

Shenzhen Anbotek Compliance Laboratory Limited FCC ID: 2ABY9OMNIA-Q Page 1 of 13 Report No.: SZAWW181115012-02

FCC TEST REPORT

For

Adam Elements International Co., LTD. OMNIA Q 10W Wireless Charging Pad with Breathing lights

Model No.: OMNIA Q

Prepared For	Adam Elements International Co., LTD.
Address	Rm. 3, 10F., No.54, Songjiang Rd., Zhongshan Dist., Taipei City 104,
	Taiwan
Prepared By	Shenzhen Anbotek Compliance Laboratory Limited

Address :

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Report Number	P	SZAWW181115012-02
Date of Test	. Yo	Nov. 15, 2018
Date of Test	tek	Nov. 15~Dec. 04, 2018
Date of Report	100	Dec. 04, 2018



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TEST REPORT

Applicant	Adam Elements International Co., LTD.
Manufacturer	Adam Elements International Co., LTD.
Product Name	: OMNIA Q 10W Wireless Charging Pad with Breathing lights
Model No.	: OMNIA Q
Trade Mark	: N.A. Anbotek Anbotek Anbotek Anbotek Anbotek Anbotek Anbotek
Rating(s)	: Input: DC 5V, 2.1A / 9V, 2A Output: DC 5V, 1A / 9V, 1.1A

Test Standard(s)	eV.	FCC Part 1.1310, 1.1307(b)			
Test Method(s)	:	KDB680106 D01 RF Exposure Wi	ireless (Charging Apps	v03

The device described above is tested by Shenzhen Anbotek Compliance Laboratory Limited to determine the maximum emission levels emanating from the device and the severe levels of the device can endure and its performance criterion. The measurement results are contained in this test report and Shenzhen Anbotek Compliance Laboratory Limited is assumed full of responsibility for the accuracy and completeness of these measurements. Also, this report shows that the EUT (Equipment Under Test) is technically compliant with the FCC Part 1.1307 & KDB680106 D01 requirements.

This report applies to above tested sample only and shall not be reproduced in part without written approval of Shenzhen Anbotek Compliance Laboratory Limited.

Nov. 15~Dec. 04, 2018 Date of Test con Anbotei Prepared By (Engineer / Dolly Mo) Approved Reviewer (Supervisor / Snowy Meng)

Approved & Authorized Signer

(Manager / Sally Zhang)

1. General Information

1.1. Client Information

	-	
Applicant	:	Adam Elements International Co., LTD.
Address	:	Rm. 3, 10F., No.54, Songjiang Rd., Zhongshan Dist., Taipei City 104, Taiwan
Manufacturer	:	Adam Elements International Co., LTD.
Address	:	Rm. 3, 10F., No.54, Songjiang Rd., Zhongshan Dist., Taipei City 104, Taiwan
Factory	:	Adam Elements International Co., LTD.
Address	:	Rm. 3, 10F., No.54, Songjiang Rd., Zhongshan Dist., Taipei City 104, Taiwan

1.2. Description of Device (EUT)

Product Name	:	Wireless Charger	otek Anbolek Anbolek Anbolek Anbolek
Model No.	:	OMNIA Q	Anbotek Anbotek Anbotek Anbotek
Trade Mark	:	N.A. Anbolen Anbo	Anbotek Anbotek Anbotek Anbo
Test Power Supply	:	AC 120V, 60Hz for adapter	ik Anbotek Anbotek Anbotek Ar
Test Sample No.	:	S1(Normal Sample), S2(Engineer	ring Sample)
		Operation Frequency:	111~205KHz
Product		Modulation Type:	MSK of the second secon
Description		Antenna Type:	Inductive loop coil Antenna
		Antenna Gain(Peak):	0 dBi
Remark: 1) For a m User's N			se refer to the manufacturer's specifications or the

