MOTOROLA SOLUTIONS

MS ISO/IEC 17025
TESTING
SAMM No.0826

DECLARATION OF COMPLIANCE: MPE ASSESSMENT Report Part 2 of 3

Motorola Solutions
EME Test Laboratory
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Date of Report: 9/27/2018
Report Revision: A

Responsible Engineer:	Saw Sun Hock (EME Engineer)
Report author:	Saw Sun Hock (EME Engineer)
Date(s) Tested:	2/17/2017-3/17/2017; 7/27/2018-9/26/2018
Manufacturer:	Futurecom Systems Group
Date submitted for test:	01/13/2017
DUT Description:	DVR 700 (764-806 MHz), Digital Vehicular Repeater Companion Mobile: APX8500 HP mobile All Bands (VHF, UHF, 7/800)
Test TX mode(s):	CW (for FM), 802.11 b/g/n (for WLAN)
Max. Power output:	**DVR:** 5W (100% duty cycle) **Companion Mobile:** 50% duty cycle, PTT with below maximum output power 120W (136-174 MHz), 120W (380-484 MHz), 48W (485-512 MHz), 30W (512-520 MHz), 36W (764-805 MHz), 42W (806-870 MHz); 63.1 mW (WLAN 2.4 GHz 802.11b), 25 mW (WLAN 2.4 GHz 802.11g/n) ; 31.6 mW (WLAN 5 GHz 802.11 a/n/ac)
TX Frequency Bands:	**DVR:** 764-776 MHz, 794-806 MHz **Companion Mobile:** 136-174 MHz; 380-520 MHz; 764-805 MHz; 806-870 MHz; WLAN 2400-2483.5 MHz; WLAN 5180-5825 MHz
Signaling type:	FM, TDMA, 802.11b/g/n (WLAN); 802.11 a/n/ac (WLAN 5 GHz)
Model(s) Tested:	**DVR:** MOBEXCOM DVRS 700 (DQPMDVR7000P) **Companion Mobile**: M37TXS9PW1AN (HUW1001A)
Model(s) Certified:	MOBEXCOM DVRS 700 (DQPMDVR7000P)
Serial Number(s):	16092663 (DVR) , 681P3A0098 & 681P3A0116 (Companion Mobile)
Classification:	Occupational/Controlled Environment
FCC ID:	**DVR**: LO6-DVRS700 769-775 MHz, 799-806 MHz **Companion Mobile**: AZ492FT7118 150.8-173.4 MHz, 406.1-512 MHz, 769-775 MHz, 799-824 MHz, 851-869 MHz, 2412-2462 MHz, 5180-5825 MHz

The MPE results clearly demonstrate compliance with FCC Occupational/Controlled RF Exposure limits. FCC rules require compliance for Passengers and Bystanders to the FCC General Population/Uncontrolled limits.

Based on the information and the testing results provided herein, the undersigned certifies that when used as stated in the operating instructions supplied, said product complies with the national and international reference standards and guidelines listed in section 3.0 of this report. This report shall not be reproduced without written approval from an officially designated representative of the Motorola Solutions Inc. EME Laboratory.
I attest to the accuracy of the data and assume full responsibility for the completeness of these measurements.
This reporting format is consistent with the suggested guidelines of the TIA TSB-159 April 2006
The results and statements contained in this report pertain only to the device(s) evaluated herein.

Tiong Nguk Ing
Digitally signed by Tiong Nguk Ing
Date: 2018.10.31 22:42:19 +08'00'

Tiong Nguk Ing
Deputy Technical Manager (Approved Signatory)
Approval Date: 10/31/2018

Appendix D – MPE Test Results Summary for DVR 700

Table D.1

MPE assessment for DVR 700 - trunk mounted antenna - Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Trunk	BS1	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.004	0.51	0.8
						4.79	775.0000	0.003	0.52	0.6
						4.86	800.0000	0.002	0.53	0.4
						4.88	806.0000	0.002	0.54	0.4
Trunk	BS2	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.011	0.51	2.1
						4.79	775.0000	0.011	0.52	2.0
						4.86	800.0000	0.008	0.53	1.5
						4.88	806.0000	0.008	0.54	1.4
Trunk	BS3	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.015	0.51	2.9
						4.79	775.0000	0.018	0.52	3.6
						4.86	800.0000	0.008	0.53	1.4
						4.88	806.0000	0.007	0.54	1.3
Trunk	BS4	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.017	0.51	3.3
						4.79	775.0000	0.017	0.52	3.2
						4.86	800.0000	0.011	0.53	2.1
						4.88	806.0000	0.009	0.54	1.7
Trunk	BS5	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.020	0.51	**3.9**
						4.79	775.0000	0.020	0.52	3.9
						4.86	800.0000	0.008	0.53	1.5
						4.88	806.0000	0.007	0.54	1.3

Note:
Results in bold font are configurations with highest percentage of limits.

Table D.2

MPE assessment for DVR 700 - trunk mounted antenna - Passenger

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Trunk	PB	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.035	0.51	6.8
						4.79	775.0000	0.038	0.52	**7.3**
						4.86	800.0000	0.022	0.53	4.1
						4.88	806.0000	0.021	0.54	3.8
Trunk	PF	E	1	HAF4016A, 1/4 Wave (764-870MHz)	5.0	4.82	770.0000	0.022	0.51	4.3
						4.79	775.0000	0.031	0.52	**6.1**
						4.86	800.0000	0.013	0.53	2.4
						4.88	806.0000	0.011	0.54	2.1

Note:
Results in bold font are configurations with highest percentage of limits.

Table D.3

DVR 700 MPE Results for FCC

Pmax (W) : 5

Pinitia**l** (W)	4.82	4.79	4.86	4.88
FCCLimit (mW/cm^2)	0.51	0.52	0.53	0.54

Table	Test Post.	Angle	Trunk / Roof	E/H Field	Antenna No.	f1 770.0000	f2 775.0000	f3 800.0000	f4 806.0000
D.1	BS1		Trunk	E	1	0.004	0.003	0.002	0.002
D.1	BS2		Trunk	E	1	0.011	0.011	0.008	0.008
D.1	BS3		Trunk	E	1	0.015	0.018	0.008	0.007
D.1	BS4		Trunk	E	1	0.017	0.017	0.011	0.009
D.1	BS5		Trunk	E	1	0.020	0.020	0.008	0.007
D.2	PB		Trunk	E	1	0.035	0.038	0.022	0.021
D.2	PF		Trunk	E	1	0.022	0.031	0.013	0.011

Appendix E – MPE Test Results Summary for Companion Mobile LMR VHF

Table E.1

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.087	0.20	43.4
						118	146.0000	0.110	0.20	55.1
						117	150.8000	0.082	0.20	41.0
						116	158.0125	0.091	0.20	45.4
						119	165.0125	0.066	0.20	32.8
						119	173.0125	0.042	0.20	21.2
Roof	BS2	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.075	0.20	37.6
						118	146.0000	0.146	0.20	72.9
						117	150.8000	0.122	0.20	61.2
						116	158.0125	0.125	0.20	62.3
						119	165.0125	0.086	0.20	43.2
						119	173.0125	0.077	0.20	38.3
Roof	BS3	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.060	0.20	29.9
						118	146.0000	0.074	0.20	37.2
						117	150.8000	0.073	0.20	36.4
						116	158.0125	0.100	0.20	50.2
						119	165.0125	0.061	0.20	30.7
						119	173.0125	0.074	0.20	37.2
Roof	BS4	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.030	0.20	15.0
						118	146.0000	0.037	0.20	18.4
						117	150.8000	0.055	0.20	27.6
						116	158.0125	0.060	0.20	29.8
						119	165.0125	0.049	0.20	24.5
						119	173.0125	0.047	0.20	23.7
Roof	BS5	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.021	0.20	10.6
						118	146.0000	0.022	0.20	11.0
						117	150.8000	0.033	0.20	16.5
						116	158.0125	0.041	0.20	20.3
						119	165.0125	0.047	0.20	23.5
						119	173.0125	0.027	0.20	13.6

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.062	0.20	31.0
						118	146.0000	0.059	0.20	29.7
						117	150.8000	0.068	0.20	33.9
						116	158.0125	0.071	0.20	35.3
						119	165.0125	0.060	0.20	29.9
						119	173.0125	0.077	0.20	38.3
Roof	BS2	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.048	0.20	24.2
						118	146.0000	0.055	0.20	27.3
						117	150.8000	0.059	0.20	29.6
						116	158.0125	0.064	0.20	31.8
						119	165.0125	0.046	0.20	23.2
						119	173.0125	0.070	0.20	34.9
Roof	BS3	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.032	0.20	16.1
						118	146.0000	0.036	0.20	18.0
						117	150.8000	0.029	0.20	14.7
						116	158.0125	0.045	0.20	22.7
						119	165.0125	0.034	0.20	16.9
						119	173.0125	0.058	0.20	29.2
Roof	BS4	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.018	0.20	9.0
						118	146.0000	0.028	0.20	13.9
						117	150.8000	0.014	0.20	7.2
						116	158.0125	0.043	0.20	21.3
						119	165.0125	0.018	0.20	9.0
						119	173.0125	0.035	0.20	17.6
Roof	BS5	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.013	0.20	6.6
						118	146.0000	0.019	0.20	9.6
						117	150.8000	0.010	0.20	4.8
						116	158.0125	0.029	0.20	14.7
						119	165.0125	0.016	0.20	8.1
						119	173.0125	0.028	0.20	13.9

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.066	0.20	33.1
						119	144.0000	0.075	0.20	37.6
						117	150.8000	0.083	0.20	41.3
						116	158.0125	0.080	0.20	39.9
						119	165.0125	0.069	0.20	34.7
						119	173.0125	0.059	0.20	29.6
Roof	BS2	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.061	0.20	30.4
						119	144.0000	0.082	0.20	40.9
						117	150.8000	0.081	0.20	40.4
						116	158.0125	0.083	0.20	41.3
						119	165.0125	0.067	0.20	33.7
						119	173.0125	0.074	0.20	37.0
Roof	BS3	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.044	0.20	22.2
						119	144.0000	0.058	0.20	29.0
						117	150.8000	0.041	0.20	20.6
						116	158.0125	0.070	0.20	35.0
						119	165.0125	0.052	0.20	26.1
						119	173.0125	0.069	0.20	34.3
Roof	BS4	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.025	0.20	12.7
						119	144.0000	0.038	0.20	19.1
						117	150.8000	0.028	0.20	13.9
						116	158.0125	0.057	0.20	28.6
						119	165.0125	0.037	0.20	18.4
						119	173.0125	0.052	0.20	26.0
Roof	BS5	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.021	0.20	10.6
						119	144.0000	0.023	0.20	11.4
						117	150.8000	0.018	0.20	8.8
						116	158.0125	0.036	0.20	17.8
						119	165.0125	0.034	0.20	17.2
						119	173.0125	0.030	0.20	15.0

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.106	0.20	53.1
						119	144.0000	0.111	0.20	55.4
						117	150.8000	0.076	0.20	37.9
						116	156.4000	0.094	0.20	46.9
						118	162.0000	0.058	0.20	29.0
Roof	BS2	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.075	0.20	37.6
						119	144.0000	0.139	0.20	69.6
						117	150.8000	0.121	0.20	60.6
						116	156.4000	0.119	0.20	59.4
						118	162.0000	0.096	0.20	48.0
Roof	BS3	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.065	0.20	32.3
						119	144.0000	0.085	0.20	42.4
						117	150.8000	0.075	0.20	37.4
						116	156.4000	0.097	0.20	48.3
						118	162.0000	0.074	0.20	36.8
Roof	BS4	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.034	0.20	17.1
						119	144.0000	0.047	0.20	23.7
						117	150.8000	0.060	0.20	29.8
						116	156.4000	0.065	0.20	32.7
						118	162.0000	0.042	0.20	21.2
Roof	BS5	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.021	0.20	10.4
						119	144.0000	0.026	0.20	13.0
						117	150.8000	0.031	0.20	15.7
						116	156.4000	0.044	0.20	21.9
						118	162.0000	0.031	0.20	15.6

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.079	0.20	39.6
						117	150.8000	0.080	0.20	40.1
						116	158.0125	0.084	0.20	41.9
						119	165.0125	0.070	0.20	34.9
						119	173.0125	0.050	0.20	25.0
Roof	BS2	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.084	0.20	41.9
						117	150.8000	0.076	0.20	38.0
						116	158.0125	0.114	0.20	57.2
						119	165.0125	0.106	0.20	53.1
						119	173.0125	0.088	0.20	43.8
Roof	BS3	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.048	0.20	23.9
						117	150.8000	0.056	0.20	27.9
						116	158.0125	0.101	0.20	50.7
						119	165.0125	0.069	0.20	34.6
						119	173.0125	0.093	0.20	46.7
Roof	BS4	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.024	0.20	12.2
						117	150.8000	0.038	0.20	19.1
						116	158.0125	0.064	0.20	31.9
						119	165.0125	0.061	0.20	30.4
						119	173.0125	0.063	0.20	31.4
Roof	BS5	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.015	0.20	7.3
						117	150.8000	0.021	0.20	10.6
						116	158.0125	0.033	0.20	16.6
						119	165.0125	0.045	0.20	22.4
						119	173.0125	0.029	0.20	14.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.100	0.20	50.1
						119	144.0000	0.091	0.20	45.6
						117	150.8000	0.112	0.20	56.2
						116	158.0125	0.076	0.20	38.2
						119	165.0125	0.056	0.20	28.1
						119	173.0125	0.039	0.20	19.4
Roof	BS2	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.067	0.20	33.3
						119	144.0000	0.117	0.20	58.5
						117	150.8000	0.116	0.20	57.8
						116	158.0125	0.101	0.20	50.3
						119	165.0125	0.082	0.20	40.9
						119	173.0125	0.067	0.20	33.5
Roof	BS3	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.061	0.20	30.3
						119	144.0000	0.079	0.20	39.5
						117	150.8000	0.073	0.20	36.3
						116	158.0125	0.085	0.20	42.7
						119	165.0125	0.054	0.20	26.9
						119	173.0125	0.066	0.20	32.8
Roof	BS4	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.033	0.20	16.7
						119	144.0000	0.042	0.20	21.0
						117	150.8000	0.055	0.20	27.3
						116	158.0125	0.057	0.20	28.4
						119	165.0125	0.052	0.20	25.8
						119	173.0125	0.047	0.20	23.3
Roof	BS5	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.019	0.20	9.6
						119	144.0000	0.025	0.20	12.6
						117	150.8000	0.031	0.20	15.3
						116	158.0125	0.031	0.20	15.7
						119	165.0125	0.036	0.20	18.1
						119	173.0125	0.022	0.20	10.8

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.142	0.20	71.1
						117	140.0000	0.119	0.20	59.5
						119	144.0000	0.104	0.20	52.1
Roof	BS2	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.106	0.20	52.8
						117	140.0000	0.113	0.20	56.7
						119	144.0000	0.136	0.20	67.8
Roof	BS3	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.085	0.20	42.7
						117	140.0000	0.094	0.20	46.8
						119	144.0000	0.088	0.20	43.9
Roof	BS4	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.041	0.20	20.4
						117	140.0000	0.054	0.20	27.2
						119	144.0000	0.045	0.20	22.4
Roof	BS5	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.027	0.20	13.3
						117	140.0000	0.038	0.20	18.9
						119	144.0000	0.029	0.20	14.6
Roof	BS1	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.101	0.20	50.4
						117	150.8000	0.118	0.20	59.2
Roof	BS2	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.131	0.20	65.5
						117	150.8000	0.121	0.20	60.6
Roof	BS3	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.087	0.20	43.7
						117	150.8000	0.085	0.20	42.6
Roof	BS4	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.043	0.20	21.5
						117	150.8000	0.064	0.20	32.2
Roof	BS5	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.028	0.20	14.2
						117	150.8000	0.034	0.20	17.1
Roof	BS1	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.090	0.20	45.0
						116	156.4000	0.088	0.20	43.8
						118	162.0000	0.073	0.20	36.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS2	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.092	0.20	46.0
						116	156.4000	0.123	0.20	61.5
						118	162.0000	0.129	0.20	64.4
Roof	BS3	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.063	0.20	31.6
						116	156.4000	0.105	0.20	52.3
						118	162.0000	0.092	0.20	46.0
Roof	BS4	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.049	0.20	24.4
						116	156.4000	0.066	0.20	33.0
						118	162.0000	0.059	0.20	29.7
Roof	BS5	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.026	0.20	13.1
						116	156.4000	0.046	0.20	22.9
						118	162.0000	0.048	0.20	24.1
Roof	BS1	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.065	0.20	32.5
						119	165.0125	0.071	0.20	35.6
						119	173.0125	0.045	0.20	22.6
Roof	BS2	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.112	0.20	56.0
						119	165.0125	0.110	0.20	54.8
						119	173.0125	0.099	0.20	49.3
Roof	BS3	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.082	0.20	40.8
						119	165.0125	0.066	0.20	32.8
						119	173.0125	0.092	0.20	45.9
Roof	BS4	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.052	0.20	25.9
						119	165.0125	0.063	0.20	31.4
						119	173.0125	0.064	0.20	32.2
Roof	BS5	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.042	0.20	21.1
						119	165.0125	0.051	0.20	25.6
						119	173.0125	0.029	0.20	14.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.128	0.20	63.9
						118	146.0000	0.152	0.20	75.8
						117	150.8000	0.151	0.20	75.6
						116	158.0125	0.118	0.20	59.2
						119	165.0125	0.093	0.20	46.6
						119	173.0125	0.070	0.20	34.8
Roof	BS2	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.108	0.20	53.9
						118	146.0000	0.147	0.20	73.5
						117	150.8000	0.138	0.20	69.2
						116	158.0125	0.157	0.20	78.3
						119	165.0125	0.110	0.20	54.8
						119	173.0125	0.121	0.20	60.5
Roof	BS3	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.084	0.20	41.9
						118	146.0000	0.110	0.20	55.0
						117	150.8000	0.101	0.20	50.4
						116	158.0125	0.121	0.20	60.4
						119	165.0125	0.085	0.20	42.6
						119	173.0125	0.088	0.20	44.2
Roof	BS4	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.050	0.20	24.9
						118	146.0000	0.071	0.20	35.7
						117	150.8000	0.079	0.20	39.6
						116	158.0125	0.080	0.20	40.2
						119	165.0125	0.088	0.20	44.1
						119	173.0125	0.090	0.20	44.8
Roof	BS5	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	107	136.0000	0.038	0.20	19.2
						118	146.0000	0.047	0.20	23.6
						117	150.8000	0.063	0.20	31.4
						116	158.0125	0.068	0.20	33.8
						119	165.0125	0.067	0.20	33.4
						119	173.0125	0.046	0.20	23.1

