

FCC Part 22 Transmitter Certification Test Report

FCC ID: DNY0A1EKOMINI8

FCC Rule Part: CFR 47 Part 22 Subpart H

ACS Report Number: 05-0373-22H

Manufacturer: EMS Wireless
Equipment Type: Cellular Bi-Directional Booster
Model: EKOMINI-8


Test Begin Date: October 25, 2005

Test End Date: October 28, 2005

Report Issue Date: November 7, 2005



FOR THE SCOPE OF ACCREDITATION UNDER LAB Code 200612


Prepared by: _____
J. Kirby Munroe
Manager Wireless Certifications
ACS, Inc.


Reviewed by: _____
R. Sam Wismer
Engineering Manager
ACS, Inc.

This test report shall not be reproduced except in full. This report may be reproduced in part with prior written consent of ACS, Inc. The results contained in this report are representative of the sample(s) submitted for evaluation.

This report contains **28** pages

Table of Contents

1.0 Occupied Bandwidth

1.1 Uplink	3
1.2 Downlink	4

2.0 Spurious Emissions at Antenna Terminals and Inter-modulation Products

2.1 CDMA Uplink	5
2.2 TDMA Uplink	8
2.3 CW Uplink	11
2.4 GSM Uplink	12
2.5 CDMA Downlink	14
2.6 TDMA Downlink	17
2.7 CW Downlink	20
2.8 GSM Downlink	21

