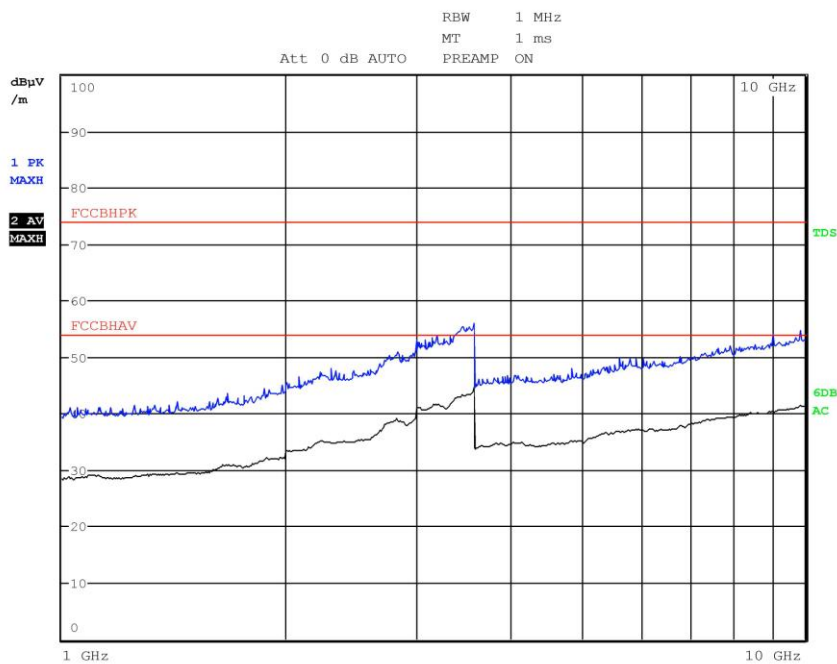
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162241

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162241
Test Spec
Horiz



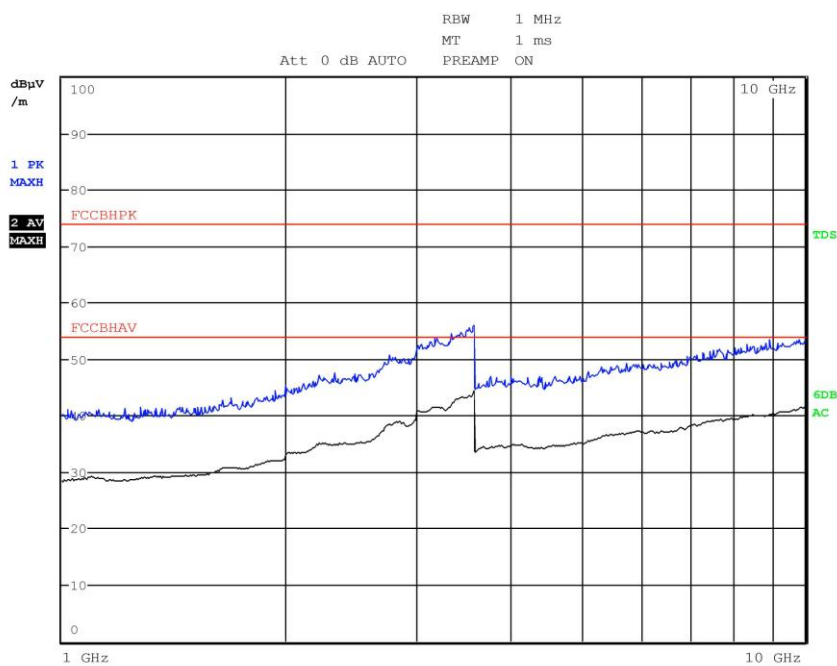
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162242

Meas Type
Equipment under Test
Manufacturer
OP Condition Fmax
Operator Bertezolo 11162242
Test Spec
Vert