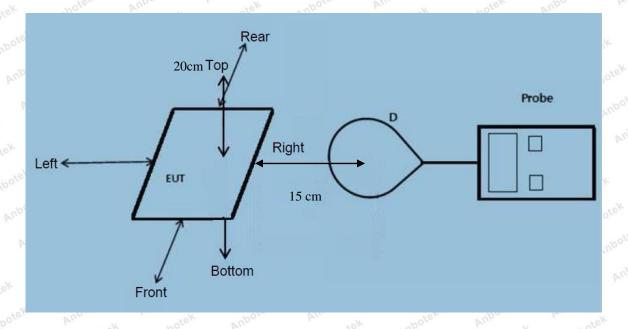
1.3. Auxiliary Equipment Used During Test

Adapter	:	Manufacturer: ZTE
		M/N: STC-A2050I1000USBA-C
		S/N: 201202102100876
		Input: 100-240V~50/60Hz 0.3A
		Output: DC 5V, 1000mA
Mobile Phone	:	Samsung
		An tak abole. Anu i atek anbou Alin ak

Anbotek Product Safety

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1.4. Description Of Test Setup



Note: Measurements should be made from all sides and the top of the primary/client pair, with the 15 cm measured from the center of the probe(s) to the edge of the device

1.5. Test Equipment List

Item	Equipment	Manufacturer	Model No.	Serial No.	Last Cal.	Cal. Interval
1	Magnetic field meter	NARDA	ELT-400	423623	Dec. 24, 2018	1 Year
2	E-Field Probe	Narda	EF0391	Q15221	Nov.17, 2017	3 Year
ote'3	H-Field Probe	Narda	HF3061	Q15835	Nov.17, 2017	3 Year

1.6. Description of Test Facility

The test facility is recognized, certified, or accredited by the following organizations:

FCC-Registration No.: 184111

Shenzhen Anbotek Compliance Laboratory Limited, EMC Laboratory has been registed and fully described in a report filed with the (FCC) Federal Communications Commission. The acceptance letter from the FCC is maintained in our files. Registration No. 184111, July 31, 2017.

ISED-Registration No.: 8058A-1

Shenzhen Anbotek Compliance Laboratory Limited, EMC Laboratory has been registered and fully described in a report filed with the (ISED) Innovation, Science and Economic Development Canada. The acceptance letter from the ISED is maintained in our files. Registration 8058A-1, June 13, 2016.

Test Location

Shenzhen Anbotek Compliance Laboratory Limited.

1/F, Building D, Sogood Science and Technology Park, Sanwei community, Hangcheng Street, Bao'an District, Shenzhen, Guangdong, China.518102

2. Measurement and Result

2.1. Requirements

According to the item 5.b) of KDB 680106 D01v03:

Inductive wireless power transfer applications that meet all of the following requirements are excluded from

submitting an RF exposure evaluation.

1) Power transfer frequency is less that 1 MHz

2) Output power from each primary coil is less than or equal to 15 watts.

3) The transfer system includes only single primary and secondary coils. This includes charging systems that may have multiple primary coils and clients that are able to detect and allow coupling only between individual pairs of coils

4) Client device is inserted in or placed directly in contact with the transmitter

5) Mobile exposure conditions only (portable exposure conditions are not covered by this exclusion)

6) The aggregate H-field strengths at 15 cm surrounding the device and 20 cm above the top surface from all simultaneous transmitting coils are demonstrated to be less than 50% of the MPE limit.

Frequency range (MHz)	Electric field strength (V/m)	Magnetic field strength (A/m)	Power density (mW/cm ²)	Averaging time (minutes)
1	(A) Limits for Occ	cupational/Controlled Ex	posures	
0.3-3.0	614	1.63	*(100)	6
3.0-30	1842/f	4.89/f	*(900/f ²)	6
30-300	61.4	0.163	1.0	6
300-1500	/	1	f/300	6
1500-100,000	/	1	5	6
	(B) Limits for Genera	I Population/Uncontrolle	d Exposure	
0.2.1.24	614	1.62	*(100)	20

Limits For Maximum Permissible Exposure (MPE)

(B) Limits for General Population/Uncontrolled Exposure					
0.3-1.34	614	1.63	*(100)	30	
1.34-30	824/f	2.19/f	*(180/f ²)	30	
30-300	27.5	0.073	0.2	30	
300-1500	/	/	f/1500	30	
1500-100,000	/	/	1.0	30	