3.0 Band-edge

3.1 CDMA Uplink	23
3.2 TDMA Uplink	24
3.3 GSM Uplink	25
3.4 CDMA Downlink	26
3.5 TDMA Downlink	27
3.6 GSM Downlink	28

1.0 Occupied Bandwidth (Input vs. Output)

1.1 Uplink

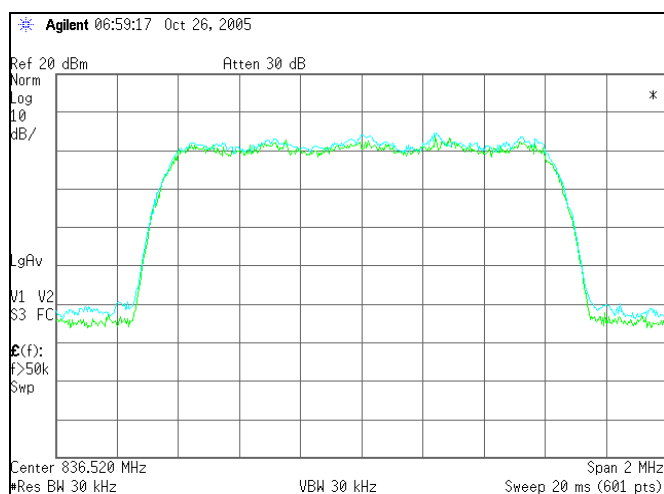


Figure 1: Occupied Bandwidth - Uplink CDMA Mid Channel

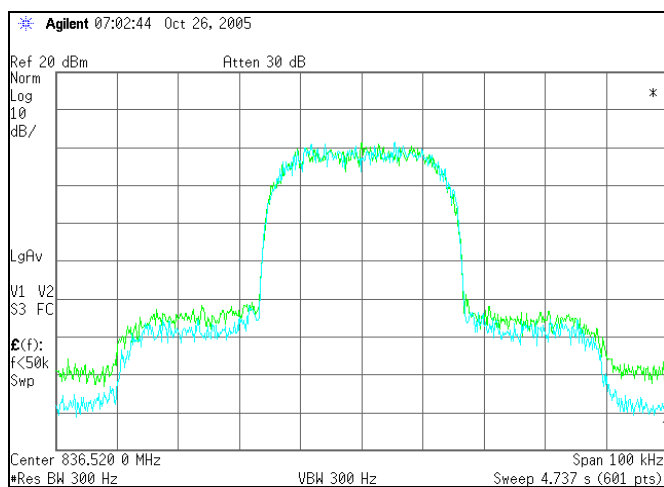


Figure 2: Occupied Bandwidth - Uplink TDMA Mid Channel

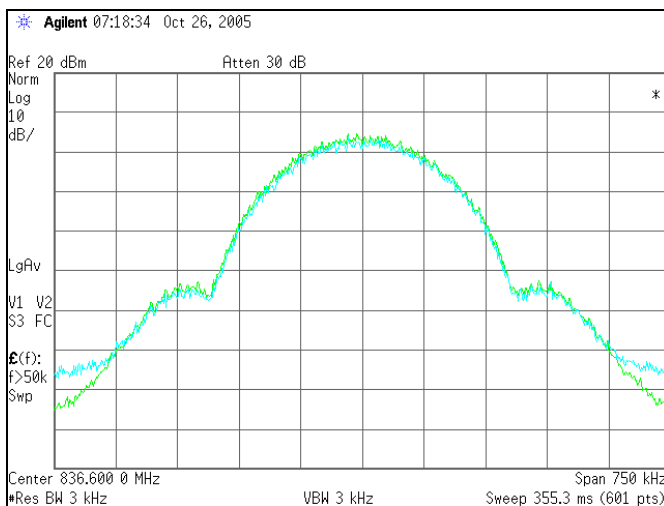


Figure 3: Occupied Bandwidth - Uplink GSM Mid Channel

1.2 Downlink

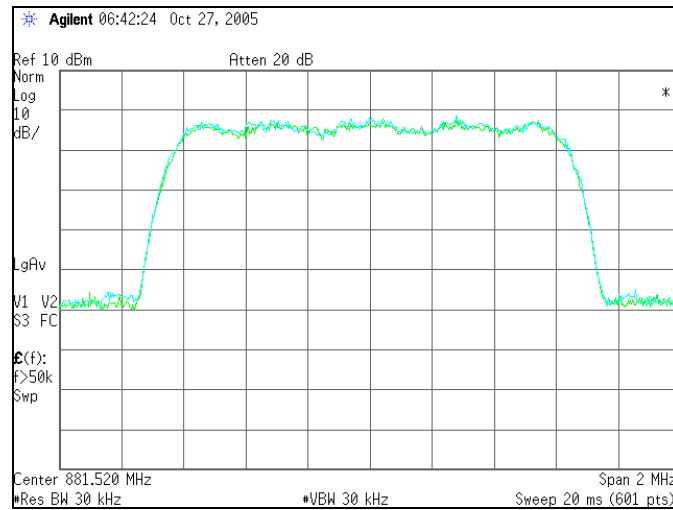


Figure 4: Occupied Bandwidth - Downlink CDMA Mid Channel

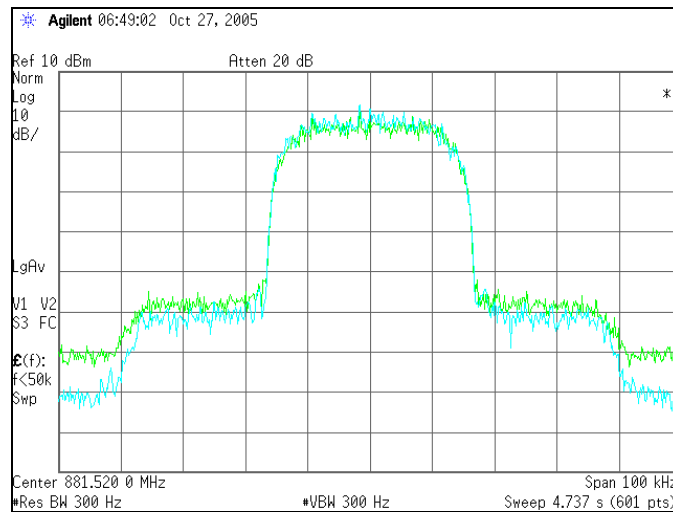


Figure 5: Occupied Bandwidth - Downlink TDMA Mid Channel

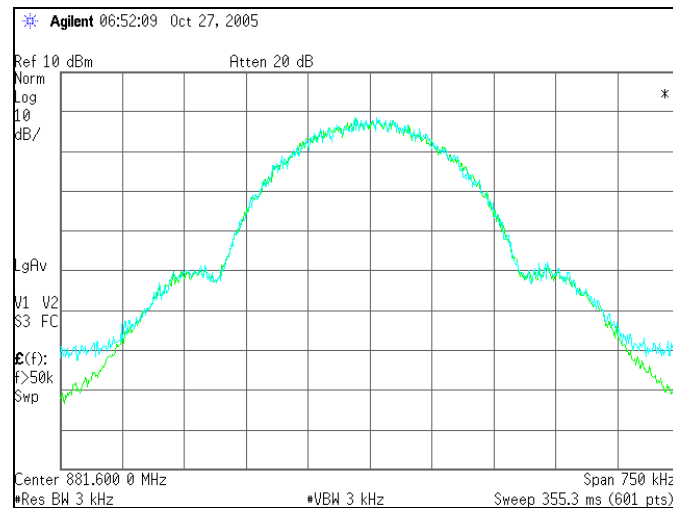


Figure 6: Occupied Bandwidth - Downlink GSM Mid Channel

2.0 Spurious Emissions at Antenna Terminals and Inter-modulation Products

2.1 CDMA Uplink

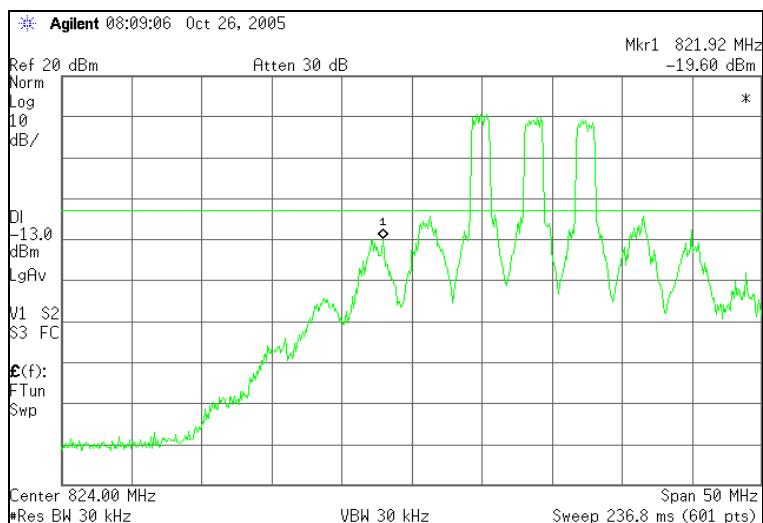


Figure 7: Spurious Emissions - Uplink CDMA Low Channel – In Band

