RF Exposure Report

Report No.:	SA120524E01G
FCC ID:	PY312200202
Test Model:	WNDAP620
Received Date:	May 24, 2012
Test Date:	May 31 to June 01, 2012 and Sep. 21, 2015
Issued Date:	Sep. 30, 2015
Applicant:	Netgear Incorporated.
Address:	350 East Plumeria Drive San Jose California United States 95134
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.
Test Location (3):	E-2, No.1, Li Hsin 1st Road, Hsinchu Science Park, Hsinchu City 300, Taiwan R.O.C.

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Release Control Record

Issue No.	Description	Date Issued
SA120524E01G	Original release.	Sep. 30, 2015

1 Certificate of Conformity

Product:	ProSafe 3x3 Single Radio, Dual Band Wireless-N Access Point
Brand:	Netgear
Test Model:	WNDAP620
Sample Status:	ENGINEERING SAMPLE
Applicant:	Netgear Incorporated.
Test Date:	May 31 to June 01, 2012 and Sep. 21, 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:** Sep. 30, 2015

Claire Kuan / Specialist

Approved by : _____ , **Date:** Sep. 30, 2015

May Chen / Manager

2 RF Exposure

2.1 Limits for Maximum Permissible Exposure (MPE)

Frequency Range (MHz)	Electric Field Strength (V/m)	Magnetic Field Strength (A/m)	Power Density (mW/cm^2)	Average Time (minutes)
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^2

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

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

Internal Antenna (For 2.4GHz / 5GHz)				
Transmitter Circuit	Antenna Type	Peak Gain (dBi)		
		2.4GHz	5GHz Band 1	5GHz Band 4
Chain (0)	Dipole	2.3	5.9	5.3
Chain (1)	Dipole	2.3	5.9	4.9
Chain (2)	Dipole	2.3	5	5.2

External Antenna (For 2.4GHz)					
Model	Antenna Type	Gain (dBi) (Exclude cable loss)	Cable Loss (dB)	Net Gain (dBi) (Include cable loss)	Connecter Type
ANT-32405	Dipole	5	3.68	1.32	SMA Plug Reverse

3 Calculation Result of Maximum Conducted Power

15.247 (2.4GHz) data was copied from the original test report (Report No.: SA120524E01)

Frequency Band (MHz)	Max Power (mW)	Antenna Gain (dBi)	Distance (cm)	Power Density (mW/cm^2)	Limit (mW/cm^2)
2412-2462	587.684	7.07	20	0.59549	1
5180-5240	45.508	10.38	20	0.09881	1
5745-5825	140.777	9.91	20	0.27432	1

NOTE:
2.4GHz: Directional gain = 2.3dBi + 10 log (3)= 7.07 dBi
5GHz (5150-5250MHz): Directional gain = 10 log[$(10^{G1/20} + 10^{G2/20} + 10^{G3/20})^2$ / 3] = 10.38dBi
5GHz (5725-5850MHz): Directional gain = 10 log[$(10^{G1/20} + 10^{G2/20} + 10^{G3/20})^2$ / 3] = 9.91dBi

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