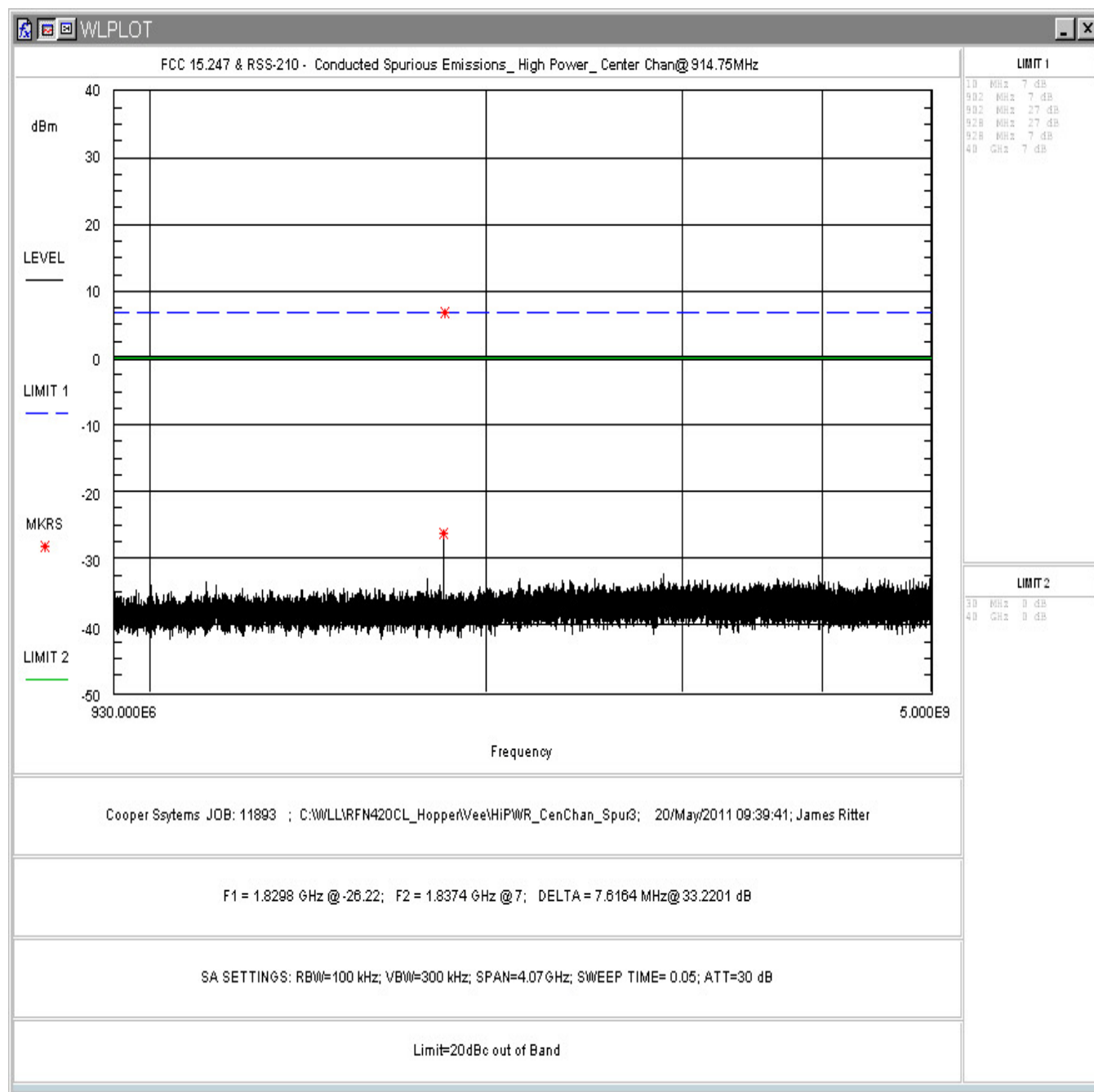




**Figure 21: Conducted Spurious Emissions, High Power, Center Channel 930-5000MHz**

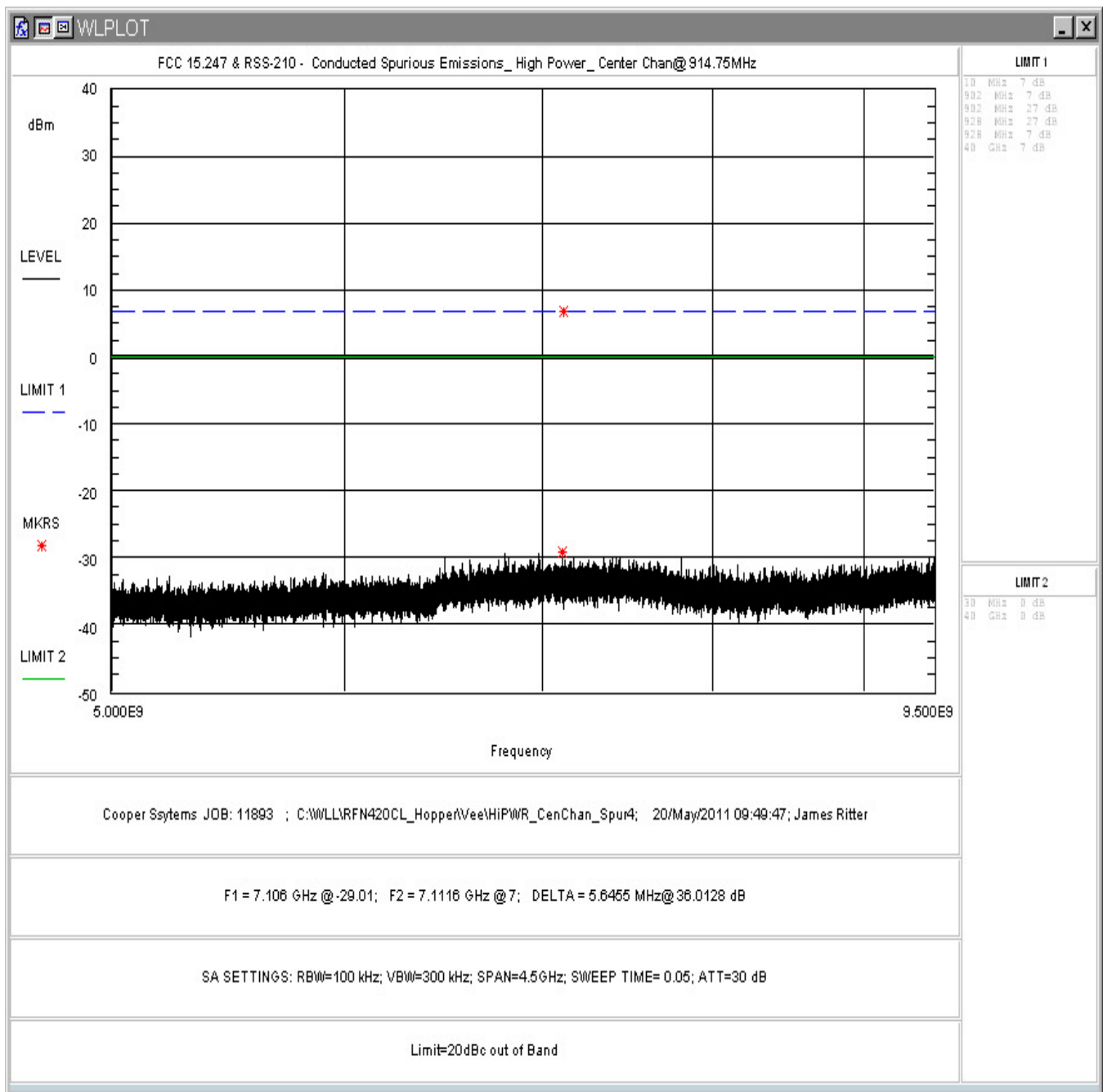
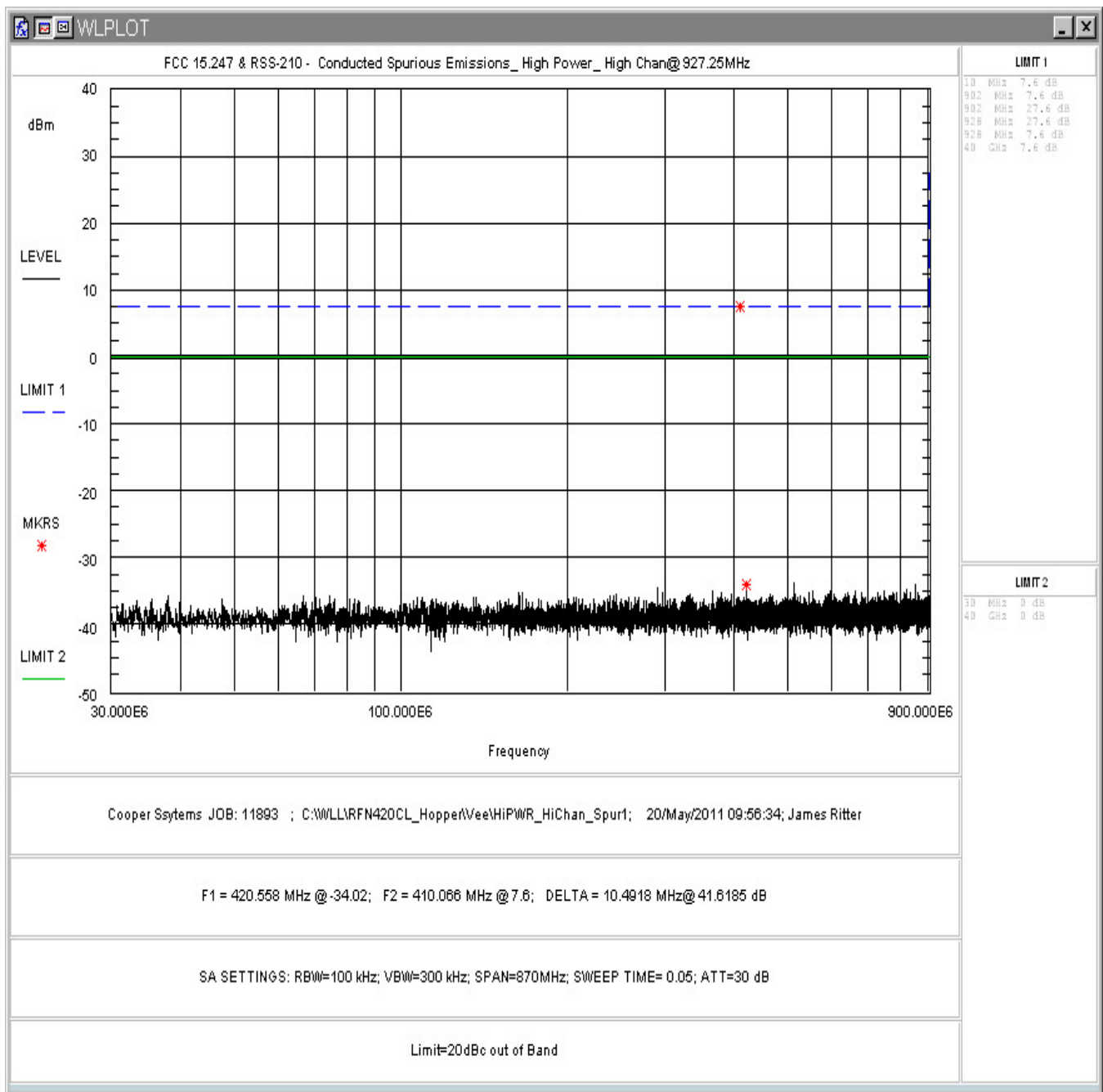