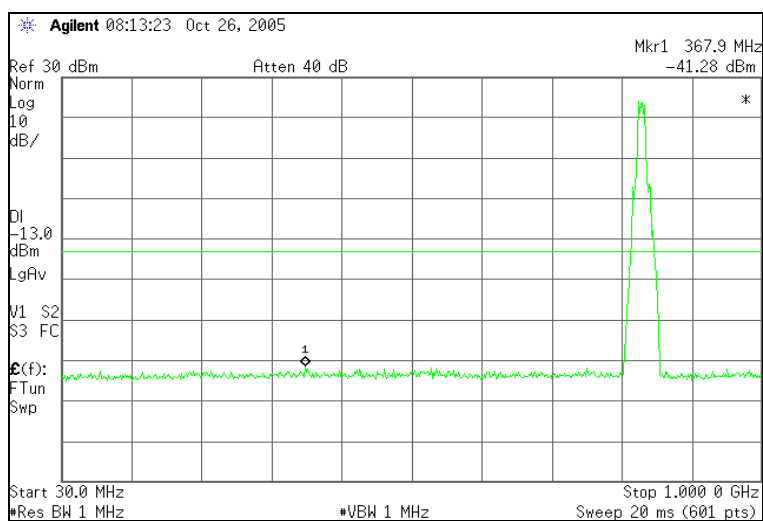


Figure 8: Spurious Emissions - Uplink CDMA Low Channel – 30 MHz to 2.9 GHz

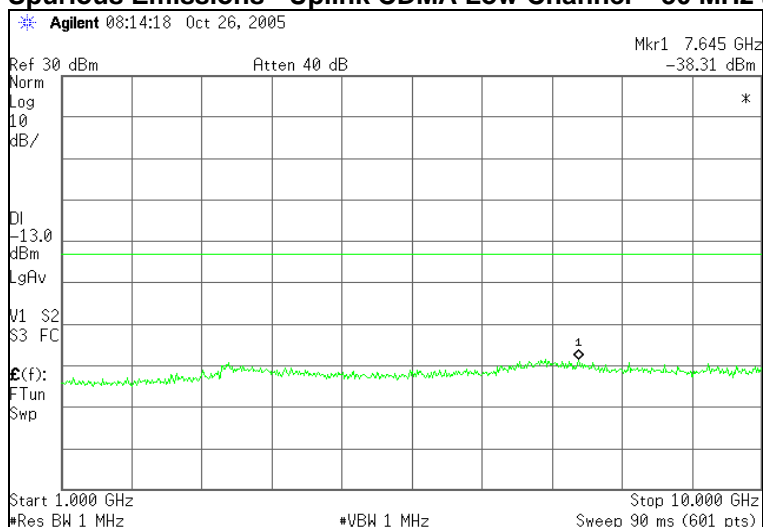


Figure 9: Spurious Emissions - Uplink CDMA Low Channel – 2.9 to 10 GHz

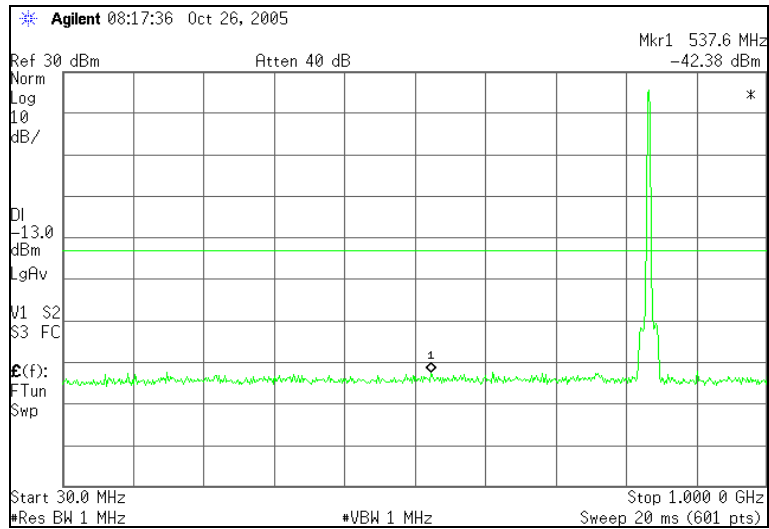


Figure 10: Spurious Emissions - Uplink CDMA Mid Channel – 30 MHz to 2.9 GHz

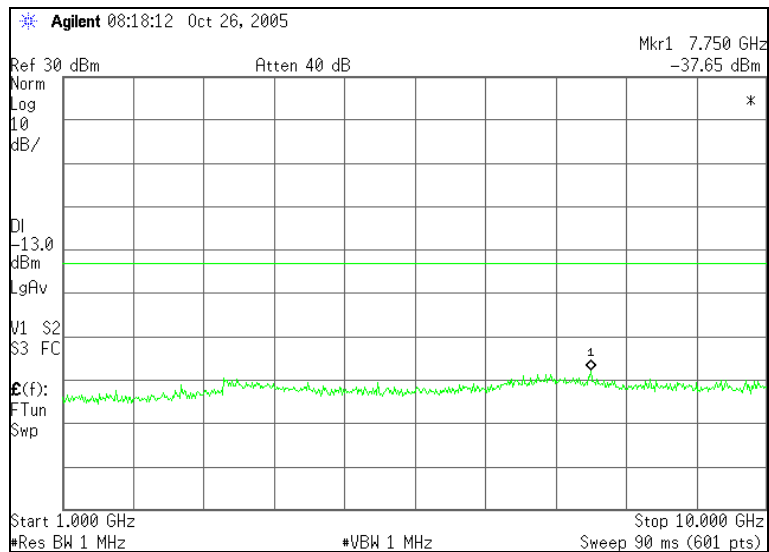


Figure 11: Spurious Emissions - Uplink CDMA Mid Channel – 2.9 to 10 GHz

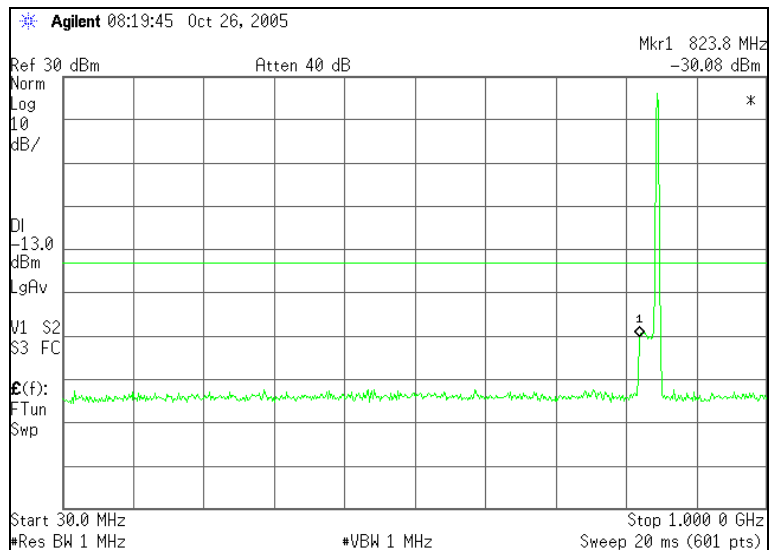


Figure 12: Spurious Emissions - Uplink CDMA High Channel – 30 MHz to 2.9 GHz

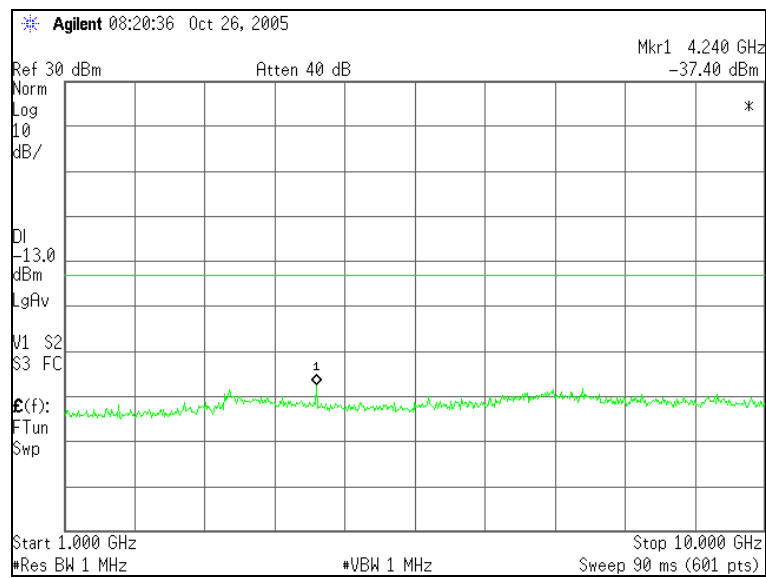


Figure 13: Spurious Emissions - Uplink CDMA High Channel – 2.9 to 10 GHz

2.2 TDMA Uplink

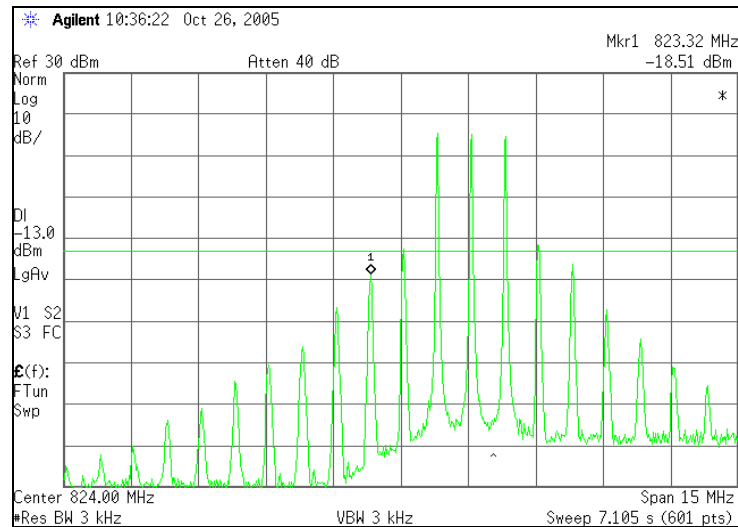


Figure 14: Spurious Emissions - Uplink TDMA Low Channel – In Band

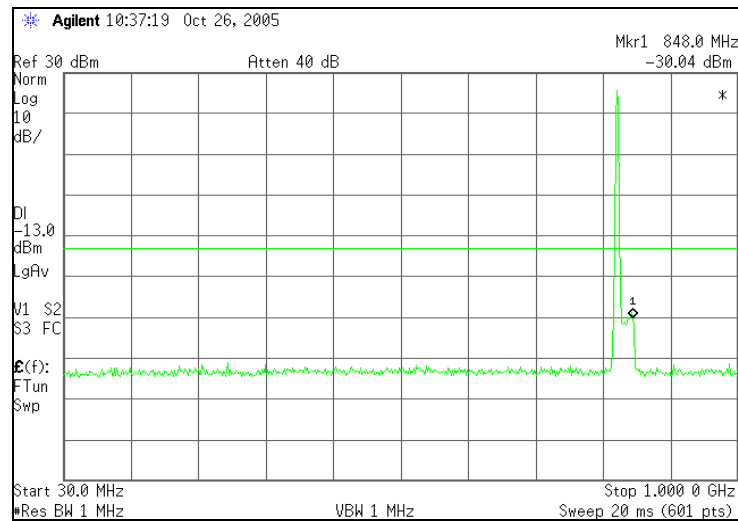


Figure 15: Spurious Emissions - Uplink TDMA Low Channel – 30 MHz to 2.9 GHz