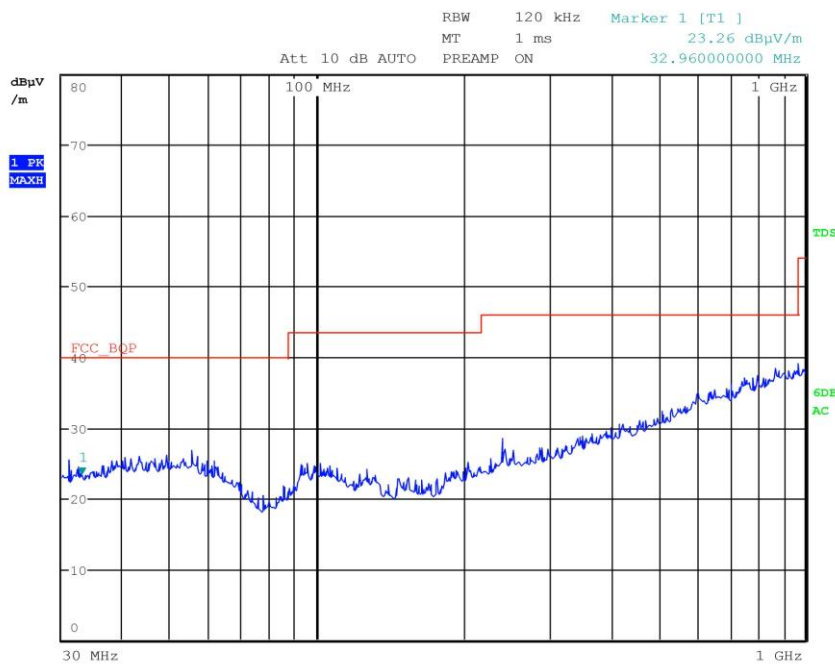
Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0



G11162243

Meas Type
Equipment under Test
Manufacturer
OP Condition RX
Operator Bertezolo 11162243
Test Spec
Horiz



Final Measurement

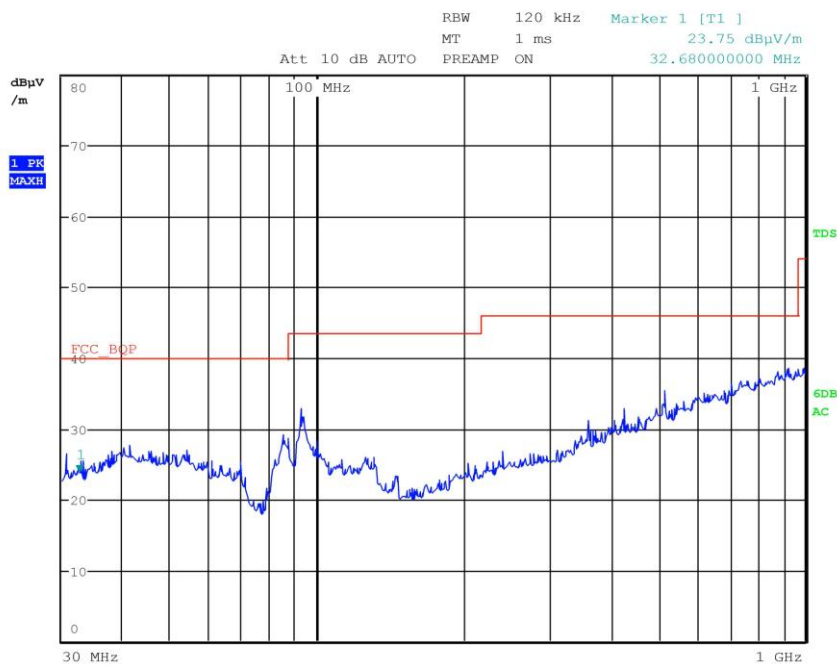
Meas Time: 1 s
Margin: 6 dB
Subranges: 0

CMC Centro Misure Compatibilità S.r.l.



G11162244

Meas Type
Equipment under Test
Manufacturer
OP Condition RX
Operator Bertezolo 11162244
Test Spec
Vert



Final Measurement

Meas Time: 1 s
Margin: 6 dB
Subranges: 0