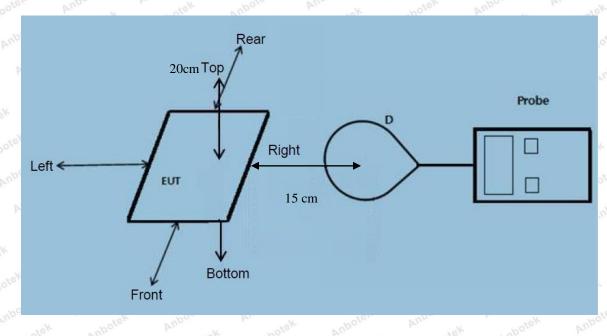
F=frequency in MHz

=Plane-wave equivalent power density

RF exposure compliance will need to be determined with respect to 1.1307(c) and (d) of the FCC rules. The emissions should be within the limits at 300kHz in Table 1 of 1.1310(use the 300kHz limits for 150kHz:614V/m,1.63A/m).

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2.2. Test Setup



Note: Measurements should be made from all sides and the top of the primary/client pair, with the 15 cm measured from the center of the probe(s) to the edge of the device

2.3. Test Procedure

1) The RF exposure test was performed in anechoic chamber.

2) The measurement probe was placed at test distance (15 cm) which is between the edge of the charger and the geometric center of probe.

3) The highest emission level was recorded and compared with limit as soon as measurement of each points

(A, B, C, D, E) were completed.(A is the right, B is the back, C is the left, D is the front, and E is the top.)

4) The EUT was measured according to the dictates of KDB 680106 D01 v03.

Remark;

The EUT's test position A, B, C, D and E is valid for the E and H field measurements

2.4. Test Result

2.4.1. Equipment Approval Considerations item 5.b of KDB 680106 D01 v03.

- 1) Power transfer frequency is less that 1 MHz
 - The device operate in the frequency range 111~205KHz
- 2) Output power from each primary coil is less than 15 watts
 - The maximum output power of the primary coil is 10W.

3) The transfer system includes only single primary and secondary coils. This includes charging systems that may have multiple primary coils and clients that are able to detect and allow coupling only between individual pairs of coils

- The transfer system including a charging system with only single primary coils is to detect and allow only

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between individual pairs of coils.

4) Client device is inserted in or placed directly in contact with the transmitter

- Client device is placed directly in contact with the transmitter.

5) Mobile exposure conditions only (portable exposure conditions are not covered by this exclusion)
 - The EUT is a Mobile Power Pack with Wireless Charger

6) The aggregate H-field strengths at 15 cm surrounding the device and 20 cm above the top surface from all simultaneous transmitting coils are demonstrated to be less than 50% of the MPE limit.

- The EUT E-Field Strength levels at 15 cm & The EUT H-Field Strength levels at 15 cm are less than 50% the MPE limit.

The test results please refer to the section 2.4.2

2.4.2. Environmental evaluation and exposure limit according to FCC CFR 47 part 1, 1.1307(b), 1.1310

Temperature:	23.6° C	Relative Humidity:	53 %
Pressure:	1012 hPa	Test Voltage:	AC 120V, 60Hz for adapter

E-Field Strength at 15 cm surrounding the EUT and 15cm above the top surface of the EUT

