



EMC Test Data

Client:	Griffin	Job Number:	J69258
Model:	iTrip SE	Test-Log Number:	T69263
		Project Manager:	Sheareen Washington
Contact:	Jeff Altheide		
Emissions Spec:	FCC 15.239	Class:	B
Immunity Spec:	EN304 489-9	Environment:	-

EMC Test Data

For The

Griffin

Model

iTrip SE

Date of Last Test: 12/21/2007



EMC Test Data

Client:	Griffin	Job Number:	J69258
Model:	iTrip SE	Test-Log Number:	T69263
		Project Manager:	Sheareen Washington
Contact:	Jeff Altheide		
Emissions Spec:	FCC 15.239	Class:	B
Immunity Spec:	EN304 489-9	Environment:	-

EUT INFORMATION

The following information was collected during the test sessions(s).

General Description

The EUT is a FM transmitter that is designed to transmit audio signals from an iPod to an FM receiver. The EUT would typically be connected to an Apple iPod NANO. Therefore, the EUT was tested with an iPod NANO and treated as hand held. The EUT is powered from the iPod.

Equipment Under Test

Manufacturer	Model	Description	Serial Number	FCC ID
SDR Electronics	iTrip Direct Attach 2007	FM Transmitter	-	VKM4052

EUT Antenna (Intentional Radiators Only)

The antenna is integral to the device.

EUT Enclosure

The EUT enclosure is primarily constructed of plastic. It measures approximately 4.2 cm wide by 0.7 cm deep by 3 cm high.

Modification History

Mod. #	Test	Date	Modification
1	-	-	None
2			
3			

Modifications applied are assumed to be used on subsequent tests unless otherwise stated as a further modification.



EMC Test Data

Client:	Griffin	Job Number:	J69258
Model:	iTrip SE	T-Log Number:	T69263
		Project Manager:	Sheareen Washington
Contact:	Jeff Altheide		
Emissions Spec:	FCC 15.239	Class:	B
Immunity Spec:	EN304 489-9	Environment:	-

Test Configuration #2

The following information was collected during the test sessions(s).

Local Support Equipment

Manufacturer	Model	Description	Serial Number	FCC ID
Apple	iPod NANO	MP3 Player	-	N/A
Dell	Inspiron 1720	Laptop	-	-

Remote Support Equipment

Manufacturer	Model	Description	Serial Number	FCC ID
D-Link	DES-1105	Hub	-	-

Cabling and Ports

Port	Connected To	Cable(s)		
		Description	Shielded or Unshielded	Length(m)
Mini-USB	USB Port - Laptop	Multiconductor	Shielded	1.5
Laptop Ethernet	Hub	Cat-5	unshielded	15.0
Laptop Power	AC/DC	3Wire	unshielded	0.8

EUT Operation During Emissions Tests

During emissions testing the EUT was configured to continuously transmit. Depending on the test, the EUT was either configured to transmit an unmodulated signal at the specified channel, or a modulated signal at the specified channel.

Client:	Griffin	Job Number:	J69258
Model:	iTrip SE	T-Log Number:	T69263
Contact:	Jeff Altheide	Account Manager:	Sheareen Washington
Standard:	FCC 15.239	Class:	B

Conducted Emissions - Power Ports

Test Specific Details

Objective: The objective of this test session is to perform final qualification testing of the EUT with respect to the specification listed above.

Date of Test: 12/21/2007 4:17
Test Engineer: Rafael Varelas
Test Location: SVOATS #1

Config. Used: 2
Config Change: Support equipment
EUT Voltage: 120V/60Hz

General Test Configuration

The EUT was located on a wooden table, 40 cm from a vertical coupling plane and 80cm from the LISN. Remote support equipment was located approximately 30 meters from the test area. All I/O connections were routed overhead.

Ambient Conditions:

Temperature: 7 °C
Rel. Humidity: 81 %

Summary of Results

Run #	Test Performed	Limit	Result	Margin
1	CE, AC Power, 120V/60Hz	EN55022 Class B	Pass	46.4dBµV @ 0.426MHz (-0.9dB)