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.046	0.20	22.8
						118	146.0000	0.053	0.20	26.5
						117	150.8000	0.061	0.20	30.3
						116	158.0125	0.075	0.20	37.5
						119	165.0125	0.061	0.20	30.6
						119	173.0125	0.092	0.20	45.8
Roof	BS2	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.045	0.20	22.6
						118	146.0000	0.050	0.20	25.1
						117	150.8000	0.049	0.20	24.6
						116	158.0125	0.072	0.20	36.1
						119	165.0125	0.055	0.20	27.3
						119	173.0125	0.088	0.20	43.8
Roof	BS3	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.040	0.20	20.1
						118	146.0000	0.047	0.20	23.3
						117	150.8000	0.043	0.20	21.7
						116	158.0125	0.050	0.20	24.9
						119	165.0125	0.042	0.20	21.0
						119	173.0125	0.063	0.20	31.7
Roof	BS4	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.039	0.20	19.6
						118	146.0000	0.055	0.20	27.6
						117	150.8000	0.037	0.20	18.4
						116	158.0125	0.054	0.20	26.9
						119	165.0125	0.046	0.20	23.1
						119	173.0125	0.069	0.20	34.5
Roof	BS5	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	107	136.0000	0.036	0.20	18.0
						118	146.0000	0.044	0.20	22.0
						117	150.8000	0.034	0.20	17.2
						116	158.0125	0.055	0.20	27.3
						119	165.0125	0.035	0.20	17.7
						119	173.0125	0.039	0.20	19.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.069	0.20	34.3
						119	144.0000	0.085	0.20	42.7
						117	150.8000	0.096	0.20	47.8
						116	158.0125	0.096	0.20	47.9
						119	165.0125	0.091	0.20	45.6
						119	173.0125	0.082	0.20	41.1
Roof	BS2	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.073	0.20	36.6
						119	144.0000	0.086	0.20	43.0
						117	150.8000	0.081	0.20	40.7
						116	158.0125	0.106	0.20	53.1
						119	165.0125	0.087	0.20	43.4
						119	173.0125	0.109	0.20	54.6
Roof	BS3	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.055	0.20	27.5
						119	144.0000	0.071	0.20	35.5
						117	150.8000	0.062	0.20	31.1
						116	158.0125	0.079	0.20	39.6
						119	165.0125	0.069	0.20	34.5
						119	173.0125	0.076	0.20	38.0
Roof	BS4	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.046	0.20	23.1
						119	144.0000	0.069	0.20	34.5
						117	150.8000	0.048	0.20	24.2
						116	158.0125	0.064	0.20	32.2
						119	165.0125	0.072	0.20	36.1
						119	173.0125	0.080	0.20	40.0
Roof	BS5	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	107	136.0000	0.043	0.20	21.5
						119	144.0000	0.051	0.20	25.4
						117	150.8000	0.048	0.20	24.1
						116	158.0125	0.058	0.20	29.2
						119	165.0125	0.057	0.20	28.4
						119	173.0125	0.049	0.20	24.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.130	0.20	65.0
						119	144.0000	0.149	0.20	74.3
						117	150.8000	0.158	0.20	79.2
						116	156.4000	0.128	0.20	64.0
						118	162.0000	0.094	0.20	47.1
Roof	BS2	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.117	0.20	58.7
						119	144.0000	0.137	0.20	68.7
						117	150.8000	0.146	0.20	72.9
						116	156.4000	0.146	0.20	72.9
						118	162.0000	0.115	0.20	57.5
Roof	BS3	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.088	0.20	43.9
						119	144.0000	0.118	0.20	59.1
						117	150.8000	0.105	0.20	52.5
						116	156.4000	0.119	0.20	59.5
						118	162.0000	0.095	0.20	47.3
Roof	BS4	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.059	0.20	29.7
						119	144.0000	0.081	0.20	40.6
						117	150.8000	0.077	0.20	38.7
						116	156.4000	0.083	0.20	41.3
						118	162.0000	0.066	0.20	33.1
Roof	BS5	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	107	136.0000	0.038	0.20	19.0
						119	144.0000	0.044	0.20	22.2
						117	150.8000	0.062	0.20	30.9
						116	156.4000	0.076	0.20	38.0
						118	162.0000	0.058	0.20	28.9

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.101	0.20	50.7
						117	150.8000	0.108	0.20	54.2
						116	158.0125	0.115	0.20	57.5
						119	165.0125	0.106	0.20	53.1
						119	173.0125	0.074	0.20	36.9
Roof	BS2	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.100	0.20	50.1
						117	150.8000	0.099	0.20	49.3
						116	158.0125	0.140	0.20	70.2
						119	165.0125	0.119	0.20	59.7
						119	173.0125	0.119	0.20	59.6
Roof	BS3	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.075	0.20	37.5
						117	150.8000	0.075	0.20	37.7
						116	158.0125	0.117	0.20	58.6
						119	165.0125	0.093	0.20	46.5
						119	173.0125	0.096	0.20	47.8
Roof	BS4	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.054	0.20	27.2
						117	150.8000	0.061	0.20	30.4
						116	158.0125	0.080	0.20	40.1
						119	165.0125	0.095	0.20	47.3
						119	173.0125	0.095	0.20	47.5
Roof	BS5	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	118	146.0000	0.031	0.20	15.4
						117	150.8000	0.045	0.20	22.5
						116	158.0125	0.061	0.20	30.3
						119	165.0125	0.068	0.20	33.9
						119	173.0125	0.049	0.20	24.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.124	0.20	62.2
						119	144.0000	0.138	0.20	69.1
						117	150.8000	0.146	0.20	73.0
						116	158.0125	0.105	0.20	52.3
						119	165.0125	0.088	0.20	44.1
						119	173.0125	0.058	0.20	28.9
Roof	BS2	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.111	0.20	55.3
						119	144.0000	0.141	0.20	70.7
						117	150.8000	0.135	0.20	67.7
						116	158.0125	0.129	0.20	64.5
						119	165.0125	0.097	0.20	48.7
						119	173.0125	0.094	0.20	47.1
Roof	BS3	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.083	0.20	41.5
						119	144.0000	0.110	0.20	55.0
						117	150.8000	0.099	0.20	49.4
						116	158.0125	0.105	0.20	52.6
						119	165.0125	0.076	0.20	37.9
						119	173.0125	0.076	0.20	37.8
Roof	BS4	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.049	0.20	24.5
						119	144.0000	0.075	0.20	37.7
						117	150.8000	0.074	0.20	37.2
						116	158.0125	0.067	0.20	33.3
						119	165.0125	0.079	0.20	39.6
						119	173.0125	0.073	0.20	36.4
Roof	BS5	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	107	136.0000	0.042	0.20	20.9
						119	144.0000	0.048	0.20	23.9
						117	150.8000	0.063	0.20	31.7
						116	158.0125	0.061	0.20	30.6
						119	165.0125	0.062	0.20	31.0
						119	173.0125	0.049	0.20	24.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.171	0.20	85.3
						117	140.0000	0.155	0.20	77.7
						119	144.0000	0.155	0.20	77.7
Roof	BS2	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.147	0.20	73.7
						117	140.0000	0.140	0.20	70.2
						119	144.0000	0.160	0.20	80.0
Roof	BS3	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.108	0.20	54.2
						117	140.0000	0.121	0.20	60.3
						119	144.0000	0.124	0.20	62.0
Roof	BS4	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.065	0.20	32.4
						117	140.0000	0.083	0.20	41.7
						119	144.0000	0.083	0.20	41.4
Roof	BS5	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	107	136.0000	0.053	0.20	26.6
						117	140.0000	0.063	0.20	31.5
						119	144.0000	0.053	0.20	26.3
Roof	BS1	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.161	0.20	80.7
						117	150.8000	0.172	0.20	**86.2**
Roof	BS2	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.153	0.20	76.4
						117	150.8000	0.150	0.20	74.9
Roof	BS3	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.126	0.20	62.9
						117	150.8000	0.115	0.20	57.5
Roof	BS4	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.079	0.20	39.7
						117	150.8000	0.085	0.20	42.4
Roof	BS5	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	119	144.0000	0.050	0.20	24.8
						117	150.8000	0.069	0.20	34.6
Roof	BS1	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.127	0.20	63.7
						116	156.4000	0.129	0.20	64.6
						118	162.0000	0.113	0.20	56.6

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table E.1 (Continued)

MPE assessment for Companion Mobile LMR VHF- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS2	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.117	0.20	58.6
						116	156.4000	0.148	0.20	74.1
						118	162.0000	0.137	0.20	68.6
Roof	BS3	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.087	0.20	43.3
						116	156.4000	0.126	0.20	62.9
						118	162.0000	0.113	0.20	56.3
Roof	BS4	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.065	0.20	32.4
						116	156.4000	0.091	0.20	45.7
						118	162.0000	0.088	0.20	43.9
Roof	BS5	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	117	150.8000	0.056	0.20	27.8
						116	156.4000	0.074	0.20	36.8
						118	162.0000	0.067	0.20	33.6
Roof	BS1	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.106	0.20	53.1
						119	165.0125	0.112	0.20	56.0
						119	173.0125	0.080	0.20	39.8
Roof	BS2	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.131	0.20	65.6
						119	165.0125	0.126	0.20	62.8
						119	173.0125	0.132	0.20	66.0
Roof	BS3	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.102	0.20	50.8
						119	165.0125	0.085	0.20	42.3
						119	173.0125	0.099	0.20	49.5
Roof	BS4	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.082	0.20	40.9
						119	165.0125	0.097	0.20	48.3
						119	173.0125	0.093	0.20	46.6
Roof	BS5	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	118	162.0000	0.062	0.20	31.0
						119	165.0125	0.070	0.20	34.9
						119	173.0125	0.050	0.20	25.2

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.2

MPE assessment for LMR VHF- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	117	136.0000	0.23	0.20	115.6
						112	146.0000	0.29	0.20	144.3
						110	150.8000	0.29	0.20	*142.7
						120	158.0125	0.37	0.20	*185.7
						114	165.0125	0.35	0.20	*175.2
						115	173.0125	0.13	0.20	62.8
Roof	PB	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	117	136.0000	0.05	0.20	24.1
						112	146.0000	0.05	0.20	23.0
						110	150.8000	0.06	0.20	29.8
						120	158.0125	0.09	0.20	45.6
						114	165.0125	0.06	0.20	31.2
						115	173.0125	0.07	0.20	34.1
Roof	PB	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	117	136.0000	0.03	0.20	15.8
						113	144.0000	0.09	0.20	43.4
						110	150.8000	0.11	0.20	55.8
						120	158.0125	0.15	0.20	74.0
						114	165.0125	0.16	0.20	82.3
						115	173.0125	0.09	0.20	44.0
Roof	PB	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	117	136.0000	0.24	0.20	119.0
						113	144.0000	0.32	0.20	157.8
						110	150.8000	0.30	0.20	*150.8
						119	156.4000	0.32	0.20	*160.8
						115	162.0000	0.34	0.20	*171.0
Roof	PB	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	112	146.0000	0.25	0.20	123.4
						110	150.8000	0.22	0.20	*107.9
						120	158.0125	0.36	0.20	*179.0
						114	165.0125	0.37	0.20	*183.1
						115	173.0125	0.15	0.20	73.1

Notes:
Blue fonts: Frequencies not regulated by FCC.
*Configuration required SAR simulations

Table E.2 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	117	136.0000	0.25	0.20	125.0
						113	144.0000	0.33	0.20	164.7
						110	150.8000	0.32	0.20	*158.1
						120	158.0125	0.33	0.20	*164.9
						114	165.0125	0.28	0.20	*138.7
						115	173.0125	0.10	0.20	49.5
Roof	PB	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	117	136.0000	0.32	0.20	160.8
						115	140.0000	0.38	0.20	190.1
						113	144.0000	0.39	0.20	193.2
Roof	PB	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	113	144.0000	0.37	0.20	185.2
						110	150.8000	0.37	0.20	*184.9
Roof	PB	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	110	150.8000	0.25	0.20	*125.1
						119	156.4000	0.35	0.20	*174.8
						115	162.0000	0.34	0.20	*170.5
Roof	PB	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	115	162.0000	0.28	0.20	*142.2
						114	165.0125	0.35	0.20	*173.1
						115	173.0125	0.10	0.20	47.6
Roof	PB	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	117	136.0000	0.26	0.20	131.2
						112	146.0000	0.28	0.20	139.0
						110	150.8000	0.25	0.20	#122.9
						120	158.0125	0.30	0.20	#151.5
						114	165.0125	0.26	0.20	#132.2
						115	173.0125	0.08	0.20	40.7
Roof	PB	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	117	136.0000	0.06	0.20	30.4
						112	146.0000	0.05	0.20	25.7
						110	150.8000	0.05	0.20	26.9
						120	158.0125	0.08	0.20	40.1
						114	165.0125	0.04	0.20	18.7
						115	173.0125	0.04	0.20	20.3

Notes:
Blue fonts: Frequencies not regulated by FCC.
*Configuration required SAR simulations.
#SAR simulation Configuration same as E Field

Table E.2 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	117	136.0000	0.06	0.20	32.2
						113	144.0000	0.09	0.20	46.0
						110	150.8000	0.09	0.20	43.5
						120	158.0125	0.15	0.20	73.5
						114	165.0125	0.17	0.20	85.0
						115	173.0125	0.09	0.20	44.1
Roof	PB	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	117	136.0000	0.23	0.20	115.0
						113	144.0000	0.29	0.20	144.8
						110	150.8000	0.27	0.20	#134.8
						119	156.4000	0.29	0.20	#144.1
						115	162.0000	0.32	0.20	#160.0
Roof	PB	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	112	146.0000	0.15	0.20	76.8
						110	150.8000	0.18	0.20	90.8
						120	158.0125	0.30	0.20	#152.4
						114	165.0125	0.42	0.20	**#212.1**
						115	173.0125	0.14	0.20	71.2
Roof	PB	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	117	136.0000	0.26	0.20	130.5
						113	144.0000	0.28	0.20	140.6
						110	150.8000	0.25	0.20	#126.4
						120	158.0125	0.27	0.20	#133.0
						114	165.0125	0.25	0.20	#123.5
						115	173.0125	0.09	0.20	46.8
Roof	PB	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	117	136.0000	0.32	0.20	158.6
						115	140.0000	0.39	0.20	192.9
						113	144.0000	0.34	0.20	168.9
Roof	PB	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	113	144.0000	0.32	0.20	157.6
						110	150.8000	0.27	0.20	#133.5

Notes:
Blue fonts: Frequencies not regulated by FCC.
*Configuration required SAR simulations.
#SAR simulation Configuration same as E Field,
Results in bold font are configurations with highest percentage of limits.