Figure 22: Conducted Spurious Emissions, High Power, Center Channel 5-9.5GHz



**Figure 23: Conducted Spurious Emissions, High Power, High Channel 30 - 900MHz**

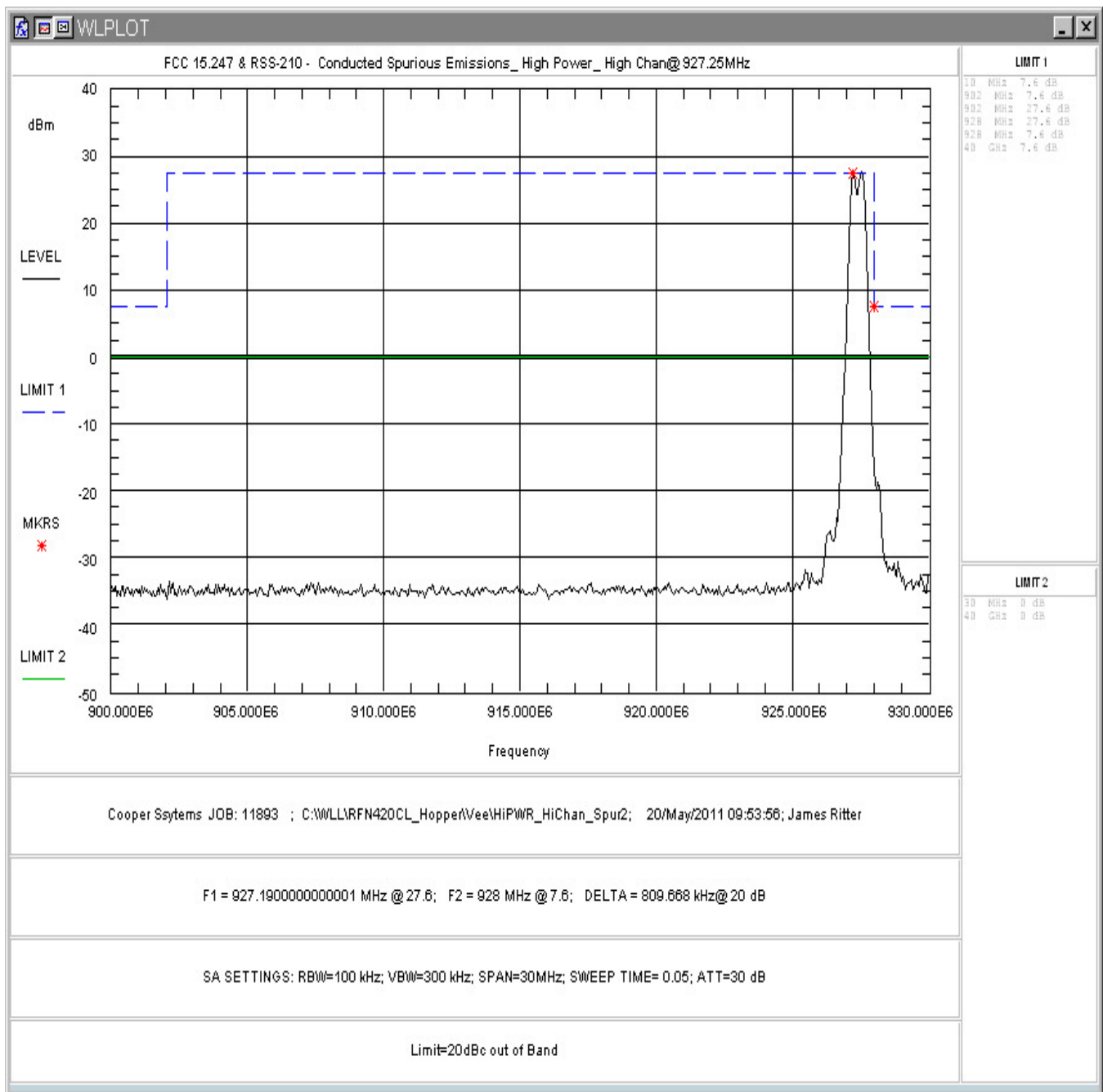
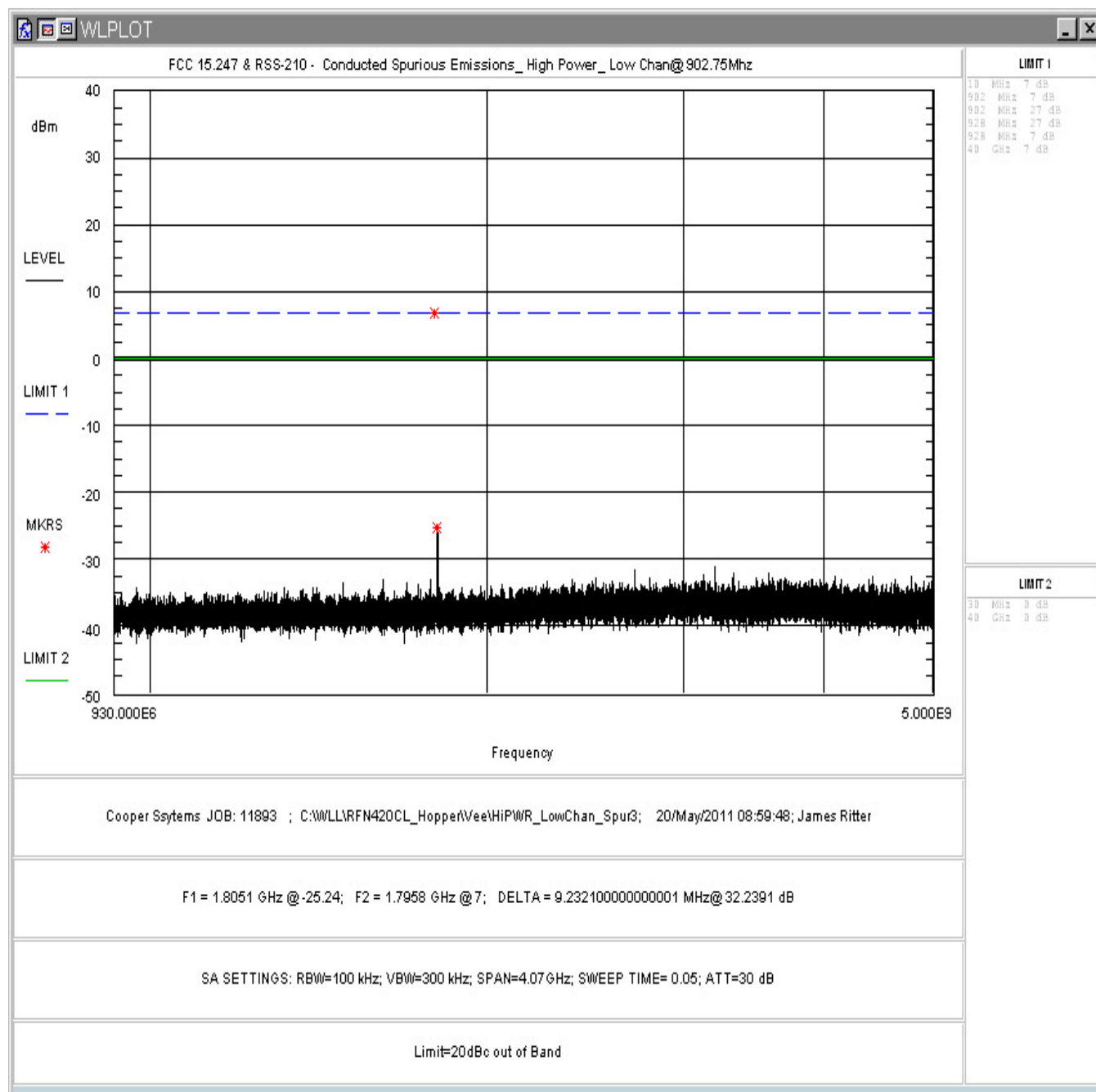
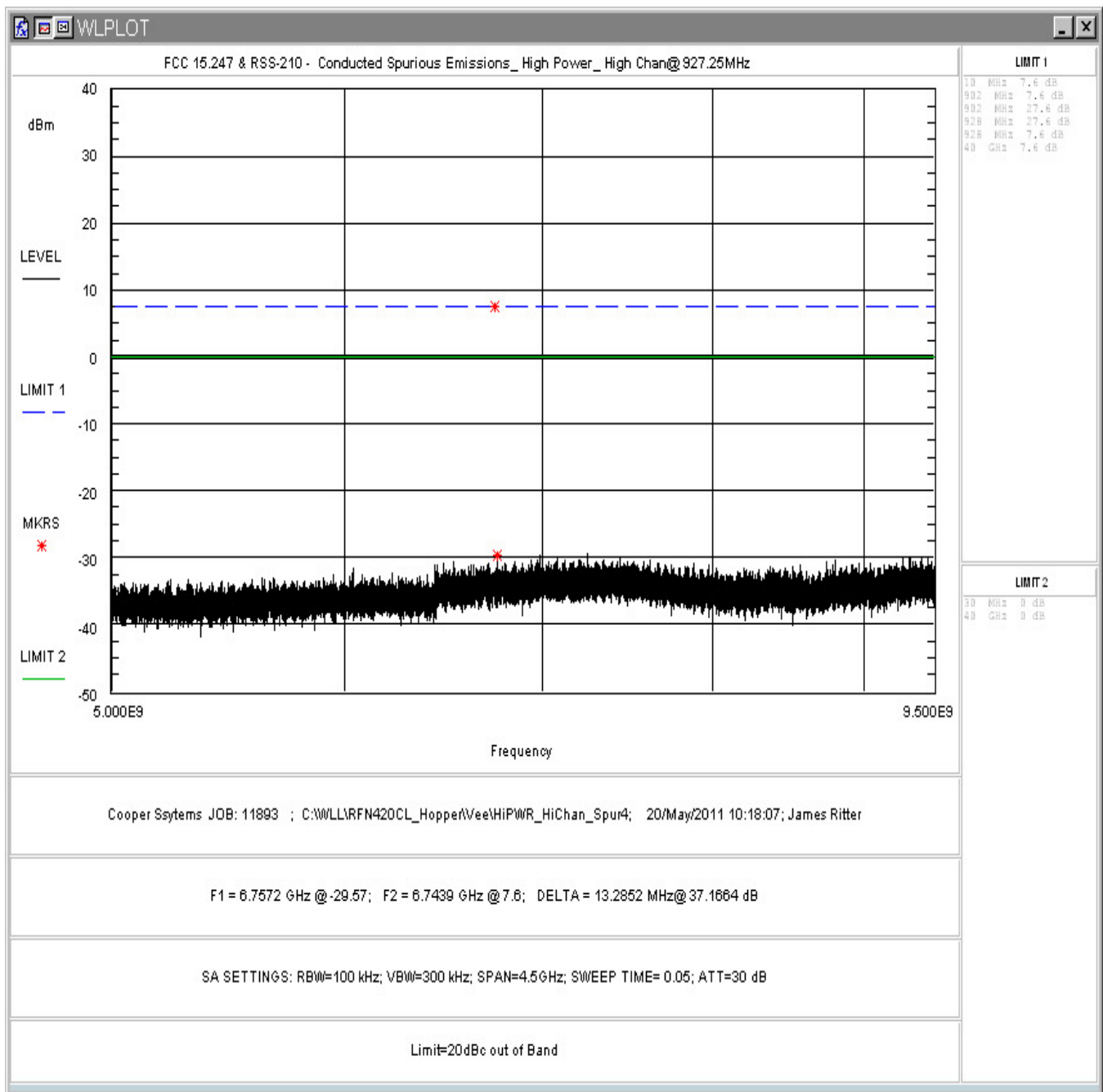


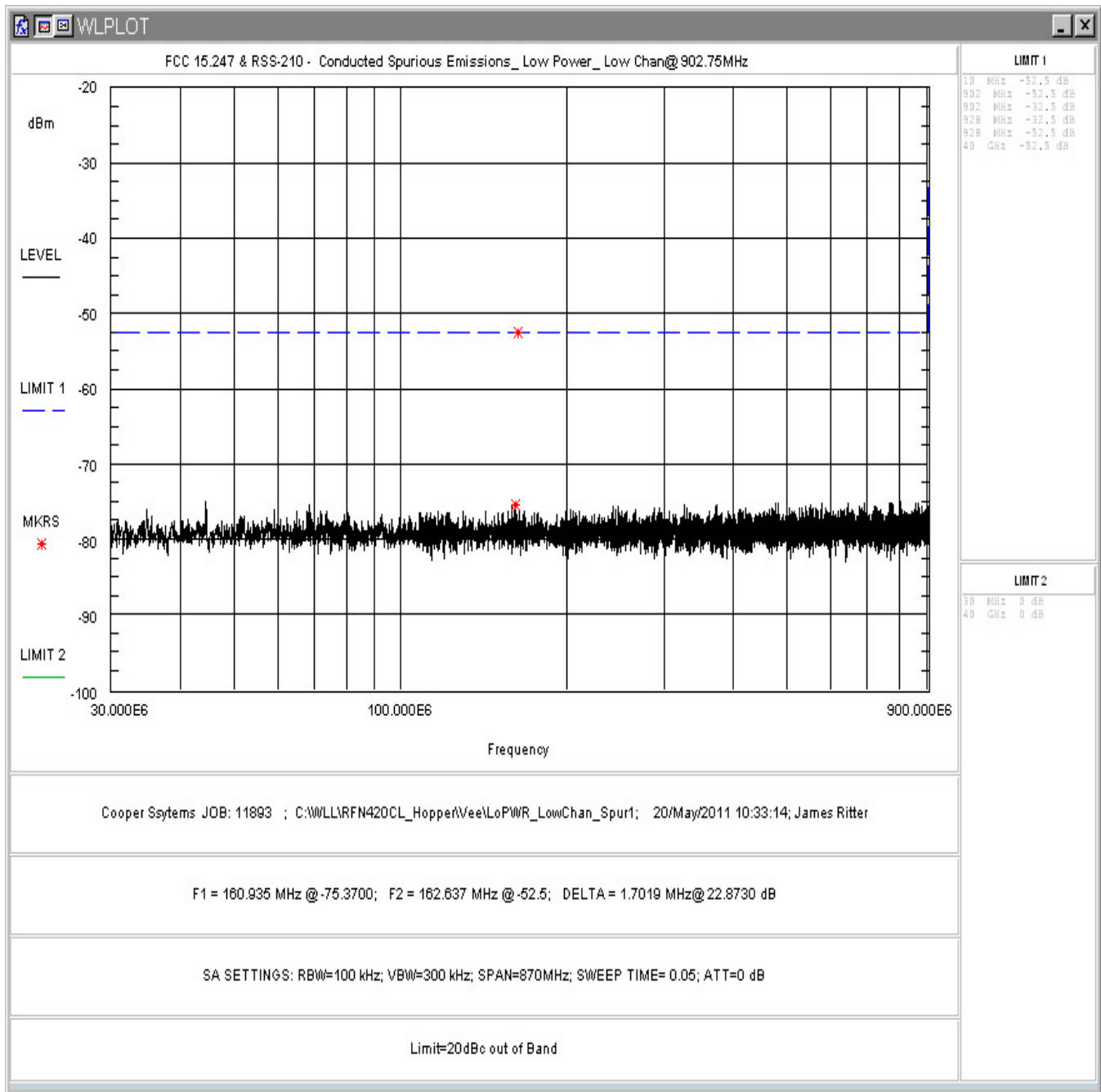
Figure 24: Conducted Spurious Emissions, High Power, High Channel 900 – 930MHz



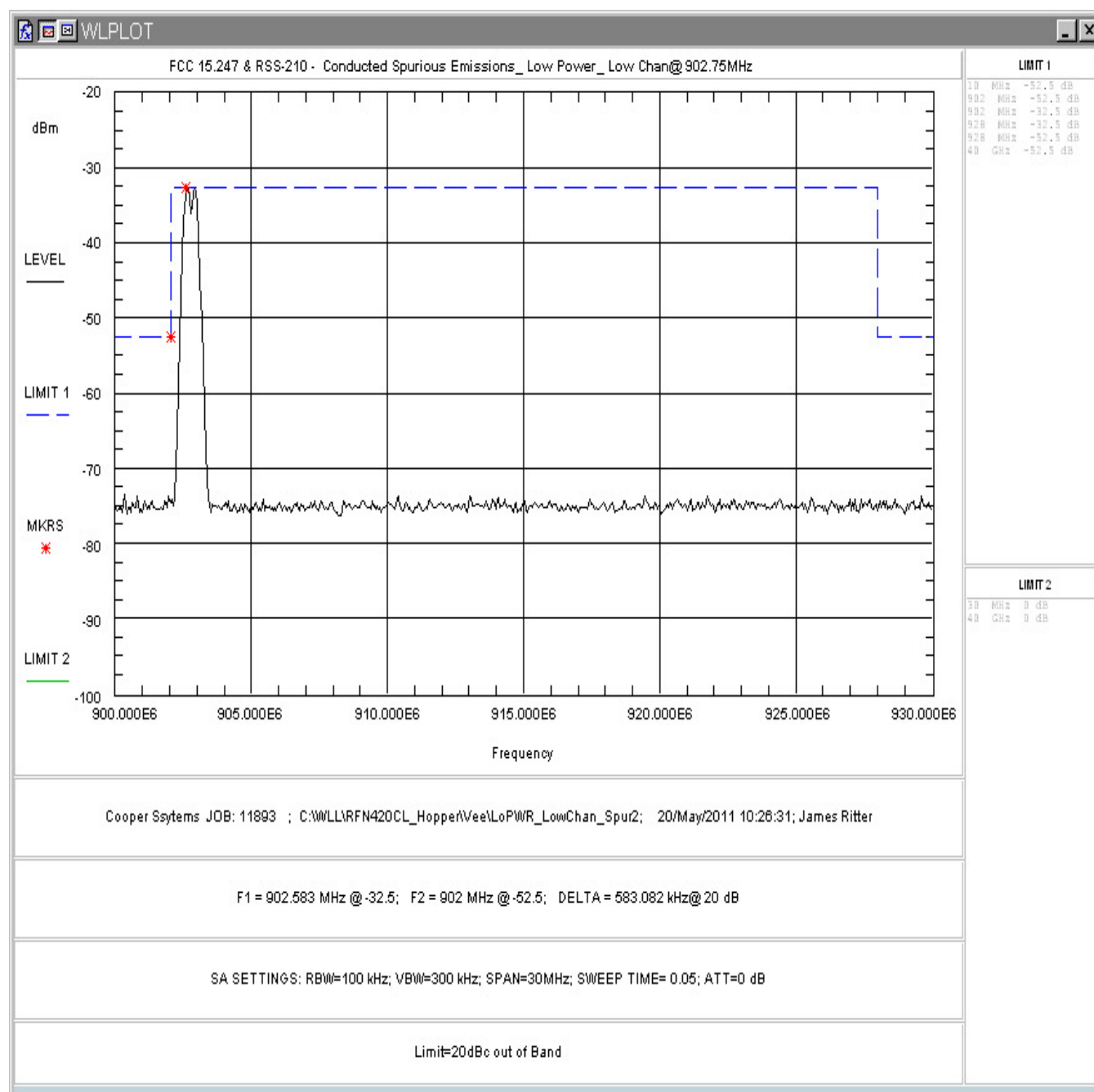
**Figure 25: Conducted Spurious Emissions, High Power, High Channel 930-5000MHz**



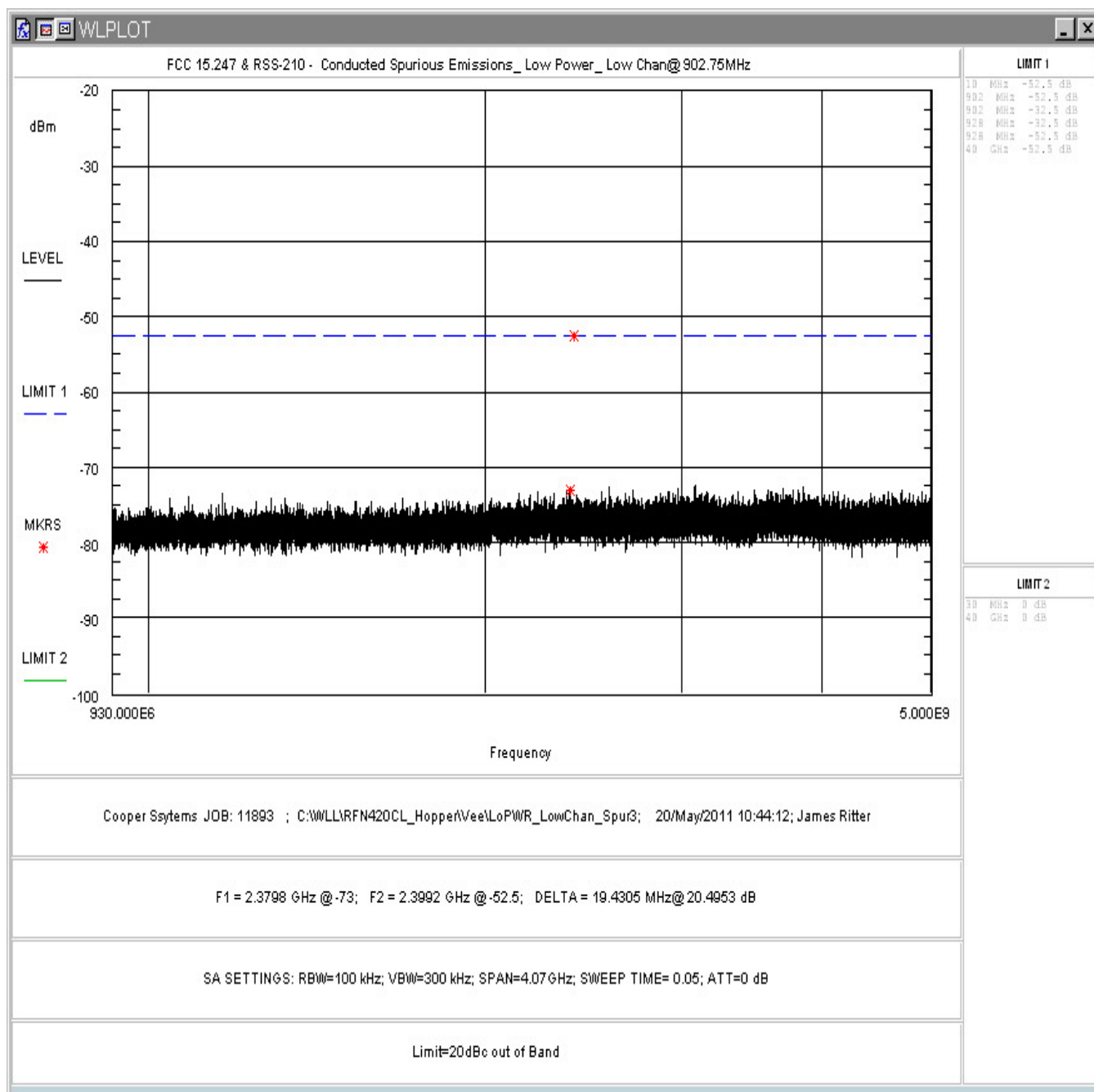
**Figure 26: Conducted Spurious Emissions, High Power, High Channel 5-9.5GHz**



