

Frequency Mixer

SIM-43MH+

Typical Performance Data

RF (IN) (MHz)	LO (MHz)	CONVERSION LOSS IF FIXED @IF(OUT)=30MHz (dB)			RF (IN) (MHz)	LO (MHz)	IP3 INPUT (dBm)			RF (IN) (MHz)	LO (MHz)	COMPRESSION @RF IN=+9dBm (dB)		
		@LO (dBm)					@LO (dBm)					@LO (dBm)		
		+10	+13	+16			+10	+13	+16			+10	+13	+16
670.0	700.0	22.82	13.08	8.11	670.0	700.0	-3.89	2.87	8.31	670.0	700.0	-7.65	-0.78	1.48
770.0	800.0	11.24	7.70	6.50	770.0	800.0	4.40	8.27	15.41	770.0	800.0	2.23	2.73	2.41
870.0	900.0	8.84	7.20	6.41	870.0	900.0	7.67	11.17	14.24	870.0	900.0	2.02	2.51	2.57
970.0	1000.0	7.95	7.14	6.60	970.0	1000.0	10.93	11.74	12.57	970.0	1000.0	1.99	2.01	1.98
1070.0	1100.0	7.01	6.51	6.16	1070.0	1100.0	13.58	16.04	18.10	1070.0	1100.0	2.05	1.88	1.70
1170.0	1200.0	6.57	6.35	6.24	1170.0	1200.0	15.10	16.28	17.12	1170.0	1200.0	1.58	1.33	1.20
1270.0	1300.0	6.53	6.34	6.24	1270.0	1300.0	21.30	16.58	19.04	1270.0	1300.0	1.08	0.80	0.76
1370.0	1400.0	6.45	6.18	6.10	1370.0	1400.0	21.95	25.98	18.62	1370.0	1400.0	0.88	0.63	0.49
1470.0	1500.0	6.38	5.96	5.89	1470.0	1500.0	28.51	18.73	18.03	1470.0	1500.0	0.80	0.67	0.55
1570.0	1600.0	6.41	6.08	5.93	1570.0	1600.0	19.13	19.72	24.16	1570.0	1600.0	0.83	0.62	0.51
1670.0	1700.0	6.45	6.11	5.99	1670.0	1700.0	23.59	19.77	19.10	1670.0	1700.0	0.93	0.62	0.49
1770.0	1800.0	6.65	6.24	6.14	1770.0	1800.0	17.81	19.02	24.63	1770.0	1800.0	0.89	0.66	0.36
1870.0	1900.0	6.44	6.22	6.15	1870.0	1900.0	18.92	26.32	28.84	1870.0	1900.0	1.01	0.59	0.41
1970.0	2000.0	6.66	6.40	6.29	1970.0	2000.0	24.24	23.59	22.30	1970.0	2000.0	0.93	0.60	0.47
2070.0	2100.0	6.65	6.33	6.19	2070.0	2100.0	22.37	21.80	22.61	2070.0	2100.0	0.99	0.72	0.58
2170.0	2200.0	6.84	6.42	6.24	2170.0	2200.0	23.65	20.55	20.48	2170.0	2200.0	1.06	0.87	0.75
2270.0	2300.0	6.80	6.21	5.97	2270.0	2300.0	16.92	17.46	19.29	2270.0	2300.0	1.03	0.86	0.77
2370.0	2400.0	6.28	5.78	5.58	2370.0	2400.0	17.29	17.09	17.87	2370.0	2400.0	1.30	0.97	0.80