Table E.2 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	110	150.8000	0.21	0.20	#105.8
						119	156.4000	0.32	0.20	#157.5
						115	162.0000	0.36	0.20	#182.0
Roof	PB	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	115	162.0000	0.29	0.20	#143.8
						114	165.0125	0.28	0.20	#139.4
						115	173.0125	0.11	0.20	56.2

Notes:
Blue fonts: Frequencies not regulated by FCC.
*Configuration required SAR simulations.
#SAR simulation Configuration same as E Field.

Table E.3

MPE assessment for LMR VHF- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	117	136.0000	0.06	0.20	31.8
						112	146.0000	0.09	0.20	42.6
						110	150.8000	0.08	0.20	38.3
						120	158.0125	0.09	0.20	42.6
						114	165.0125	0.08	0.20	41.4
						115	173.0125	0.10	0.20	49.8
Roof	PF	E	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	117	136.0000	0.01	0.20	5.5
						112	146.0000	0.02	0.20	11.7
						110	150.8000	0.02	0.20	8.8
						120	158.0125	0.005	0.20	2.3
						114	165.0125	0.01	0.20	5.0
						115	173.0125	0.02	0.20	8.6
Roof	PF	E	9	HAD4022A, 5/8 Wave (132-174MHz)	120	117	136.0000	0.02	0.20	9.5
						113	144.0000	0.02	0.20	10.8
						110	150.8000	0.04	0.20	18.5
						120	158.0125	0.02	0.20	9.3
						114	165.0125	0.04	0.20	21.5
						115	173.0125	0.03	0.20	15.8
Roof	PF	E	2	HAD4016A, 1/4 Wave (136-162MHz)	120	117	136.0000	0.08	0.20	38.9
						113	144.0000	0.08	0.20	42.1
						110	150.8000	0.09	0.20	47.0
						119	156.4000	0.07	0.20	32.9
						115	162.0000	0.10	0.20	51.6
Roof	PF	E	3	HAD4017A, 1/4 Wave (146-174MHz)	120	112	146.0000	0.07	0.20	36.2
						110	150.8000	0.06	0.20	29.6
						120	158.0125	0.08	0.20	41.9
						114	165.0125	0.10	0.20	47.7
						115	173.0125	0.10	0.20	48.6

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.3 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	4	HAD4021A, 1/4 Wave (136-174MHz)	120	117	136.0000	0.06	0.20	30.0
						113	144.0000	0.08	0.20	37.8
						110	150.8000	0.07	0.20	34.9
						120	158.0125	0.08	0.20	38.3
						114	165.0125	0.08	0.20	39.6
						115	173.0125	0.07	0.20	36.4
Roof	PF	E	5	HAD4006A, 1/4 Wave (136-144MHz)	120	117	136.0000	0.10	0.20	48.3
						115	140.0000	0.08	0.20	40.8
						113	144.0000	0.09	0.20	46.4
Roof	PF	E	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	113	144.0000	0.09	0.20	42.8
						110	150.8000	0.08	0.20	41.9
Roof	PF	E	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	110	150.8000	0.07	0.20	33.2
						119	156.4000	0.08	0.20	37.5
						115	162.0000	0.11	0.20	53.7
Roof	PF	E	8	HAD4009A, 1/4 Wave (162-174MHz)	120	115	162.0000	0.10	0.20	47.7
						114	165.0125	0.11	0.20	52.6
						115	173.0125	0.12	0.20	58.6
Roof	PF	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	117	136.0000	0.10	0.20	52.0
						112	146.0000	0.09	0.20	46.2
						110	150.8000	0.09	0.20	44.9
						120	158.0125	0.11	0.20	53.6
						114	165.0125	0.12	0.20	57.9
						115	173.0125	0.12	0.20	58.8
Roof	PF	H	10	RAD4010ARB, 1/2 Wave (136-174MHz)	120	117	136.0000	0.03	0.20	14.8
						112	146.0000	0.03	0.20	15.0
						110	150.8000	0.03	0.20	15.4
						120	158.0125	0.02	0.20	9.0
						114	165.0125	0.03	0.20	15.8
						115	173.0125	0.04	0.20	18.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.3 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	117	136.0000	0.04	0.20	19.4
						113	144.0000	0.03	0.20	14.8
						110	150.8000	0.04	0.20	20.0
						120	158.0125	0.03	0.20	15.5
						114	165.0125	0.06	0.20	30.0
						115	173.0125	0.06	0.20	29.2
Roof	PF	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	117	136.0000	0.10	0.20	50.4
						113	144.0000	0.08	0.20	40.3
						110	150.8000	0.09	0.20	44.0
						119	156.4000	0.06	0.20	31.9
						115	162.0000	0.12	0.20	60.4
Roof	PF	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	112	146.0000	0.08	0.20	39.2
						110	150.8000	0.07	0.20	34.6
						120	158.0125	0.10	0.20	49.4
						114	165.0125	0.15	0.20	73.0
						115	173.0125	0.13	0.20	66.1
Roof	PF	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	117	136.0000	0.10	0.20	48.9
						113	144.0000	0.07	0.20	35.4
						110	150.8000	0.10	0.20	47.7
						120	158.0125	0.09	0.20	47.3
						114	165.0125	0.13	0.20	63.8
						115	173.0125	0.10	0.20	50.9
Roof	PF	H	5	HAD4006A, 1/4 Wave (136-144MHz)	120	117	136.0000	0.10	0.20	52.0
						115	140.0000	0.09	0.20	45.4
						113	144.0000	0.10	0.20	52.0
Roof	PF	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	113	144.0000	0.08	0.20	40.1
						110	150.8000	0.11	0.20	53.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table E.3 (Continued)

MPE assessment for LMR VHF- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	110	150.8000	0.09	0.20	43.2
						119	156.4000	0.10	0.20	49.5
						115	162.0000	0.16	0.20	79.7
Roof	PF	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	115	162.0000	0.16	0.20	78.6
						114	165.0125	0.18	0.20	**88.0**
						115	173.0125	0.11	0.20	53.2

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table E.4
LMR VHF MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**Passenger P**initial (W)	117.0	113.0	112.0	110.0	119.0	120.0	115.0	114.0	115.0	115.0
		Bystander Pinitial (W)	107.0	119.0	118.0	117.0	116.0	116.0	118.0	119.0	119.0	117.0
		FCCLimit (mW/cm^2)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						136.0000	140.0000	144.0000	146.0000	150.8000	156.4000	158.0125	162.0000	165.0125	173.0125
E.1	BS1		Roof	E	30	0.087			0.110	0.082		0.091		0.066	0.042
E.1	BS2		Roof	E	30	0.075			0.146	0.122		0.125		0.086	0.077
E.1	BS3		Roof	E	30	0.060			0.074	0.073		0.100		0.061	0.074
E.1	BS4		Roof	E	30	0.030			0.037	0.055		0.060		0.049	0.047
E.1	BS5		Roof	E	30	0.021			0.022	0.033		0.041		0.047	0.027
E.1	BS1		Roof	E	10	0.062			0.059	0.068		0.071		0.060	0.077
E.1	BS2		Roof	E	10	0.048			0.055	0.059		0.064		0.046	0.070
E.1	BS3		Roof	E	10	0.032			0.036	0.029		0.045		0.034	0.058
E.1	BS4		Roof	E	10	0.018			0.028	0.014		0.043		0.018	0.035
E.1	BS5		Roof	E	10	0.013			0.019	0.010		0.029		0.016	0.028
E.1	BS1		Roof	E	9	0.066		0.075		0.083		0.080		0.069	0.059
E.1	BS2		Roof	E	9	0.061		0.082		0.081		0.083		0.067	0.074
E.1	BS3		Roof	E	9	0.044		0.058		0.041		0.070		0.052	0.069
E.1	BS4		Roof	E	9	0.025		0.038		0.028		0.057		0.037	0.052
E.1	BS5		Roof	E	9	0.021		0.023		0.018		0.036		0.034	0.030
E.1	BS1		Roof	E	2	0.106		0.111		0.076	0.094		0.058		
E.1	BS2		Roof	E	2	0.075		0.139		0.121	0.119		0.096		
E.1	BS3		Roof	E	2	0.065		0.085		0.075	0.097		0.074		
E.1	BS4		Roof	E	2	0.034		0.047		0.060	0.065		0.042		
E.1	BS5		Roof	E	2	0.021		0.026		0.031	0.044		0.031		
E.1	BS1		Roof	E	3				0.079	0.080		0.084		0.070	0.050
E.1	BS2		Roof	E	3				0.084	0.076		0.114		0.106	0.088
E.1	BS3		Roof	E	3				0.048	0.056		0.101		0.069	0.093
E.1	BS4		Roof	E	3				0.024	0.038		0.064		0.061	0.063
E.1	BS5		Roof	E	3				0.015	0.021		0.033		0.045	0.029
E.1	BS1		Roof	E	4	0.100		0.091		0.112		0.076		0.056	0.039
E.1	BS2		Roof	E	4	0.067		0.117		0.116		0.101		0.082	0.067
E.1	BS3		Roof	E	4	0.061		0.079		0.073		0.085		0.054	0.066
E.1	BS4		Roof	E	4	0.033		0.042		0.055		0.057		0.052	0.047
E.1	BS5		Roof	E	4	0.019		0.025		0.031		0.031		0.036	0.022

Table E.4 (Continued)

LMR VHF MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**Passenger P**initial (W)	117.0	113.0	112.0	110.0	119.0	120.0	115.0	114.0	115.0	115.0
		Bystander Pinitial (W)	107.0	119.0	118.0	117.0	116.0	116.0	118.0	119.0	119.0	117.0
		FCCLimit (mW/cm^2)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						136.0000	140.0000	144.0000	146.0000	150.8000	156.4000	158.0125	162.0000	165.0125	173.0125
E.1	BS1		Roof	E	5	0.142	0.119	0.104							
E.1	BS2		Roof	E	5	0.106	0.113	0.136							
E.1	BS3		Roof	E	5	0.085	0.094	0.088							
E.1	BS4		Roof	E	5	0.041	0.054	0.045							
E.1	BS5		Roof	E	5	0.027	0.038	0.029							
E.1	BS1		Roof	E	6			0.101		0.118					
E.1	BS2		Roof	E	6			0.131		0.121					
E.1	BS3		Roof	E	6			0.087		0.085					
E.1	BS4		Roof	E	6			0.043		0.064					
E.1	BS5		Roof	E	6			0.028		0.034					
E.1	BS1		Roof	E	7					0.090	0.088		0.073		
E.1	BS2		Roof	E	7					0.092	0.123		0.129		
E.1	BS3		Roof	E	7					0.063	0.105		0.092		
E.1	BS4		Roof	E	7					0.049	0.066		0.059		
E.1	BS5		Roof	E	7					0.026	0.046		0.048		
E.1	BS1		Roof	E	8								0.065	0.071	0.045
E.1	BS2		Roof	E	8								0.112	0.110	0.099
E.1	BS3		Roof	E	8								0.082	0.066	0.092
E.1	BS4		Roof	E	8								0.052	0.063	0.064
E.1	BS5		Roof	E	8								0.042	0.051	0.029
E.1	BS1		Roof	H	30	0.128			0.148	0.151		0.118		0.093	0.070
E.1	BS2		Roof	H	30	0.108			0.143	0.138		0.157		0.110	0.121
E.1	BS3		Roof	H	30	0.084			0.107	0.101		0.121		0.085	0.088
E.1	BS4		Roof	H	30	0.050			0.070	0.079		0.080		0.088	0.090
E.1	BS5		Roof	H	30	0.038			0.046	0.063		0.068		0.067	0.046
E.1	BS1		Roof	H	10	0.046			0.052	0.061		0.075		0.061	0.092
E.1	BS2		Roof	H	10	0.045			0.049	0.049		0.072		0.055	0.088
E.1	BS3		Roof	H	10	0.040			0.046	0.043		0.050		0.042	0.063
E.1	BS4		Roof	H	10	0.039			0.054	0.037		0.054		0.046	0.069
E.1	BS5		Roof	H	10	0.036			0.043	0.034		0.055		0.035	0.039

Table E.4 (Continued)

LMR VHF MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**Passenger P**initial (W)	117.0	113.0	112.0	110.0	119.0	120.0	115.0	114.0	115.0	115.0
		Bystander Pinitial (W)	107.0	119.0	118.0	117.0	116.0	116.0	118.0	119.0	119.0	117.0
		FCCLimit (mW/cm^2)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						136.0000	140.0000	144.0000	146.0000	150.8000	156.4000	158.0125	162.0000	165.0125	173.0125
E.1	BS1		Roof	H	9	0.069		0.083		0.096		0.096		0.091	0.082
E.1	BS2		Roof	H	9	0.073		0.084		0.081		0.106		0.087	0.109
E.1	BS3		Roof	H	9	0.055		0.069		0.062		0.079		0.069	0.076
E.1	BS4		Roof	H	9	0.046		0.067		0.048		0.064		0.072	0.080
E.1	BS5		Roof	H	9	0.043		0.050		0.048		0.058		0.057	0.049
E.1	BS1		Roof	H	2	0.130		0.145		0.158	0.128		0.094		
E.1	BS2		Roof	H	2	0.117		0.134		0.146	0.146		0.115		
E.1	BS3		Roof	H	2	0.088		0.115		0.105	0.119		0.095		
E.1	BS4		Roof	H	2	0.059		0.079		0.077	0.083		0.066		
E.1	BS5		Roof	H	2	0.038		0.043		0.062	0.076		0.058		
E.1	BS1		Roof	H	3				0.099	0.108		0.115		0.106	0.074
E.1	BS2		Roof	H	3				0.098	0.099		0.140		0.119	0.119
E.1	BS3		Roof	H	3				0.073	0.075		0.117		0.093	0.096
E.1	BS4		Roof	H	3				0.053	0.061		0.080		0.095	0.095
E.1	BS5		Roof	H	3				0.030	0.045		0.061		0.068	0.049
E.1	BS1		Roof	H	4	0.124		0.135		0.146		0.105		0.088	0.058
E.1	BS2		Roof	H	4	0.111		0.138		0.135		0.129		0.097	0.094
E.1	BS3		Roof	H	4	0.083		0.107		0.099		0.105		0.076	0.076
E.1	BS4		Roof	H	4	0.049		0.074		0.074		0.067		0.079	0.073
E.1	BS5		Roof	H	4	0.042		0.047		0.063		0.061		0.062	0.049
E.1	BS1		Roof	H	5	0.171	0.155	0.152							
E.1	BS2		Roof	H	5	0.147	0.140	0.156							
E.1	BS3		Roof	H	5	0.108	0.121	0.121							
E.1	BS4		Roof	H	5	0.065	0.083	0.081							
E.1	BS5		Roof	H	5	0.053	0.063	0.051							
E.1	BS1		Roof	H	6			0.158		0.172					
E.1	BS2		Roof	H	6			0.149		0.150					
E.1	BS3		Roof	H	6			0.123		0.115					
E.1	BS4		Roof	H	6			0.078		0.085					
E.1	BS5		Roof	H	6			0.049		0.069					

Table E.4 (Continued)

LMR VHF MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**Passenger Pinitial** (W)	117.0	113.0	112.0	110.0	119.0	120.0	115.0	114.0	115.0	115.0
		Bystander Pinitial (W)	107.0	119.0	118.0	117.0	116.0	116.0	118.0	119.0	119.0	117.0
		FCCLimit (mW/cm^2)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						136.0000	140.0000	144.0000	146.0000	150.8000	156.4000	158.0125	162.0000	165.0125	173.0125
E.1	BS1		Roof	H	7					0.127	0.129		0.113		
E.1	BS2		Roof	H	7					0.117	0.148		0.137		
E.1	BS3		Roof	H	7					0.087	0.126		0.113		
E.1	BS4		Roof	H	7					0.065	0.091		0.088		
E.1	BS5		Roof	H	7					0.056	0.074		0.067		
E.1	BS1		Roof	H	8								0.106	0.112	0.080
E.1	BS2		Roof	H	8								0.131	0.126	0.132
E.1	BS3		Roof	H	8								0.102	0.085	0.099
E.1	BS4		Roof	H	8								0.082	0.097	0.093
E.1	BS5		Roof	H	8								0.062	0.070	0.050
E.2	PB		Roof	E	30	0.23			0.29	0.29		0.37		0.35	0.13
E.2	PB		Roof	E	10	0.05			0.05	0.06		0.09		0.06	0.07
E.2	PB		Roof	E	9	0.03		0.09		0.11		0.15		0.16	0.09
E.2	PB		Roof	E	2	0.24		0.32		0.30	0.32		0.34		
E.2	PB		Roof	E	3				0.25	0.22		0.36		0.37	0.15
E.2	PB		Roof	E	4	0.25		0.33		0.32		0.33		0.28	0.10
E.2	PB		Roof	E	5	0.32	0.38	0.39							
E.2	PB		Roof	E	6			0.37		0.37					
E.2	PB		Roof	E	7					0.25	0.35		0.34		
E.2	PB		Roof	E	8								0.28	0.35	0.10
E.2	PB		Roof	H	30	0.26			0.28	0.25		0.30		0.26	0.08
E.2	PB		Roof	H	10	0.06			0.05	0.05		0.08		0.04	0.04
E.2	PB		Roof	H	9	0.06		0.09		0.09		0.15		0.17	0.09
E.2	PB		Roof	H	2	0.23		0.29		0.27	0.29		0.32		
E.2	PB		Roof	H	3				0.15	0.18		0.30		0.42	0.14
E.2	PB		Roof	H	4	0.26		0.28		0.25		0.27		0.25	0.09
E.2	PB		Roof	H	5	0.32	0.39	0.34							
E.2	PB		Roof	H	6			0.32		0.27					
E.2	PB		Roof	H	7					0.21	0.32		0.36		
E.2	PB		Roof	H	8								0.29	0.28	0.11