**Figure 27: Conducted Spurious Emissions, Low Power, Low Channel 30 - 900MHz**



**Figure 28: Conducted Spurious Emissions, Low Power, Low Channel 900 – 930MHz**



**Figure 29: Conducted Spurious Emissions, Low Power, Low Channel 930-5000MHz**

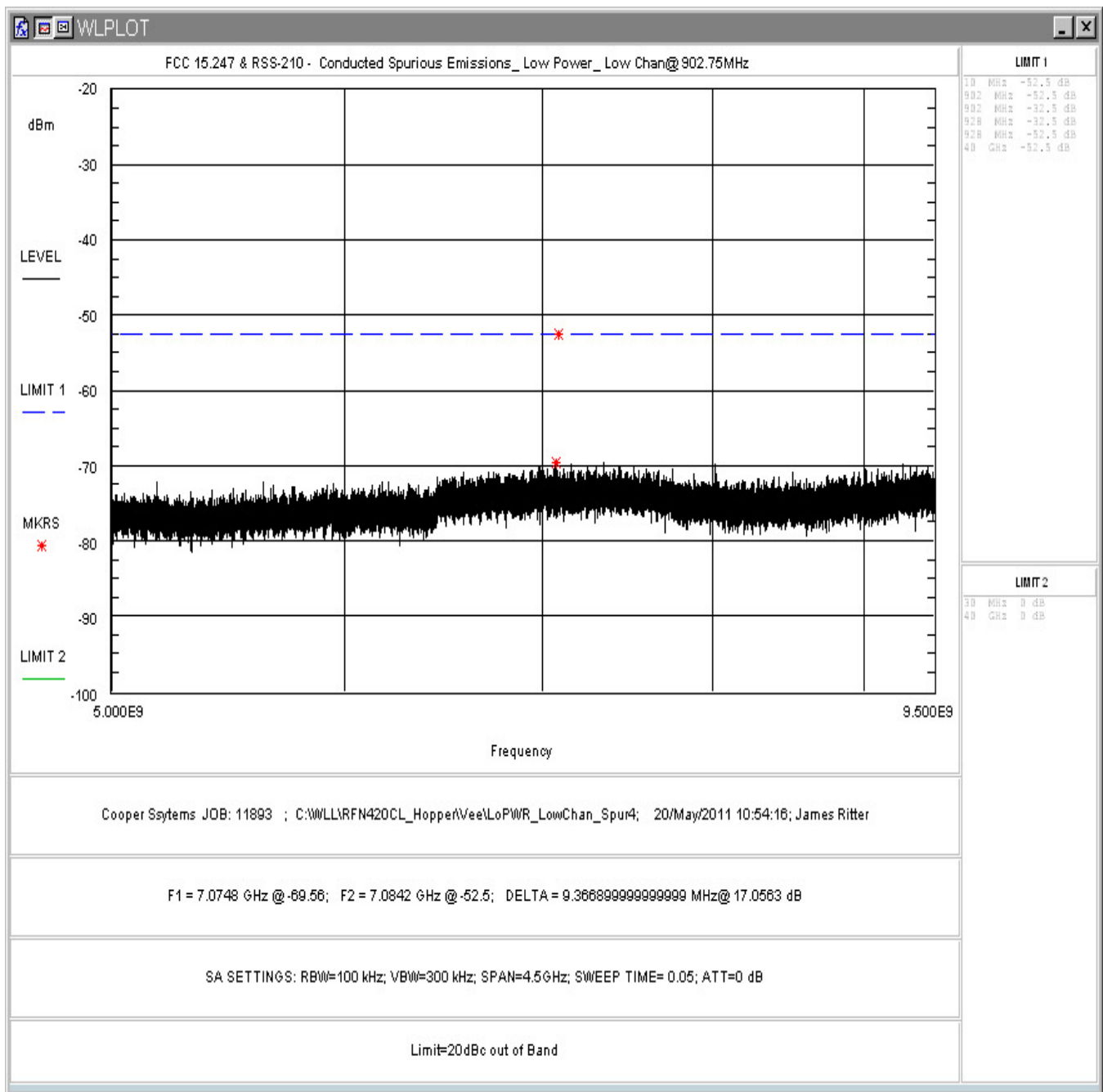


Figure 30: Conducted Spurious Emissions, Low Power, Low Channel 5-9.5GHz

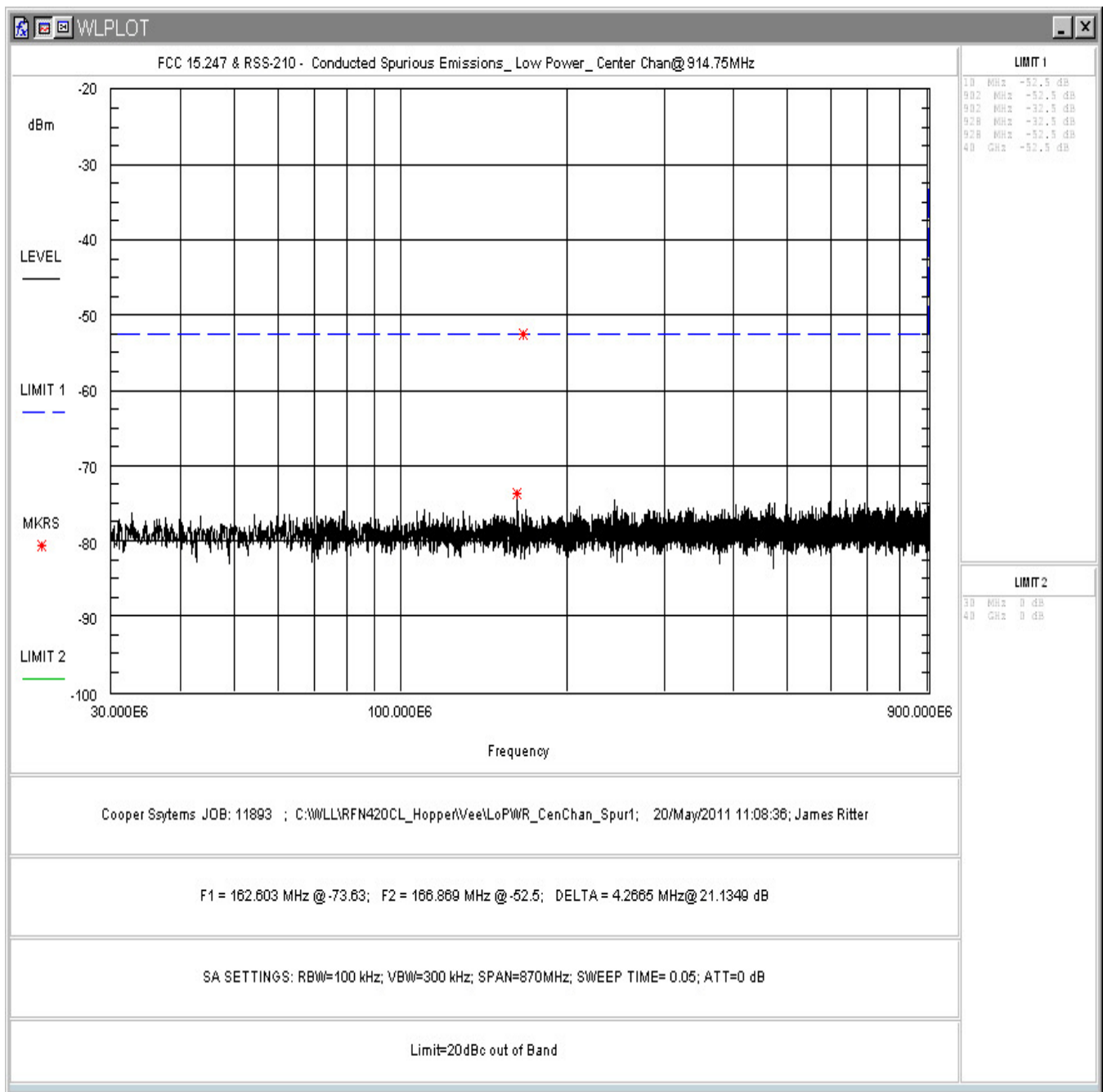


Figure 31: Conducted Spurious Emissions, Low Power, Center Channel 30 - 900MHz

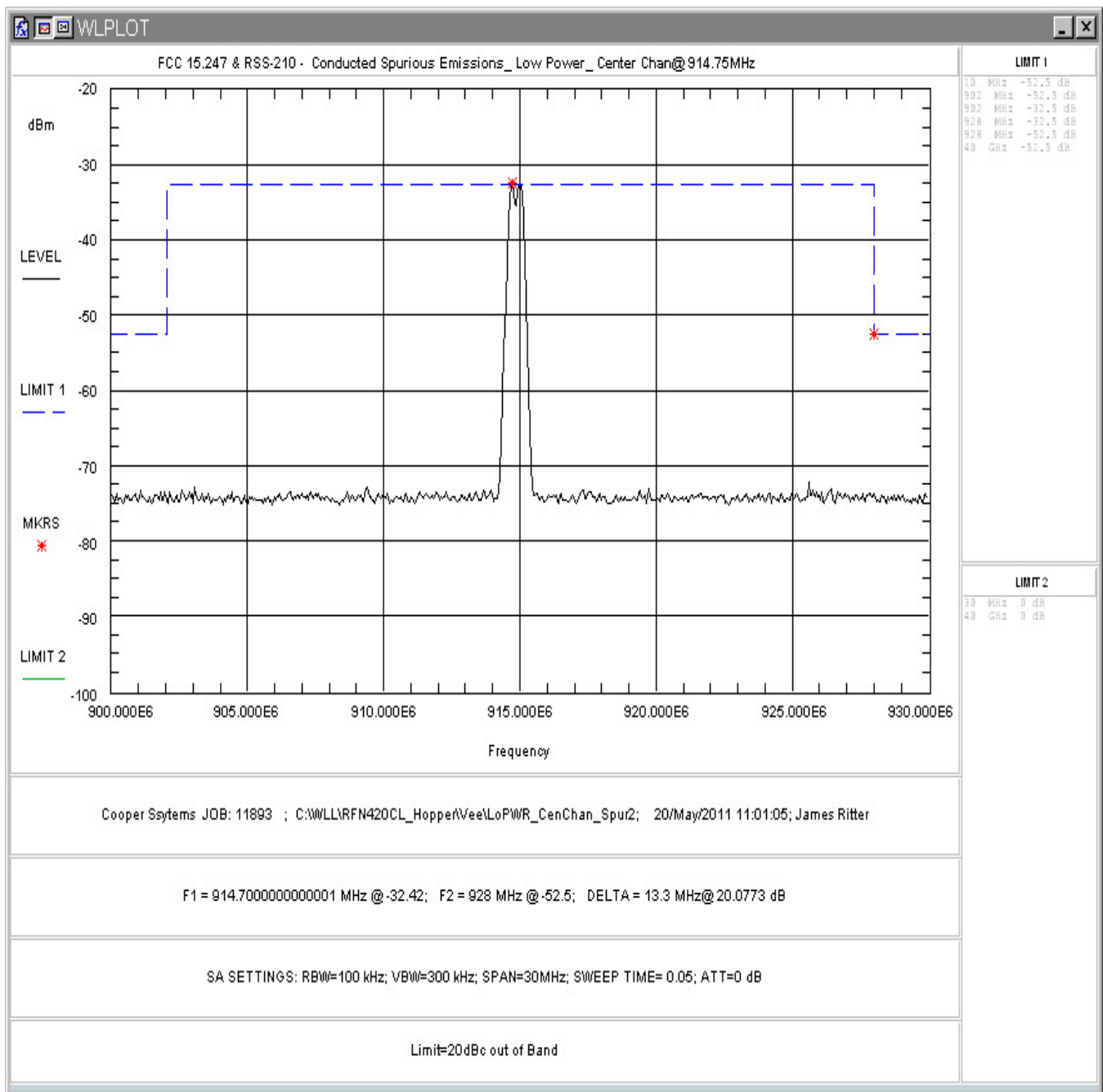
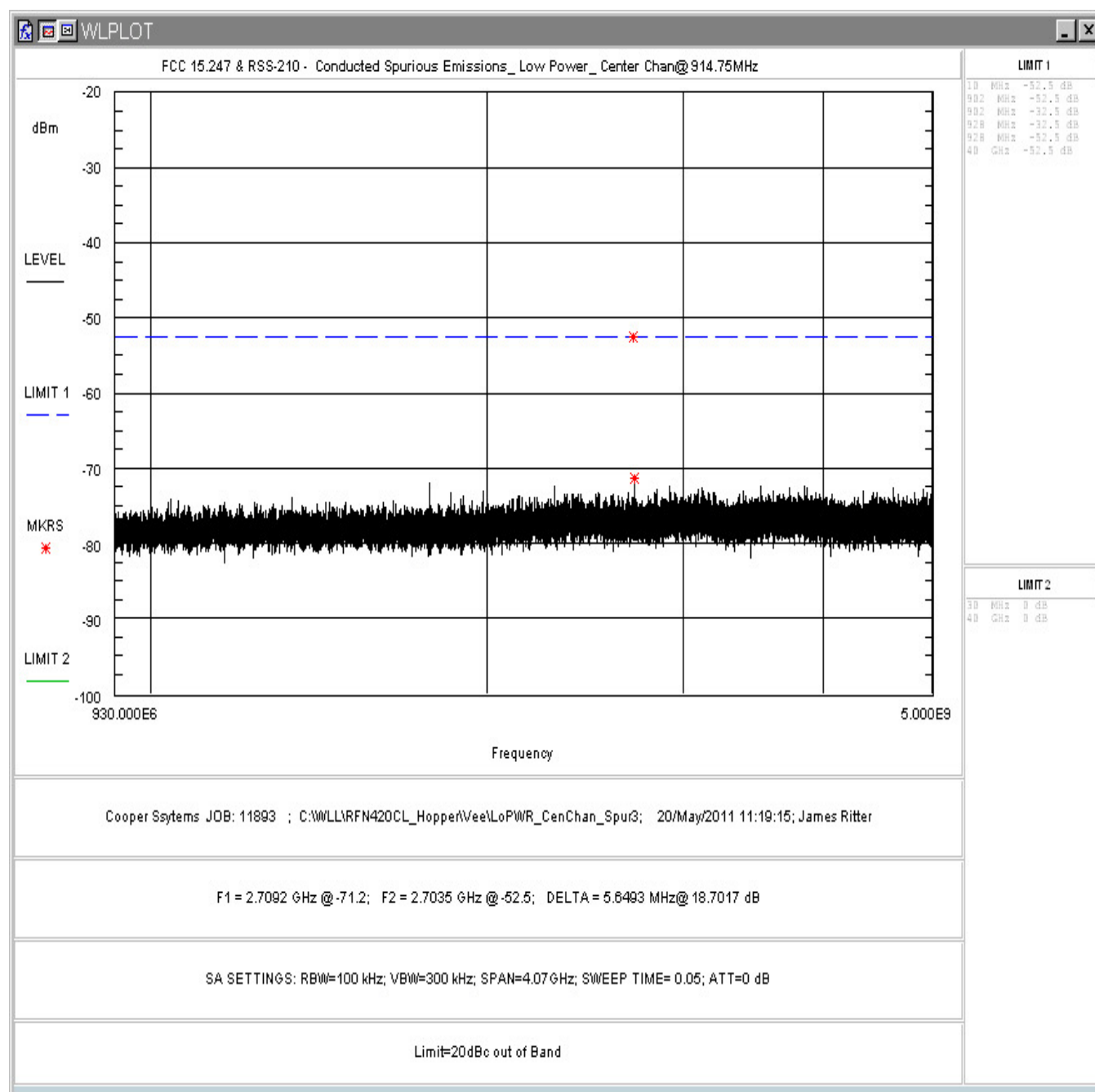