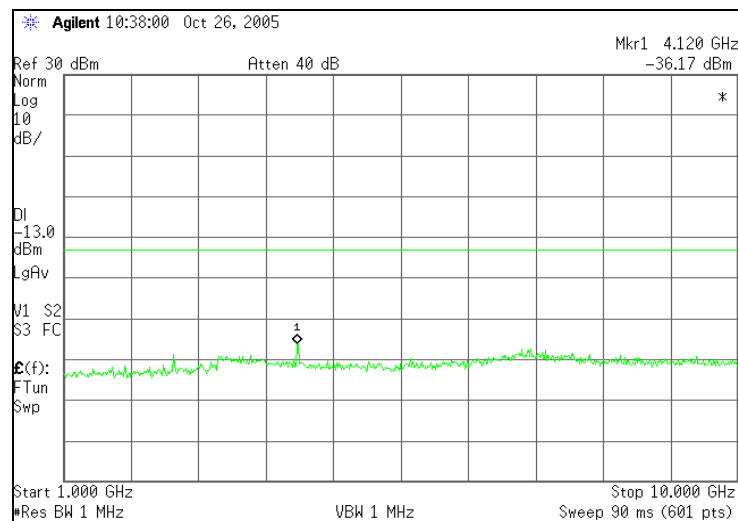


Figure 16: Spurious Emissions - Uplink TDMA Low Channel – 2.9 to 10 GHz

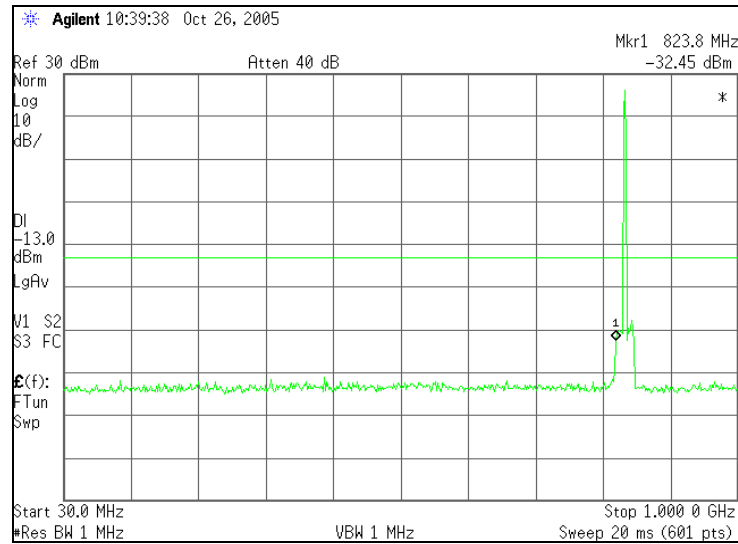


Figure 17: Spurious Emissions - Uplink TDMA Mid Channel – 30 MHz to 2.9 GHz

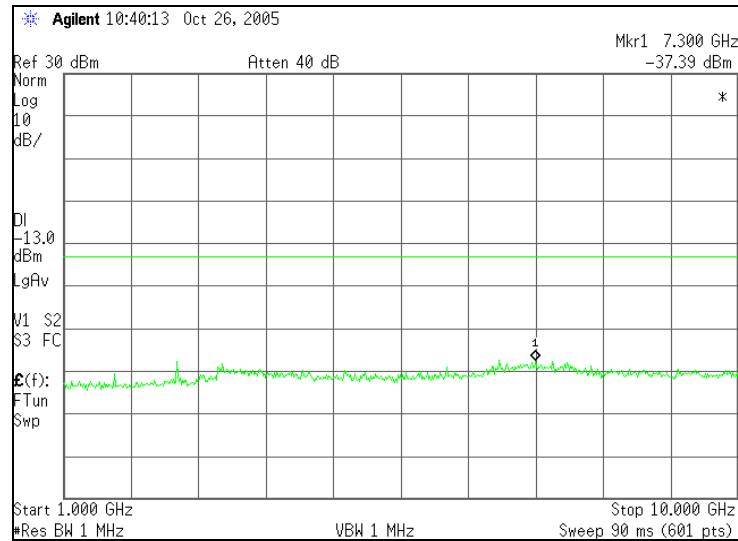


Figure 18: Spurious Emissions - Uplink TDMA Mid Channel – 2.9 to 10 GHz

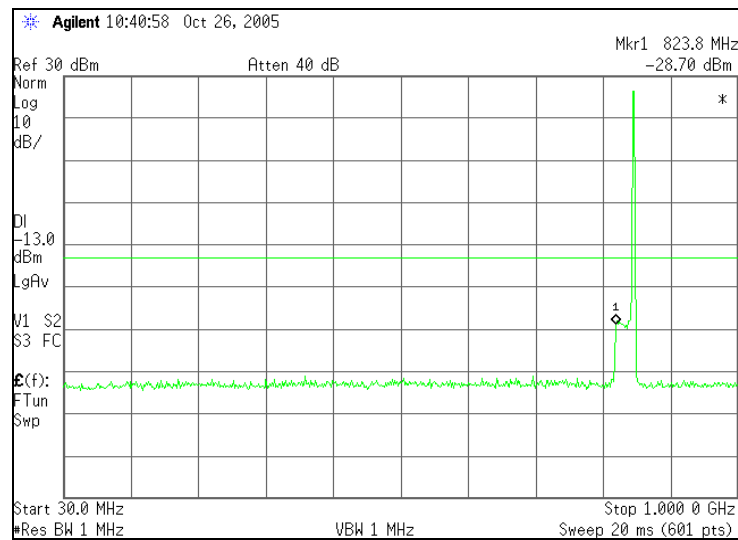


Figure 19: Spurious Emissions - Uplink TDMA High Channel – 30 MHz to 2.9 GHz

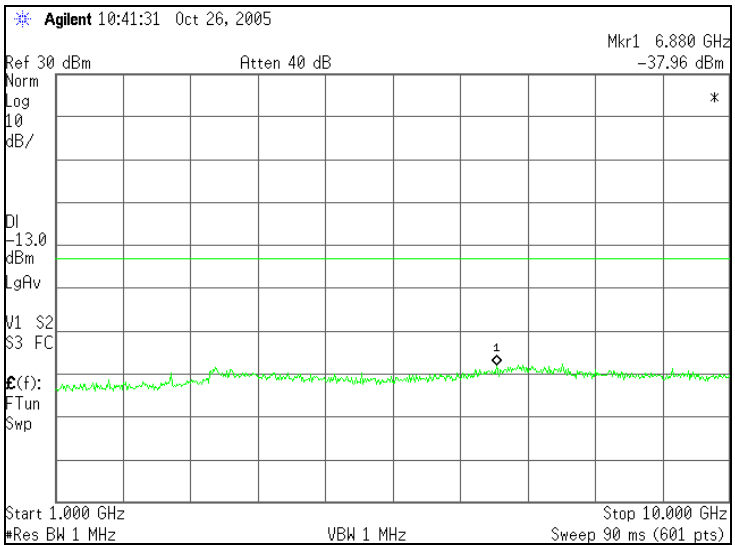


Figure 20: Spurious Emissions - Uplink TDMA High Channel – 2.9 to 10 GHz

2.3 CW Uplink – Covers FM (GSM and F1D)

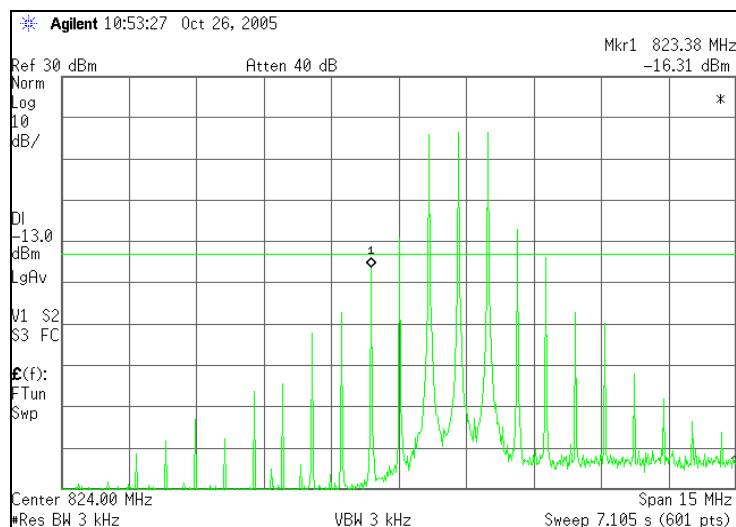


Figure 21: Spurrious Emissions - Uplink CW Low Channel – In Band

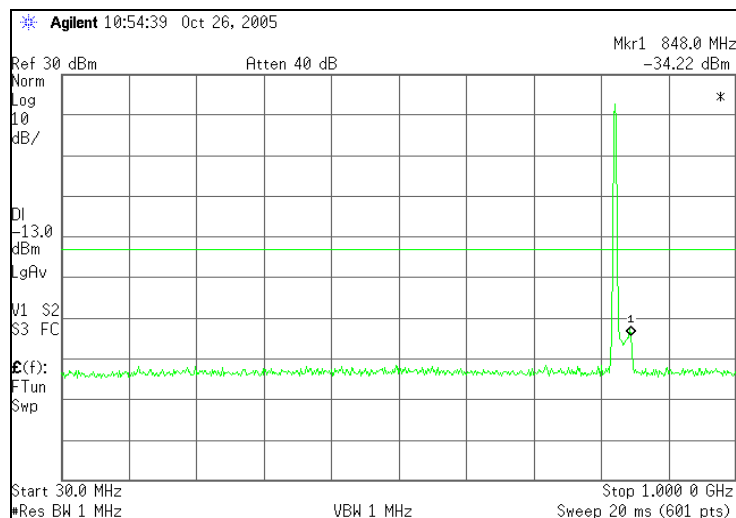


Figure 22: Spurrious Emissions - Uplink CW Low Channel – 30 MHz to 2.9 GHz

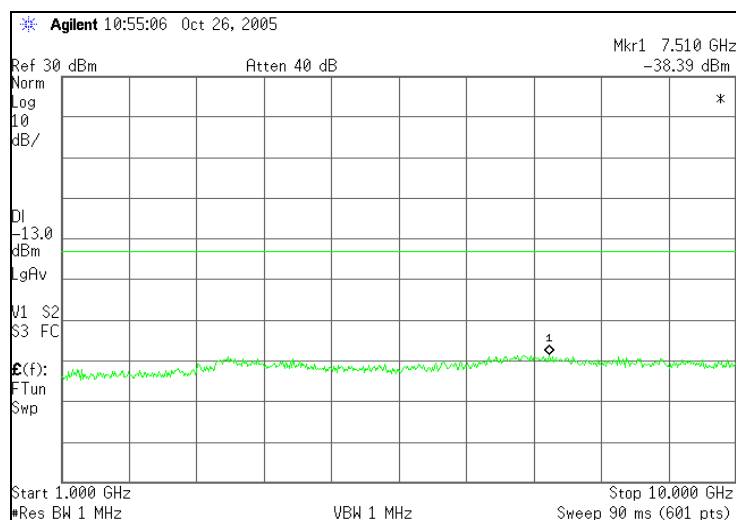


Figure 23: Spurrious Emissions - Uplink CW Low Channel – 2.9 to 10 GHz

2.4 GSM Uplink