Table E.4 (Continued)

LMR VHF MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W) 120	**P**initial (W)	117.0	113.0	112.0	110.0	119.0	120.0	115.0	114.0	115.0	115.0
	FCCLimit (mW/cm^2)	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20	0.20

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						136.0000	140.0000	144.0000	146.0000	150.8000	156.4000	158.0125	162.0000	165.0125	173.0125
E.3	PF		Roof	E	30	0.06			0.09	0.08		0.09		0.08	0.10
E.3	PF		Roof	E	10	0.01			0.02	0.02		0.005		0.01	0.02
E.3	PF		Roof	E	9	0.02		0.02		0.04		0.02		0.04	0.03
E.3	PF		Roof	E	2	0.08		0.08		0.09	0.07		0.10		
E.3	PF		Roof	E	3				0.07	0.06		0.08		0.10	0.10
E.3	PF		Roof	E	4	0.06		0.08		0.07		0.08		0.08	0.07
E.3	PF		Roof	E	5	0.10	0.08	0.09							
E.3	PF		Roof	E	6			0.09		0.08					
E.3	PF		Roof	E	7					0.07	0.08		0.11		
E.3	PF		Roof	E	8								0.10	0.11	0.12
E.3	PF		Roof	H	30	0.10			0.09	0.09		0.11		0.12	0.12
E.3	PF		Roof	H	10	0.03			0.03	0.03		0.02		0.03	0.04
E.3	PF		Roof	H	9	0.04		0.03		0.04		0.03		0.20	0.20
E.3	PF		Roof	H	2	0.10		0.08		0.09	0.06		0.12		
E.3	PF		Roof	H	3				0.08	0.07		0.10		0.15	0.13
E.3	PF		Roof	H	4	0.10		0.07		0.10		0.09		0.13	0.10
E.3	PF		Roof	H	5	0.10	0.09	0.10							
E.3	PF		Roof	H	6			0.08		0.11					
E.3	PF		Roof	H	7					0.09	0.10		0.16		
E.3	PF		Roof	H	8								0.16	0.18	0.11

Table E.5

LMR Companion Radio VHF MPE Variability Test

Notes:

*Configuration required SAR simulations.

Bystander measurement at initial mounting location
Bystander measurement at 10cm antenna offset from initial mounting location

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit	MPE Variability (%)
Roof	BS2	H	30	AN000131A01, 1/4 wave (136-870MHz)	120	116	158.0125	0.16	0.20	78.3	-7.8
						116	158.0125	0.15	0.20	72.6	
Roof	BS1	H	2	HAD4016A, 1/4 Wave (136-162MHz)	120	117	150.8000	0.16	0.20	79.2	-8.6
						117	150.8000	0.14	0.20	72.4	
Roof	BS2	H	9	HAD4022A, 5/8 Wave (132-174MHz)	120	116	158.0125	0.11	0.20	53.1	-6.5
						116	158.0125	0.10	0.20	49.6	
						119	173.0125	0.11	0.20	54.6	2.4
						119	173.0125	0.11	0.20	55.9	
Roof	BS2	H	3	HAD4017A, 1/4 Wave (146-174MHz)	120	116	158.0125	0.14	0.20	70.2	-3.7
						116	158.0125	0.14	0.20	67.6	
Roof	BS1	H	4	HAD4021A, 1/4 Wave (136-174MHz)	120	117	150.8000	0.15	0.20	73.0	-7.8
						117	150.8000	0.13	0.20	67.3	
Roof	BS1	H	6	HAD4007A, 1/4 Wave (144-150.8MHz)	120	117	150.8000	0.17	0.20	86.2	-9.8
						117	150.8000	0.16	0.20	77.8	
Roof	BS2	H	7	HAD4008A, 1/4 Wave (150.8-162MHz)	120	116	156.4000	0.15	0.20	74.1	-3.7
						116	156.4000	0.14	0.20	71.4	
Roof	BS2	H	8	HAD4009A, 1/4 Wave (162-174MHz)	120	119	173.0125	0.13	0.20	66.1	-2.7
						119	173.0125	0.13	0.20	64.3	

Appendix F – MPE Test Results Summary for UHF R1

Table F.1

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.030	0.25	11.9
						120.0	393.0125	0.037	0.26	14.1
						118.0	406.5000	0.042	0.27	15.7
						111.0	422.0125	0.046	0.28	16.4
						108.0	438.0125	0.056	0.29	19.0
						119.0	450.0125	0.062	0.30	20.5
						116.0	469.9875	0.046	0.31	14.7
Roof	BS2	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.023	0.25	8.9
						120.0	393.0125	0.029	0.26	11.0
						118.0	406.5000	0.030	0.27	11.1
						111.0	422.0125	0.026	0.28	9.2
						108.0	438.0125	0.029	0.29	10.0
						119.0	450.0125	0.032	0.30	10.8
						116.0	469.9875	0.024	0.31	7.7
Roof	BS3	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.021	0.25	8.4
						120.0	393.0125	0.028	0.26	10.8
						118.0	406.5000	0.026	0.27	9.5
						111.0	422.0125	0.023	0.28	8.0
						108.0	438.0125	0.024	0.29	8.1
						119.0	450.0125	0.024	0.30	8.1
						116.0	469.9875	0.022	0.31	7.1
Roof	BS4	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.014	0.25	5.3
						120.0	393.0125	0.020	0.26	7.5
						118.0	406.5000	0.020	0.27	7.3
						111.0	422.0125	0.014	0.28	5.1
						108.0	438.0125	0.014	0.29	4.9
						119.0	450.0125	0.014	0.30	4.8
						116.0	469.9875	0.010	0.31	3.2
						115.0	380.0125	0.014	0.25	5.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.003	0.25	1.1
						120.0	393.0125	0.003	0.26	1.2
						118.0	406.5000	0.003	0.27	1.2
						111.0	422.0125	0.006	0.28	2.3
						108.0	438.0125	0.007	0.29	2.4
						119.0	450.0125	0.007	0.30	2.4
						116.0	469.9875	0.007	0.31	2.4
Roof	BS1	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.039	0.25	15.6
						120.0	393.0125	0.035	0.26	13.5
						118.0	406.5000	0.046	0.27	17.1
						113.0	419.5000	0.044	0.28	15.8
						108.0	432.9875	0.036	0.29	12.4
Roof	BS2	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.031	0.25	12.1
						120.0	393.0125	0.033	0.26	12.6
						118.0	406.5000	0.029	0.27	10.7
						113.0	419.5000	0.026	0.28	9.1
						108.0	432.9875	0.025	0.29	8.7
Roof	BS3	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.023	0.25	9.2
						120.0	393.0125	0.028	0.26	10.7
						118.0	406.5000	0.027	0.27	9.9
						113.0	419.5000	0.021	0.28	7.7
						108.0	432.9875	0.020	0.29	6.8
Roof	BS4	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.015	0.25	5.9
						120.0	393.0125	0.018	0.26	7.0
						118.0	406.5000	0.017	0.27	6.2
						113.0	419.5000	0.011	0.28	4.0
						108.0	432.9875	0.012	0.29	4.0

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.004	0.25	1.8
						120.0	393.0125	0.006	0.26	2.2
						118.0	406.5000	0.005	0.27	1.9
						113.0	419.5000	0.006	0.28	2.0
						108.0	432.9875	0.010	0.29	3.6
Roof	BS1	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.073	0.25	28.8
						120.0	393.0125	0.089	0.26	34.1
						118.0	406.5000	0.076	0.27	27.9
						113.0	419.5000	0.058	0.28	20.7
						108.0	432.9875	0.032	0.29	11.1
Roof	BS2	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.076	0.25	30.1
						120.0	393.0125	0.091	0.26	34.6
						118.0	406.5000	0.062	0.27	22.9
						113.0	419.5000	0.036	0.28	12.9
						108.0	432.9875	0.022	0.29	7.6
Roof	BS3	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.046	0.25	18.3
						120.0	393.0125	0.037	0.26	14.1
						118.0	406.5000	0.042	0.27	15.5
						113.0	419.5000	0.028	0.28	9.9
						108.0	432.9875	0.019	0.29	6.7
Roof	BS4	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.034	0.25	13.6
						120.0	393.0125	0.045	0.26	17.1
						118.0	406.5000	0.027	0.27	9.9
						113.0	419.5000	0.012	0.28	4.3
						108.0	432.9875	0.012	0.29	4.0

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.023	0.25	9.1
						120.0	393.0125	0.027	0.26	10.4
						118.0	406.5000	0.018	0.27	6.8
						113.0	419.5000	0.017	0.28	6.1
						108.0	432.9875	0.010	0.29	3.3
Roof	BS1	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.075	0.25	29.6
						120.0	393.0125	0.075	0.26	28.6
						118.0	406.5000	0.081	0.27	29.7
						113.0	419.5000	0.094	0.28	33.6
						108.0	432.9875	0.077	0.29	26.6
Roof	BS2	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.063	0.25	24.9
						120.0	393.0125	0.064	0.26	24.5
						118.0	406.5000	0.064	0.27	23.8
						113.0	419.5000	0.052	0.28	18.5
						108.0	432.9875	0.050	0.29	17.4
Roof	BS3	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.049	0.25	19.5
						120.0	393.0125	0.046	0.26	17.6
						118.0	406.5000	0.043	0.27	15.9
						113.0	419.5000	0.037	0.28	13.3
						108.0	432.9875	0.042	0.29	14.6
Roof	BS4	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.031	0.25	12.2
						120.0	393.0125	0.041	0.26	15.7
						118.0	406.5000	0.030	0.27	10.9
						113.0	419.5000	0.021	0.28	7.6
						108.0	432.9875	0.025	0.29	8.6

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.013	0.25	5.0
						120.0	393.0125	0.019	0.26	7.4
						118.0	406.5000	0.016	0.27	5.8
						113.0	419.5000	0.018	0.28	6.3
						108.0	432.9875	0.017	0.29	5.8
Roof	BS1	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.086	0.25	33.9
						120.0	393.0125	0.074	0.26	28.4
						118.0	406.5000	0.107	0.27	**39.3**
						111.0	422.0125	0.097	0.28	34.6
						108.0	438.0125	0.108	0.29	36.9
						119.0	450.0125	0.104	0.30	34.6
						120.0	460.0000	0.077	0.31	25.1
						116.0	469.9875	0.068	0.31	21.8
Roof	BS2	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.067	0.25	26.5
						120.0	393.0125	0.068	0.26	25.8
						118.0	406.5000	0.056	0.27	20.8
						111.0	422.0125	0.067	0.28	23.6
						108.0	438.0125	0.078	0.29	26.8
						119.0	450.0125	0.053	0.30	17.8
						120.0	460.0000	0.043	0.31	13.9
						116.0	469.9875	0.040	0.31	12.7
Roof	BS3	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.050	0.25	19.5
						120.0	393.0125	0.045	0.26	17.4
						118.0	406.5000	0.041	0.27	15.1
						111.0	422.0125	0.046	0.28	16.5
						108.0	438.0125	0.048	0.29	16.4
						119.0	450.0125	0.040	0.30	13.2
						120.0	460.0000	0.058	0.31	18.9
						116.0	469.9875	0.032	0.31	10.2

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.035	0.25	13.7
						120.0	393.0125	0.040	0.26	15.2
						118.0	406.5000	0.031	0.27	11.6
						111.0	422.0125	0.045	0.28	16.0
						108.0	438.0125	0.038	0.29	13.0
						119.0	450.0125	0.032	0.30	10.8
						120.0	460.0000	0.024	0.31	7.8
						116.0	469.9875	0.023	0.31	7.3
Roof	BS5	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.012	0.25	4.7
						120.0	393.0125	0.018	0.26	6.7
						118.0	406.5000	0.014	0.27	5.3
						111.0	422.0125	0.018	0.28	6.4
						108.0	438.0125	0.027	0.29	9.2
						119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.025	0.31	8.1
						116.0	469.9875	0.011	0.31	3.5
Roof	BS1	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.074	0.25	29.4
						120.0	393.0125	0.076	0.26	29.0
						118.0	406.5000	0.077	0.27	28.4
						111.0	422.0125	0.064	0.28	22.6
						108.0	438.0125	0.099	0.29	33.9
						119.0	450.0125	0.099	0.30	33.1
						116.0	469.9875	0.092	0.31	29.4
Roof	BS2	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.059	0.25	23.4
						120.0	393.0125	0.073	0.26	28.0
						118.0	406.5000	0.072	0.27	26.5
						111.0	422.0125	0.068	0.28	24.1
						108.0	438.0125	0.067	0.29	22.8
						119.0	450.0125	0.069	0.30	23.1
						116.0	469.9875	0.054	0.31	17.2

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS3	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.045	0.25	17.9
						120.0	393.0125	0.047	0.26	17.8
						118.0	406.5000	0.047	0.27	17.5
						111.0	422.0125	0.045	0.28	16.0
						108.0	438.0125	0.039	0.29	13.3
						119.0	450.0125	0.045	0.30	15.0
						116.0	469.9875	0.037	0.31	11.8
Roof	BS4	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.032	0.25	12.5
						120.0	393.0125	0.042	0.26	16.0
						118.0	406.5000	0.034	0.27	12.4
						111.0	422.0125	0.028	0.28	10.1
						108.0	438.0125	0.027	0.29	9.1
						119.0	450.0125	0.028	0.30	9.4
						116.0	469.9875	0.027	0.31	8.5
Roof	BS5	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.011	0.25	4.4
						120.0	393.0125	0.020	0.26	7.7
						118.0	406.5000	0.016	0.27	5.9
						111.0	422.0125	0.015	0.28	5.4
						108.0	438.0125	0.024	0.29	8.0
						119.0	450.0125	0.021	0.30	7.0
						116.0	469.9875	0.014	0.31	4.5
Roof	BS1	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.056	0.30	18.7
						120.0	460.0000	0.055	0.31	17.8
						116.0	469.9875	0.078	0.31	25.0
Roof	BS2	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.052	0.30	17.4
						120.0	460.0000	0.047	0.31	15.2
						116.0	469.9875	0.057	0.31	18.3
Roof	BS3	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.029	0.30	9.8
						120.0	460.0000	0.043	0.31	14.0
						116.0	469.9875	0.032	0.31	10.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.024	0.30	8.1
						120.0	460.0000	0.024	0.31	7.7
						116.0	469.9875	0.036	0.31	11.5
Roof	BS5	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.023	0.30	7.6
						120.0	460.0000	0.028	0.31	9.2
						116.0	469.9875	0.020	0.31	6.4
Roof	BS1	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.4
						120.0	460.0000	0.028	0.31	9.1
						116.0	469.9875	0.012	0.31	3.8
Roof	BS2	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.052	0.30	17.5
						120.0	460.0000	0.033	0.31	10.7
						116.0	469.9875	0.036	0.31	11.3
Roof	BS3	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.039	0.30	13.0
						120.0	460.0000	0.038	0.31	12.5
						116.0	469.9875	0.020	0.31	6.2
Roof	BS4	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.019	0.31	6.1
						116.0	469.9875	0.020	0.31	6.2
Roof	BS5	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.031	0.30	10.3
						120.0	460.0000	0.021	0.31	7.0
						116.0	469.9875	0.012	0.31	3.8
Roof	BS1	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.020	0.30	6.7
						120.0	460.0000	0.025	0.31	8.2
						116.0	469.9875	0.019	0.31	6.0
Roof	BS2	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.057	0.30	18.8
						120.0	460.0000	0.034	0.31	11.1
						116.0	469.9875	0.052	0.31	16.7
Roof	BS3	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.007	0.30	2.3
						120.0	460.0000	0.016	0.31	5.3
						116.0	469.9875	0.007	0.31	2.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.026	0.30	8.7
						120.0	460.0000	0.016	0.31	5.3
						116.0	469.9875	0.019	0.31	5.9
Roof	BS5	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.4
						120.0	460.0000	0.013	0.31	4.3
						116.0	469.9875	0.009	0.31	2.8
Roof	BS1	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.026	0.30	8.8
						120.0	460.0000	0.025	0.31	8.1
						116.0	469.9875	0.025	0.31	8.1
Roof	BS2	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.016	0.30	5.2
						120.0	460.0000	0.011	0.31	3.6
						116.0	469.9875	0.012	0.31	3.7
Roof	BS3	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.045	0.30	15.0
						120.0	460.0000	0.048	0.31	15.6
						116.0	469.9875	0.044	0.31	14.0
Roof	BS4	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.029	0.30	9.8
						120.0	460.0000	0.023	0.31	7.4
						116.0	469.9875	0.027	0.31	8.5
Roof	BS5	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.022	0.30	7.2
						120.0	460.0000	0.018	0.31	5.9
						116.0	469.9875	0.013	0.31	4.0
Roof	BS1	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.014	0.30	4.7
						120.0	460.0000	0.023	0.31	7.4
						116.0	469.9875	0.024	0.31	7.5
Roof	BS2	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.052	0.30	17.2
						120.0	460.0000	0.034	0.31	11.2
						116.0	469.9875	0.037	0.31	11.8
Roof	BS3	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.039	0.30	13.1
						120.0	460.0000	0.041	0.31	13.4
						116.0	469.9875	0.039	0.31	12.6