Figure 32: Conducted Spurious Emissions, Low Power, Center Channel 900 – 930MHz



**Figure 33: Conducted Spurious Emissions, Low Power, Center Channel 930-5000MHz**

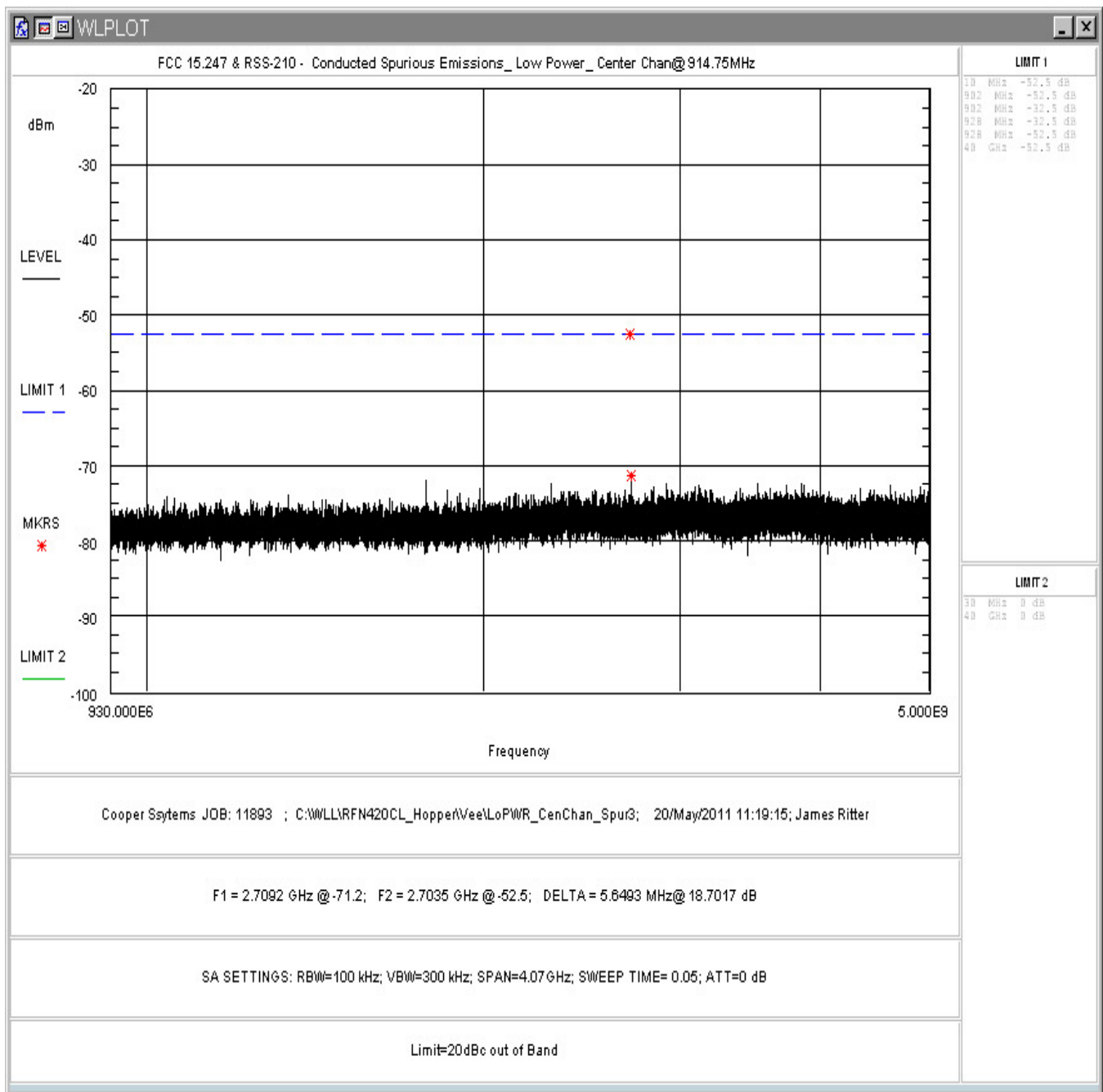
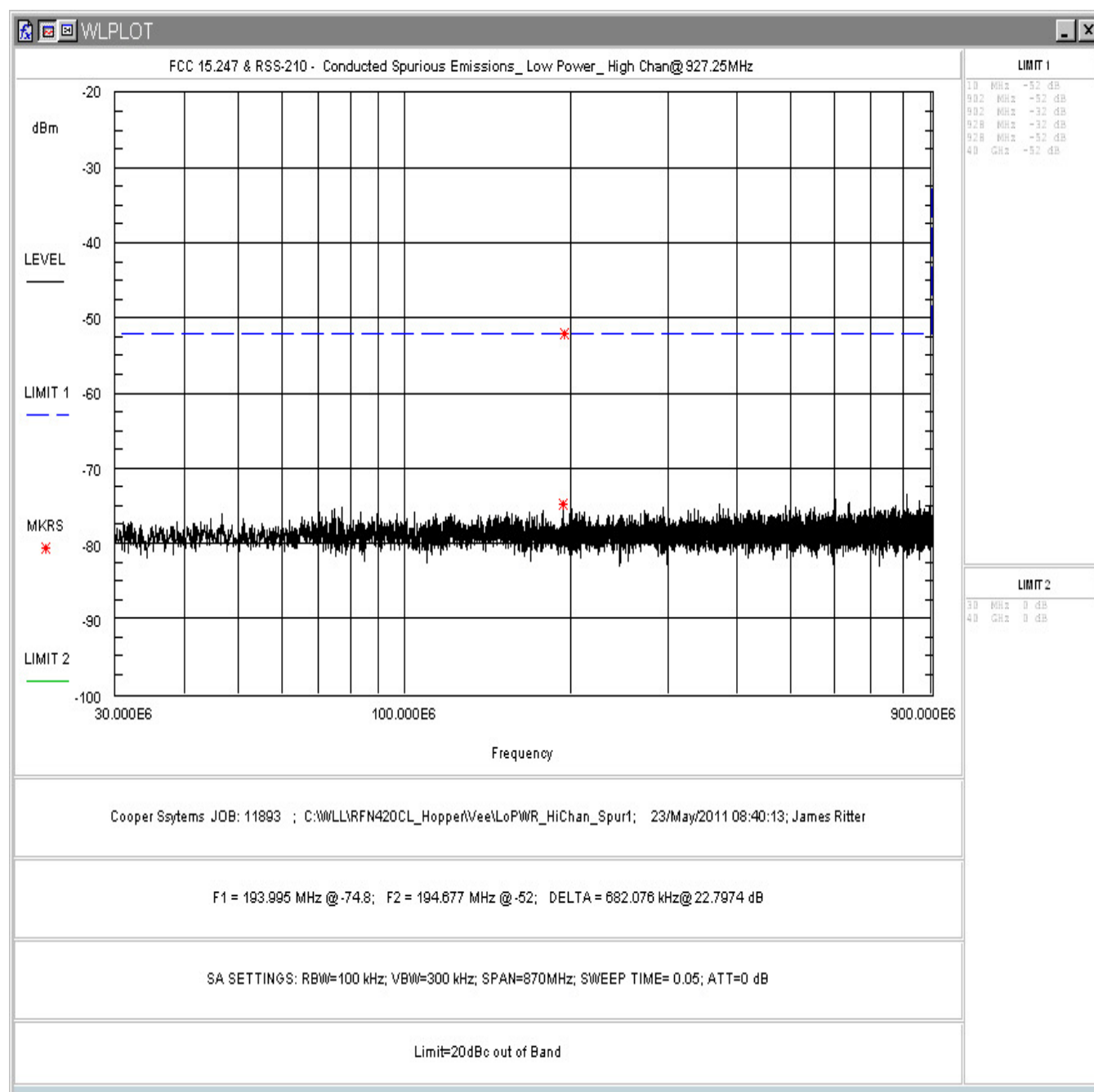


Figure 34: Conducted Spurious Emissions, Low Power, Center Channel 5-9.5GHz



**Figure 35: Conducted Spurious Emissions, Low Power, High Channel 30 - 900MHz**

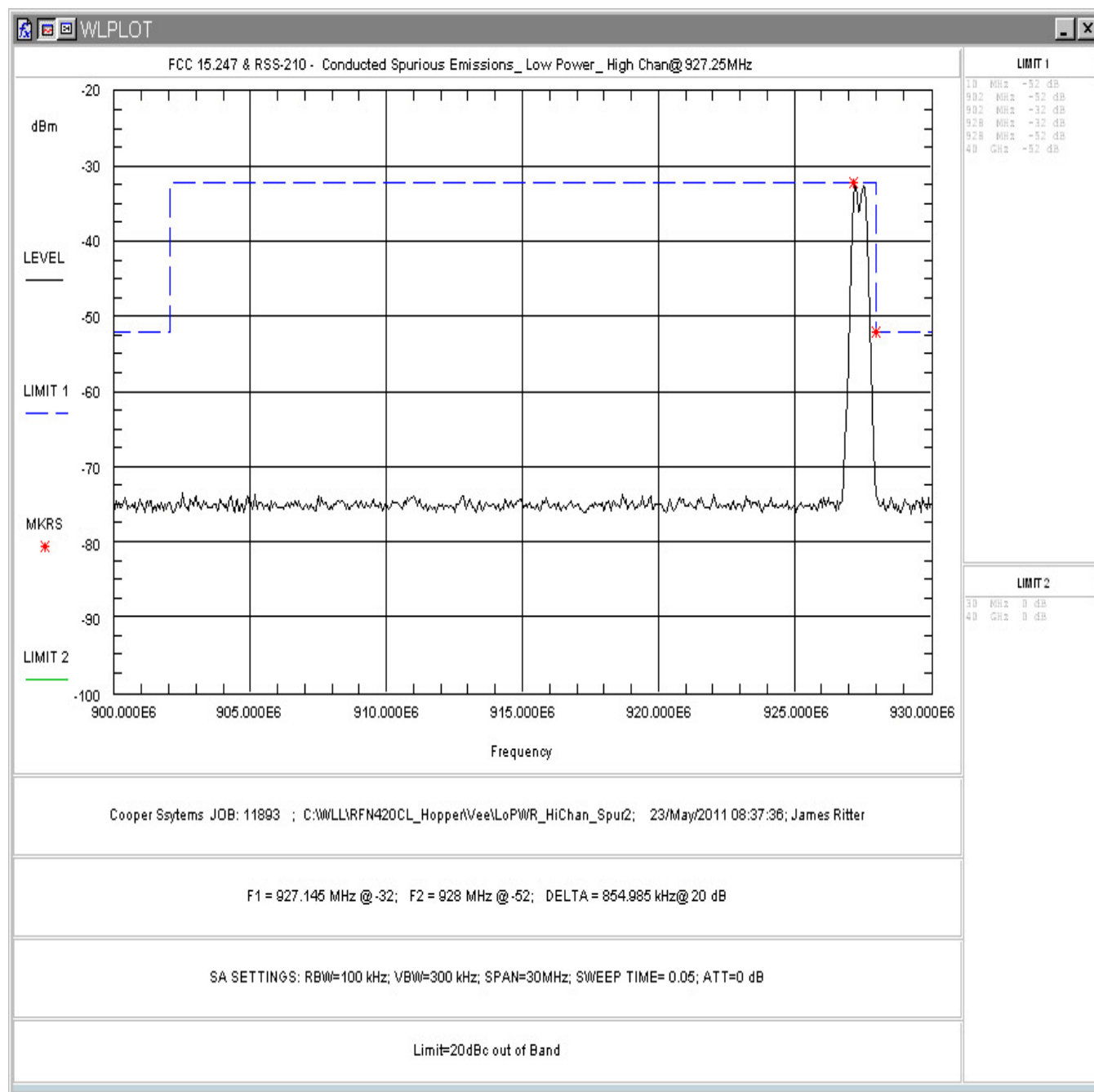
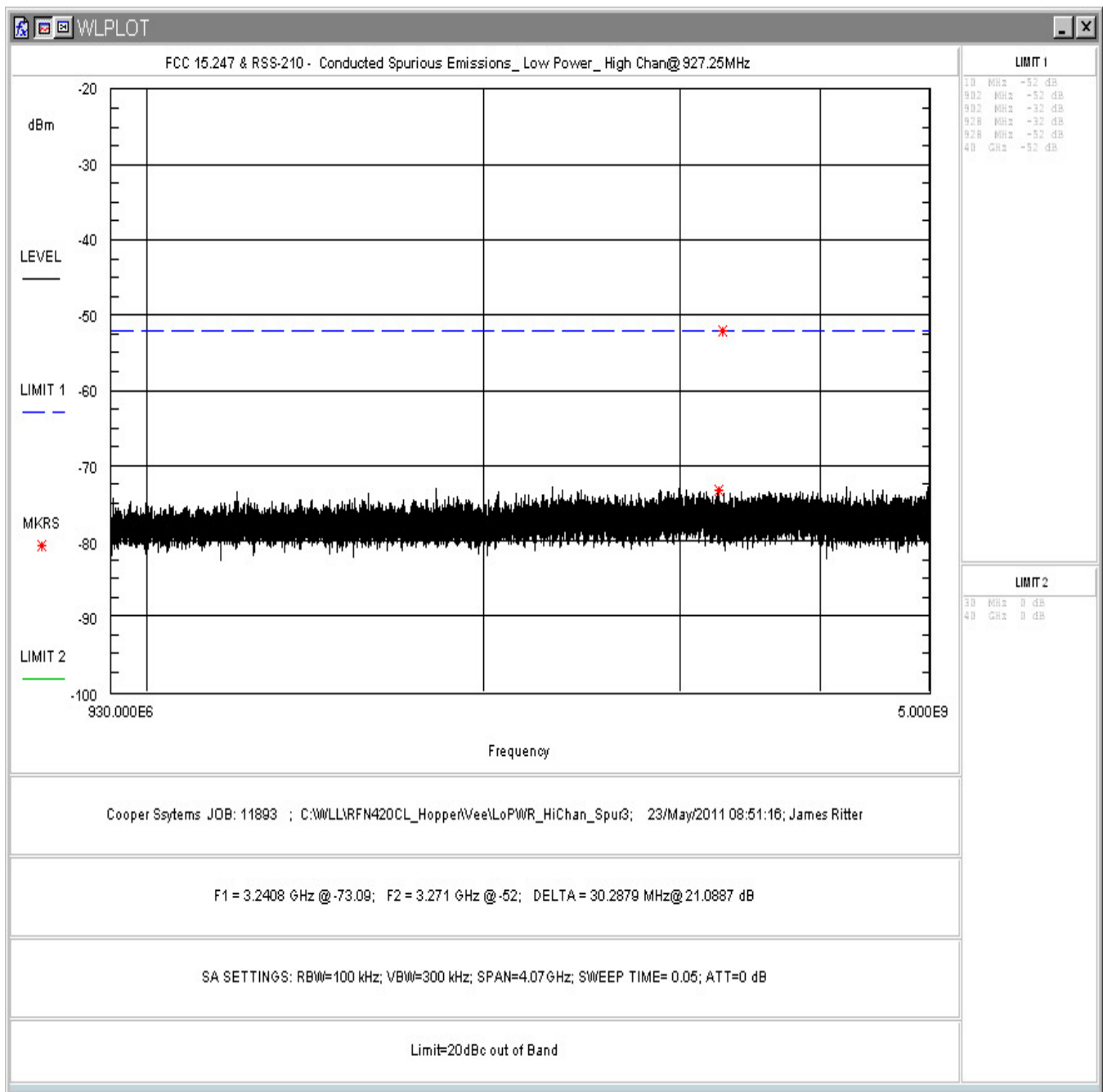
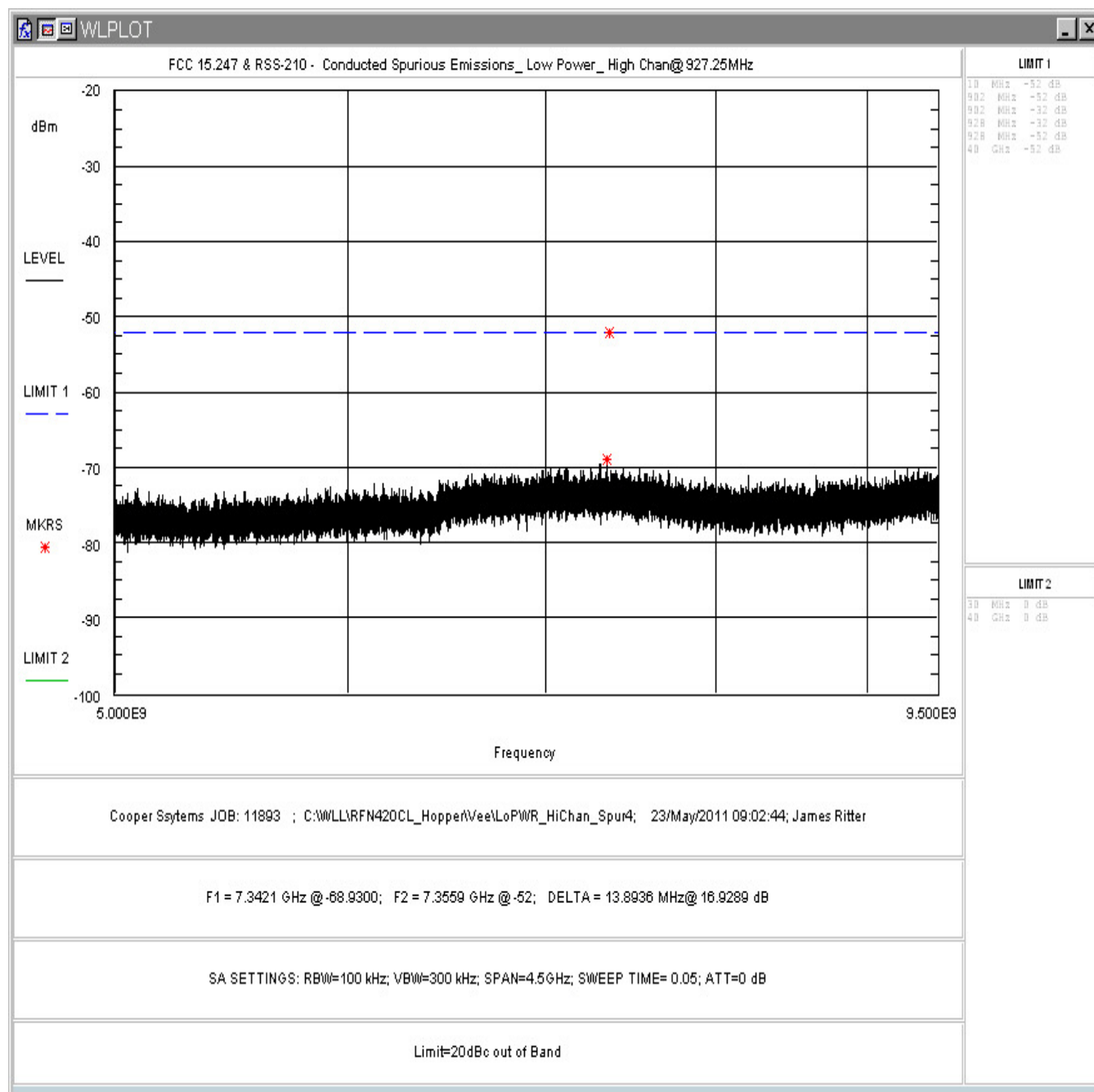