2470.0	2500.0	6.78	6.07	5.82	2470.0	2500.0	15.32	24.93	27.25	2470.0	2500.0	1.21	1.02	0.83
2570.0	2600.0	7.21	6.45	6.07	2570.0	2600.0	18.07	14.84	16.44	2570.0	2600.0	1.15	1.11	1.09
2650.0	2680.0	6.59	5.83	5.43	2650.0	2680.0	13.89	15.34	15.23	2650.0	2680.0	1.32	1.38	1.40
2750.0	2780.0	6.40	5.84	5.49	2750.0	2780.0	11.41	11.96	12.59	2750.0	2780.0	1.43	1.32	1.32
2830.0	2860.0	6.03	5.61	5.30	2830.0	2860.0	10.57	11.72	17.21	2830.0	2860.0	1.55	1.33	1.20
2930.0	2960.0	5.87	5.28	5.21	2930.0	2960.0	13.26	19.72	20.77	2930.0	2960.0	1.43	1.01	0.81
3010.0	3040.0	5.47	5.26	5.26	3010.0	3040.0	17.43	20.52	22.17	3010.0	3040.0	1.46	0.70	0.61
3110.0	3140.0	5.47	5.35	5.42	3110.0	3140.0	17.67	19.35	22.20	3110.0	3140.0	1.37	0.52	0.37
3190.0	3220.0	5.53	5.37	5.40	3190.0	3220.0	17.97	20.67	22.28	3190.0	3220.0	1.28	0.47	0.30
3290.0	3320.0	5.64	5.48	5.52	3290.0	3320.0	20.20	23.12	21.85	3290.0	3320.0	1.47	0.81	0.51
3370.0	3400.0	5.96	5.73	5.71	3370.0	3400.0	20.57	21.67	23.31	3370.0	3400.0	1.40	0.84	0.61
3470.0	3500.0	6.45	6.05	5.94	3470.0	3500.0	18.94	23.22	20.67	3470.0	3500.0	1.30	0.88	0.67
3550.0	3580.0	6.80	6.30	6.12	3550.0	3580.0	19.12	23.07	20.89	3550.0	3580.0	1.09	0.79	0.63
3650.0	3680.0	6.95	6.40	6.25	3650.0	3680.0	28.39	24.73	22.48	3650.0	3680.0	0.74	0.54	0.47
3730.0	3760.0	7.22	6.49	6.30	3730.0	3760.0	28.59	22.85	23.42	3730.0	3760.0	0.73	0.57	0.47
3830.0	3860.0	7.42	6.63	6.44	3830.0	3860.0	20.49	22.93	23.05	3830.0	3860.0	1.00	0.70	0.58
3910.0	3940.0	8.33	7.35	7.02	3910.0	3940.0	19.18	20.78	23.14	3910.0	3940.0	0.61	0.59	0.62
4010.0	4040.0	8.68	7.51	7.19	4010.0	4040.0	22.30	19.95	24.70	4010.0	4040.0	0.40	0.38	0.43
4090.0	4120.0	9.09	7.56	7.19	4090.0	4120.0	21.42	18.63	22.89	4090.0	4120.0	0.37	0.32	0.32
4190.0	4220.0	10.05	7.86	7.33	4190.0	4220.0	18.97	22.21	21.49	4190.0	4220.0	0.03	0.30	0.29
4270.0	4300.0	12.60	7.78	7.14	4270.0	4300.0	9.47	24.23	24.14	4270.0	4300.0	-1.85	0.52	0.42
4370.0	4400.0	17.51	9.20	7.89	4370.0	4400.0	5.11	24.58	25.45	4370.0	4400.0	-5.02	0.20	0.34