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.1 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.025	0.30	8.3
						120.0	460.0000	0.018	0.31	5.9
						116.0	469.9875	0.023	0.31	7.2
Roof	BS5	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.015	0.31	4.9
						116.0	469.9875	0.015	0.31	4.7

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.2

MPE assessment for LMR UHF R1- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.11	0.25	45.4
						120.0	393.0125	0.10	0.26	39.7
						118.0	406.5000	0.11	0.27	39.7
						111.0	422.0125	0.07	0.28	23.8
						108.0	438.0125	0.09	0.29	32.3
						119.0	450.0125	0.09	0.30	31.5
						116.0	469.9875	0.08	0.31	24.1
Roof	PB	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.11	0.25	42.1
						120.0	393.0125	0.11	0.26	42.2
						118.0	406.5000	0.12	0.27	**45.4**
						113.0	419.5000	0.07	0.28	23.5
						108.0	432.9875	0.09	0.29	29.8
Roof	PB	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.01	0.25	5.3
						120.0	393.0125	0.03	0.26	11.0
						118.0	406.5000	0.03	0.27	11.1
						113.0	419.5000	0.02	0.28	8.5
						108.0	432.9875	0.03	0.29	9.3
Roof	PB	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.15	0.25	59.6
						120.0	393.0125	0.15	0.26	56.3
						118.0	406.5000	0.07	0.27	26.7
						113.0	419.5000	0.07	0.28	23.8
						108.0	432.9875	0.04	0.29	12.4
Roof	PB	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.10	0.25	38.6
						120.0	393.0125	0.11	0.26	42.4
						118.0	406.5000	0.12	0.27	43.1
						111.0	422.0125	0.06	0.28	22.0
						108.0	438.0125	0.10	0.29	34.0
						119.0	450.0125	0.11	0.30	37.1
						120.0	460.0000	0.05	0.31	15.9
						116.0	469.9875	0.05	0.31	17.4

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table F.2 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.12	0.25	48.2
						120.0	393.0125	0.11	0.26	43.8
						118.0	406.5000	0.11	0.27	40.5
						111.0	422.0125	0.07	0.28	25.1
						108.0	438.0125	0.10	0.29	35.6
						119.0	450.0125	0.11	0.30	35.0
						116.0	469.9875	0.07	0.31	23.4
Roof	PB	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.01	0.30	4.8
						120.0	460.0000	0.01	0.31	3.8
						116.0	469.9875	0.03	0.31	9.0
Roof	PB	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.03	0.30	8.5
						120.0	460.0000	0.01	0.31	4.9
						116.0	469.9875	0.03	0.31	10.0
Roof	PB	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.02	0.30	6.2
						120.0	460.0000	0.02	0.31	7.0
						116.0	469.9875	0.02	0.31	5.8
Roof	PB	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.10	0.30	32.3
						120.0	460.0000	0.07	0.31	22.2
						116.0	469.9875	0.07	0.31	23.1
Roof	PB	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.08	0.30	25.1
						120.0	460.0000	0.07	0.31	22.2
						116.0	469.9875	0.08	0.31	24.1

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.3

MPE assessment for LMR UHF R1- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	115.0	380.0125	0.05	0.25	20.0
						120.0	393.0125	0.05	0.26	19.3
						118.0	406.5000	0.03	0.27	12.2
						111.0	422.0125	0.04	0.28	14.8
						108.0	438.0125	0.04	0.29	14.2
						119.0	450.0125	0.06	0.30	19.8
						116.0	469.9875	0.04	0.31	11.4
Roof	PF	E	11	HAE6010A, 1/2 Wave (380-433MHz)	120	115.0	380.0125	0.04	0.25	14.6
						120.0	393.0125	0.07	0.26	27.5
						118.0	406.5000	0.03	0.27	12.1
						113.0	419.5000	0.04	0.28	15.8
						108.0	432.9875	0.06	0.29	20.2
Roof	PF	E	12	HAE6011A, 5/8 Wave (380-433MHz)	120	115.0	380.0125	0.01	0.25	3.0
						120.0	393.0125	0.02	0.26	7.6
						118.0	406.5000	0.01	0.27	4.4
						113.0	419.5000	0.02	0.28	6.6
						108.0	432.9875	0.02	0.29	7.2
Roof	PF	E	13	HAE6012A, 1/4 Wave (380-433MHz)	120	115.0	380.0125	0.01	0.25	5.6
						120.0	393.0125	0.01	0.26	5.6
						118.0	406.5000	0.01	0.27	2.9
						113.0	419.5000	0.02	0.28	6.1
						108.0	432.9875	0.01	0.29	5.2
Roof	PF	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	115.0	380.0125	0.04	0.25	14.3
						120.0	393.0125	0.06	0.26	23.6
						118.0	406.5000	0.03	0.27	11.7
						111.0	422.0125	0.04	0.28	13.7
						108.0	438.0125	0.05	0.29	18.2
						119.0	450.0125	0.04	0.30	14.9
						120.0	460.0000	0.02	0.31	7.7
						116.0	469.9875	0.04	0.31	12.0

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table F.3 (Continued)

MPE assessment for LMR UHF R1- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	115.0	380.0125	0.05	0.25	18.6
						120.0	393.0125	0.05	0.26	20.7
						118.0	406.5000	0.03	0.27	11.2
						111.0	422.0125	0.06	0.28	**22.7**
						108.0	438.0125	0.06	0.29	19.4
						119.0	450.0125	0.07	0.30	21.7
						116.0	469.9875	0.05	0.31	16.0
Roof	PF	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.01	0.30	3.8
						120.0	460.0000	0.01	0.31	3.5
						116.0	469.9875	0.003	0.31	0.8
Roof	PF	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.01	0.30	3.1
						120.0	460.0000	0.01	0.31	2.5
						116.0	469.9875	0.01	0.31	3.6
Roof	PF	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.01	0.30	4.9
						120.0	460.0000	0.02	0.31	5.4
						116.0	469.9875	0.01	0.31	2.2
Roof	PF	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.06	0.30	19.5
						120.0	460.0000	0.04	0.31	13.1
						116.0	469.9875	0.04	0.31	13.0
Roof	PF	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.07	0.30	22.6
						120.0	460.0000	0.04	0.31	13.7
						116.0	469.9875	0.03	0.31	11.0

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table F.4
LMR UHF R1 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	Pinitial (W)	115.0	120.0	118.0	113.0	111.0	108.0	108.0	119.0	120.0	116.0
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						380.0125	393.0125	406.5000	419.5000	422.0125	432.9875	438.0125	450.0125	460.0000	469.9875
F.1	BS1		Roof	E	30	0.030	0.037	0.042		0.046		0.056	0.062		0.046
F.1	BS2		Roof	E	30	0.023	0.029	0.030		0.026		0.029	0.032		0.024
F.1	BS3		Roof	E	30	0.021	0.028	0.026		0.023		0.024	0.024		0.022
F.1	BS4		Roof	E	30	0.014	0.020	0.020		0.014		0.014	0.014		0.010
F.1	BS5		Roof	E	30	0.003	0.003	0.003		0.006		0.007	0.007		0.007
F.1	BS1		Roof	E	11	0.039	0.035	0.046	0.044		0.036				
F.1	BS2		Roof	E	11	0.031	0.033	0.029	0.026		0.025				
F.1	BS3		Roof	E	11	0.023	0.028	0.027	0.021		0.020				
F.1	BS4		Roof	E	11	0.015	0.018	0.017	0.011		0.012				
F.1	BS5		Roof	E	11	0.004	0.006	0.005	0.006		0.010				
F.1	BS1		Roof	E	12	0.073	0.089	0.076	0.058		0.032				
F.1	BS2		Roof	E	12	0.076	0.091	0.062	0.036		0.022				
F.1	BS3		Roof	E	12	0.046	0.037	0.042	0.028		0.019				
F.1	BS4		Roof	E	12	0.034	0.045	0.027	0.012		0.012				
F.1	BS5		Roof	E	12	0.023	0.027	0.018	0.017		0.010				
F.1	BS1		Roof	E	13	0.075	0.075	0.081	0.094		0.077				
F.1	BS2		Roof	E	13	0.063	0.064	0.064	0.052		0.050				
F.1	BS3		Roof	E	13	0.049	0.046	0.043	0.037		0.042				
F.1	BS4		Roof	E	13	0.031	0.041	0.030	0.021		0.025				
F.1	BS5		Roof	E	13	0.013	0.019	0.016	0.018		0.017				
F.1	BS1		Roof	E	14	0.086	0.074	0.107		0.097		0.108	0.104	0.077	0.068
F.1	BS2		Roof	E	14	0.067	0.068	0.056		0.067		0.078	0.053	0.043	0.040
F.1	BS3		Roof	E	14	0.050	0.045	0.041		0.046		0.048	0.040	0.058	0.032
F.1	BS4		Roof	E	14	0.035	0.040	0.031		0.045		0.038	0.032	0.024	0.023
F.1	BS5		Roof	E	14	0.012	0.018	0.014		0.018		0.027	0.019	0.025	0.011
F.1	BS1		Roof	E	15	0.074	0.076	0.077		0.064		0.099	0.099		0.092
F.1	BS2		Roof	E	15	0.059	0.073	0.072		0.068		0.067	0.069		0.054
F.1	BS3		Roof	E	15	0.045	0.047	0.047		0.045		0.039	0.045		0.037
F.1	BS4		Roof	E	15	0.032	0.042	0.034		0.028		0.027	0.028		0.027
F.1	BS5		Roof	E	15	0.011	0.020	0.016		0.015		0.024	0.021		0.014
F.1	BS1		Roof	E	20								0.056	0.055	0.078
F.1	BS2		Roof	E	20								0.052	0.047	0.057
F.1	BS3		Roof	E	20								0.029	0.043	0.032
F.1	BS4		Roof	E	20								0.024	0.024	0.036
F.1	BS5		Roof	E	20								0.023	0.028	0.20

Table F.4 (Continued)

LMR UHF R1 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**P**initial (W)	115.0	120.0	118.0	113.0	111.0	108.0	108.0	119.0	120.0	116.0
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						380.0125	393.0125	406.5000	419.5000	422.0125	432.9875	438.0125	450.0125	460.0000	469.9875
F.1	BS1		Roof	E	17								0.019	0.028	0.012
F.1	BS2		Roof	E	17								0.052	0.033	0.036
F.1	BS3		Roof	E	17								0.039	0.038	0.020
F.1	BS4		Roof	E	17								0.019	0.019	0.020
F.1	BS5		Roof	E	17								0.031	0.021	0.012
F.1	BS1		Roof	E	16								0.020	0.025	0.019
F.1	BS2		Roof	E	16								0.057	0.034	0.052
F.1	BS3		Roof	E	16								0.007	0.016	0.007
F.1	BS4		Roof	E	16								0.026	0.016	0.019
F.1	BS5		Roof	E	16								0.019	0.013	0.009
F.1	BS1		Roof	E	18								0.026	0.025	0.025
F.1	BS2		Roof	E	18								0.016	0.011	0.012
F.1	BS3		Roof	E	18								0.045	0.048	0.044
F.1	BS4		Roof	E	18								0.029	0.023	0.027
F.1	BS5		Roof	E	18								0.022	0.018	0.013
F.1	BS1		Roof	E	19								0.014	0.023	0.024
F.1	BS2		Roof	E	19								0.052	0.034	0.037
F.1	BS3		Roof	E	19								0.039	0.041	0.039
F.1	BS4		Roof	E	19								0.025	0.018	0.023
F.1	BS5		Roof	E	19								0.019	0.015	0.015
F.2	PB		Roof	E	30	0.11	0.10	0.11		0.07		0.09	0.09		0.08
F.2	PB		Roof	E	11	0.11	0.11	0.12	0.07		0.09				
F.2	PB		Roof	E	12	0.01	0.03	0.03	0.02		0.03				
F.2	PB		Roof	E	13	0.15	0.15	0.07	0.07		0.04				
F.2	PB		Roof	E	14	0.10	0.11	0.12		0.06		0.10	0.11	0.05	0.05
F.2	PB		Roof	E	15	0.12	0.11	0.11		0.07		0.10	0.11		0.07
F.2	PB		Roof	E	20								0.01	0.01	0.03
F.2	PB		Roof	E	17								0.03	0.01	0.03
F.2	PB		Roof	E	16								0.02	0.02	0.02
F.2	PB		Roof	E	18								0.10	0.07	0.07
F.2	PB		Roof	E	19								0.08	0.07	0.08

Table F.4 (Continued)

LMR UHF R1 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120	**P**initia**l** (W)	115.0	120.0	118.0	113.0	111.0	108.0	108.0	119.0	120.0	116.0
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10
						380.0125	393.0125	406.5000	419.5000	422.0125	432.9875	438.0125	450.0125	460.0000	469.9875
F.3	PF		Roof	E	30	0.05	0.05	0.03		0.04		0.04	0.06		0.04
F.3	PF		Roof	E	11	0.04	0.07	0.03	0.04		0.06				
F.3	PF		Roof	E	12	0.01	0.02	0.01	0.02		0.02				
F.3	PF		Roof	E	13	0.01	0.01	0.01	0.02		0.01				
F.3	PF		Roof	E	14	0.04	0.06	0.03		0.04		0.05	0.04	0.02	0.04
F.3	PF		Roof	E	15	0.05	0.05	0.03		0.06		0.06	0.07		0.05
F.3	PF		Roof	E	20								0.01	0.01	0.003
F.3	PF		Roof	E	17								0.01	0.01	0.01
F.3	PF		Roof	E	16								0.01	0.02	0.01
F.3	PF		Roof	E	18								0.06	0.04	0.04
F.3	PF		Roof	E	19								0.07	0.04	0.03

Appendix G – MPE Test Results Summary for UHF R2

Table G.1

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.062	0.30	20.5
						116.0	469.9875	0.046	0.31	14.7
						118.0	482.5000	0.051	0.32	15.9
					48	47.4	496.5000	0.015	0.33	4.5
						47.9	511.9875	0.017	0.34	4.9
					30	29.9	519.9875	0.008	0.35	2.4
Roof	BS2	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.032	0.30	10.8
						116.0	469.9875	0.024	0.31	7.7
						118.0	482.5000	0.030	0.32	9.4
					48	47.4	496.5000	0.011	0.33	3.5
						47.9	511.9875	0.016	0.34	4.5
					30	29.9	519.9875	0.008	0.35	2.2
Roof	BS3	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.024	0.30	8.1
						116.0	469.9875	0.022	0.31	7.1
						118.0	482.5000	0.030	0.32	9.4
					48	47.4	496.5000	0.008	0.33	2.5
						47.9	511.9875	0.010	0.34	2.9
					30	29.9	519.9875	0.004	0.35	1.2
Roof	BS4	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.014	0.30	4.8
						116.0	469.9875	0.010	0.31	3.2
						118.0	482.5000	0.013	0.32	3.9
					48	47.4	496.5000	0.006	0.33	1.7
						47.9	511.9875	0.006	0.34	1.9
					30	29.9	519.9875	0.002	0.35	0.7
Roof	BS5	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.007	0.30	2.4
						116.0	469.9875	0.007	0.31	2.4
						118.0	482.5000	0.007	0.32	2.1
					48	47.4	496.5000	0.003	0.33	0.9
						47.9	511.9875	0.004	0.34	1.2
					30	29.9	519.9875	0.002	0.35	0.7