Figure 36: Conducted Spurious Emissions, Low Power, High Channel 900 – 930MHz



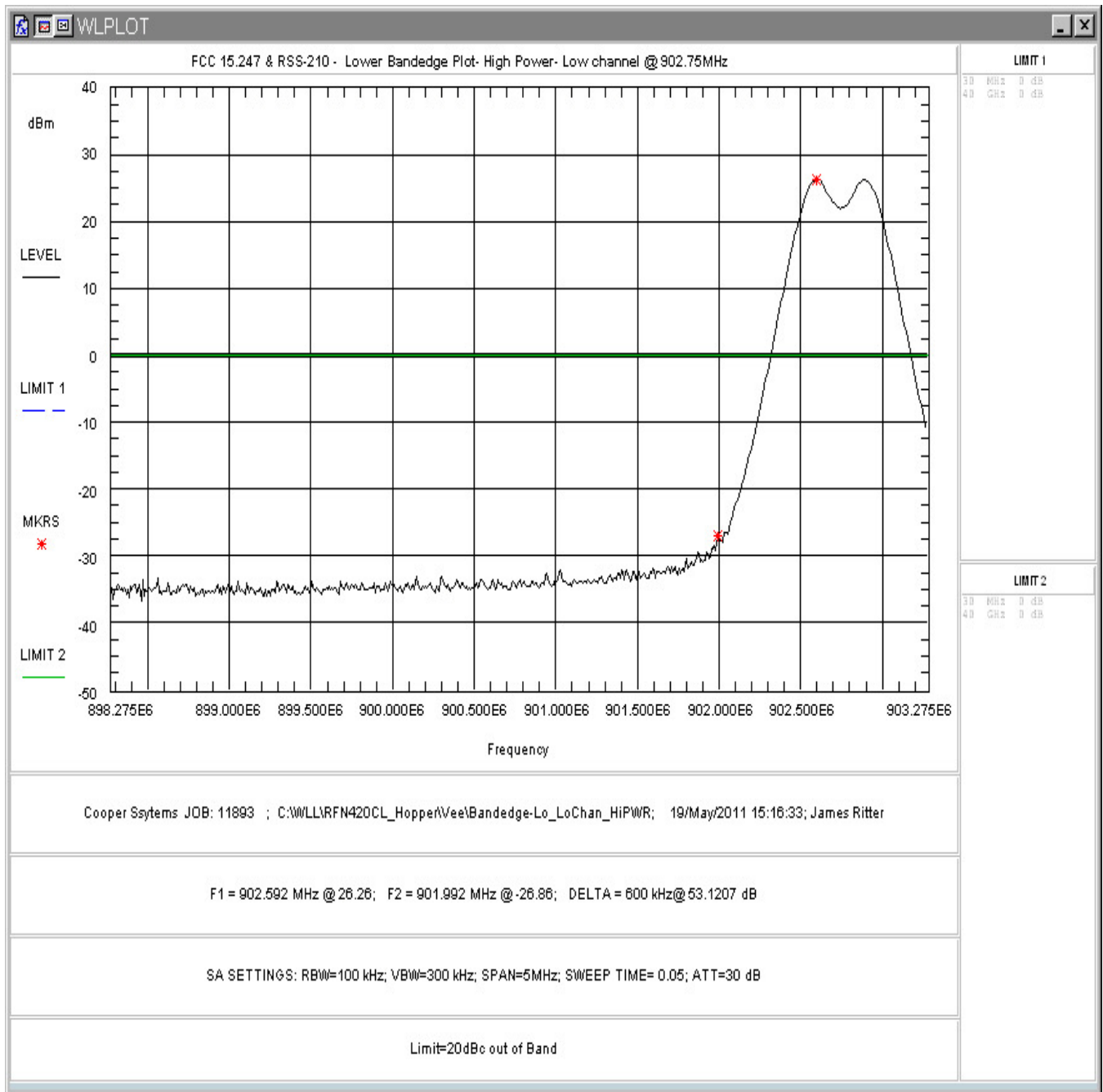
**Figure 37: Conducted Spurious Emissions, Low Power, High Channel 930-5000MHz**



**Figure 38: Conducted Spurious Emissions, Low Power, High Channel 5-9.5GHz**

### 5.5.1 Band Edge Compliance

In accordance with FCC Public Notice DA-00-705 close-up plots of the upper and lower channels in both hopping and non-hopping modes with respect to the nearest authorized band-edges are provided below. The tests were performed in the same manner as the above conducted spurious emissions tests.



**Figure 39: Lower Band-edge, Low Channel, High Power**

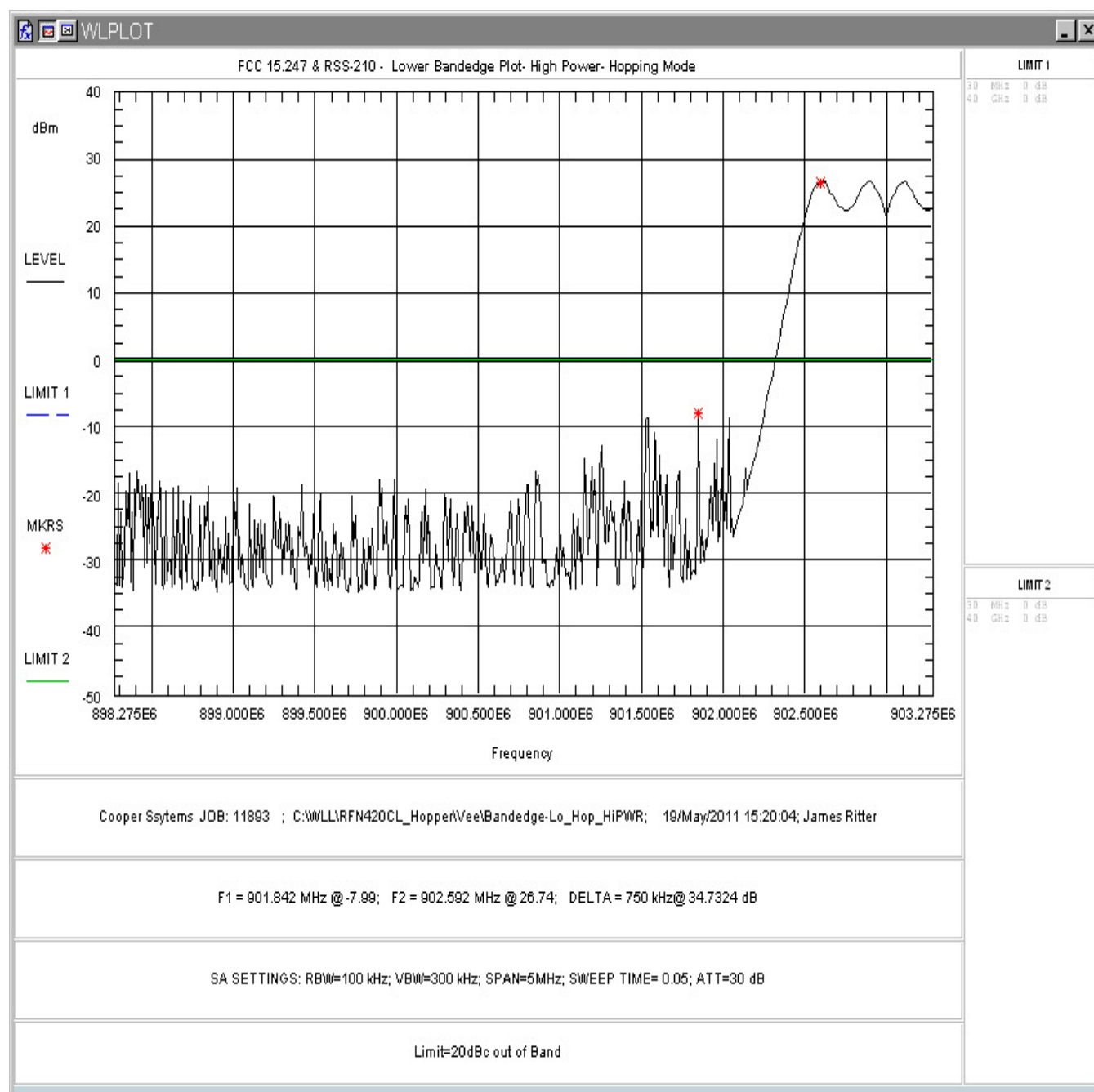
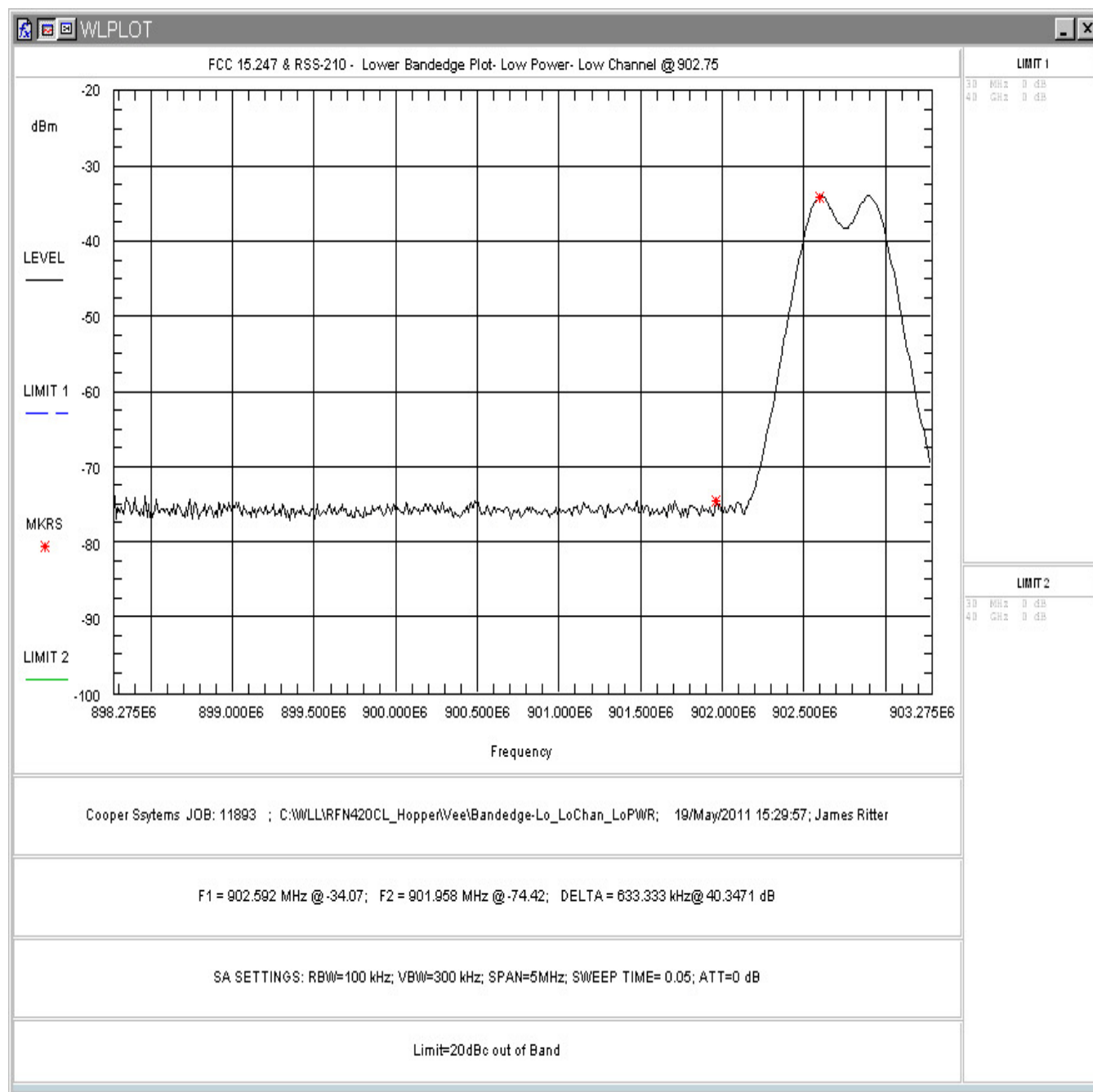
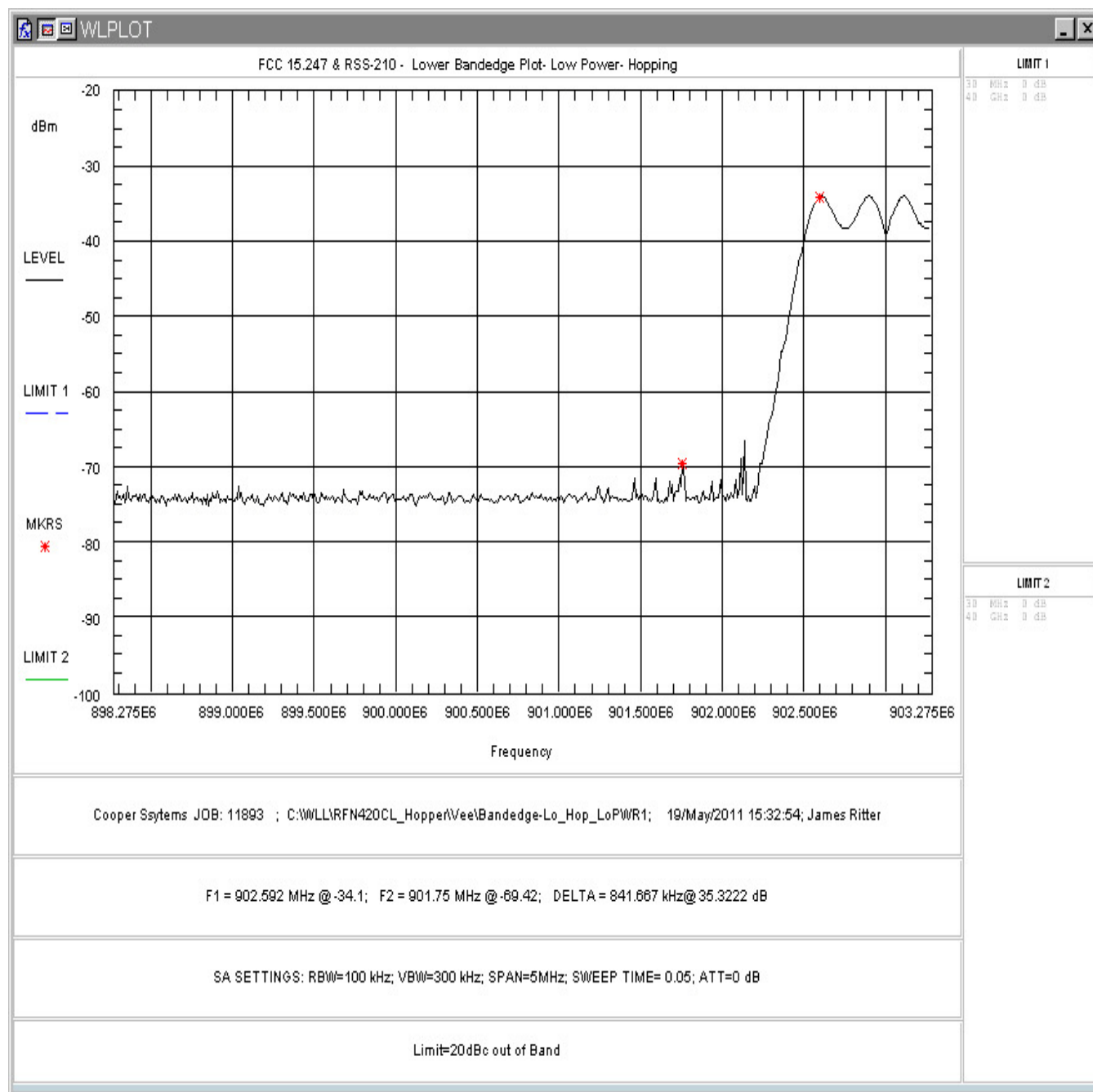