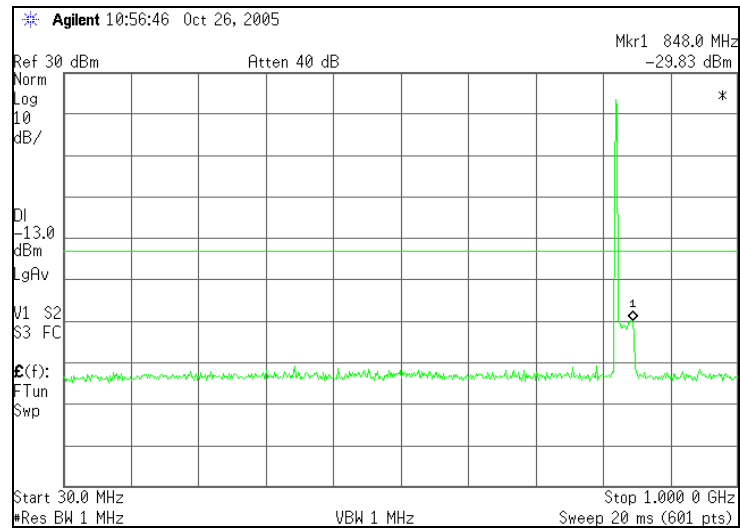


Figure 24: Spurious Emissions - Uplink GSM Low Channel – 30 MHz to 2.9 GHz

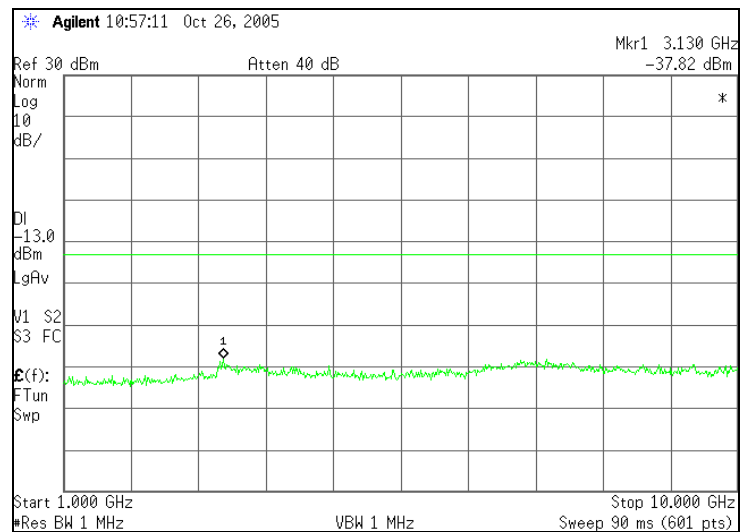


Figure 25: Spurious Emissions - Uplink GSM Low Channel – 2.9 to 10 GHz

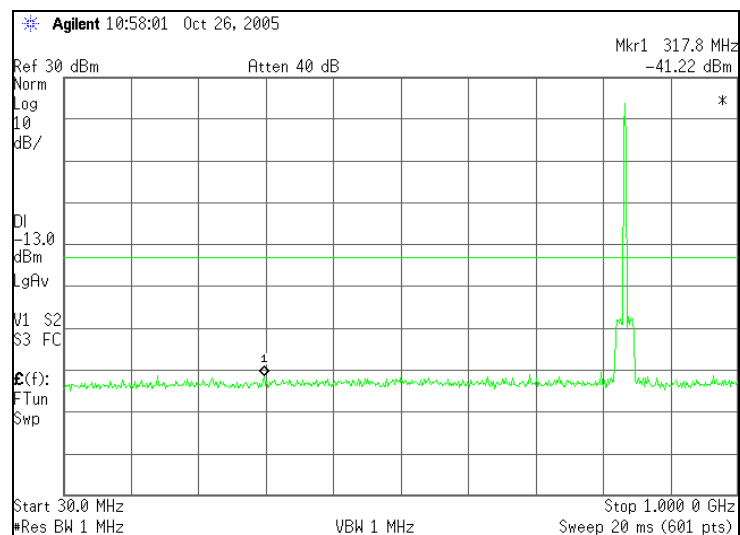


Figure 26: Spurious Emissions - Uplink GSM Mid Channel – 30 MHz to 2.9 GHz

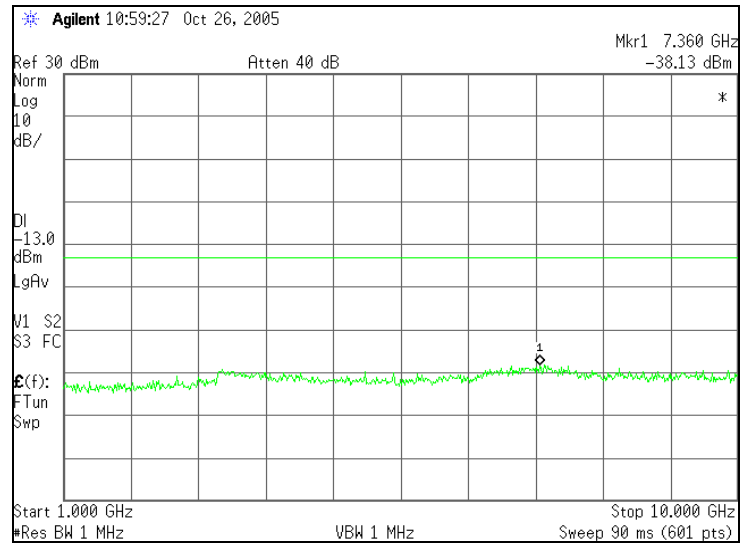


Figure 27: Spurious Emissions - Uplink GSM Mid Channel – 2.9 to 10 GHz

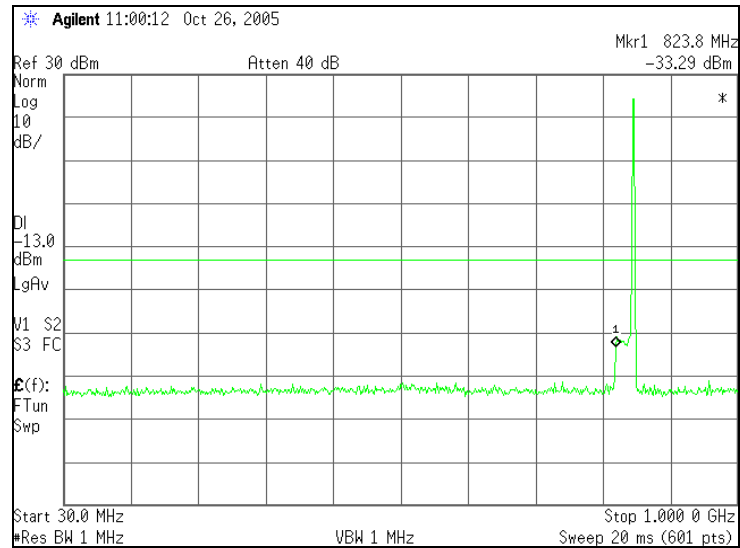


Figure 28: Spurious Emissions - Uplink GSM High Channel – 30 MHz to 2.9 GHz

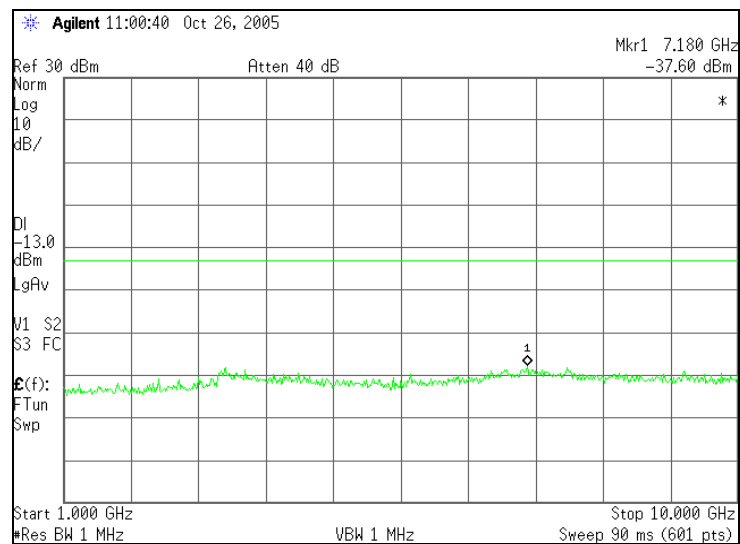


Figure 29: Spurious Emissions - Uplink GSM High Channel – 2.9 to 10 GHz

2.5 CDMA Downlink

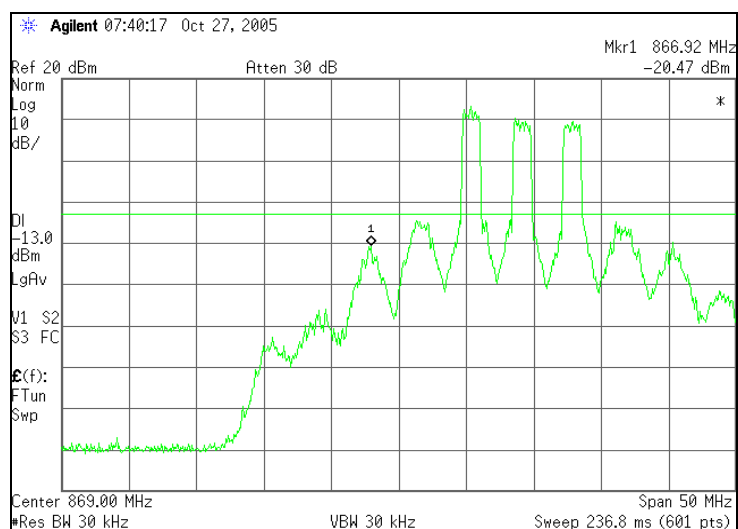


Figure 30: Spurios Emissions - Downlink CDMA Low Channel – In Band

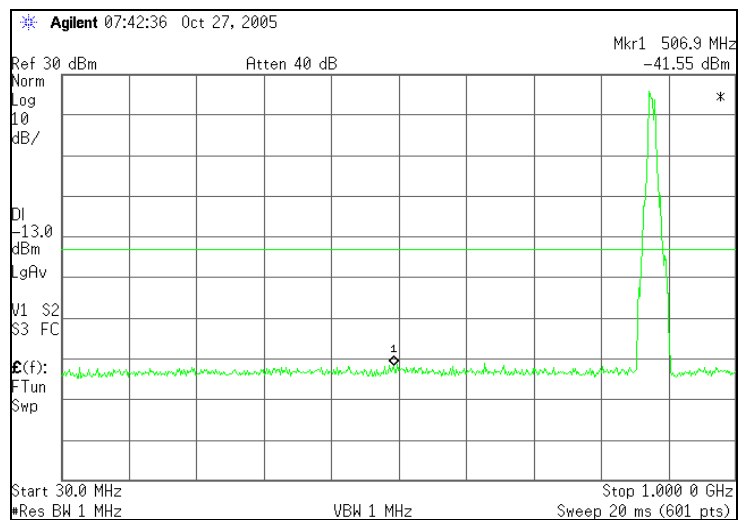


Figure 31: Spurios Emissions - Downlink CDMA Low Channel – 30 MHz to 2.9 GHz

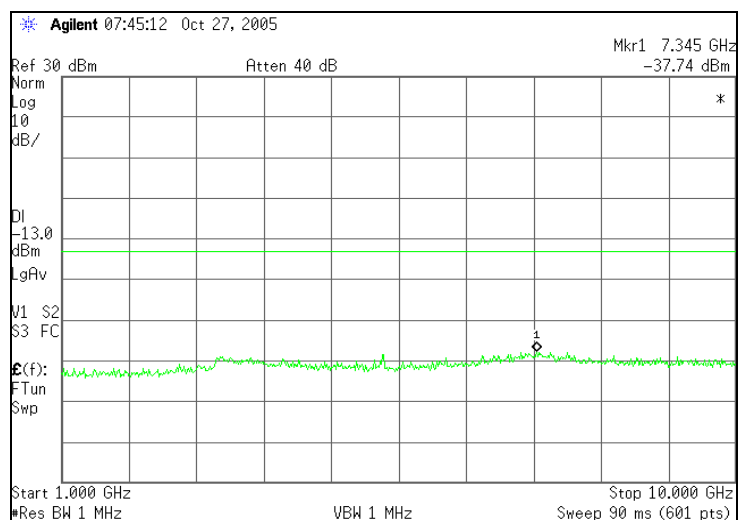