Typical Performance Data

IF (OUT) (MHz)	LO (MHz)	CONVERSION LOSS VS. IF FREQUENCY @RF(IN)=2512MHz (dB)	IF (OUT) (MHz)	LO (MHz)	CONVERSION LOSS VS. IF FREQUENCY @RF(IN)=813.9MHz (dB)	IF (OUT) (MHz)	LO (MHz)	CONVERSION LOSS VS. IF FREQUENCY @RF(IN)=4210.1MHz (dB)
		@LO (dBm)			@LO (dBm)			@LO (dBm)
		+13			+13			+13
1412.0	1100.0	10.78	10.1	824.0	8.01	1350.1	2860.0	10.78
1337.2	1174.8	9.30	50.1	864.0	7.03	1310.1	2900.0	10.15
1262.5	1249.5	7.30	90.1	904.0	6.89	1270.1	2940.0	9.66
1187.7	1324.3	6.82	130.1	944.0	6.83	1230.1	2980.0	9.66
1112.9	1399.1	7.55	170.1	984.0	6.72	1190.1	3020.0	9.92
1038.1	1473.9	7.78	210.1	1024.0	6.75	1150.1	3060.0	9.62
963.4	1548.6	8.35	250.1	1064.0	6.41	1110.1	3100.0	9.34
888.6	1623.4	9.65	290.1	1104.0	6.10	1070.1	3140.0	9.24
813.8	1698.2	9.51	330.1	1144.0	6.21	1030.1	3180.0	9.08
739.0	1773.0	8.06	370.1	1184.0	6.30	990.1	3220.0	9.04
664.3	1847.7	7.03	410.1	1224.0	6.14	950.1	3260.0	9.07
589.5	1922.5	6.61	450.1	1264.0	6.02	910.1	3300.0	9.14
514.7	1997.3	6.50	490.1	1304.0	6.07	870.1	3340.0	9.31
439.9	2072.1	6.01	530.1	1344.0	6.21	830.1	3380.0	9.31
365.2	2146.8	5.65	570.1	1384.0	6.44	790.1	3420.0	9.27
290.4	2221.6	5.33	610.1	1424.0	6.41	750.1	3460.0	9.32
215.6	2296.4	5.26	650.1	1464.0	6.49	710.1	3500.0	9.48
140.9	2371.1	5.37	690.1	1504.0	6.76	670.1	3540.0	9.83
66.1	2445.9	6.05	730.1	1544.0	6.91	630.1	3580.0	9.92
10.0	2522.0	6.91	770.1	1584.0	7.12	610.1	3600.0	10.04
95.2	2607.2	6.66	810.1	1624.0	7.26	570.1	3640.0	9.79
180.5	2692.5	6.77	850.1	1664.0	7.26	550.1	3660.0	9.75
265.7	2777.7	7.11	890.1	1704.0	7.46	510.1	3700.0	9.62
350.9	2862.9	6.91	930.1	1744.0	7.67	490.1	3720.0	9.53
436.1	2948.1	6.13	970.1	1784.0	7.63	450.1	3760.0	9.48
521.4	3033.4	6.27	1010.1	1824.0	7.42	430.1	3780.0	9.19
606.6	3118.6	6.36	1050.1	1864.0	7.59	390.1	3820.0	8.98
691.8	3203.8	6.42	1090.1	1904.0	7.71	370.1	3840.0	8.89
777.0	3289.0	6.51	1130.1	1944.0	7.47	330.1	3880.0	8.60
862.3	3374.3	6.57	1190.1	2004.0	7.69	310.1	3900.0	8.56
947.5	3459.5	6.36	1230.1	2044.0	7.75	270.1	3940.0	8.27
1011.4	3523.4	6.41	1290.1	2104.0	8.03	250.1	3960.0	8.20
1096.6	3608.6	6.41	1330.1	2144.0	8.33	210.1	4000.0	8.07
1160.6	3672.6	6.45	1390.1	2204.0	8.17	190.1	4020.0	7.90
1245.8	3757.8	6.60	1430.1	2244.0	8.22	150.1	4060.0	7.85
1309.7	3821.7	6.96	1490.1	2304.0	8.49	130.1	4080.0	7.88
1394.9	3906.9	7.71	1530.1	2344.0	8.68	90.1	4120.0	7.86
1458.9	3970.9	8.42	1590.1	2404.0	9.17	70.1	4140.0	7.89
1544.1	4056.1	9.73	1630.1	2444.0	9.52	30.1	4180.0	8.00
1608.0	4120.0	10.87	1690.1	2504.0	10.30	10.1	4200.0	8.63