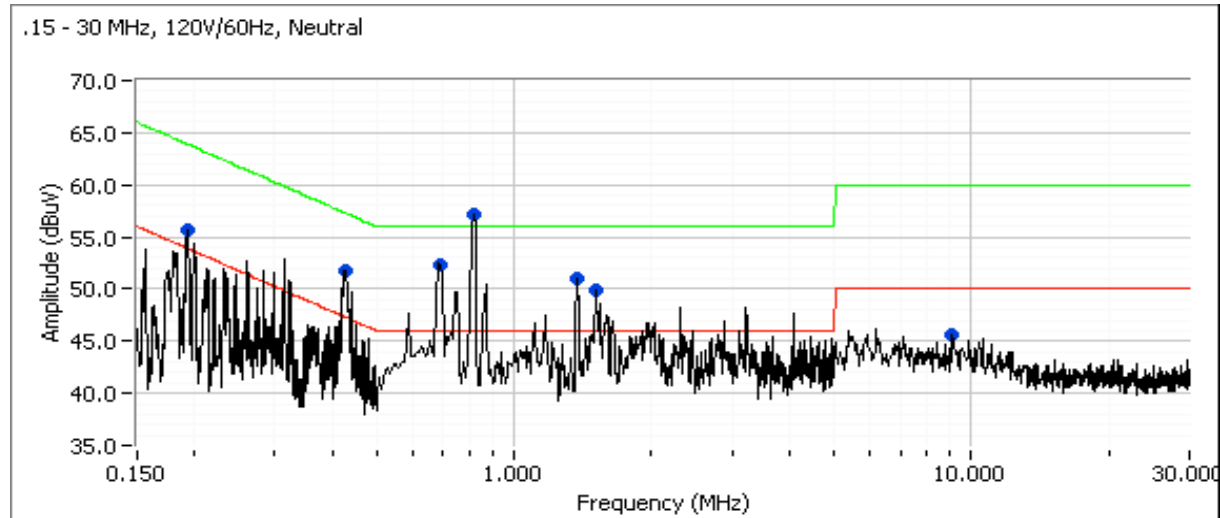
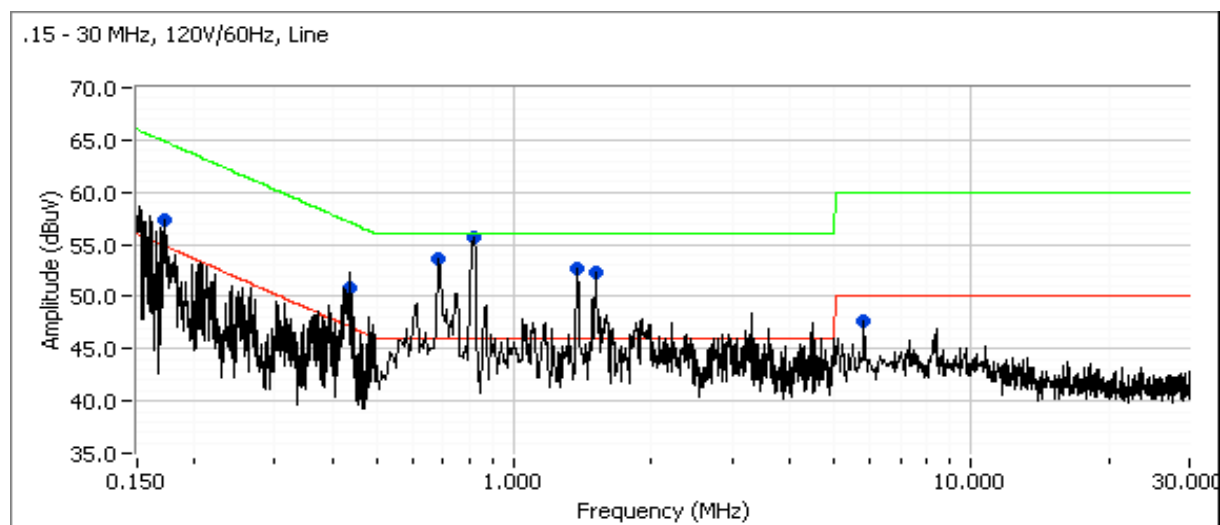
Modifications Made During Testing

No modifications were made to the EUT during testing

Deviations From The Standard

No deviations were made from the requirements of the standard.

Client: Griffin	Job Number: J69258
Model: iTrip SE	T-Log Number: T69263
Contact: Jeff Altheide	Account Manager: Sheareen Washington
Standard: FCC 15.239	Class: B

Run #1: AC Power Port Conducted Emissions, 0.15 - 30MHz, 120V/60Hz




EMC Test Data

Client:	Griffin	Job Number:	J69258
Model:	iTrip SE	T-Log Number:	T69263
Contact:	Jeff Altheide	Account Manager:	Sheareen Washington
Standard:	FCC 15.239	Class:	B

Run #1: Continued

Frequency MHz	Level dB μ V	AC Line	EN55022 B		Detector QP/Ave	Comments
			Limit	Margin		
0.426	46.4	Neutral	47.3	-0.9	AVG	
0.430	43.2	Line 1	47.3	-4.1	AVG	
0.426	49.6	Neutral	57.3	-7.7	QP	
0.430	47.3	Line 1	57.3	-10.0	QP	
0.171	52.8	Line 1	64.9	-12.1	QP	
0.191	50.0	Neutral	64.0	-14.0	QP	
0.191	37.6	Neutral	54.0	-16.4	AVG	
0.171	38.1	Line 1	54.9	-16.8	AVG	
5.859	31.3	Line 1	50.0	-18.7	AVG	
9.248	30.2	Neutral	50.0	-19.8	AVG	
5.859	36.9	Line 1	60.0	-23.1	QP	
9.248	36.3	Neutral	60.0	-23.7	QP	
0.811	55.7	Line 1	-	-	Peak	Ambient
0.681	53.6	Line 1	-	-	Peak	Ambient
1.371	52.7	Line 1	-	-	Peak	Ambient
1.501	52.4	Line 1	-	-	Peak	Ambient
0.681	52.3	Neutral	-	-	Peak	Ambient
0.811	57.2	Neutral	-	-	Peak	Ambient
1.369	51.0	Neutral	-	-	Peak	Ambient
1.501	49.9	Neutral	-	-	Peak	Ambient