Figure 32: Spurios Emissions - Downlink CDMA Low Channel – 2.9 to 10 GHz

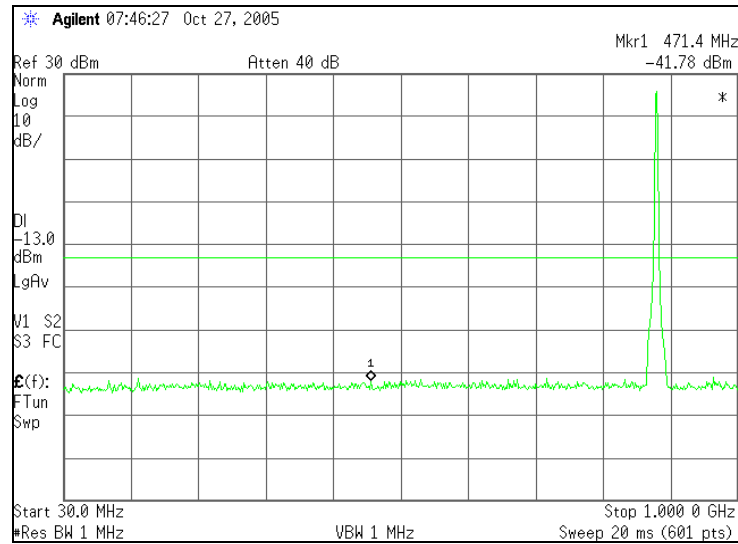


Figure 33: Spurious Emissions - Downlink CDMA Mid Channel – 30 MHz to 2.9 GHz

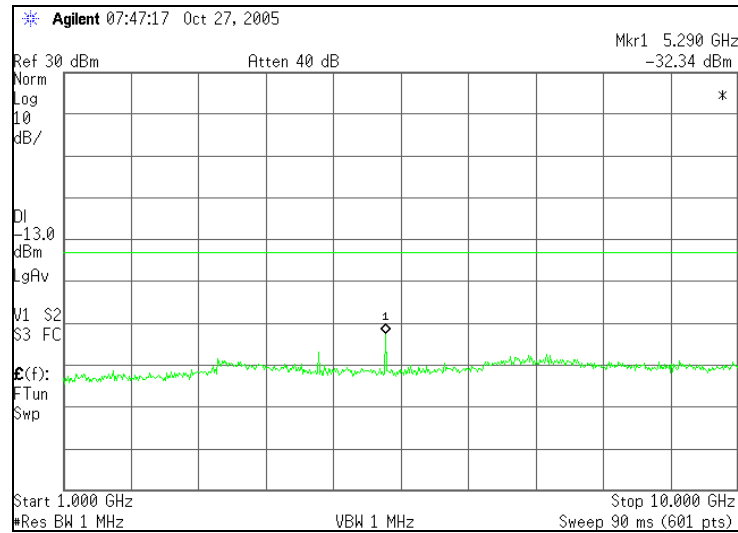


Figure 34: Spurious Emissions - Downlink CDMA Mid Channel – 2.9 to 10 GHz

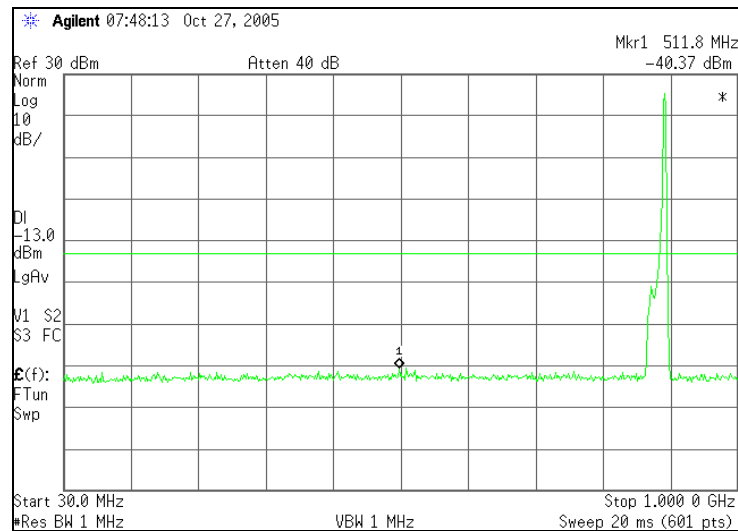


Figure 35: Spurious Emissions - Downlink CDMA High Channel – 30 MHz to 2.9 GHz

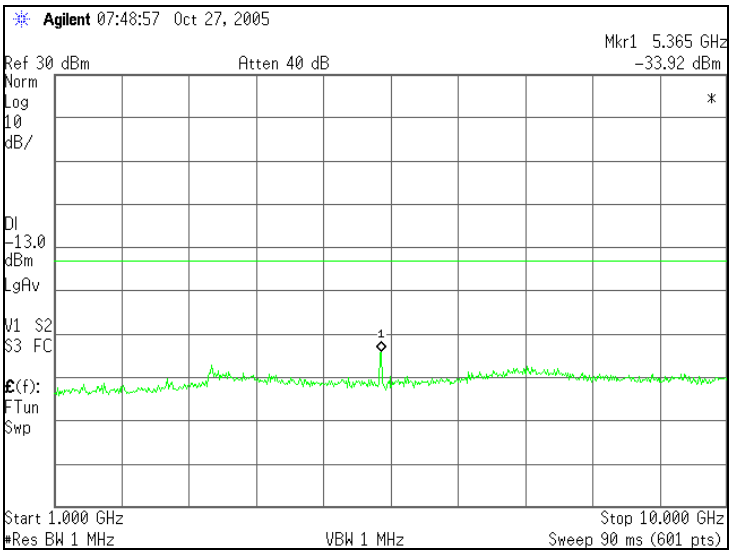


Figure 36: Spurious Emissions - Downlink CDMA High Channel – 2.9 to 10 GHz

2.6 TDMA Downlink

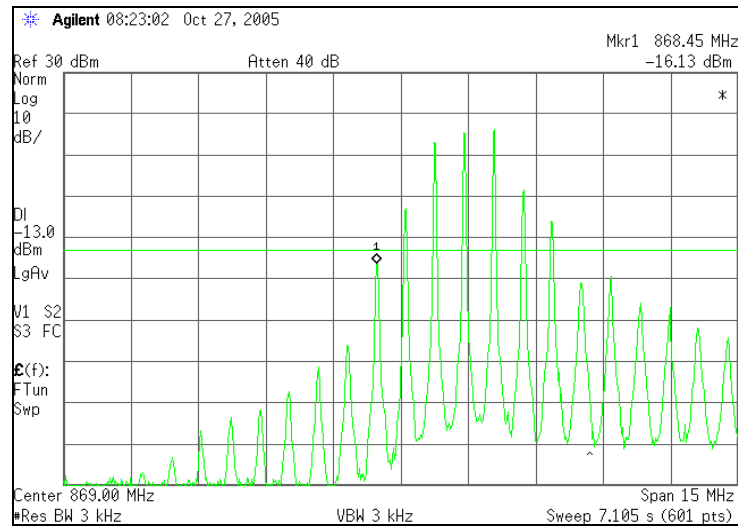


Figure 37: Spurious Emissions - Downlink TDMA Low Channel – In Band

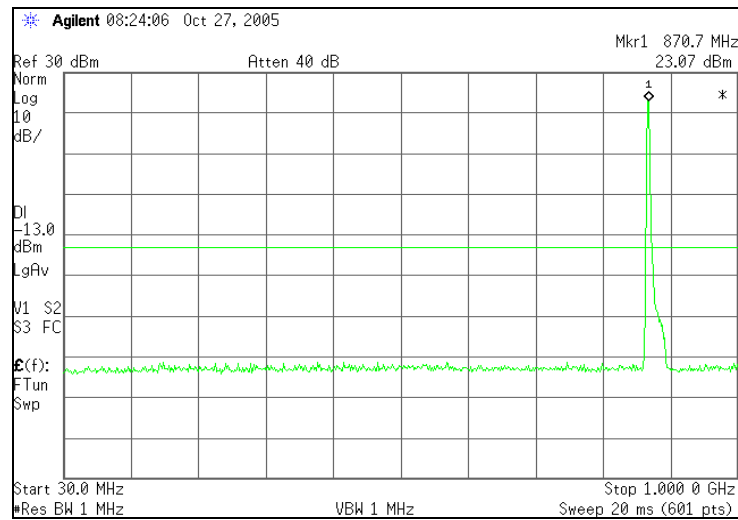


Figure 38: Spurious Emissions - Downlink TDMA Low Channel – 30 MHz to 2.9 GHz

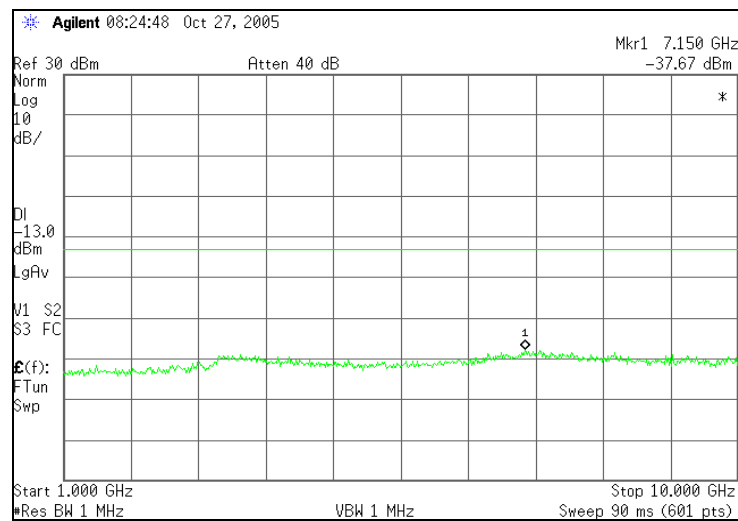
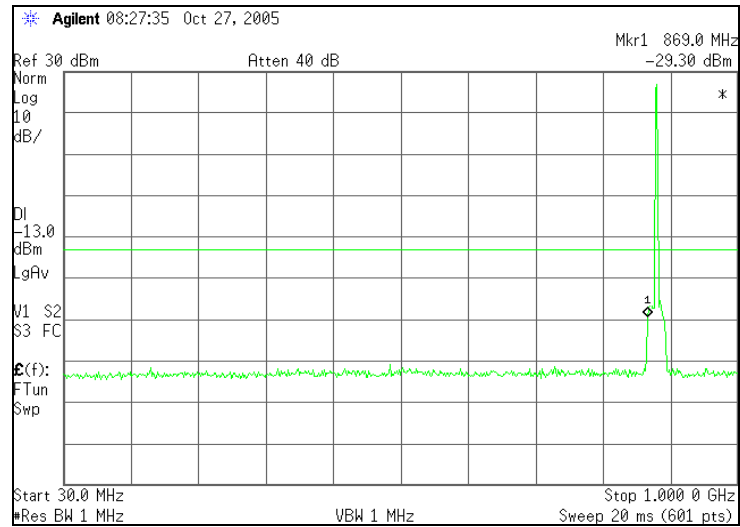
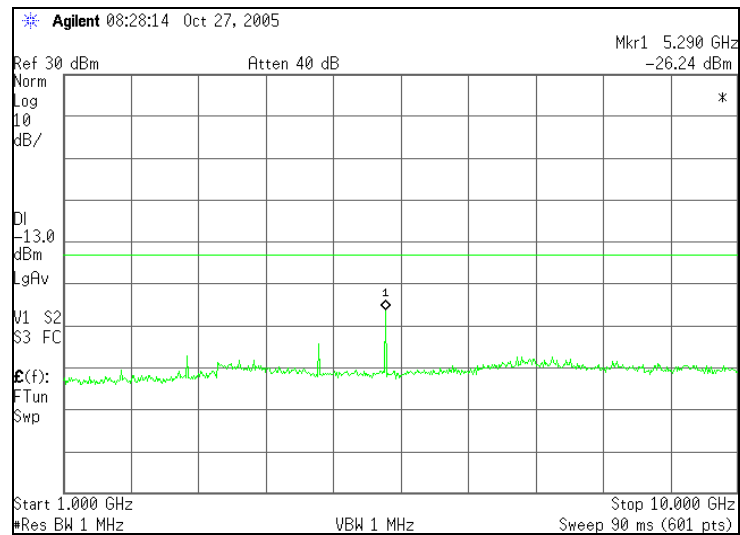
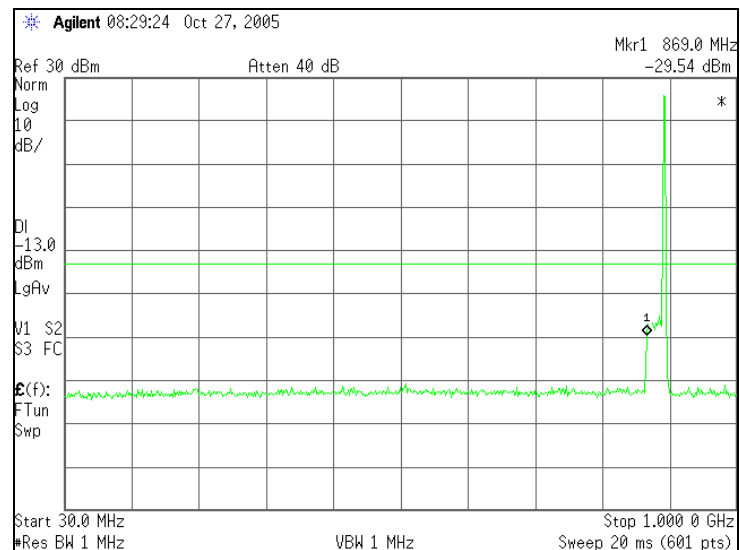