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119.0	450.0125	0.104	0.30	**34.6**
						120.0	460.0000	0.077	0.31	25.1
						116.0	469.9875	0.068	0.31	21.8
Roof	BS2	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119.0	450.0125	0.053	0.30	17.8
						120.0	460.0000	0.043	0.31	13.9
						116.0	469.9875	0.040	0.31	12.7
Roof	BS3	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119.0	450.0125	0.040	0.30	13.2
						120.0	460.0000	0.058	0.31	18.9
						116.0	469.9875	0.032	0.31	10.2
Roof	BS4	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119.0	450.0125	0.032	0.30	10.8
						120.0	460.0000	0.024	0.31	7.8
						116.0	469.9875	0.023	0.31	7.3
Roof	BS5	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.025	0.31	8.1
						116.0	469.9875	0.011	0.31	3.5
Roof	BS1	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.099	0.30	33.1
						116.0	469.9875	0.092	0.31	29.4
						118.0	482.5000	0.100	0.32	31.0
					48	47.4	496.5000	0.032	0.33	9.6
						47.9	511.9875	0.025	0.34	7.4
					30	29.9	519.9875	0.018	0.35	5.1
Roof	BS2	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.069	0.30	23.1
						116.0	469.9875	0.054	0.31	17.2
						118.0	482.5000	0.059	0.32	18.5
					48	47.4	496.5000	0.022	0.33	6.6
						47.9	511.9875	0.023	0.34	6.7
					30	29.9	519.9875	0.014	0.35	4.0

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS3	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.045	0.30	15.0
						116.0	469.9875	0.037	0.31	11.8
						118.0	482.5000	0.053	0.32	16.5
					48	47.4	496.5000	0.015	0.33	4.4
						47.9	511.9875	0.013	0.34	3.8
					30	29.9	519.9875	0.011	0.35	3.2
Roof	BS4	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.028	0.30	9.4
						116.0	469.9875	0.027	0.31	8.5
						118.0	482.5000	0.026	0.32	8.1
					48	47.4	496.5000	0.012	0.33	3.7
						47.9	511.9875	0.007	0.34	2.1
					30	29.9	519.9875	0.003	0.35	1.0
Roof	BS5	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.021	0.30	7.0
						116.0	469.9875	0.014	0.31	4.5
						118.0	482.5000	0.012	0.32	3.8
					48	47.4	496.5000	0.005	0.33	1.5
						47.9	511.9875	0.004	0.34	1.1
					30	29.9	519.9875	0.003	0.35	1.0
Roof	BS1	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.056	0.30	18.7
						120.0	460.0000	0.055	0.31	17.8
						116.0	469.9875	0.078	0.31	25.0
Roof	BS2	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.052	0.30	17.4
						120.0	460.0000	0.047	0.31	15.2
						116.0	469.9875	0.057	0.31	18.3
Roof	BS3	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.029	0.30	9.8
						120.0	460.0000	0.043	0.31	14.0
						116.0	469.9875	0.032	0.31	10.3
Roof	BS4	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.024	0.30	8.1
						120.0	460.0000	0.024	0.31	7.7
						116.0	469.9875	0.036	0.31	11.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.023	0.30	7.6
						120.0	460.0000	0.028	0.31	9.2
						116.0	469.9875	0.020	0.31	6.4
Roof	BS1	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.4
						120.0	460.0000	0.028	0.31	9.1
						116.0	469.9875	0.012	0.31	3.8
Roof	BS2	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.052	0.30	17.5
						120.0	460.0000	0.033	0.31	10.7
						116.0	469.9875	0.036	0.31	11.3
Roof	BS3	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.039	0.30	13.0
						120.0	460.0000	0.038	0.31	12.5
						116.0	469.9875	0.020	0.31	6.2
Roof	BS4	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.019	0.31	6.1
						116.0	469.9875	0.020	0.31	6.2
Roof	BS5	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.031	0.30	10.3
						120.0	460.0000	0.021	0.31	7.0
						116.0	469.9875	0.012	0.31	3.8
Roof	BS1	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.020	0.30	6.7
						120.0	460.0000	0.025	0.31	8.2
						116.0	469.9875	0.019	0.31	6.0
Roof	BS2	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.057	0.30	18.8
						120.0	460.0000	0.034	0.31	11.1
						116.0	469.9875	0.052	0.31	16.7
Roof	BS3	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.007	0.30	2.3
						120.0	460.0000	0.016	0.31	5.3
						116.0	469.9875	0.007	0.31	2.3
Roof	BS4	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.026	0.30	8.7
						120.0	460.0000	0.016	0.31	5.3
						116.0	469.9875	0.019	0.31	5.9

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.4
						120.0	460.0000	0.013	0.31	4.3
						116.0	469.9875	0.009	0.31	2.8
Roof	BS1	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.026	0.30	8.8
						120.0	460.0000	0.025	0.31	8.1
						116.0	469.9875	0.025	0.31	8.1
						118.0	482.5000	0.096	0.32	29.9
					48	47.4	496.5000	0.030	0.33	9.0
						47.9	511.9875	0.028	0.34	8.3
					30	29.9	519.9875	0.016	0.35	4.5
Roof	BS2	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.016	0.30	5.2
						120.0	460.0000	0.011	0.31	3.6
						116.0	469.9875	0.012	0.31	3.7
						118.0	482.5000	0.059	0.32	18.5
					48	47.4	496.5000	0.026	0.33	8.0
						47.9	511.9875	0.026	0.34	7.7
					30	29.9	519.9875	0.011	0.35	3.2
Roof	BS3	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.045	0.30	15.0
						120.0	460.0000	0.048	0.31	15.6
						116.0	469.9875	0.044	0.31	14.0
						118.0	482.5000	0.053	0.32	16.4
					48	47.4	496.5000	0.014	0.33	4.3
						47.9	511.9875	0.014	0.34	4.2
					30	29.9	519.9875	0.009	0.35	2.6
Roof	BS4	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.029	0.30	9.8
						120.0	460.0000	0.023	0.31	7.4
						116.0	469.9875	0.027	0.31	8.5
						118.0	482.5000	0.025	0.32	7.7
					48	47.4	496.5000	0.011	0.33	3.3
						47.9	511.9875	0.008	0.34	2.3
					30	29.9	519.9875	0.003	0.35	0.9

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.022	0.30	7.2
						120.0	460.0000	0.018	0.31	5.9
						116.0	469.9875	0.013	0.31	4.0
						118.0	482.5000	0.018	0.32	5.7
					48	47.4	496.5000	0.004	0.33	1.3
						47.9	511.9875	0.005	0.34	1.5
					30	29.9	519.9875	0.004	0.35	1.2
Roof	BS1	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.080	0.31	25.4
						118.0	482.5000	0.076	0.32	23.5
					48	47.4	494.9875	0.016	0.33	4.8
Roof	BS2	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.054	0.31	17.2
						118.0	482.5000	0.058	0.32	17.9
					48	47.4	494.9875	0.013	0.33	4.1
Roof	BS3	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.034	0.31	10.9
						118.0	482.5000	0.042	0.32	12.9
					48	47.4	494.9875	0.008	0.33	2.4
Roof	BS4	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.030	0.31	9.7
						118.0	482.5000	0.026	0.32	8.1
					48	47.4	494.9875	0.006	0.33	1.8
Roof	BS5	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.010	0.31	3.2
						118.0	482.5000	0.005	0.32	1.7
					48	47.4	494.9875	0.003	0.33	0.8
Roof	BS1	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.084	0.31	26.7
						118.0	482.5000	0.093	0.32	28.9
					48	47.4	496.5000	0.026	0.33	7.7
						47.9	511.9875	0.025	0.34	7.2
Roof	BS2	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.049	0.31	15.7
						118.0	482.5000	0.055	0.32	17.1
					48	47.4	496.5000	0.022	0.33	6.8
						47.9	511.9875	0.023	0.34	6.7

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS3	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.037	0.31	11.8
						118.0	482.5000	0.047	0.32	14.7
					48	47.4	496.5000	0.011	0.33	3.5
						47.9	511.9875	0.012	0.34	3.4
Roof	BS4	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.016	0.31	5.1
						118.0	482.5000	0.024	0.32	7.4
					48	47.4	496.5000	0.008	0.33	2.4
						47.9	511.9875	0.006	0.34	1.6
Roof	BS5	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.014	0.31	4.5
						118.0	482.5000	0.014	0.32	4.2
					48	47.4	496.5000	0.005	0.33	1.6
						47.9	511.9875	0.005	0.34	1.6
Roof	BS1	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.026	0.33	8.0
						47.8	503.0000	0.029	0.34	8.8
						47.9	511.9875	0.024	0.34	6.9
Roof	BS2	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.021	0.33	6.5
						47.8	503.0000	0.021	0.34	6.2
						47.9	511.9875	0.022	0.34	6.4
Roof	BS3	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.013	0.33	3.9
						47.8	503.0000	0.016	0.34	4.8
						47.9	511.9875	0.011	0.34	3.2
Roof	BS4	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.011	0.33	3.2
						47.8	503.0000	0.006	0.34	1.9
						47.9	511.9875	0.006	0.34	1.9
Roof	BS5	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.009	0.33	2.7
						47.8	503.0000	0.011	0.34	3.2
						47.9	511.9875	0.006	0.34	1.7
Roof	BS1	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.018	0.33	5.5
						47.8	503.0000	0.023	0.34	6.8
						47.9	511.9875	0.019	0.34	5.7

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS2	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.014	0.33	4.3
						47.8	503.0000	0.016	0.34	4.8
						47.9	511.9875	0.022	0.34	6.6
Roof	BS3	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.010	0.33	3.0
						47.8	503.0000	0.013	0.34	3.7
						47.9	511.9875	0.012	0.34	3.5
Roof	BS4	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.007	0.33	2.0
						47.8	503.0000	0.005	0.34	1.4
						47.9	511.9875	0.011	0.34	3.3
Roof	BS5	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.008	0.33	2.4
						47.8	503.0000	0.007	0.34	2.1
						47.9	511.9875	0.007	0.34	2.0
Roof	BS1	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.014	0.30	4.7
						120.0	460.0000	0.023	0.31	7.4
						116.0	469.9875	0.024	0.31	7.5
						118.0	482.5000	0.085	0.32	26.3
					48	47.4	496.5000	0.030	0.33	9.2
						47.9	511.9875	0.019	0.34	5.6
Roof	BS2	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.052	0.30	17.2
						120.0	460.0000	0.034	0.31	11.2
						116.0	469.9875	0.037	0.31	11.8
						118.0	482.5000	0.049	0.32	15.4
					48	47.4	496.5000	0.024	0.33	7.3
						47.9	511.9875	0.016	0.34	4.8
Roof	BS3	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.039	0.30	13.1
						120.0	460.0000	0.041	0.31	13.4
						116.0	469.9875	0.039	0.31	12.6
						118.0	482.5000	0.046	0.32	14.2
					48	47.4	496.5000	0.014	0.33	4.3
						47.9	511.9875	0.009	0.34	2.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.1 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.025	0.30	8.3
						120.0	460.0000	0.018	0.31	5.9
						116.0	469.9875	0.023	0.31	7.2
						118.0	482.5000	0.020	0.32	6.1
					48	47.4	496.5000	0.008	0.33	2.4
						47.9	511.9875	0.004	0.34	1.1
Roof	BS5	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.019	0.30	6.3
						120.0	460.0000	0.015	0.31	4.9
						116.0	469.9875	0.015	0.31	4.7
						118.0	482.5000	0.008	0.32	2.6
					48	47.4	496.5000	0.003	0.33	0.9
						47.9	511.9875	0.003	0.34	0.9
Roof	BS1	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.059	0.31	18.8
						118.0	482.5000	0.052	0.32	16.1
					48	47.3	493.9875	0.020	0.33	6.1
Roof	BS2	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.044	0.31	14.1
						118.0	482.5000	0.058	0.32	17.9
					48	47.3	493.9875	0.016	0.33	4.9
Roof	BS3	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.019	0.31	6.1
						118.0	482.5000	0.036	0.32	11.1
					48	47.3	493.9875	0.009	0.33	2.7
Roof	BS4	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.025	0.31	8.1
						118.0	482.5000	0.022	0.32	6.8
					48	47.3	493.9875	0.004	0.33	1.4
Roof	BS5	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.016	0.31	5.1
						118.0	482.5000	0.017	0.32	5.4
					48	47.3	493.9875	0.008	0.33	2.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.2

MPE assessment for LMR UHF R2- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.094	0.30	31.5
						116.0	469.9875	0.075	0.31	24.1
						118.0	482.5000	0.088	0.32	27.4
					48	47.4	496.5000	0.032	0.33	9.7
						47.9	511.9875	0.020	0.34	5.9
					30	29.9	519.9875	0.013	0.35	3.8
Roof	PB	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119	450.0125	0.111	0.30	**37.1**
						120	460.0000	0.049	0.31	15.9
						116	469.9875	0.055	0.31	17.4
Roof	PB	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.105	0.30	35.0
						116.0	469.9875	0.073	0.31	23.4
						118.0	482.5000	0.102	0.32	31.6
					48	47.4	496.5000	0.030	0.33	9.0
						47.9	511.9875	0.018	0.34	5.2
					30	29.9	519.9875	0.009	0.35	2.6
Roof	PB	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.014	0.30	4.8
						120.0	460.0000	0.012	0.31	3.8
						116.0	469.9875	0.028	0.31	9.0
Roof	PB	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.026	0.30	8.5
						120.0	460.0000	0.015	0.31	4.9
						116.0	469.9875	0.031	0.31	10.0
Roof	PB	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.019	0.30	6.2
						120.0	460.0000	0.022	0.31	7.0
						116.0	469.9875	0.018	0.31	5.8

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table G.2 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	17	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.097	0.30	32.3
						120.0	460.0000	0.068	0.31	22.2
						116.0	469.9875	0.072	0.31	23.1
						118.0	482.5000	0.095	0.32	29.7
					48	47.4	496.5000	0.033	0.33	10.1
						47.9	511.9875	0.019	0.34	5.5
					30	29.9	519.9875	0.010	0.35	2.9
Roof	PB	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.041	0.31	13.1
						118.0	482.5000	0.037	0.32	11.6
					48	47.4	494.9875	0.009	0.33	2.8
Roof	PB	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.024	0.31	7.7
						118.0	482.5000	0.051	0.32	15.9
					48	47.4	496.5000	0.027	0.33	8.2
						47.9	511.9875	0.011	0.34	3.2
Roof	PB	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.012	0.33	3.8
						47.8	503.0000	0.005	0.34	1.6
						47.9	511.9875	0.003	0.34	0.9
Roof	PB	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.008	0.33	2.5
						47.8	503.0000	0.004	0.34	1.3
						47.9	511.9875	0.003	0.34	1.0
Roof	PB	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.075	0.30	25.1
						120.0	460.0000	0.068	0.31	22.2
						116.0	469.9875	0.075	0.31	24.1
						118.0	482.5000	0.075	0.32	23.4
					48	47.4	496.5000	0.034	0.33	10.3
						47.9	511.9875	0.014	0.34	4.0
Roof	PB	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.011	0.31	3.6
						118.0	482.5000	0.017	0.32	5.4
					48	47.3	493.9875	0.001	0.33	0.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.3

MPE assessment for LMR UHF R2- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	30	AN000131A01, 1/4 wave (136-870MHz)	120	119.0	450.0125	0.059	0.30	19.8
						116.0	469.9875	0.036	0.31	11.4
						118.0	482.5000	0.045	0.32	14.0
					48	47.4	496.5000	0.026	0.33	7.7
						47.9	511.9875	0.025	0.34	7.2
					30	29.9	519.9875	0.017	0.35	4.8
Roof	PF	E	14	HAE6013A, 1/2 Wave (380-470MHz)	120	119	450.0125	0.045	0.30	14.9
						120	460.0000	0.024	0.31	7.7
						116	469.9875	0.038	0.31	12.0
Roof	PF	E	15	HAE6031A, 1/2 Wave (380-520MHz)	120	119.0	450.0125	0.065	0.30	21.7
						116.0	469.9875	0.050	0.31	16.0
						118.0	482.5000	0.065	0.32	20.2
					48	47.4	496.5000	0.025	0.33	7.4
						47.9	511.9875	0.025	0.34	7.2
					30	29.9	519.9875	0.011	0.35	3.3
Roof	PF	E	20	RAE4014ARB, 5/8 Wave (445-470MHz)	120	119.0	450.0125	0.011	0.30	3.8
						120.0	460.0000	0.011	0.31	3.5
						116.0	469.9875	0.003	0.31	0.8
Roof	PF	E	17	HAE4011A, 1/2 Wave (450-470MHz)	120	119.0	450.0125	0.009	0.30	3.1
						120.0	460.0000	0.008	0.31	2.5
						116.0	469.9875	0.011	0.31	3.6
Roof	PF	E	16	HAE4003A, 1/4 Wave (450-470MHz)	120	119.0	450.0125	0.015	0.30	4.9
						120.0	460.0000	0.017	0.31	5.4
						116.0	469.9875	0.007	0.31	2.2

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table G.3 (Continued)