Frequency Mixer

SIM-43MH+

Typical Performance Data

LO (MHz)	LO-RF ISOLATION (dB)			LO-IF ISOLATION (dB)		
	@LO (dBm)			@LO (dBm)		
	+10	+13	+16	+10	+13	+16
700.0	50.47	52.36	48.02	25.07	25.08	25.20
800.0	47.94	40.16	39.15	22.44	23.17	25.76
900.0	35.99	36.03	36.76	21.70	24.48	27.38
1000.0	39.29	39.83	40.69	23.62	26.71	29.38
1100.0	46.39	46.96	46.49	26.01	29.13	31.45
1200.0	46.34	44.34	42.56	28.71	31.62	31.89
1300.0	44.14	39.58	37.49	31.83	33.73	31.98
1400.0	40.83	37.17	34.55	34.99	36.57	34.71
1500.0	38.07	34.94	32.69	34.55	40.27	44.07
1600.0	37.11	34.53	32.91	28.18	30.01	31.76
1700.0	37.14	34.82	33.54	25.76	26.93	27.16
1800.0	37.07	36.41	34.70	20.21	21.35	21.51
1900.0	36.55	35.03	33.88	14.79	16.07	16.90
2000.0	35.52	34.60	33.67	10.97	12.47	13.55
2100.0	35.70	34.45	33.39	9.50	11.20	12.60
2200.0	35.55	34.13	33.19	9.78	11.59	13.33
2300.0	34.47	32.83	31.74	10.84	12.77	14.72
2400.0	33.53	31.61	29.86	12.13	14.18	16.22
2500.0	35.27	33.21	31.64	13.45	15.58	17.68
2600.0	33.27	30.41	29.08	14.97	17.06	18.87
2680.0	32.69	30.66	28.73	16.33	18.18	19.66
2780.0	31.95	29.88	27.96	18.00	18.90	19.07
2860.0	32.36	30.79	27.94	19.37	19.51	18.93
2960.0	31.53	29.54	26.79	21.17	20.88	19.84
3040.0	30.15	27.89	26.08	24.17	22.56	21.23
3140.0	29.03	26.99	25.09	27.49	24.52	22.58
3220.0	28.67	26.87	25.09	28.77	26.48	24.71
3320.0	28.31	27.06	25.52	25.94	25.28	24.47
3400.0	27.60	26.87	25.76	25.71	26.25	26.44
3500.0	26.03	25.79	24.98	24.22	24.85	25.15
3580.0	25.09	24.98	24.38	21.74	22.60	22.92
3680.0	24.63	24.44	24.20	18.82	19.58	20.50
3760.0	24.80	24.42	24.04	17.53	18.26	19.31
3860.0	25.46	25.12	24.82	18.56	19.12	20.42
3940.0	25.72	25.40	24.92	20.10	20.72	22.16
4040.0	25.76	25.54	25.07	16.42	17.51	19.20
4120.0	25.91	25.60	25.24	15.07	16.12	17.81
4220.0	26.53	26.12	25.41	14.75	15.90	17.60
4300.0	27.16	27.18	26.31	14.47	15.47	16.94
4400.0	28.08	28.10	26.83	14.35	15.54	16.54

RF (IN) (MHz)	LO (MHz)	RF-IF ISOLATION (dB)		
		@LO (dBm)		
		+10	+13	+16
670.0	700.0	24.65	24.50	19.99
770.0	800.0	21.18	15.15	13.67
870.0	900.0	13.67	12.48	11.99
970.0	1000.0	14.52	13.71	13.20
1070.0	1100.0	17.25	16.41	15.92
1170.0	1200.0	20.03	19.60	19.46
1270.0	1300.0	22.48	22.44	22.26
1370.0	1400.0	23.63	23.98	24.75
1470.0	1500.0	24.02	24.29	24.86
1570.0	1600.0	24.81	25.89	26.59
1670.0	1700.0	24.47	24.97	25.36
1770.0	1800.0	25.86	26.45	26.47
1870.0	1900.0	28.52	28.36	28.21
1970.0	2000.0	33.93	33.75	33.54
2070.0	2100.0	40.39	39.22	38.62
2170.0	2200.0	36.68	36.35	36.55
2270.0	2300.0	37.39	37.86	38.94
2370.0	2400.0	38.72	38.62	38.66
2470.0	2500.0	41.00	41.58	41.98
2570.0	2600.0	34.85	34.93	35.10
2650.0	2680.0	32.30	31.63	31.09
2750.0	2780.0	29.36	28.92	28.78
2830.0	2860.0	27.41	26.83	26.71
2930.0	2960.0	26.54	25.72	25.99
3010.0	3040.0	25.53	25.32	25.47
3110.0	3140.0	24.85	24.47	24.46
3190.0	3220.0	24.57	24.19	24.01
3290.0	3320.0	38.03	40.25	37.43
3370.0	3400.0	20.90	20.24	19.95
3470.0	3500.0	20.58	20.11	19.94
3550.0	3580.0	20.64	19.88	19.88
3650.0	3680.0	22.96	21.90	21.68
3730.0	3760.0	24.01	22.10	21.38
3830.0	3860.0	25.45	24.04	23.38
3910.0	3940.0	30.59	29.50	29.76
4010.0	4040.0	39.31	43.38	40.72
4090.0	4120.0	32.58	32.37	31.37
4190.0	4220.0	28.03	25.97	25.12
4270.0	4300.0	27.62	25.91	24.84
4370.0	4400.0	28.43	28.88	28.32