Figure 39: Spurious Emissions - Downlink TDMA Low Channel – 2.9 to 10 GHz

**Figure 40: Spurious Emissions - Downlink TDMA Mid Channel – 30 MHz to 2.9 GHz****Figure 41: Spurious Emissions - Downlink TDMA Mid Channel – 2.9 to 10 GHz****Figure 42: Spurious Emissions - Downlink TDMA High Channel – 30 MHz to 2.9 GHz**

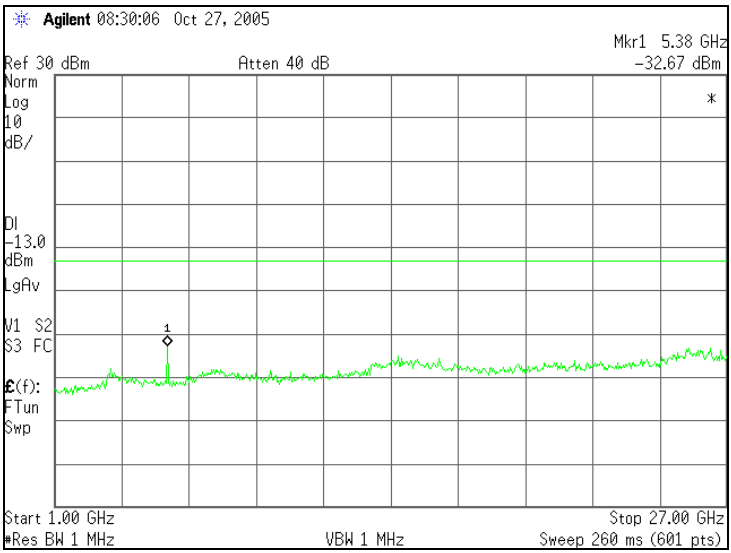


Figure 43: Spurious Emissions - Downlink TDMA High Channel – 2.9 to 10 GHz

2.7 CW Downlink – Covers FM (GSM and F1D)

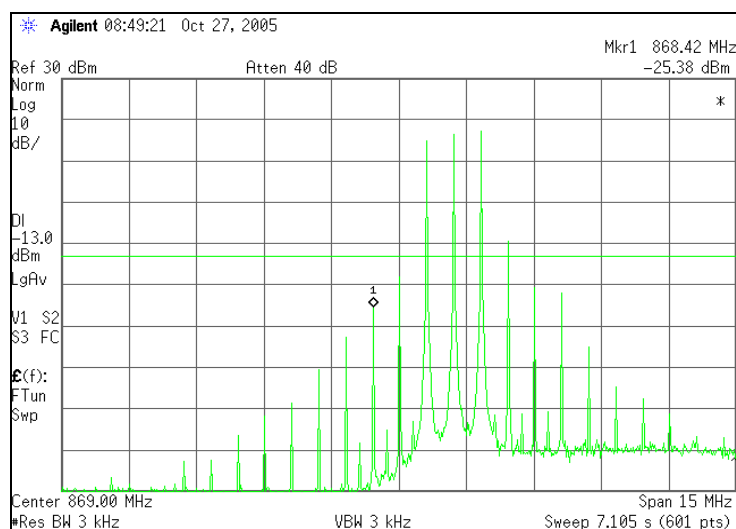


Figure 44: Spurious Emissions – Downlink CW Low Channel – In Band

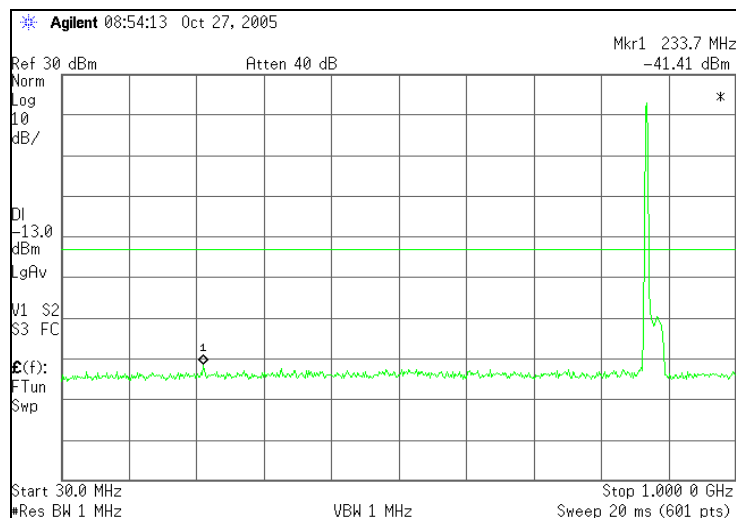


Figure 45: Spurious Emissions – Downlink CW Low Channel – 30 MHz to 2.9 GHz

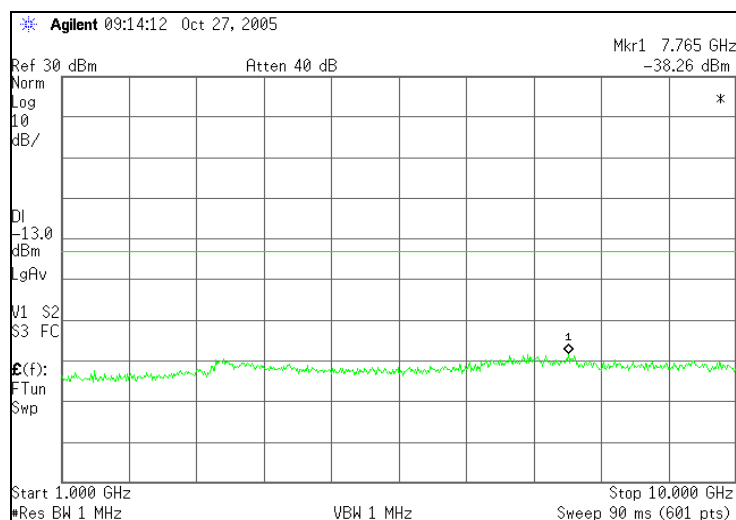


Figure 46: Spurious Emissions – Downlink CW Low Channel – 2.9 to 10 GHz

2.8 GSM Downlink

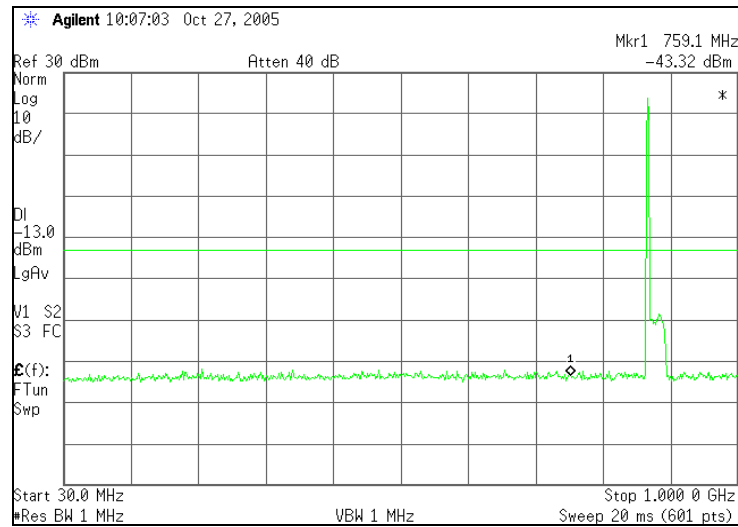


Figure 47: Spurious Emissions - Downlink GSM Low Channel – 30 MHz to 2.9 GHz

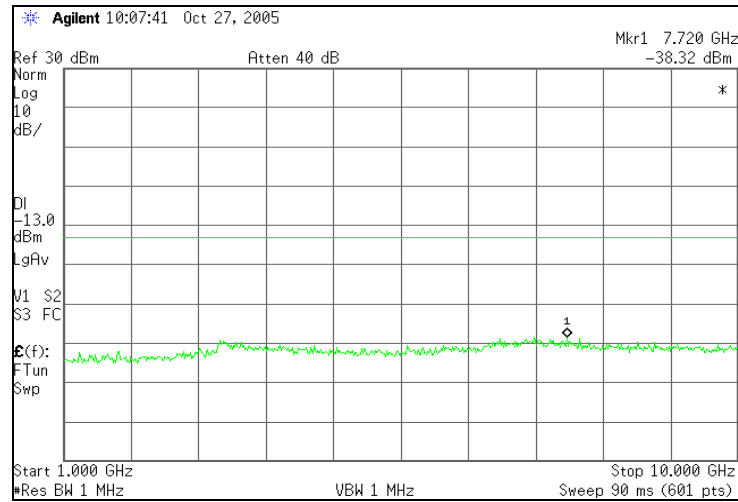


Figure 48: Spurious Emissions - Downlink GSM Low Channel – 2.9 to 10 GHz

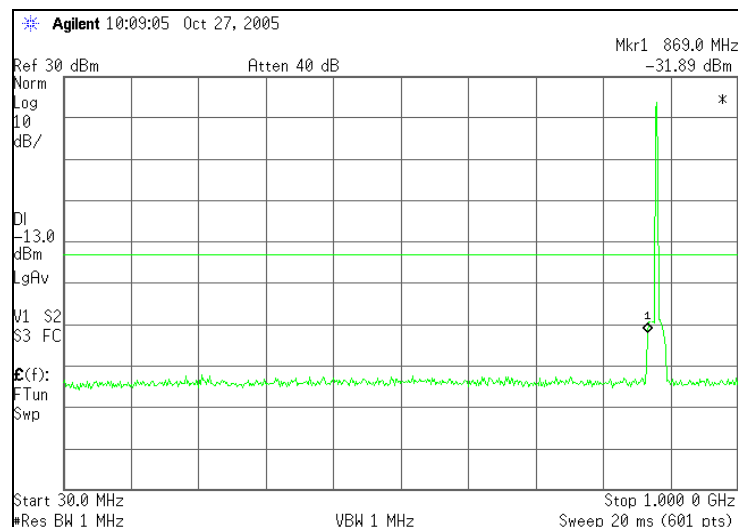
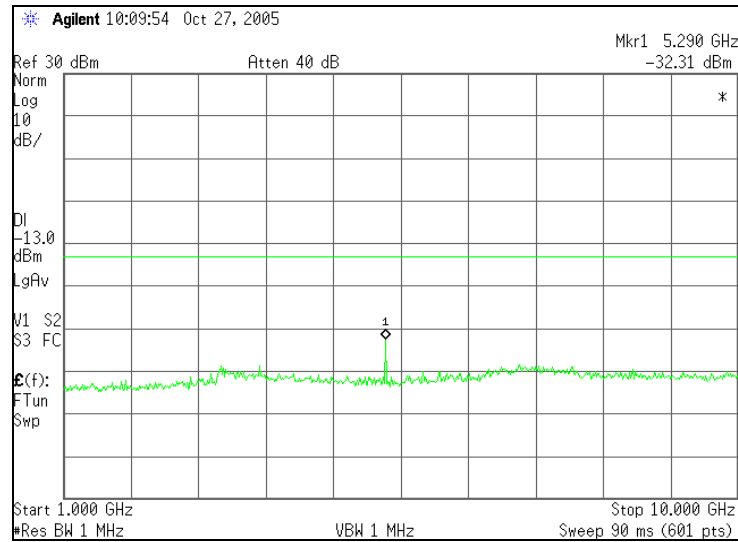
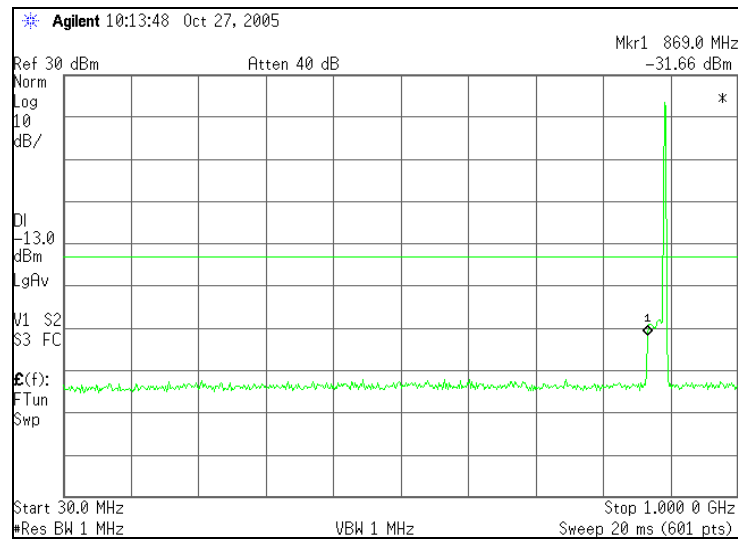
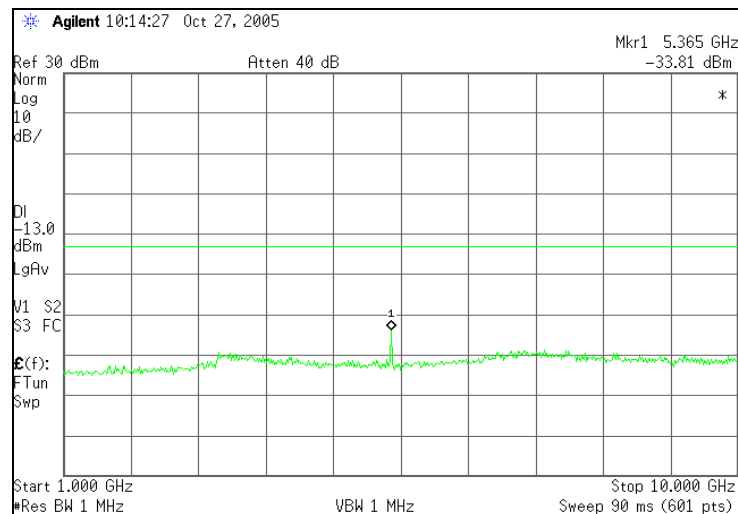


Figure 49: Spurious Emissions - Downlink GSM Mid Channel – 30 MHz to 2.9 GHz

**Figure 50: Spurious Emissions - Downlink GSM Mid Channel – 2.9 to 10 GHz****Figure 51: Spurious Emissions - Downlink GSM High Channel – 30 MHz to 2.9 GHz****Figure 52: Spurious Emissions - Downlink GSM High Channel – 2.9 to 10 GHz**