Figure 40: Lower Band-edge, Hopping Mode, High Power



**Figure 41: Lower Band-edge, Low Channel, Low Power**



**Figure 42: Lower Band-edge, Hopping Mode, Low Power**

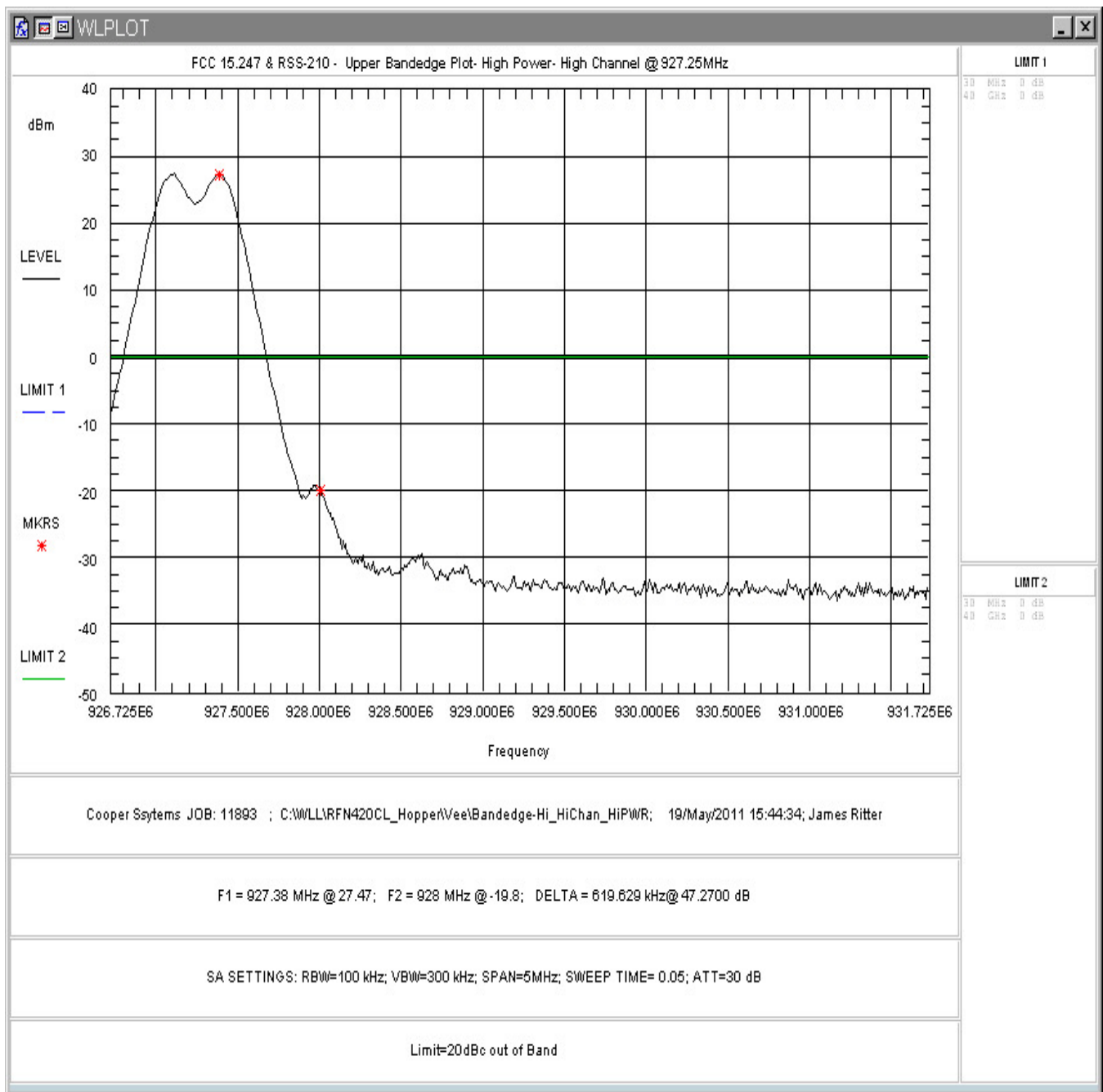


Figure 43: Upper Band-edge, High Channel, High Power

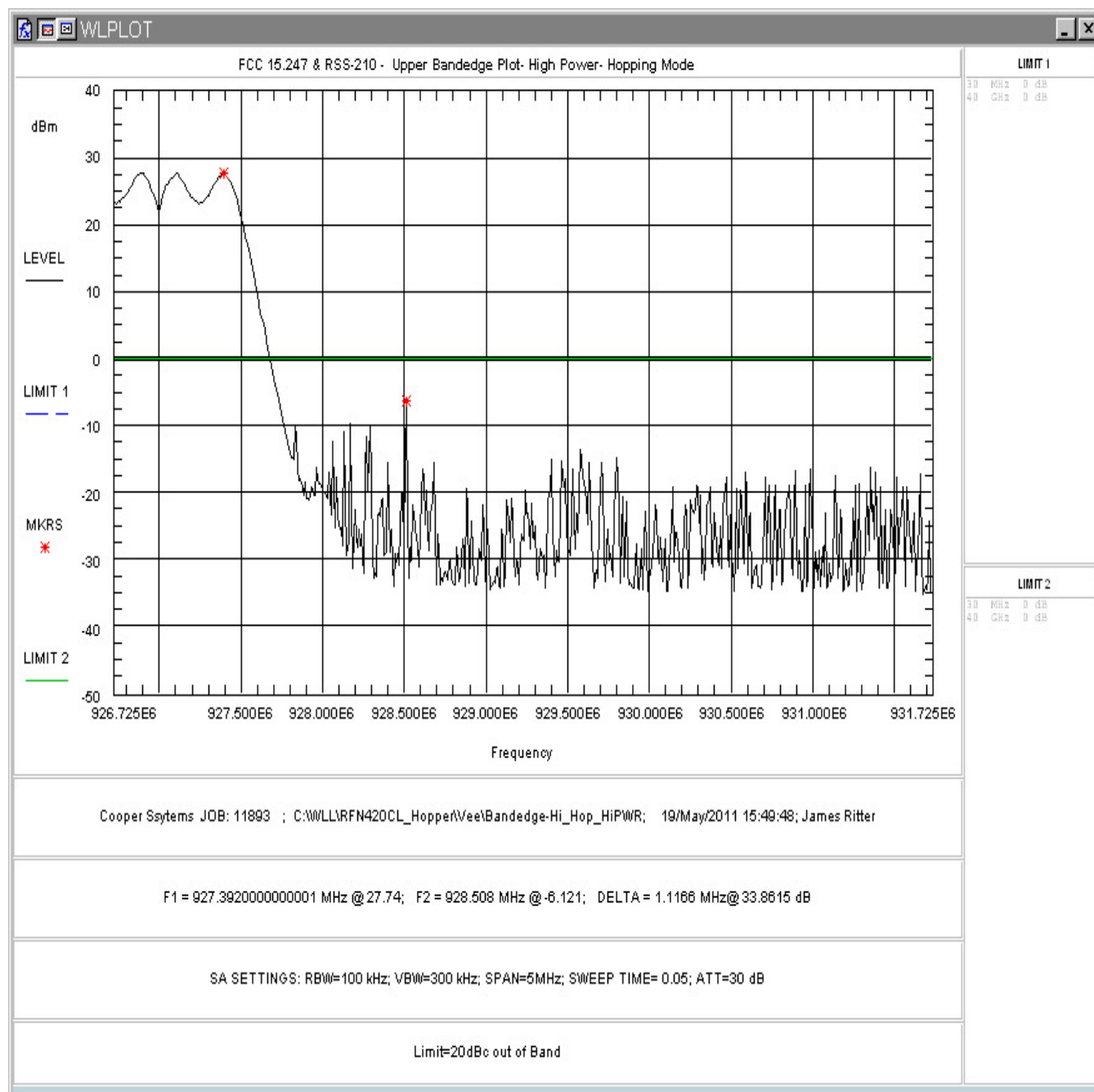


Figure 44: Upper Band-edge, Hopping Mode, High Power

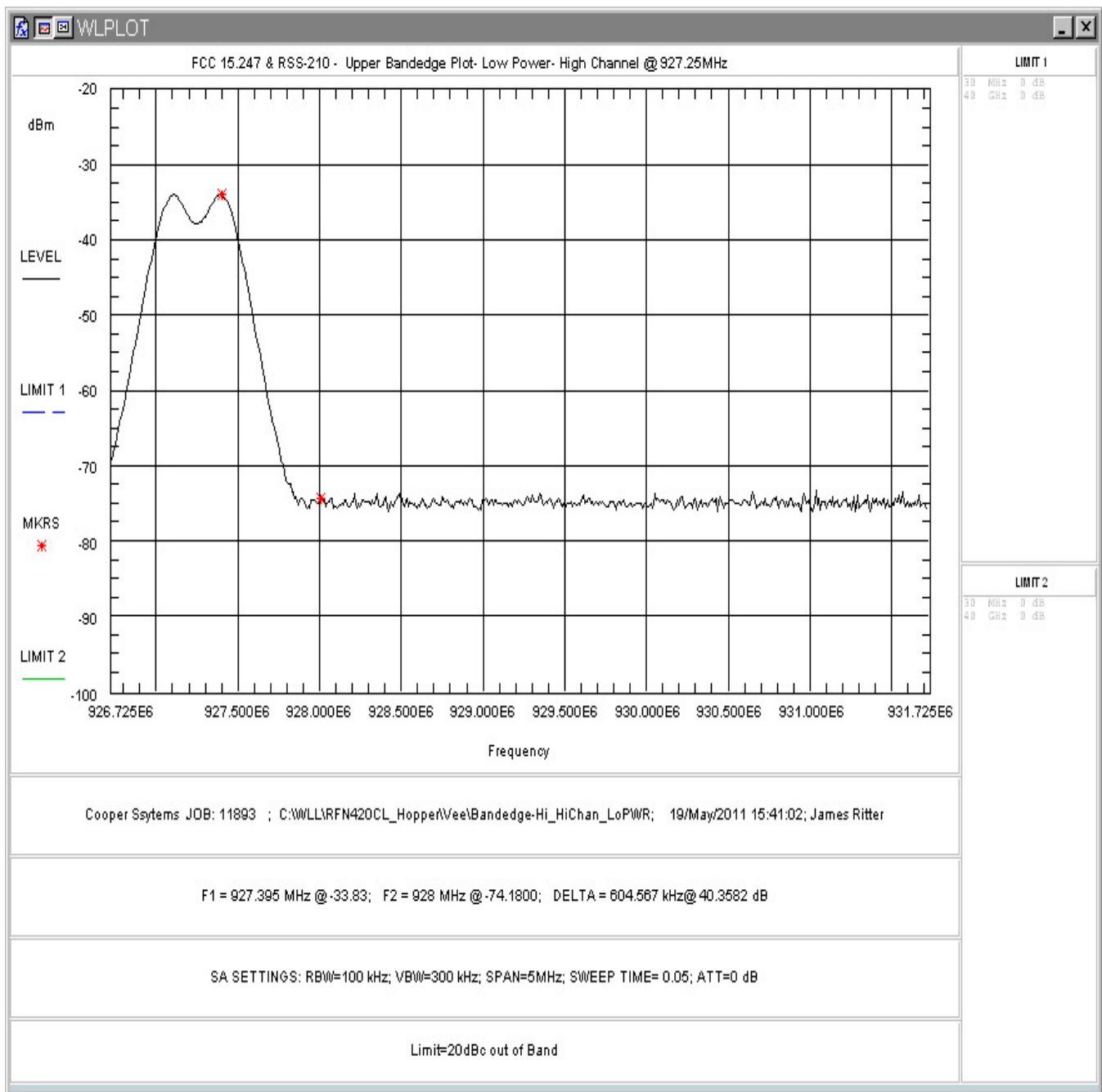


Figure 45: Upper Band-edge, High Channel, Low Power

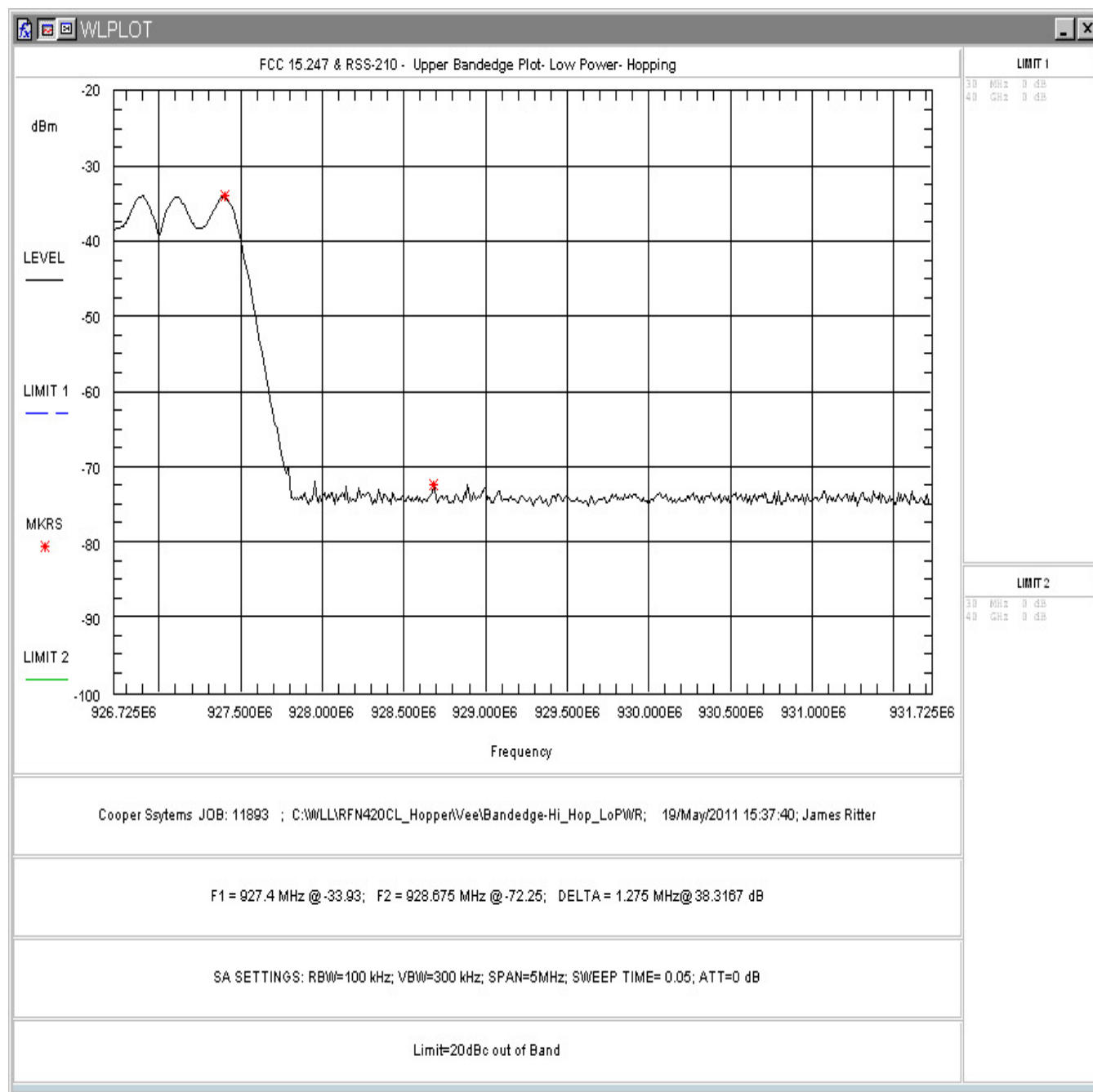


Figure 46: Upper Band-edge, Hopping Mode, Low Power

## 5.6 Radiated Spurious Emissions: (FCC Part §2.1053)

The EUT must comply with the requirements for radiated spurious emissions that fall within the restricted bands. These emissions must meet the limits specified in §15.209 and §15.35(b) for peak measurements.

### 5.6.1 Test Procedure

The EUT was placed on motorized turntable for radiated testing on a 3-meter open field test site. The emissions from the EUT were measured continuously at every azimuth by rotating the turntable. Receiving antennas were mounted on an antenna mast to determine the height of maximum emissions. The height of the antenna was varied between 1 and 4 meters. The peripherals were placed on the table in accordance with ANSI C63.4-2003. Cables were varied in position to produce maximum emissions. Both the horizontal and vertical field components were measured.

The emissions were measured using the following resolution bandwidths:

**Table 9: Spectrum Analyzer Settings**

| Frequency Range | Resolution Bandwidth | Video Bandwidth            |
|-----------------|----------------------|----------------------------|
| 30MHz-1000 MHz  | 120kHz               | >100 kHz                   |
| >1000 MHz       | 1 MHz                | <10 Hz (Avg.), 1MHz (Peak) |

**Table 10: Radiated Emission Test Data < 1GHz  
(Restricted Bands-covers all 3 antenna configurations)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|
| 73.77           | V            | 0.00             | 1.00            | 9.60            | 11.3              | 11.1               | 100.0        | -19.1       |
| 109.13          | V            | 95.00            | 1.00            | 8.40            | 14.6              | 14.1               | 150.0        | -20.6       |
| 112.90          | V            | 95.00            | 1.00            | 9.40            | 14.9              | 16.4               | 150.0        | -19.2       |
| 164.25          | V            | 45.00            | 1.00            | 10.40           | 14.6              | 17.9               | 150.0        | -18.5       |
| 171.86          | V            | 125.00           | 2.15            | 13.70           | 14.0              | 24.4               | 150.0        | -15.8       |
| 254.67          | V            | 265.00           | 2.04            | 20.30           | 14.3              | 53.9               | 200.0        | -11.4       |
| 326.24          | V            | 270.00           | 1.54            | 12.40           | 17.2              | 30.2               | 200.0        | -16.4       |
| 966.90          | V            | 0.00             | 1.23            | 10.80           | 27.9              | 86.0               | 500.0        | -15.3       |
|                 | V            |                  |                 |                 |                   |                    |              |             |
| 73.75           | H            | 180.00           | 4.00            | 12.70           | 11.3              | 15.9               | 100.0        | -16.0       |
| 75.00           | H            | 180.00           | 4.00            | 12.10           | 11.5              | 15.2               | 100.0        | -16.4       |
| 117.02          | H            | 185.00           | 4.00            | 15.90           | 15.3              | 36.4               | 150.0        | -12.3       |
| 132.00          | H            | 300.00           | 4.00            | 9.40            | 15.8              | 18.1               | 150.0        | -18.4       |
| 164.27          | H            | 90.00            | 3.50            | 17.00           | 14.6              | 38.2               | 150.0        | -11.9       |
| 169.17          | H            | 125.00           | 2.83            | 13.90           | 14.4              | 26.1               | 150.0        | -15.2       |
| 244.82          | H            | 265.00           | 1.95            | 19.50           | 14.2              | 48.4               | 200.0        | -12.3       |
| 323.47          | H            | 125.00           | 1.78            | 13.30           | 17.2              | 33.5               | 200.0        | -15.5       |
| 240.00          | H            | 350.00           | 3.00            | 19.20           | 14.1              | 46.2               | 200.0        | -12.7       |

Same for all channels

**Table 11: Radiated Emission Test Data >1GHz, Low Channel  
(8dbi –Omni directional Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2708.30         | V            | 190.00           | 2.20            | 47.30           | -0.9              | 208.8              | 5000.0       | -27.6       | Peak     |
| 3611.00         | V            | 0.00             | 2.20            | 42.00           | 1.3               | 146.9              | 5000.0       | -30.6       | Peak     |
| 4513.80         | V            | 0.00             | 2.20            | 41.30           | 2.3               | 151.0              | 5000.0       | -30.4       | Peak     |
| 5416.50         | V            | 270.00           | 2.20            | 43.80           | 2.7               | 211.5              | 5000.0       | -27.5       | Peak     |
| 8124.80         | V            | 85.00            | 2.10            | 44.83           | 2.4               | 230.1              | 5000.0       | -26.7       | Peak     |
| 9027.50         | V            | 185.00           | 2.10            | 42.67           | 3.0               | 192.3              | 5000.0       | -28.3       | Peak     |
| 2708.30         | V            | 190.00           | 2.20            | 38.00           | -0.9              | 71.6               | 500.0        | -16.9       | Average  |
| 3611.00         | V            | 0.00             | 2.20            | 31.20           | 1.3               | 42.4               | 500.0        | -21.4       | Average  |
| 4513.80         | V            | 0.00             | 2.20            | 30.50           | 2.3               | 43.6               | 500.0        | -21.2       | Average  |
| 5416.50         | V            | 270.00           | 2.20            | 30.50           | 2.7               | 45.7               | 500.0        | -20.8       | Average  |
| 8124.80         | V            | 85.00            | 2.10            | 31.20           | 2.4               | 47.9               | 500.0        | -20.4       | Average  |
| 9027.50         | V            | 185.00           | 2.10            | 31.20           | 3.0               | 51.3               | 500.0        | -19.8       | Average  |
| 2708.30         | H            | 275.00           | 3.30            | 46.50           | -0.9              | 190.4              | 5000.0       | -28.4       | Peak     |
| 3611.00         | H            | 0.00             | 3.35            | 44.67           | 1.3               | 199.7              | 5000.0       | -28.0       | Peak     |
| 4513.80         | H            | 350.00           | 3.35            | 43.00           | 2.3               | 183.7              | 5000.0       | -28.7       | Peak     |
| 5416.50         | H            | 180.00           | 3.30            | 42.67           | 2.7               | 185.7              | 5000.0       | -28.6       | Peak     |
| 8124.80         | H            | 0.00             | 3.30            | 42.30           | 2.4               | 171.9              | 5000.0       | -29.3       | Peak     |
| 9027.50         | H            | 0.00             | 3.30            | 42.00           | 3.0               | 178.0              | 5000.0       | -29.0       | Peak     |
| 2708.30         | H            | 275.00           | 3.30            | 36.50           | -0.9              | 60.2               | 500.0        | -18.4       | Average  |
| 3611.00         | H            | 0.00             | 3.35            | 31.70           | 1.3               | 44.9               | 500.0        | -20.9       | Average  |
| 4513.80         | H            | 350.00           | 3.35            | 30.80           | 2.3               | 45.1               | 500.0        | -20.9       | Average  |
| 5416.50         | H            | 180.00           | 3.30            | 30.30           | 2.7               | 44.7               | 500.0        | -21.0       | Average  |