	0							
Anu	Frequency	Test	Test	Test Mark	Test	Test	Reference	Limits
Battery	Range	Position	Position	Position	Position	Position	Limit	Test
power	(KHz)	ek A Anb	B	С	Dek	E	(V/m)	(V/m)
ten Aup	otek N	botek I	nboto	Ann botek	Anbotek	Aupor	ek nbc	Lek P
1%	111~205	0.35	0.28	0.36	0.64	0.41 Anbo	307 Minut	614
Anbotek	Anbo	Anbotek	Anbote	Anbore	O' D'	10- 1-	bor A	abotek
Anbotek	Anbou	Anbote	Anbo	otek pri	nbotek	Anbotek	Anborntek	A. nbotek
50%	111~205	1.87	1.72 N	1.47	1.61	1.83	307	614
ak Anbo	lek Anbo	tek pi	nbotek	Anboten	Anbotek	Anbotek	Anbolo	
otek Ar	boten An	po potek	Anbotek	Anbore	And	ek Anbot	ek Aupo	. tek
99%	111~205	2.28	2.09	2.91	2.67	2.16	o ^{ote^N307}	614
Anny hotek	Anbotek	Anbou	Annbot	ek Anb	sten An	pot r		
Am	Anbotek	Aupor	0.0	potek p	nboten	Anubotek	Anbotek	Anboter
Stand-by	111~205	0.23	0.80	0.54	0.82	0.67		614
Anu	otek Ant	otek A	upor tek	photek	Anbotek	Ano	ak anbot	

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Battery	Frequency	Test	Test	Test	Test	Test	Reference	Limits
100-	Range	Position	Position	Position	Position	Position	Limit	Test
power	(KHz)	A	boterB	nboteC	Anbo D	Entek	(A/m)	(A/m)
tek Ant	otek Anb	otek pr	abotek	Anboten	Anote	K Anbote	& Anboro	Nek Ar
1%	111~205	0.058	0.062	0.043	0.049	0.098	0.815	1.63
bo votek	Anbotek	Anbote	And	K Anbot	ek Anb	or An	nbotek p	
Ann botek	Anbotek	Anboth	ek no	otek An	poter p	inbo botek	Anbotek	Anboro
50%	111~205	0.36	0.32	0.55	0.47	0.49	0.815	1.63
Anbo	stek anbr	stek An	poter p	In botek	Anbotek	Anbortel	Annobotel	
en Aup	Lotek A	nbotek	Anbors	An	Anbote	Anbo		btek.
99%	111~205	0.25	0.41	0.57	0.40	otek 0.48 Anbr	0.815	1.63
Anbotek	Anbou	Anbotek	Anbote	And	otek p	nbotek A	nbold A	
Anboten	Anbo	Anbot	sk Anbr	rek Au	nbotek	Anbotek	Anbo	Anbot
Stand-by	111~205	0.39	0.45	0.36	0.06	0.35	0.815	1.63
ek Anbr	stek Anbo	stek An	nbotek	Anboten	Anbe	Anbotek	Anbote	

H-Field Strength at 15 cm surrounding the EUT and 20cm above the top surface of the EUT

Remark: All the conditions have been tested. It is found that 10W is the worst mode, and the data in the report only reflects the worst mode.

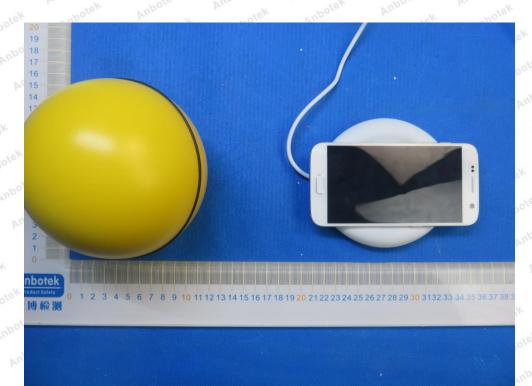


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APPENDIX I -- TEST SETUP PHOTOGRAPH



Photo of MPE Measurement



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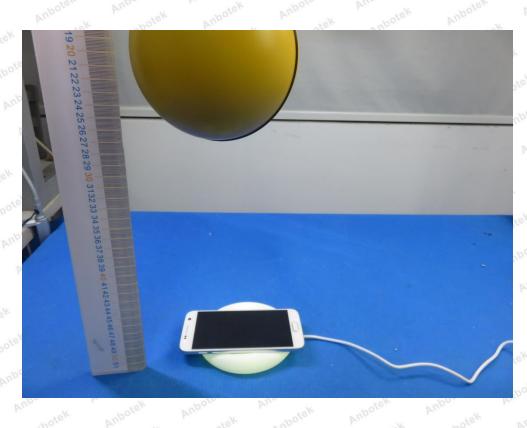


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