Band-edge

3.1 CDMA Uplink

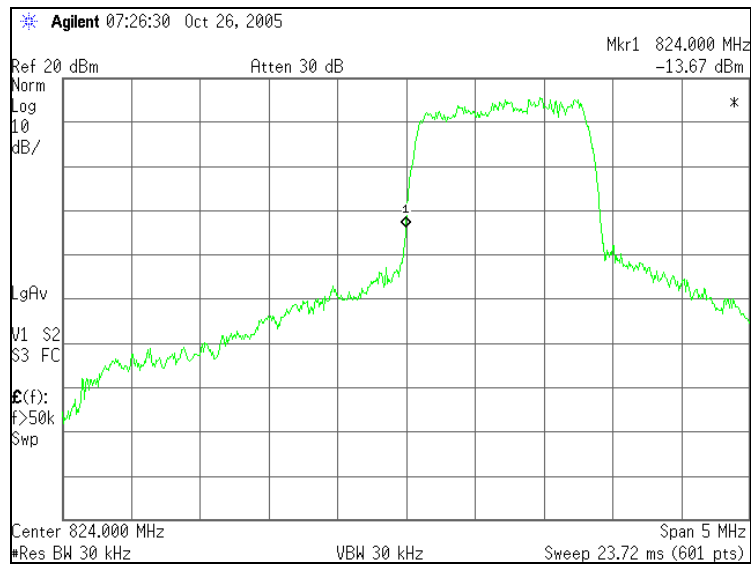


Figure 53: Band-Edge Uplink CDMA Low Channel

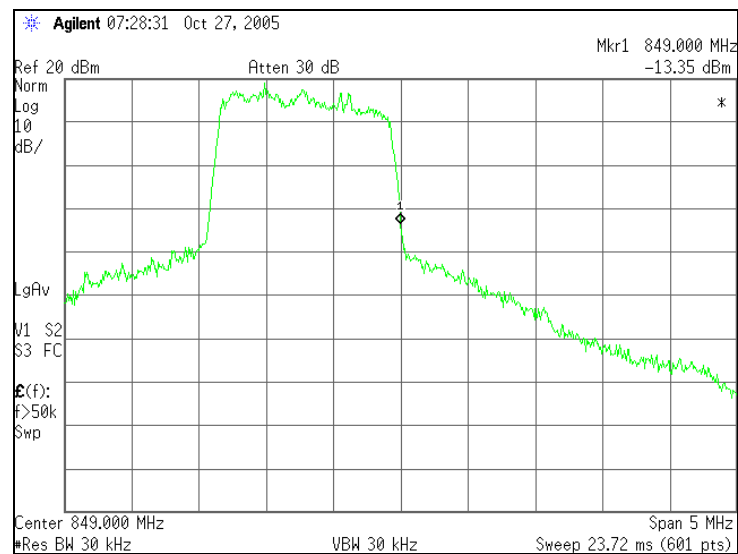


Figure 54: Band-Edge Uplink CDMA High Channel

3.2 TDMA Uplink

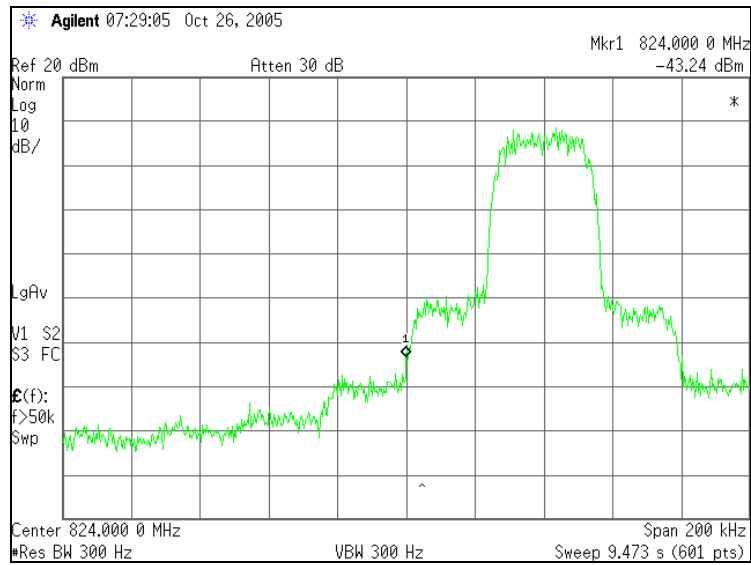


Figure 55: Band-Edge Uplink TDMA Low Channel

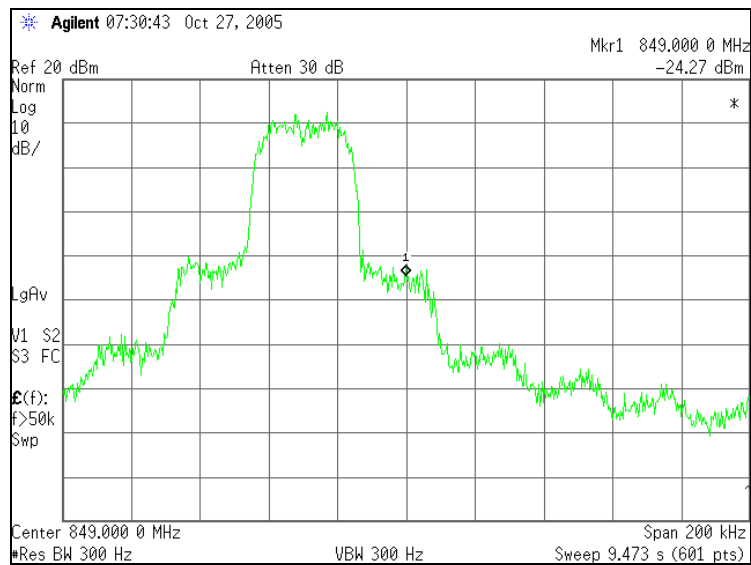


Figure 56: Band-Edge Uplink TDMA High Channel

3.3 GSM Uplink

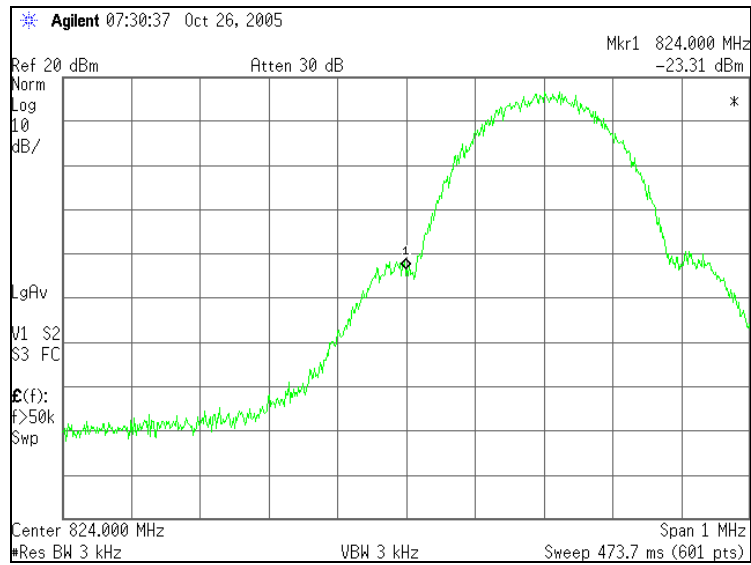


Figure 57: Band-Edge Uplink GSM Low Channel

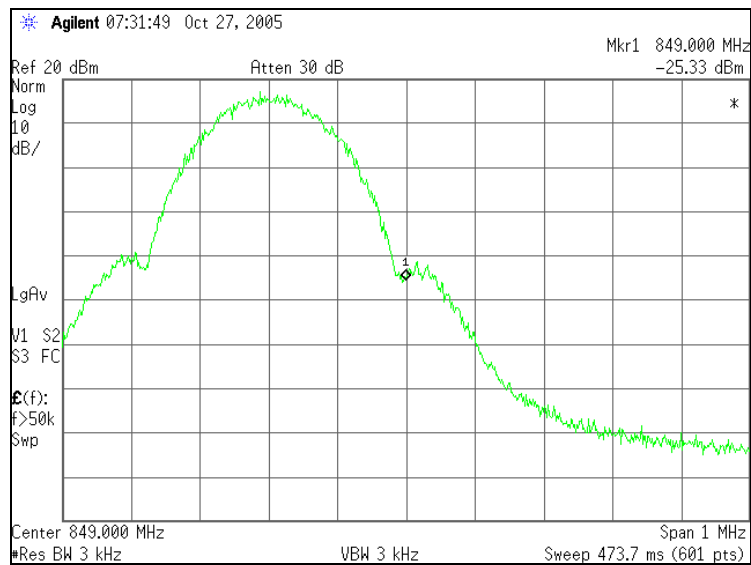


Figure 58: Band-Edge Uplink GSM High Channel

3.4 CDMA Downlink

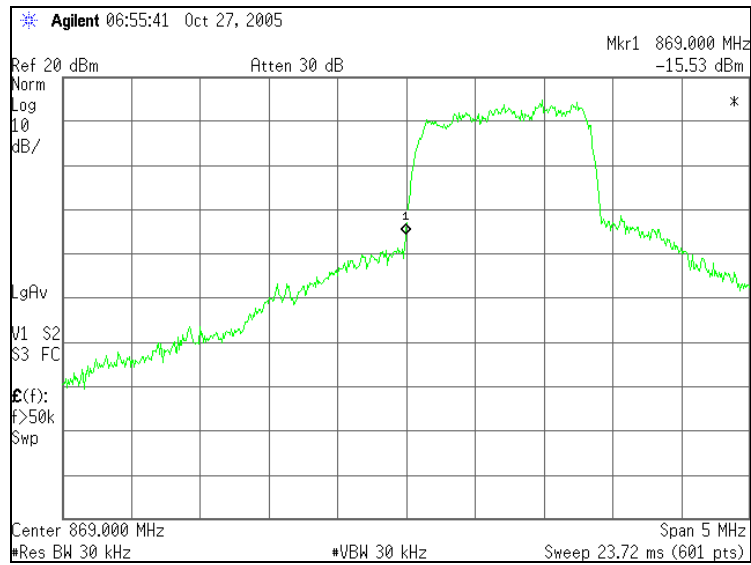


Figure 59: Band-Edge Downlink CDMA Low Channel

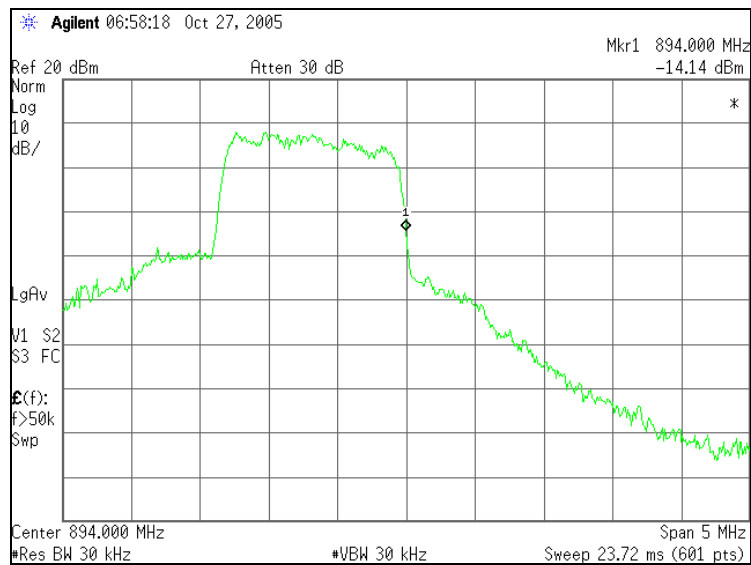


Figure 60: Band-Edge Downlink CDMA High Channel

3.5 TDMA Downlink

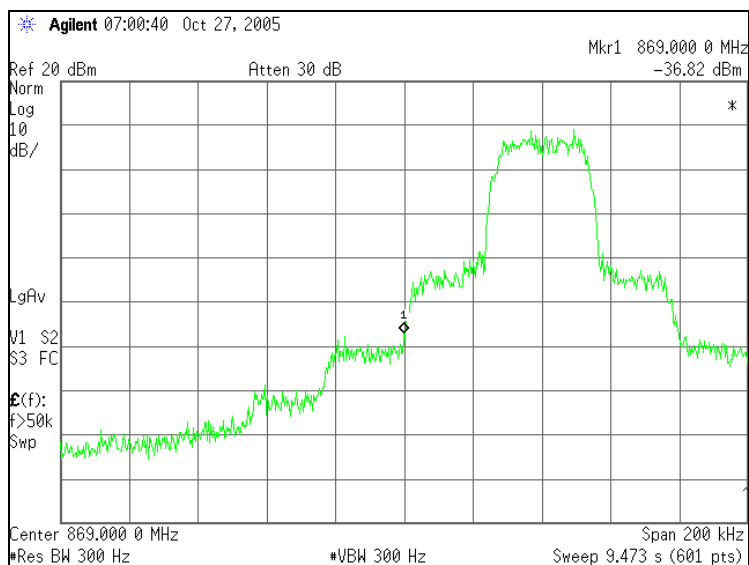


Figure 61: Band-Edge Downlink TDMA Low Channel

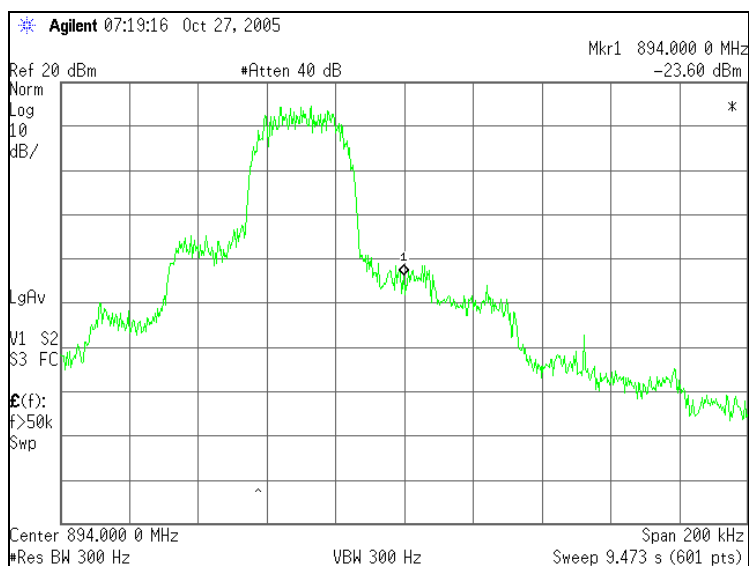


Figure 62: Band-Edge Downlink TDMA High Channel

3.6 GSM Downlink

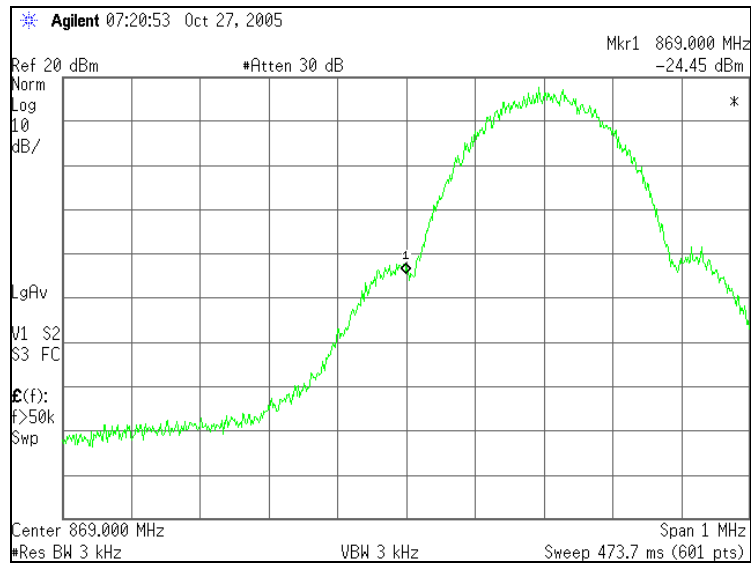


Figure 63: Band-Edge Downlink GSM Low Channel

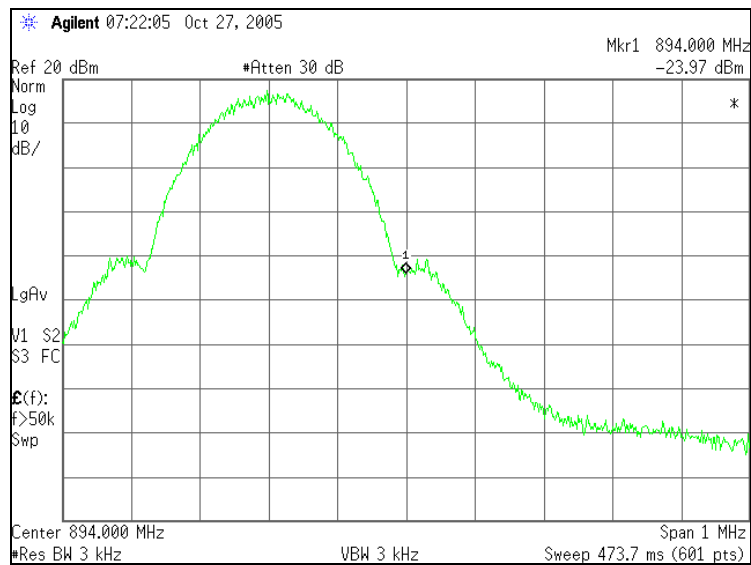


Figure 64: Band-Edge Downlink GSM High Channel

END REPORT