| 8124.80         | H            | 0.00             | 3.30            | 30.80           | 2.4               | 45.7               | 500.0        | -20.8       | Average  |
| 9027.50         | H            | 0.00             | 3.30            | 31.00           | 3.0               | 50.2               | 500.0        | -20.0       | Average  |

**Table 12: Radiated Emission Test Data >1GHz, Low Channel  
(3dbi –Phantom Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2708.25         | V            | 125.00           | 1.92            | 49.67           | -2.2              | 236.9              | 5000.0       | -26.5       | Peak     |
| 3611.00         | V            | 95.00            | 1.90            | 44.20           | -0.3              | 156.7              | 5000.0       | -30.1       | Peak     |
| 4513.75         | V            | 185.00           | 1.85            | 42.50           | 0.6               | 143.4              | 5000.0       | -30.9       | Peak     |
| 5416.50         | V            | 180.00           | 1.85            | 43.10           | 0.7               | 155.3              | 5000.0       | -30.2       | Peak     |
| 8124.75         | V            | 270.00           | 1.80            | 43.00           | 0.2               | 144.4              | 5000.0       | -30.8       | Peak     |
| 9027.50         | V            | 185.00           | 1.80            | 42.60           | 0.8               | 147.5              | 5000.0       | -30.6       | Peak     |
| 2708.25         | V            | 125.00           | 1.92            | 41.70           | -2.2              | 94.6               | 500.0        | -14.5       | Average  |
| 3611.00         | V            | 95.00            | 1.90            | 30.80           | -0.3              | 33.5               | 500.0        | -23.5       | Average  |
| 4513.75         | V            | 185.00           | 1.85            | 28.40           | 0.6               | 28.3               | 500.0        | -25.0       | Average  |
| 5416.50         | V            | 180.00           | 1.85            | 30.00           | 0.7               | 34.4               | 500.0        | -23.3       | Average  |
| 8124.75         | V            | 270.00           | 1.80            | 30.20           | 0.2               | 33.1               | 500.0        | -23.6       | Average  |
| 9027.50         | V            | 185.00           | 1.80            | 29.80           | 0.8               | 33.8               | 500.0        | -23.4       | Average  |
| 2708.25         | H            | 90.00            | 1.98            | 50.00           | -2.2              | 246.1              | 5000.0       | -26.2       | Peak     |
| 3611.00         | H            | 95.00            | 1.95            | 43.70           | -0.3              | 147.9              | 5000.0       | -30.6       | Peak     |
| 4513.75         | H            | 265.00           | 1.85            | 42.80           | 0.6               | 148.4              | 5000.0       | -30.6       | Peak     |
| 5416.50         | H            | 346.00           | 1.80            | 43.50           | 0.7               | 162.7              | 5000.0       | -29.8       | Peak     |
| 8124.75         | H            | 270.00           | 1.75            | 43.10           | 0.2               | 146.1              | 5000.0       | -30.7       | Peak     |
| 9027.50         | H            | 275.00           | 1.70            | 44.20           | 0.8               | 177.3              | 5000.0       | -29.0       | Peak     |
| 2708.25         | H            | 90.00            | 1.98            | 43.50           | -2.2              | 116.4              | 500.0        | -12.7       | Average  |
| 3611.00         | H            | 95.00            | 1.95            | 31.80           | -0.3              | 37.6               | 500.0        | -22.5       | Average  |
| 4513.75         | H            | 275.00           | 2.23            | 29.70           | 0.6               | 32.8               | 500.0        | -23.7       | Average  |
| 5416.50         | H            | 345.00           | 2.20            | 29.40           | 0.7               | 32.1               | 500.0        | -23.9       | Average  |
| 8124.75         | H            | 270.00           | 2.21            | 28.90           | 0.2               | 28.5               | 500.0        | -24.9       | Average  |
| 9027.50         | H            | 275.00           | 1.70            | 29.60           | 0.8               | 33.0               | 500.0        | -23.6       | Average  |

**Table 13: Radiated Emission Test Data >1GHz, Low Channel  
(2dbi –Co-Linear Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2708.25         | V            | 270.00           | 1.53            | 47.80           | -2.2              | 191.0              | 5000.0       | -28.4       | Peak     |
| 3611.00         | V            | 0.00             | 1.63            | 41.50           | -0.3              | 114.8              | 5000.0       | -32.8       | Peak     |
| 4513.75         | V            | 185.00           | 1.62            | 41.33           | 0.6               | 125.3              | 5000.0       | -32.0       | Peak     |
| 5416.50         | V            | 276.00           | 1.65            | 43.00           | 0.7               | 153.6              | 5000.0       | -30.3       | Peak     |
| 8124.75         | V            | 90.00            | 1.90            | 42.17           | 0.2               | 131.2              | 5000.0       | -31.6       | Peak     |
| 9027.50         | V            | 45.00            | 2.00            | 43.17           | 0.8               | 157.5              | 5000.0       | -30.0       | Peak     |
| 2708.25         | V            | 270.00           | 1.53            | 37.68           | -2.2              | 59.6               | 500.0        | -18.5       | Average  |
| 3611.00         | V            | 0.00             | 1.63            | 29.67           | -0.3              | 29.4               | 500.0        | -24.6       | Average  |
| 4513.75         | V            | 185.00           | 1.62            | 28.33           | 0.6               | 28.1               | 500.0        | -25.0       | Average  |
| 5416.50         | V            | 276.00           | 1.65            | 29.50           | 0.7               | 32.5               | 500.0        | -23.8       | Average  |
| 8124.75         | V            | 90.00            | 1.90            | 28.67           | 0.2               | 27.7               | 500.0        | -25.1       | Average  |
| 9027.50         | V            | 45.00            | 2.00            | 28.60           | 0.8               | 29.4               | 500.0        | -24.6       | Average  |
| 2708.25         | H            | 2.45             | 0.00            | 46.80           | -2.2              | 170.3              | 5000.0       | -29.4       | Peak     |
| 3611.00         | H            | 2.88             | 175.00          | 43.80           | -0.3              | 149.7              | 5000.0       | -30.5       | Peak     |
| 4513.75         | H            | 220.00           | 325.00          | 42.80           | 0.6               | 148.4              | 5000.0       | -30.6       | Peak     |
| 5416.50         | H            | 125.00           | 3.20            | 43.30           | 0.7               | 159.0              | 5000.0       | -30.0       | Peak     |
| 8124.75         | H            | 200.00           | 3.50            | 42.80           | 0.2               | 141.1              | 5000.0       | -31.0       | Peak     |
| 9027.50         | H            | 180.00           | 3.41            | 43.50           | 0.8               | 163.5              | 5000.0       | -29.7       | Peak     |
| 2708.25         | H            | 2.45             | 0.00            | 35.50           | -2.2              | 46.4               | 500.0        | -20.7       | Average  |
| 3611.00         | H            | 2.88             | 175.00          | 30.67           | -0.3              | 33.0               | 500.0        | -23.6       | Average  |
| 4513.75         | H            | 220.00           | 325.00          | 28.50           | 0.6               | 28.6               | 500.0        | -24.9       | Average  |
| 5416.50         | H            | 125.00           | 3.20            | 29.50           | 0.7               | 32.5               | 500.0        | -23.8       | Average  |
| 8124.75         | H            | 200.00           | 3.50            | 28.80           | 0.2               | 28.2               | 500.0        | -25.0       | Average  |
| 9027.50         | H            | 180.00           | 3.41            | 28.67           | 0.8               | 29.7               | 500.0        | -24.5       | Average  |