Frequency Mixer

SIM-43MH+

Typical Performance Data

RF (IN) (MHz)	LO (MHz)	RF VSWR (:1)		
		@LO (dBm)		
		+10	+13	+16
670.0	700.0	8.55	4.53	3.21
770.0	800.0	2.90	2.34	2.04
870.0	900.0	2.39	1.95	1.73
970.0	1000.0	2.86	2.57	2.37
1070.0	1100.0	3.24	3.03	2.88
1170.0	1200.0	3.43	3.29	3.24
1270.0	1300.0	3.59	3.36	3.29
1370.0	1400.0	3.68	3.35	3.13
1470.0	1500.0	3.64	3.19	2.89
1570.0	1600.0	3.48	3.06	2.79
1670.0	1700.0	3.37	2.94	2.65
1770.0	1800.0	3.37	2.76	2.52
1870.0	1900.0	3.07	2.77	2.61
1970.0	2000.0	3.38	3.10	2.91
2070.0	2100.0	3.41	3.09	2.89
2170.0	2200.0	3.40	3.07	2.86
2270.0	2300.0	3.30	2.85	2.60
2370.0	2400.0	2.72	2.27	2.01
2470.0	2500.0	2.69	2.33	2.11
2570.0	2600.0	3.05	2.52	2.22
2650.0	2680.0	2.86	2.48	2.11
2750.0	2780.0	2.46	2.20	1.97
2830.0	2860.0	2.20	1.87	1.64
2930.0	2960.0	1.86	1.66	1.63
3010.0	3040.0	1.80	1.73	1.73
3110.0	3140.0	1.81	1.75	1.76
3190.0	3220.0	1.82	1.73	1.72
3290.0	3320.0	1.85	1.69	1.63
3370.0	3400.0	1.97	1.77	1.69
3470.0	3500.0	2.33	2.06	1.91
3550.0	3580.0	2.65	2.35	2.14
3650.0	3680.0	3.09	2.75	2.55
3730.0	3760.0	3.22	2.81	2.61
3830.0	3860.0	3.23	2.82	2.63
3910.0	3940.0	3.97	3.45	3.22
4010.0	4040.0	4.45	3.80	3.53
4090.0	4120.0	4.96	4.06	3.67
4190.0	4220.0	5.41	4.23	3.70
4270.0	4300.0	6.73	4.40	3.73
4370.0	4400.0	8.86	5.46	4.52

LO (MHz)	LO VSWR (:1)		
	@LO (dBm)		
	+10	+13	+16
700.0	25.94	25.56	19.32
800.0	19.32	10.69	7.53
900.0	5.13	4.34	4.87
1000.0	2.22	2.71	3.53
1100.0	1.25	1.81	2.54
1200.0	1.26	1.34	1.90
1300.0	1.69	1.13	1.50
1400.0	1.89	1.10	1.38
1500.0	1.90	1.29	1.58
1600.0	1.83	1.55	1.92
1700.0	1.81	1.80	2.29
1800.0	1.62	1.83	2.36
1900.0	1.26	1.67	2.34
2000.0	1.12	1.65	2.32
2100.0	1.37	1.70	2.30
2200.0	1.73	1.83	2.32
2300.0	2.16	2.01	2.34
2400.0	2.55	2.18	2.36
2500.0	2.77	2.17	2.27
2600.0	3.03	2.22	2.11
2680.0	2.91	2.08	2.04
2780.0	2.69	1.72	1.63
2860.0	2.46	1.47	1.31
2960.0	2.63	1.54	1.31
3040.0	2.66	1.56	1.33
3140.0	2.55	1.53	1.34
3220.0	2.36	1.47	1.36
3320.0	2.20	1.44	1.44
3400.0	2.09	1.42	1.51
3500.0	2.08	1.55	1.66
3580.0	2.09	1.65	1.82
3680.0	2.23	1.81	1.97
3760.0	2.42	1.97	2.13
3860.0	2.84	2.23	2.28
3940.0	3.38	2.56	2.48
4040.0	4.32	3.03	2.71
4120.0	5.23	3.50	2.92
4220.0	6.46	4.02	3.15
4300.0	7.66	4.52	3.10
4400.0	8.72	5.93	3.53

