RF Exposure Report

Report No.:	SA171005D11
FCC ID:	PY317300391
Test Model:	R6350
Received Date:	Oct. 5, 2017
Test Date:	Oct. 31 ~ Dec. 11, 2017
Issued Date:	Dec. 14, 2017
Applicant:	NETGEAR INC.
Address:	350 East Plumeria Drive, San Jose, CA 95134, USA
Issued By:	Bureau Veritas Consumer Products Services (H.K.) Ltd., Taoyuan Branch
Lab Address:	No. 47-2, 14th Ling, Chia Pau Vil., Lin Kou Dist., New Taipei City, Taiwan, R.O.C.

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Release Control Record

Issue No.	Description	Date Issued
SA171005D11	Original release.	Dec. 14, 2017

1 Certificate of Conformity

Product:	AC1600 Smart WiFi Router
Brand:	NETGEAR
Test Model:	R6350
Sample Status:	Engineering sample
Applicant:	NETGEAR INC.
Test Date:	Oct. 31 ~ Dec. 11, 2017
Standards:	FCC Part 2 (Section 2.1091) KDB 447498 D01 General RF Exposure Guidance v06 IEEE C95.1-1992

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 : Annie Chang , **Date:** Dec. 14, 2017

Annie Chang / Senior Specialist

Approved by : Rex. Lai , **Date:** Dec. 14, 2017

Rex Lai / Associate Technical 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 25cm away from the body of the user. So, this device is classified as **Mobile Device**.

2.4 Calculation Result Of Maximum Conducted Power

Frequency Band (MHz)	Max Power (dBm)	Antenna Gain (dBi)	Distance (cm)	Power Density (mW/cm^2)	Limit (mW/cm^2)
2412-2462	27.73	5.89	25	0.2930	1
5180-5240	28.60	6.92	25	0.4538	1
5745-5825	29.19	7.28	25	0.5648	1

NOTE:
2.4GHz: Directional gain = 5.89dBi
5180-5240MHz: Directional gain = 6.92dBi
5745-5825MHz: Directional gain = 7.28dBi

Conclusion:

The formula of calculated the MPE is:

CPD1 / LPD1 + CPD2 / LPD2 + ……etc. < 1

CPD = Calculation power density

LPD = Limit of power density

WLAN 2.4GHz + WLAN 5GHz = 0.2930 + 0.5648 = 0.8578

Therefore the maximum calculations of above situations are less than the “1” limit.