

## **RF Exposure Report**

Report No.: SA140402E02G

FCC ID: HEDAC866

Test Model: SF-AC866-1, SF-AC866

Series Model: ECWO4320, ECWO4320-C, ECWO4320-L, ECWO4324, ECWO4324-C,

ECWO4324-L

Received Date: Mar. 19, 2015

**Test Date:** Mar. 19 to Apr. 10, 2015

**Issued Date:** Apr. 30, 2015

**Applicant:** Accton Technology Corporation

Address: No.1, Creation Rd. III, Science-based Industrial Park, Hsinchu, Taiwan,

R.O.C.

Issued By: Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch

Hsin Chu Laboratory

Lab Address: No. 81-1, Lu Liao Keng, 9th Ling, Wu Lung Tsuen, Chiung Lin Hsiang, Hsin

Chu Hsien 307, Taiwan R.O.C.

Test Location (1): No. 81-1, Lu Liao Keng, 9th Ling, Wu Lung Tsuen, Chiung Lin Hsiang, Hsin

Chu Hsien 307, Taiwan R.O.C.

Test Location (2): No. 49, Ln. 206, Wende Rd., Shangshan Tsuen, Chiung Lin Hsiang, Hsin

Chu Hsien 307, Taiwan R.O.C.

This report is for your exclusive use. Any copying or replication of this report to or for any other person or entity, or use of our name or trademark, is permitted only with our prior written permission. This report sets forth our findings solely with respect to the test samples identified herein. The results set forth in this report are not indicative or representative of the quality or characteristics of the lot from which a test sample was taken or any similar or identical product unless specifically and expressly noted. Our report includes all of the tests requested by you and the results thereof based upon the information that you provided to us. You have 60 days from date of issuance of this report to notify us of any material error or omission caused by our negligence, provided, however, that such notice shall be in writing and shall specifically address the issue you wish to raise. A failure to raise such issue within the prescribed time shall constitute your unqualified acceptance of the completeness of this report, the tests conducted and the correctness of the report contents. Unless specific mention, the uncertainty of measurement has been explicitly taken into account to declare the compliance or non-compliance to the specification.

Report No.: SA140402E02G Page No. 1 / 7 Report Format Version: 6.1.1

Reference No.: 150304E07, 150305E06



## **Table of Contents**

R	elea	se Control Record	3
1		Certificate of Conformity	4
2		RF Exposure	5
	2.1	Limits for Maximum Permissible Exposure (MPE)	5
	2.2	MPE Calculation Formula	5
	2.3	Classification	5
	2.4	Antenna Gain	6
3		Calculation Result of Maximum Conducted Power	7



## **Release Control Record**

Issue No.	Description	Date Issued
SA140402E02G	Original release.	Apr. 30, 2015

Report No.: SA140402E02G Page No. 3 / 7 Report Format Version: 6.1.1



## 1 Certificate of Conformity

Product: 5GHz Outdoor AP, 802.11ac Outdoor 5GHz Access Point

Brand: IgniteNet, Edge-CorE

Test Model: SF-AC866-1, SF-AC866

Series Model: ECWO4320, ECWO4320-C, ECWO4320-L, ECWO4324, ECWO4324-C,

ECWO4324-L

Sample Status: ENGINEERING SAMPLE

**Applicant:** Accton Technology Corporation

Test Date: Mar. 19 to Apr. 10, 2015

Standards: FCC Part 2 (Section 2.1091)

KDB 447498 D03

**IEEE C95.1** 

The above equipment has been tested by **Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch**, and found compliance with the requirement of the above standards. The test record, data evaluation & Equipment Under Test (EUT) configurations represented herein are true and accurate accounts of the measurements of the sample's EMC characteristics under the conditions specified in this report.

Prepared by: \_\_\_\_\_\_\_, Date: \_\_\_\_\_\_\_, Apr. 30, 2015

Approved by : \_\_\_\_\_\_\_, Date: \_\_\_\_\_\_\_, Apr. 30, 2015

May Chen Manager



## 2 RF Exposure

## 2.1 Limits for Maximum Permissible Exposure (MPE)

Frequency Range (MHz)	, , , , , , , , , , , , , , , , , , , ,							
	Limits For General Population / Uncontrolled Exposure							
300-1500 F/1500 30								
1500-100,000			1.0	30				

F = Frequency in MHz

## 2.2 MPE Calculation Formula

 $Pd = (Pout*G) / (4*pi*r^2)$ 

where

Pd = power density in mW/cm<sup>2</sup>

Pout = output power to antenna in mW

G = gain of antenna in linear scale

Pi = 3.1416

R = distance between observation point and center of the radiator in cm

## 2.3 Classification

The antenna of this product, under normal use condition, is at least 20cm away from the body of the user. So, this device is classified as **Mobile Device**.



### 2.4 Antenna Gain

1. The antennas provided to the EUT, please refer to the following table:

External antenna 1 (Single Band Ant.)	External	antenna 1	(Single	<b>Band Ant.</b>
---------------------------------------	----------	-----------	---------	------------------

Brand Name: Cortec / Model Name: AN5000-0301RS

Diana Name	. Contec /	Wodel Nan	16. ANSOOO-	030110					
Transmitter Circuit	Antenna Co	Antenna Connecter Type Type	Antenna	Inside	EUT	Outsid	le EUT		Frequency
			Gain(dBi) <excluding cable loss&gt;</excluding 	Cable Loss (dB)	Cable Length (mm)	Cable Loss (dB)	Cable Length (mm)	Net. Gain (dBi)	range (MHz to MHz)
Chain (0)	Dipole	RP-SMA	2.7	1.2	250	2.9	500	-1.4	5150~5850
Chain (1)	Dipole	RP-SMA	2.7	1.2	250	2.9	500	-1.4	5150~5850

Internal antenna 1 (Single Band Ant.)
Brand Name: Accton / Model Name: 123800000297A

	Transmitter Circuit	Antenna Type	Connecter Type	Antenna Gain(dBi)	Frequency range (MHz to MHz)
	Chain (0)	Patch Array	MMCX	13.81	5150~5850
-	Chain (1)	Patch Array	MMCX	13.72	5150~5850

# Internal antenna 2 (Single Band Ant.) Brand Name: NA / Model Name: NA

Transmitter Circuit	Antenna Type	Connecter Type	Antenna Gain(dBi)	Frequency range (MHz to MHz)
Chain (0)	Patch Array	MMCX	8	5150~5850
Chain (1)	Patch Array	MMCX	8	5150~5850

## Note:

1. For 802.11a mode will fix transmission on Chain (0)



## 3 Calculation Result of Maximum Conducted Power

## For External antenna 1:

Frequency Band (MHz)	Max Power (mW)	Antenna Gain (dBi)	Distance (cm)	Power Density (mW/cm²)	Limit (mW/cm²)
5180-5240, 5745-5825 (1TX mode)	265.461	-1.4	20	0.03826	1
5180-5240, 5745-5825 (2TX mode)	283.351	-1.4	20	0.04084	1

## For Internal antenna 1:

1 of internal antenna 1.						
Frequency Band (MHz)	Max Power (mW)	Antenna Gain (dBi)	Distance (cm)	Power Density (mW/cm <sup>2</sup> )	Limit (mW/cm²)	
5180-5240, 5745-5825 (1TX mode)	142.561	13.81	20	0.68191	1	
5180-5240, 5745-5825 (2TX mode)	130.78	13.81	20	0.62556	1	

--- END ---