MPE assessment for LMR UHF R2- roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	18	HAE6015A, 1/2 Wave (450-520MHz)	120	119.0	450.0125	0.059	0.30	19.5
						120.0	460.0000	0.040	0.31	13.1
						116.0	469.9875	0.041	0.31	13.0
						118.0	482.5000	0.050	0.32	15.4
					48	47.4	496.5000	0.022	0.33	6.7
						47.9	511.9875	0.020	0.34	6.0
					30	29.9	519.9875	0.014	0.35	3.9
Roof	PF	E	22	HAE4012A, 1/2 Wave (470-495MHz)	120	116.0	470.0125	0.021	0.31	6.8
						118.0	482.5000	0.013	0.32	4.0
					48	47.4	494.9875	0.005	0.33	1.5
Roof	PF	E	21	HAE4004A, 1/4 Wave (470-512MHz)	120	116.0	470.0125	0.009	0.31	2.8
						118.0	482.5000	0.023	0.32	7.1
					48	47.4	496.5000	0.007	0.33	2.2
						47.9	511.9875	0.002	0.34	0.7
Roof	PF	E	23	HAE4013A, 1/2 Wave (494-512MHz)	48	47.4	494.9875	0.008	0.33	2.4
						47.8	503.0000	0.009	0.34	2.7
						47.9	511.9875	0.004	0.34	1.2
Roof	PF	E	25	RAE4016ARB, 5/8 Wave (494-512MHz)	48	47.4	494.9875	0.004	0.33	1.2
						47.8	503.0000	0.007	0.34	2.1
						47.9	511.9875	0.004	0.34	1.2
Roof	PF	E	19	HAE6016A, 1/4 Wave (450-512MHz)	120	119.0	450.0125	0.068	0.30	**22.6**
						120.0	460.0000	0.042	0.31	13.7
						116.0	469.9875	0.034	0.31	11.0
						118.0	482.5000	0.039	0.32	12.1
					48	47.4	496.5000	0.019	0.33	5.9
						47.9	511.9875	0.025	0.34	7.4
Roof	PF	E	24	RAE4015ARM, 5/8 Wave (470-494MHz)	120	116.0	470.0125	0.017	0.31	5.3
						118.0	482.5000	0.009	0.32	2.7
					48	47.3	493.9875	0.001	0.33	0.4

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table G.4

LMR UHF R2 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120/48/30	**P**initial (W)	119.0	120.0	116.0	116.0	118.0	47.3	47.4	47.4	47.8	47.9	29.9
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10	f11
						450.0125	460.0000	469.9875	470.0125	482.5000	493.9875	494.9875	496.5000	503.0000	511.9875	519.9875
G.1	BS1		Roof	E	30	0.062		0.046		0.051			0.015		0.017	0.008
G.1	BS2		Roof	E	30	0.032		0.024		0.030			0.011		0.016	0.008
G.1	BS3		Roof	E	30	0.024		0.022		0.030			0.008		0.010	0.004
G.1	BS4		Roof	E	30	0.014		0.010		0.013			0.006		0.006	0.002
G.1	BS5		Roof	E	30	0.007		0.007		0.007			0.003		0.004	0.002
G.1	BS1		Roof	E	14	0.104	0.077	0.068								
G.1	BS2		Roof	E	14	0.053	0.043	0.040								
G.1	BS3		Roof	E	14	0.040	0.058	0.032								
G.1	BS4		Roof	E	14	0.032	0.024	0.023								
G.1	BS5		Roof	E	14	0.019	0.025	0.011								
G.1	BS1		Roof	E	15	0.099		0.092		0.100			0.032		0.025	0.018
G.1	BS2		Roof	E	15	0.069		0.054		0.059			0.022		0.023	0.014
G.1	BS3		Roof	E	15	0.045		0.037		0.053			0.015		0.013	0.011
G.1	BS4		Roof	E	15	0.028		0.027		0.026			0.012		0.007	0.003
G.1	BS5		Roof	E	15	0.021		0.014		0.012			0.005		0.004	0.003
G.1	BS1		Roof	E	20	0.056	0.055	0.078								
G.1	BS2		Roof	E	20	0.052	0.047	0.057								
G.1	BS3		Roof	E	20	0.029	0.043	0.032								
G.1	BS4		Roof	E	20	0.024	0.024	0.036								
G.1	BS5		Roof	E	20	0.023	0.028	0.020								
G.1	BS1		Roof	E	17	0.019	0.028	0.012								
G.1	BS2		Roof	E	17	0.052	0.033	0.036								
G.1	BS3		Roof	E	17	0.039	0.038	0.020								
G.1	BS4		Roof	E	17	0.019	0.019	0.020								
G.1	BS5		Roof	E	17	0.031	0.021	0.012								
G.1	BS1		Roof	E	16	0.020	0.025	0.019								
G.1	BS2		Roof	E	16	0.057	0.034	0.052								
G.1	BS3		Roof	E	16	0.007	0.016	0.007								
G.1	BS4		Roof	E	16	0.026	0.016	0.019								
G.1	BS5		Roof	E	16	0.019	0.013	0.009								

Table G.4 (Continued)

LMR UHF R2 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120/48/30	Pinitial (W)	119.0	120.0	116.0	116.0	118.0	47.3	47.4	47.4	47.8	47.9	29.9
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10	f11
						450.0125	460.0000	469.9875	470.0125	482.5000	493.9875	494.9875	496.5000	503.0000	511.9875	519.9875
G.1	BS1		Roof	E	18	0.026	0.025	0.025		0.096			0.030		0.028	0.016
G.1	BS2		Roof	E	18	0.016	0.011	0.012		0.059			0.026		0.026	0.011
G.1	BS3		Roof	E	18	0.045	0.048	0.044		0.053			0.014		0.014	0.009
G.1	BS4		Roof	E	18	0.029	0.023	0.027		0.025			0.011		0.008	0.003
G.1	BS5		Roof	E	18	0.022	0.018	0.013		0.018			0.004		0.005	0.004
G.1	BS1		Roof	E	22				0.080	0.076		0.016				
G.1	BS2		Roof	E	22				0.054	0.058		0.013				
G.1	BS3		Roof	E	22				0.034	0.042		0.008				
G.1	BS4		Roof	E	22				0.030	0.026		0.006				
G.1	BS5		Roof	E	22				0.010	0.005		0.003				
G.1	BS1		Roof	E	21				0.084	0.093			0.026		0.025	
G.1	BS2		Roof	E	21				0.049	0.055			0.022		0.023	
G.1	BS3		Roof	E	21				0.037	0.047			0.011		0.012	
G.1	BS4		Roof	E	21				0.016	0.024			0.008		0.006	
G.1	BS5		Roof	E	21				0.014	0.014			0.005		0.005	
G.1	BS1		Roof	E	23							0.026		0.029	0.024	
G.1	BS2		Roof	E	23							0.021		0.021	0.022	
G.1	BS3		Roof	E	23							0.013		0.016	0.011	
G.1	BS4		Roof	E	23							0.011		0.006	0.006	
G.1	BS5		Roof	E	23							0.009		0.011	0.006	
G.1	BS1		Roof	E	25							0.018		0.023	0.019	
G.1	BS2		Roof	E	25							0.014		0.016	0.022	
G.1	BS3		Roof	E	25							0.010		0.013	0.012	
G.1	BS4		Roof	E	25							0.007		0.005	0.011	
G.1	BS5		Roof	E	25							0.008		0.007	0.007	
G.1	BS1		Roof	E	19	0.014	0.023	0.24		0.085				0.030	0.019	
G.1	BS2		Roof	E	19	0.052	0.034	0.037		0.049				0.024	0.016	
G.1	BS3		Roof	E	19	0.039	0.041	0.039		0.046				0.014	0.009	
G.1	BS4		Roof	E	19	0.025	0.018	0.023		0.020				0.008	0.004	
G.1	BS5		Roof	E	19	0.019	0.015	0.015		0.008				0.003	0.003	

Table G.4 (Continued)

LMR UHF R2 MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	120/48/30	**P**initial (W)	119.0	120.0	116.0	116.0	118.0	47.3	47.4	47.4	47.8	47.9	29.9
		FCCLimit (mW/cm^2)	0.25	0.26	0.27	0.28	0.28	0.29	0.29	0.30	0.31	0.31	0.31

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9	f10	f11
						450.0125	460.0000	469.9875	470.0125	482.5000	493.9875	494.9875	496.5000	503.0000	511.9875	519.9875
G.1	BS1		Roof	E	24				0.059	0.052	0.020					
G.1	BS2		Roof	E	24				0.044	0.058	0.016					
G.1	BS3		Roof	E	24				0.019	0.036	0.009					
G.1	BS4		Roof	E	24				0.025	0.022	0.004					
G.1	BS5		Roof	E	24				0.016	0.017	0.008					
G.2	PB		Roof	E	30	0.094		0.075		0.088			0.032		0.020	0.013
G.2	PB		Roof	E	14	0.111	0.049	0.055								
G.2	PB		Roof	E	15	0.105		0.073		0.102			0.030		0.018	0.009
G.2	PB		Roof	E	20	0.014	0.012	0.028								
G.2	PB		Roof	E	17	0.026	0.015	0.031								
G.2	PB		Roof	E	16	0.019	0.022	0.018								
G.2	PB		Roof	E	18	0.097	0.068	0.072		0.095			0.033		0.019	0.010
G.2	PB		Roof	E	22				0.041	0.037		0.009				
G.2	PB		Roof	E	21				0.024	0.051			0.027		0.011	
G.2	PB		Roof	E	23							0.012		0.005	0.003	
G.2	PB		Roof	E	25							0.008		0.004	0.003	
G.2	PB		Roof	E	19	0.075	0.068	0.075		0.075			0.034		0.014	
G.2	PB		Roof	E	24				0.011	0.017	0.001					
G.3	PF		Roof	E	30	0.059		0.036		0.045			0.026		0.025	0.017
G.3	PF		Roof	E	14	0.045	0.024	0.038								
G.3	PF		Roof	E	15	0.065		0.050		0.065			0.025		0.025	0.011
G.3	PF		Roof	E	20	0.011	0.011	0.003								
G.3	PF		Roof	E	17	0.009	0.008	0.011								
G.3	PF		Roof	E	16	0.015	0.017	0.007								
G.3	PF		Roof	E	18	0.059	0.040	0.041		0.050			0.022		0.020	0.014
G.3	PF		Roof	E	22				0.021	0.013		0.005				
G.3	PF		Roof	E	21				0.009	0.023			0.007		0.002	
G.3	PF		Roof	E	23							0.008		0.009	0.004	
G.3	PF		Roof	E	25							0.004		0.007	0.004	
G.3	PF		Roof	E	19	0.068	0.042	0.034		0.039			0.019		0.025	
G.3	PF		Roof	E	24				0.017	0.009	0.001					

Appendix H – MPE Test Results Summary for 7/800 band

Table H.1

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.025	0.51	4.9
						35.8	770.0125	0.023	0.51	4.6
						34.9	775.9125	0.018	0.52	3.5
						35.9	794.0875	0.022	0.53	4.2
					42	41.2	806.0125	0.026	0.54	4.9
						41.6	823.9875	0.025	0.55	4.5
						41.7	851.0125	0.018	0.57	3.2
						41.7	862.0125	0.019	0.57	3.3
						41.8	868.8875	0.012	0.58	2.0
Roof	BS2	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.014	0.51	2.8
						35.8	770.0125	0.015	0.51	2.9
						34.9	775.9125	0.017	0.52	3.3
						35.9	794.0875	0.017	0.53	3.2
					42	41.2	806.0125	0.024	0.54	4.4
						41.6	823.9875	0.020	0.55	3.6
						41.7	851.0125	0.015	0.57	2.6
						41.7	862.0125	0.013	0.57	2.2
						41.8	868.8875	0.009	0.58	1.5
Roof	BS3	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.010	0.51	2.0
						35.8	770.0125	0.009	0.51	1.7
						34.9	775.9125	0.013	0.52	2.4
						35.9	794.0875	0.010	0.53	2.0
					42	41.2	806.0125	0.013	0.54	2.4
						41.6	823.9875	0.011	0.55	2.0
						41.7	851.0125	0.010	0.57	1.8
						41.7	862.0125	0.009	0.57	1.5
						41.8	868.8875	0.006	0.58	1.0

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.005	0.51	0.9
						35.8	770.0125	0.005	0.51	0.9
						34.9	775.9125	0.007	0.52	1.3
						35.9	794.0875	0.009	0.53	1.7
					42	41.2	806.0125	0.008	0.54	1.5
						41.6	823.9875	0.008	0.55	1.5
						41.7	851.0125	0.006	0.57	1.1
						41.7	862.0125	0.004	0.57	0.7
						41.8	868.8875	0.004	0.58	0.6
Roof	BS5	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.005	0.51	0.9
						35.8	770.0125	0.006	0.51	1.2
						34.9	775.9125	0.004	0.52	0.7
						35.9	794.0875	0.005	0.53	0.9
					42	41.2	806.0125	0.006	0.54	1.1
						41.6	823.9875	0.008	0.55	1.4
						41.7	851.0125	0.003	0.57	0.5
						41.7	862.0125	0.002	0.57	0.4
						41.8	868.8875	0.003	0.58	0.5
Roof	BS1	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.021	0.51	4.0
						35.8	770.0125	0.020	0.51	3.9
						34.9	775.9125	0.016	0.52	3.1
						35.9	794.0875	0.018	0.53	3.5
					42	41.2	806.0125	0.020	0.54	3.7
						41.6	823.9875	0.021	0.55	3.9
						41.7	851.0125	0.019	0.57	3.3
						41.7	862.0125	0.025	0.57	4.4
						41.8	868.8875	0.018	0.58	3.2

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS2	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.012	0.51	2.4
						35.8	770.0125	0.013	0.51	2.5
						34.9	775.9125	0.013	0.52	2.4
						35.9	794.0875	0.013	0.53	2.5
					42	41.2	806.0125	0.015	0.54	2.9
						41.6	823.9875	0.018	0.55	3.3
						41.7	851.0125	0.015	0.57	2.6
						41.7	862.0125	0.015	0.57	2.6
						41.8	868.8875	0.016	0.58	2.7
Roof	BS3	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.009	0.51	1.7
						35.8	770.0125	0.009	0.51	1.7
						34.9	775.9125	0.011	0.52	2.1
						35.9	794.0875	0.008	0.53	1.6
					42	41.2	806.0125	0.009	0.54	1.7
						41.6	823.9875	0.010	0.55	1.8
						41.7	851.0125	0.010	0.57	1.8
						41.7	862.0125	0.010	0.57	1.8
						41.8	868.8875	0.010	0.58	1.7
Roof	BS4	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.001	0.51	0.2
						35.8	770.0125	0.001	0.51	0.2
						34.9	775.9125	0.001	0.52	0.2
						35.9	794.0875	0.002	0.53	0.4
					42	41.2	806.0125	0.002	0.54	0.4
						41.6	823.9875	0.001	0.55	0.3
						41.7	851.0125	0.003	0.57	0.5
						41.7	862.0125	0.002	0.57	0.4
						41.8	868.8875	0.002	0.58	0.3

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.005	0.51	0.9
						35.8	770.0125	0.006	0.51	1.2
						34.9	775.9125	0.004	0.52	0.9
						35.9	794.0875	0.005	0.53	0.9
					42	41.2	806.0125	0.005	0.54	1.0
						41.6	823.9875	0.008	0.55	1.4
						41.7	851.0125	0.005	0.57	0.9
						41.7	862.0125	0.006	0.57	1.1
						41.8	868.8875	0.006	0.58	1.0
Roof	BS1	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.016	0.51	3.1
						35.8	770.0125	0.013	0.51	2.6
						34.9	775.9125	0.012	0.52	2.3
						35.9	794.0875	0.019	0.53	3.5
					42	41.2	806.0125	0.023	0.54	4.4
						41.6	823.9875	0.031	0.55	5.6
						41.7	851.0125	0.029	0.57	5.2
						41.7	862.0125	0.031	0.57	5.4
						41.8	868.8875	0.023	0.58	4.1
Roof	BS2	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.007	0.51	1.4
						35.8	770.0125	0.007	0.51	1.4
						34.9	775.9125	0.010	0.52	2.0
						35.9	794.0875	0.014	0.53	2.6
					42	41.2	806.0125	0.020	0.54	3.8
						41.6	823.9875	0.022	0.55	4.1
						41.7	851.0125	0.022	0.57	3.8
						41.7	862.0125	0.024	0.57	4.2
						41.8	868.8875	0.020	0.58	3.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS3	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.001	0.51	0.2
						35.8	770.0125	0.001	0.51	0.3
						34.9	775.9125	0.002	0.52	0.4
						35.9	794.0875	0.004	0.53	0.8
					42	41.2	806.0125	0.004	0.54	0.7
						41.6	823.9875	0.006	0.55	1.0
						41.7	851.0125	0.006	0.57	1.1
						41.7	862.0125	0.008	0.57	1.4
						41.8	868.8875	0.005	0.58	0.9
Roof	BS4	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.003	0.51	0.6
						35.8	770.0125	0.003	0.51	0.5
						34.9	775.9125	0.005	0.52	0.9
						35.9	794.0875	0.008	0.53	1.5
					42	41.2	806.0125	0.011	0.54	2.1
						41.6	823.9875	0.014	0.55	2.6
						41.7	851.0125	0.012	0.57	2.0
						41.7	862.0125	0.010	0.57	1.8
						41.8	868.8875	0.011	0.58	1.9
Roof	BS5	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.002	0.51	0.5
						35.8	770.0125	0.005	0.51	0.9
						34.9	775.9125	0.003	0.52	0.6
						35.9	794.0875	0.005	0.53	0.9
					42	41.2	806.0125	0.008	0.54	1.4
						41.6	823.9875	0.012	0.55	2.1
						41.7	851.0125	0.009	0.57	1.5
						41.7	862.0125	0.010	0.57	1.8
						41.8	868.8875	0.012	0.58	2.2