IF (OUT) (MHz)	IF VSWR @LO=4200MHz (:1)		
	@LO (dBm)		
	+10	+13	+16
10.0	1.73	1.04	1.38
50.0	1.69	1.12	1.39
90.0	1.79	1.20	1.41
130.0	1.89	1.27	1.44
170.0	2.06	1.39	1.50
210.0	2.27	1.46	1.51
250.0	2.52	1.59	1.57
290.0	2.84	1.74	1.62
330.0	3.14	1.92	1.71
370.0	3.46	2.11	1.81
410.0	3.81	2.31	1.92
450.0	4.07	2.49	2.04
490.0	4.42	2.68	2.15
530.0	4.77	2.87	2.27
570.0	5.14	3.06	2.37
610.0	5.61	3.31	2.53
650.0	5.93	3.39	2.55
710.0	6.46	3.67	2.76
750.0	6.73	3.73	2.78
810.0	7.22	3.98	3.00
850.0	7.25	3.94	2.99
910.0	7.28	4.07	3.13
950.0	7.44	4.17	3.23
1010.0	7.41	4.24	3.31
1050.0	7.41	4.29	3.42
1110.0	7.08	4.25	3.45
1150.0	7.22	4.47	3.76
1210.0	6.81	4.33	3.76
1250.0	6.78	4.53	4.10
1310.0	6.15	4.33	4.15
1350.0	6.26	4.74	4.68
1410.0	5.61	4.74	4.98
1450.0	5.51	4.93	5.30
1510.0	5.06	5.33	6.01
1550.0	4.96	5.70	6.53
1610.0	4.83	6.44	7.50
1650.0	4.89	6.83	7.94
1710.0	5.31	7.53	8.64
1750.0	5.63	7.70	8.68
1810.0	5.83	7.31	8.08

Harmonics Tables

RF HARMONICS ORDER

	(-dBm)	(-dBc)										
0	-	-	+9	11	10	21	34	57	35	40	40	---
1	-	31	+0	38	19	31	35	71	45	68	49	60
2	73	52	52	55	49	62	51	64	72	71	67	73
3	>90	63	58	>78	59	>78	66	73	69	>78	76	>78
4	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
5	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
6	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
7	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
8	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
9	>90	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
10	---	---	>78	>78	>78	>78	>78	>78	>78	>78	>78	>78
	RF CAL	0	1	2	3	4	5	6	7	8	9	10

Test conditions: RF IN: 2512 MHz; -6.00 dBm.
 LO IN: 2542 MHz; +13.00 dBm
 IF OUT: 30 MHz; -12.31 dBm

RF HARMONICS ORDER

	(-dBm)	(-dBc)										
0	-	-	1	22	22	34	46	59	47	53	54	---
1	-	31	+0	40	19	35	37	70	51	69	56	65
2	53	43	44	46	40	56	45	52	65	69	63	67
3	86	40	34	59	35	58	45	46	49	78	59	76
4	>90	63	56	55	56	53	57	64	57	68	73	71
5	>90	66	56	60	54	72	52	73	63	68	64	85
6	>90	>88	87	74	77	66	71	60	73	71	72	80
7	>90	>88	>88	87	75	74	66	80	60	83	73	75
8	>90	>88	>88	>88	>88	82	83	76	83	70	78	86
9	>90	>88	>88	>88	>88	>88	87	82	80	>88	74	>88
10	---	---	>88	>88	>88	>88	>88	>88	>88	87	>88	76
	RF CAL	0	1	2	3	4	5	6	7	8	9	10

LO HARMONICS ORDER

Test conditions: RF IN: 2512 MHz; 4.00 dBm.
 LO IN: 2542 MHz; +13.00 dBm
 IF OUT: 30 MHz; -2.22 dBm

- Notes: 1. All Harmonics are in (dBc) relative to IF OUTPUT.
 2. + entry denotes harmonics are in (dBc) above IF OUTPUT.
 3. RF Cal represent the Harmonics level of the RF input signal to the mixer.