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS1	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.020	0.51	3.9
						35.8	770.0125	0.020	0.51	3.9
						34.9	775.9125	0.016	0.52	3.1
						35.9	794.0875	0.019	0.53	3.6
					42	41.2	806.0125	0.020	0.54	3.7
						41.6	823.9875	0.022	0.55	4.0
						41.7	851.0125	0.020	0.57	3.5
						41.7	862.0125	0.026	0.57	4.5
						41.8	868.8875	0.019	0.58	3.3
Roof	BS2	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.013	0.51	2.5
						35.8	770.0125	0.013	0.51	2.5
						34.9	775.9125	0.015	0.52	2.9
						35.9	794.0875	0.014	0.53	2.6
					42	41.2	806.0125	0.016	0.54	3.0
						41.6	823.9875	0.018	0.55	3.3
						41.7	851.0125	0.016	0.57	2.7
						41.7	862.0125	0.016	0.57	2.8
						41.8	868.8875	0.015	0.58	2.6
Roof	BS3	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.003	0.51	0.6
						35.8	770.0125	0.003	0.51	0.5
						34.9	775.9125	0.002	0.52	0.4
						35.9	794.0875	0.004	0.53	0.8
					42	41.2	806.0125	0.003	0.54	0.5
						41.6	823.9875	0.002	0.55	0.4
						41.7	851.0125	0.005	0.57	0.8
						41.7	862.0125	0.004	0.57	0.7
						41.8	868.8875	0.003	0.58	0.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS4	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.001	0.51	0.3
						35.8	770.0125	0.002	0.51	0.3
						34.9	775.9125	0.001	0.52	0.2
						35.9	794.0875	0.002	0.53	0.4
					42	41.2	806.0125	0.002	0.54	0.3
						41.6	823.9875	0.001	0.55	0.3
						41.7	851.0125	0.002	0.57	0.4
						41.7	862.0125	0.002	0.57	0.4
						41.8	868.8875	0.002	0.58	0.3
Roof	BS5	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.005	0.51	0.9
						35.8	770.0125	0.006	0.51	1.2
						34.9	775.9125	0.004	0.52	0.9
						35.9	794.0875	0.005	0.53	0.9
					42	41.2	806.0125	0.005	0.54	1.0
						41.6	823.9875	0.007	0.55	1.3
						41.7	851.0125	0.004	0.57	0.8
						41.7	862.0125	0.005	0.57	1.0
						41.8	868.8875	0.006	0.58	1.1
Roof	BS1	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.027	0.51	5.4
						35.8	770.0125	0.027	0.51	5.3
						34.9	775.9125	0.023	0.52	4.5
						35.9	794.0875	0.028	0.53	5.2
					42	41.2	806.0125	0.027	0.54	5.1
						41.6	823.9875	0.032	0.55	**5.9**
						41.7	851.0125	0.025	0.57	4.5
						41.7	862.0125	0.033	0.57	5.7
						41.8	868.8875	0.022	0.58	3.9

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS2	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.016	0.51	3.2
						35.8	770.0125	0.019	0.51	3.8
						34.9	775.9125	0.019	0.52	3.7
						35.9	794.0875	0.021	0.53	3.9
					42	41.2	806.0125	0.024	0.54	4.4
						41.6	823.9875	0.026	0.55	4.7
						41.7	851.0125	0.020	0.57	3.5
						41.7	862.0125	0.020	0.57	3.5
						41.8	868.8875	0.020	0.58	3.4
Roof	BS3	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.006	0.51	1.1
						35.8	770.0125	0.005	0.51	0.9
						34.9	775.9125	0.003	0.52	0.6
						35.9	794.0875	0.007	0.53	1.3
					42	41.2	806.0125	0.003	0.54	0.6
						41.6	823.9875	0.003	0.55	0.6
						41.7	851.0125	0.005	0.57	0.8
						41.7	862.0125	0.006	0.57	1.1
						41.8	868.8875	0.003	0.58	0.5
Roof	BS4	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.003	0.51	0.6
						35.8	770.0125	0.003	0.51	0.6
						34.9	775.9125	0.002	0.52	0.4
						35.9	794.0875	0.005	0.53	1.0
					42	41.2	806.0125	0.003	0.54	0.6
						41.6	823.9875	0.002	0.55	0.4
						41.7	851.0125	0.004	0.57	0.7
						41.7	862.0125	0.004	0.57	0.7
						41.8	868.8875	0.003	0.58	0.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.1 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Bystander

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	BS5	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.009	0.51	1.8
						35.8	770.0125	0.012	0.51	2.4
						34.9	775.9125	0.009	0.52	1.7
						35.9	794.0875	0.009	0.53	1.8
					42	41.2	806.0125	0.010	0.54	1.9
						41.6	823.9875	0.013	0.55	2.4
						41.7	851.0125	0.008	0.57	1.3
						41.7	862.0125	0.009	0.57	1.5
						41.8	868.8875	0.010	0.58	1.8

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.2

MPE assessment for LMR 7/800 band - roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.012	0.51	2.4
						35.8	770.0125	0.014	0.51	2.7
						34.9	775.9125	0.020	0.52	3.9
						35.9	794.0875	0.016	0.53	2.9
					42	41.2	806.0125	0.017	0.54	3.2
						41.6	823.9875	0.013	0.55	2.4
						41.7	851.0125	0.009	0.57	1.6
						41.7	862.0125	0.008	0.57	1.4
						41.8	868.8875	0.006	0.58	1.1
Roof	PB	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.015	0.51	2.9
						35.8	770.0125	0.012	0.51	2.4
						34.9	775.9125	0.016	0.52	3.1
						35.9	794.0875	0.013	0.53	2.5
					42	41.2	806.0125	0.015	0.54	2.8
						41.6	823.9875	0.012	0.55	2.1
						41.7	851.0125	0.006	0.57	1.1
						41.7	862.0125	0.007	0.57	1.2
						41.8	868.8875	0.011	0.58	1.9
Roof	PB	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.001	0.51	0.2
						35.8	770.0125	0.001	0.51	0.1
						34.9	775.9125	0.001	0.52	0.3
						35.9	794.0875	0.003	0.53	0.6
					42	41.2	806.0125	0.005	0.54	0.9
						41.6	823.9875	0.010	0.55	1.9
						41.7	851.0125	0.010	0.57	1.7
						41.7	862.0125	0.006	0.57	1.1
						41.8	868.8875	0.008	0.58	1.4

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.2 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Passenger Back

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PB	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.015	0.51	3.0
						35.8	770.0125	0.017	0.51	3.3
						34.9	775.9125	0.019	0.52	3.7
						35.9	794.0875	0.015	0.53	2.9
					42	41.2	806.0125	0.016	0.54	3.1
						41.6	823.9875	0.013	0.55	2.4
						41.7	851.0125	0.006	0.57	1.1
						41.7	862.0125	0.007	0.57	1.2
						41.8	868.8875	0.008	0.58	1.3
Roof	PB	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.032	0.51	6.3
						35.8	770.0125	0.039	0.51	7.6
						34.9	775.9125	0.04	0.52	**8.4**
						35.9	794.0875	0.032	0.53	6.1
					42	41.2	806.0125	0.030	0.54	5.5
						41.6	823.9875	0.020	0.55	3.7
						41.7	851.0125	0.010	0.57	1.8
						41.7	862.0125	0.007	0.57	1.2
						41.8	868.8875	0.012	0.58	2.0

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table H.3

MPE assessment for LMR 7/800 band - roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	30	AN000131A01, 1/4 wave (136-870MHz)	36	35.4	764.0875	0.011	0.51	2.2
						35.8	770.0125	0.009	0.51	1.8
						34.9	775.9125	0.007	0.52	1.4
						35.9	794.0875	0.014	0.53	2.7
					42	41.2	806.0125	0.014	0.54	2.6
						41.6	823.9875	0.017	0.55	3.2
						41.7	851.0125	0.010	0.57	1.8
						41.7	862.0125	0.007	0.57	1.3
						41.8	868.8875	0.004	0.58	0.7
Roof	PF	E	26	HAF4013A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.007	0.51	1.4
						35.8	770.0125	0.006	0.51	1.1
						34.9	775.9125	0.005	0.52	1.0
						35.9	794.0875	0.010	0.53	1.9
					42	41.2	806.0125	0.013	0.54	2.5
						41.6	823.9875	0.012	0.55	2.3
						41.7	851.0125	0.009	0.57	1.6
						41.7	862.0125	0.009	0.57	1.6
						41.8	868.8875	0.007	0.58	1.2
Roof	PF	E	27	HAF4014A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.001	0.51	0.2
						35.8	770.0125	0.002	0.51	0.3
						34.9	775.9125	0.001	0.52	0.1
						35.9	794.0875	0.004	0.53	0.8
					42	41.2	806.0125	0.007	0.54	1.3
						41.6	823.9875	0.008	0.55	1.5
						41.7	851.0125	0.013	0.57	2.3
						41.7	862.0125	0.010	0.57	1.7
						41.8	868.8875	0.009	0.58	1.5

Notes:
Blue fonts: Frequencies not regulated by FCC.

Table H.3 (Continued)

MPE assessment for LMR 7/800 band - roof mounted antenna – Passenger Front

Trunk / Roof	Test Post.	E/H Field	Antenna No.	Antenna Model	Max Pwr (W)	Initial Pwr (W)	Tx Freq (MHz)	Max Calc. P.D. (mW/cm^2)	FCC Limit	% To FCC Spec Limit
Roof	PF	E	28	HAF4016A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.011	0.51	2.1
						35.8	770.0125	0.010	0.51	2.0
						34.9	775.9125	0.007	0.52	1.3
						35.9	794.0875	0.012	0.53	2.3
					42	41.2	806.0125	0.018	0.54	3.3
						41.6	823.9875	0.013	0.55	2.4
						41.7	851.0125	0.010	0.57	1.8
						41.7	862.0125	0.011	0.57	1.9
						41.8	868.8875	0.008	0.58	1.5
Roof	PF	E	29	HAF4017A, 1/4 Wave (764-870MHz)	36	35.4	764.0875	0.018	0.51	3.5
						35.8	770.0125	0.016	0.51	3.2
						34.9	775.9125	0.013	0.52	2.6
						35.9	794.0875	0.023	0.53	4.4
					42	41.2	806.0125	0.027	0.54	**5.0**
						41.6	823.9875	0.018	0.55	3.3
						41.7	851.0125	0.016	0.57	2.8
						41.7	862.0125	0.012	0.57	2.1
						41.8	868.8875	0.008	0.58	1.4

Notes:
Blue fonts: Frequencies not regulated by FCC.
Results in bold font are configurations with highest percentage of limits.

Table H.4

LMR 7/800 band MPE Results for FCC

Note:
Blue fonts: Frequencies not regulated by FCC.

Pmax (W)	36/42	**P**initial (W)	35.4	35.8	34.9	35.9	41.2	41.6	41.7	41.7	41.8
		FCCLimit (mW/cm^2)	0.51	0.51	0.52	0.53	0.54	0.55	0.57	0.57	0.58

Table	Test Post	Angle	Trunk / Roof	E/H Field	Antenna No.	f1	f2	f3	f4	f5	f6	f7	f8	f9
						764.0875	770.0125	775.9125	794.0875	806.0125	823.9875	851.0125	862.0125	868.8875
H.1	BS1		Roof	E	30	0.025	0.023	0.018	0.022	0.026	0.025	0.018	0.019	0.012
H.1	BS2		Roof	E	30	0.014	0.015	0.017	0.017	0.024	0.020	0.015	0.013	0.009
H.1	BS3		Roof	E	30	0.010	0.009	0.013	0.010	0.013	0.011	0.010	0.009	0.006
H.1	BS4		Roof	E	30	0.005	0.005	0.007	0.009	0.008	0.008	0.006	0.004	0.004
H.1	BS5		Roof	E	30	0.005	0.006	0.004	0.005	0.006	0.008	0.003	0.002	0.003
H.1	BS1		Roof	E	26	0.021	0.020	0.016	0.018	0.020	0.021	0.019	0.025	0.018
H.1	BS2		Roof	E	26	0.012	0.013	0.013	0.013	0.015	0.018	0.015	0.015	0.006
H.1	BS3		Roof	E	26	0.009	0.009	0.011	0.008	0.009	0.010	0.010	0.010	0.010
H.1	BS4		Roof	E	26	0.001	0.001	0.001	0.002	0.002	0.001	0.003	0.002	0.002
H.1	BS5		Roof	E	26	0.005	0.006	0.004	0.005	0.005	0.008	0.005	0.006	0.006
H.1	BS1		Roof	E	27	0.016	0.013	0.012	0.019	0.023	0.031	0.029	0.031	0.023
H.1	BS2		Roof	E	27	0.007	0.007	0.010	0.014	0.020	0.022	0.022	0.024	0.020
H.1	BS3		Roof	E	27	0.001	0.001	0.002	0.004	0.004	0.006	0.006	0.008	0.005
H.1	BS4		Roof	E	27	0.003	0.003	0.005	0.008	0.011	0.014	0.012	0.010	0.011
H.1	BS5		Roof	E	27	0.002	0.005	0.003	0.005	0.008	0.012	0.009	0.010	0.012
H.1	BS1		Roof	E	28	0.020	0.020	0.016	0.019	0.020	0.022	0.020	0.026	0.019
H.1	BS2		Roof	E	28	0.013	0.013	0.015	0.014	0.016	0.018	0.016	0.016	0.015
H.1	BS3		Roof	E	28	0.003	0.003	0.002	0.004	0.003	0.002	0.005	0.004	0.003
H.1	BS4		Roof	E	28	0.001	0.002	0.001	0.002	0.002	0.001	0.002	0.002	0.002
H.1	BS5		Roof	E	28	0.005	0.006	0.004	0.005	0.005	0.007	0.004	0.005	0.006
H.1	BS1		Roof	E	29	0.027	0.027	0.023	0.028	0.027	0.032	0.025	0.033	0.022
H.1	BS2		Roof	E	29	0.016	0.019	0.019	0.021	0.024	0.026	0.020	0.020	0.020
H.1	BS3		Roof	E	29	0.006	0.005	0.003	0.007	0.003	0.003	0.005	0.006	0.003
H.1	BS4		Roof	E	29	0.003	0.003	0.002	0.005	0.003	0.002	0.004	0.004	0.003
H.1	BS5		Roof	E	29	0.009	0.012	0.009	0.009	0.010	0.013	0.008	0.009	0.010
H.2	PB		Roof	E	30	0.012	0.014	0.020	0.016	0.017	0.013	0.009	0.008	0.006
H.2	PB		Roof	E	26	0.015	0.012	0.016	0.013	0.015	0.012	0.006	0.007	0.011
H.2	PB		Roof	E	27	0.001	0.001	0.001	0.003	0.005	0.010	0.010	0.006	0.008
H.2	PB		Roof	E	28	0.015	0.017	0.019	0.015	0.016	0.013	0.006	0.007	0.008
H.2	PB		Roof	E	29	0.032	0.039	0.040	0.032	0.030	0.020	0.010	0.007	0.012
H.3	PF		Roof	E	30	0.011	0.009	0.007	0.014	0.014	0.017	0.010	0.007	0.004
H.3	PF		Roof	E	26	0.007	0.006	0.005	0.010	0.013	0.012	0.009	0.009	0.007
H.3	PF		Roof	E	27	0.001	0.002	0.001	0.004	0.007	0.008	0.013	0.010	0.009
H.3	PF		Roof	E	28	0.011	0.010	0.007	0.012	0.018	0.013	0.010	0.011	0.008
H.3	PF		Roof	E	29	0.018	0.016	0.013	0.023	0.027	0.018	0.016	0.012	0.008