**Table 14: Radiated Emission Test Data >1GHz, Center Channel  
(8dbi –Omni directional Antenna)**

| Frequency<br>(MHz) | Polarity<br>H/V | Azimuth<br>(Degree) | Ant. Height<br>(m) | SA Level<br>(dBuV) | Corr<br>Factors<br>(dB) | Corr. Level<br>(uV/m) | Limit<br>(uV/m) | Margin<br>(dB) | Comments |
|--------------------|-----------------|---------------------|--------------------|--------------------|-------------------------|-----------------------|-----------------|----------------|----------|
| 2744.25            | V               | 250.00              | 2.40               | 52.20              | -1.1                    | 359.8                 | 5000.0          | -22.9          | Peak     |
| 3659.00            | V               | 90.00               | 2.35               | 42.80              | 1.2                     | 159.1                 | 5000.0          | -29.9          | Peak     |
| 4573.80            | V               | 270.00              | 2.35               | 43.00              | 2.2                     | 182.9                 | 5000.0          | -28.7          | Peak     |
| 7318.00            | V               | 125.00              | 2.40               | 42.67              | 2.2                     | 175.0                 | 5000.0          | -29.1          | Peak     |
| 8232.80            | V               | 0.00                | 2.41               | 42.50              | 2.7                     | 182.1                 | 5000.0          | -28.8          | Peak     |
| 9147.50            | V               | 260.00              | 2.41               | 43.83              | 3.5                     | 231.5                 | 5000.0          | -26.7          | Peak     |
| 2744.25            | V               | 250.00              | 2.40               | 46.50              | -1.1                    | 186.7                 | 500.0           | -8.6           | Average  |
| 3659.00            | V               | 90.00               | 2.35               | 31.70              | 1.2                     | 44.3                  | 500.0           | -21.0          | Average  |
| 4573.80            | V               | 270.00              | 2.35               | 31.00              | 2.2                     | 45.9                  | 500.0           | -20.7          | Average  |
| 7318.00            | V               | 125.00              | 2.40               | 31.00              | 2.2                     | 45.7                  | 500.0           | -20.8          | Average  |
| 8232.80            | V               | 0.00                | 2.41               | 31.20              | 2.7                     | 49.6                  | 500.0           | -20.1          | Average  |
| 9147.50            | V               | 260.00              | 2.41               | 31.20              | 3.5                     | 54.1                  | 500.0           | -19.3          | Average  |
| 2744.25            | H               | 350.00              | 3.31               | 49.50              | -1.1                    | 263.7                 | 5000.0          | -25.6          | Peak     |
| 3659.00            | H               | 180.00              | 3.30               | 42.50              | 1.2                     | 153.7                 | 5000.0          | -30.2          | Peak     |
| 4573.80            | H               | 265.00              | 3.30               | 42.50              | 2.2                     | 172.6                 | 5000.0          | -29.2          | Peak     |
| 7318.00            | H               | 270.00              | 3.35               | 42.80              | 2.2                     | 177.7                 | 5000.0          | -29.0          | Peak     |
| 8232.80            | H               | 90.00               | 3.30               | 43.33              | 2.7                     | 200.3                 | 5000.0          | -27.9          | Peak     |
| 9147.50            | H               | 125.00              | 3.31               | 43.30              | 3.5                     | 217.8                 | 5000.0          | -27.2          | Peak     |
| 2744.25            | H               | 350.00              | 3.31               | 41.00              | -1.1                    | 99.1                  | 500.0           | -14.1          | Average  |
| 3659.00            | H               | 180.00              | 3.30               | 31.67              | 1.2                     | 44.2                  | 500.0           | -21.1          | Average  |
| 4573.80            | H               | 265.00              | 3.30               | 30.90              | 2.2                     | 45.4                  | 500.0           | -20.8          | Average  |
| 7318.00            | H               | 270.00              | 3.35               | 31.00              | 2.2                     | 45.7                  | 500.0           | -20.8          | Average  |
| 8232.80            | H               | 90.00               | 3.30               | 31.20              | 2.7                     | 49.6                  | 500.0           | -20.1          | Average  |
| 9147.50            | H               | 125.00              | 3.31               | 31.00              | 3.5                     | 52.8                  | 500.0           | -19.5          | Average  |

**Table 15: Radiated Emission Test Data >1GHz, Center Channel  
(3dbi –Phantom Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2744.25         | V            | 125.00           | 2.98            | 51.67           | -2.2              | 297.9              | 5000.0       | -24.5       | Peak     |
| 3659.00         | V            | 120.00           | 2.90            | 44.50           | -0.4              | 161.2              | 5000.0       | -29.8       | Peak     |
| 4573.75         | V            | 185.00           | 2.80            | 43.00           | 0.6               | 151.6              | 5000.0       | -30.4       | Peak     |
| 8232.75         | V            | 0.00             | 2.80            | 43.00           | 0.3               | 147.0              | 5000.0       | -30.6       | Peak     |
| 9147.50         | V            | 180.00           | 2.65            | 42.20           | 0.9               | 142.2              | 5000.0       | -30.9       | Peak     |
| 2744.25         | V            | 125.00           | 2.98            | 46.70           | -2.2              | 168.1              | 500.0        | -9.5        | Average  |
| 3659.00         | V            | 120.00           | 2.90            | 32.50           | -0.4              | 40.5               | 500.0        | -21.8       | Average  |
| 4573.75         | V            | 185.00           | 2.80            | 28.80           | 0.6               | 29.6               | 500.0        | -24.6       | Average  |
| 8232.75         | V            | 0.00             | 2.80            | 29.70           | 0.3               | 31.8               | 500.0        | -23.9       | Average  |
| 9147.50         | V            | 180.00           | 2.65            | 29.20           | 0.9               | 31.8               | 500.0        | -23.9       | Average  |
| 2744.25         | H            | 90.00            | 2.26            | 49.50           | -2.2              | 232.1              | 5000.0       | -26.7       | Peak     |
| 3659.00         | H            | 90.00            | 2.35            | 44.50           | -0.4              | 161.2              | 5000.0       | -29.8       | Peak     |
| 4573.75         | H            | 275.00           | 2.23            | 43.83           | 0.6               | 166.8              | 5000.0       | -29.5       | Peak     |
| 8232.75         | H            | 345.00           | 2.20            | 43.20           | 0.3               | 150.4              | 5000.0       | -30.4       | Peak     |
| 9147.50         | H            | 270.00           | 2.21            | 42.30           | 0.9               | 143.8              | 5000.0       | -30.8       | Peak     |
| 2744.25         | H            | 90.00            | 2.26            | 44.50           | -2.2              | 130.5              | 500.0        | -11.7       | Average  |
| 3659.00         | H            | 90.00            | 2.35            | 31.00           | -0.4              | 34.1               | 500.0        | -23.3       | Average  |
| 4573.75         | H            | 275.00           | 2.23            | 29.67           | 0.6               | 32.7               | 500.0        | -23.7       | Average  |
| 8232.75         | H            | 345.00           | 2.20            | 29.50           | 0.3               | 31.1               | 500.0        | -24.1       | Average  |
| 9147.50         | H            | 270.00           | 2.21            | 29.30           | 0.9               | 32.2               | 500.0        | -23.8       | Average  |

**Table 16: Radiated Emission Test Data >1GHz, Center Channel  
(2dbi –Co-Linear Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2744.25         | V            | 85.00            | 3.10            | 52.60           | -2.2              | 331.6              | 5000.0       | -23.6       | Peak     |
| 3659.00         | V            | 180.00           | 2.96            | 44.20           | -0.4              | 155.7              | 5000.0       | -30.1       | Peak     |
| 4573.75         | V            | 49.00            | 2.55            | 41.80           | 0.6               | 132.0              | 5000.0       | -31.6       | Peak     |
| 8232.75         | V            | 275.00           | 1.80            | 43.30           | 0.3               | 152.1              | 5000.0       | -30.3       | Peak     |
| 9147.50         | V            | 90.00            | 1.81            | 47.00           | 0.9               | 247.0              | 5000.0       | -26.1       | Peak     |
| 2744.25         | V            | 85.00            | 3.10            | 47.50           | -2.2              | 184.3              | 500.0        | -8.7        | Average  |
| 3659.00         | V            | 180.00           | 2.96            | 30.30           | -0.4              | 31.4               | 500.0        | -24.0       | Average  |
| 4573.75         | V            | 49.00            | 2.55            | 28.80           | 0.6               | 29.6               | 500.0        | -24.6       | Average  |
| 8232.75         | V            | 275.00           | 1.80            | 29.30           | 0.3               | 30.4               | 500.0        | -24.3       | Average  |
| 9147.50         | V            | 90.00            | 1.81            | 29.50           | 0.9               | 32.9               | 500.0        | -23.6       | Average  |
| 2744.25         | H            | 200.00           | 2.50            | 46.20           | -2.2              | 158.7              | 5000.0       | -30.0       | Peak     |
| 3659.00         | H            | 125.00           | 2.50            | 42.00           | -0.4              | 120.9              | 5000.0       | -32.3       | Peak     |
| 4573.75         | H            | 45.00            | 2.56            | 39.83           | 0.6               | 105.2              | 5000.0       | -33.5       | Peak     |
| 8232.75         | H            | 0.00             | 2.56            | 41.50           | 0.3               | 123.7              | 5000.0       | -32.1       | Peak     |
| 9147.50         | H            | 180.00           | 2.73            | 43.00           | 0.9               | 155.9              | 5000.0       | -30.1       | Peak     |
| 2744.25         | H            | 200.00           | 2.50            | 31.20           | -2.2              | 28.2               | 500.0        | -25.0       | Average  |
| 3659.00         | H            | 125.00           | 2.50            | 30.30           | -0.4              | 31.4               | 500.0        | -24.0       | Average  |
| 4573.75         | H            | 45.00            | 2.56            | 28.20           | 0.6               | 27.6               | 500.0        | -25.2       | Average  |
| 8232.75         | H            | 0.00             | 2.56            | 29.67           | 0.3               | 31.7               | 500.0        | -24.0       | Average  |
| 9147.50         | H            | 180.00           | 2.73            | 29.80           | 0.9               | 34.1               | 500.0        | -23.3       | Average  |

**Table 17: Radiated Emission Test Data >1GHz, High Channel  
(8dbi –Omni directional Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2781.80         | V            | 90.00            | 3.30            | 47.70           | -1.3              | 210.0              | 5000.0       | -27.5       | Peak     |
| 3709.00         | V            | 275.00           | 3.30            | 44.30           | 1.1               | 187.0              | 5000.0       | -28.5       | Peak     |
| 4636.30         | V            | 15.00            | 3.35            | 45.30           | 2.3               | 238.8              | 5000.0       | -26.4       | Peak     |
| 7418.00         | V            | 300.00           | 3.30            | 44.00           | 1.7               | 193.7              | 5000.0       | -28.2       | Peak     |
| 8345.30         | V            | 280.00           | 3.30            | 44.50           | 3.2               | 243.3              | 5000.0       | -26.3       | Peak     |
| 2781.80         | V            | 90.00            | 3.30            | 37.20           | -1.3              | 62.7               | 500.0        | -18.0       | Average  |
| 3709.00         | V            | 275.00           | 3.30            | 32.70           | 1.1               | 49.2               | 500.0        | -20.1       | Average  |
| 4636.30         | V            | 15.00            | 3.35            | 32.30           | 2.3               | 53.5               | 500.0        | -19.4       | Average  |
| 7418.00         | V            | 300.00           | 3.30            | 33.20           | 1.7               | 55.9               | 500.0        | -19.0       | Average  |
| 8345.30         | V            | 280.00           | 3.30            | 33.50           | 3.2               | 68.6               | 500.0        | -17.3       | Average  |
| 2781.80         | H            | 280.00           | 3.10            | 46.83           | -1.3              | 190.0              | 5000.0       | -28.4       | Peak     |
| 3709.00         | H            | 0.00             | 3.10            | 44.30           | 1.1               | 187.0              | 5000.0       | -28.5       | Peak     |
| 4636.30         | H            | 200.00           | 3.20            | 44.80           | 2.3               | 225.5              | 5000.0       | -26.9       | Peak     |
| 7418.00         | H            | 125.00           | 3.10            | 45.30           | 1.7               | 225.0              | 5000.0       | -26.9       | Peak     |
| 8345.30         | H            | 260.00           | 3.10            | 44.80           | 3.2               | 251.9              | 5000.0       | -26.0       | Peak     |
| 2781.80         | H            | 280.00           | 3.10            | 35.20           | -1.3              | 49.8               | 500.0        | -20.0       | Average  |
| 3709.00         | H            | 0.00             | 3.10            | 32.70           | 1.1               | 49.2               | 500.0        | -20.1       | Average  |
| 4636.30         | H            | 200.00           | 3.20            | 32.30           | 2.3               | 53.5               | 500.0        | -19.4       | Average  |
| 7418.00         | H            | 125.00           | 3.10            | 33.20           | 1.7               | 55.9               | 500.0        | -19.0       | Average  |
| 8345.30         | H            | 260.00           | 3.10            | 33.30           | 3.2               | 67.0               | 500.0        | -17.5       | Average  |

**Table 18: Radiated Emission Test Data >1GHz, High Channel  
(3dbi –Phantom Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2781.75         | V            | 90.00            | 2.30            | 53.30           | -2.2              | 359.0              | 5000.0       | -22.9       | Peak     |
| 3709.00         | V            | 45.00            | 2.43            | 44.30           | -0.4              | 156.7              | 5000.0       | -30.1       | Peak     |
| 4636.25         | V            | 160.00           | 2.90            | 43.50           | 0.6               | 160.4              | 5000.0       | -29.9       | Peak     |
| 7418.00         | V            | 170.00           | 3.00            | 43.30           | 0.0               | 145.8              | 5000.0       | -30.7       | Peak     |
| 8345.25         | V            | 180.00           | 3.04            | 43.82           | 0.6               | 166.7              | 5000.0       | -29.5       | Peak     |
| 2781.75         | V            | 90.00            | 2.30            | 47.50           | -2.2              | 184.1              | 500.0        | -8.7        | Average  |
| 3709.00         | V            | 45.00            | 2.43            | 30.20           | -0.4              | 30.9               | 500.0        | -24.2       | Average  |
| 4636.25         | V            | 160.00           | 2.90            | 29.67           | 0.6               | 32.6               | 500.0        | -23.7       | Average  |
| 7418.00         | V            | 170.00           | 3.00            | 29.80           | 0.0               | 30.8               | 500.0        | -24.2       | Average  |
| 8345.25         | V            | 180.00           | 3.04            | 30.00           | 0.6               | 34.0               | 500.0        | -23.4       | Average  |
| 2781.75         | H            | 0.00             | 3.03            | 53.50           | -2.2              | 367.4              | 5000.0       | -22.7       | Peak     |
| 3709.00         | H            | 45.00            | 3.03            | 43.80           | -0.4              | 147.9              | 5000.0       | -30.6       | Peak     |
| 4636.25         | H            | 90.00            | 2.83            | 42.80           | 0.6               | 148.0              | 5000.0       | -30.6       | Peak     |
| 7418.00         | H            | 125.00           | 2.80            | 43.67           | 0.0               | 152.1              | 5000.0       | -30.3       | Peak     |
| 8345.25         | H            | 0.00             | 2.80            | 44.33           | 0.6               | 176.8              | 5000.0       | -29.0       | Peak     |
| 2781.75         | H            | 0.00             | 3.03            | 48.50           | -2.2              | 206.6              | 500.0        | -7.7        | Average  |
| 3709.00         | H            | 45.00            | 3.03            | 30.33           | -0.4              | 31.4               | 500.0        | -24.0       | Average  |
| 4636.25         | H            | 90.00            | 2.83            | 29.50           | 0.6               | 32.0               | 500.0        | -23.9       | Average  |
| 7418.00         | H            | 125.00           | 2.80            | 29.80           | 0.0               | 30.8               | 500.0        | -24.2       | Average  |
| 8345.25         | H            | 0.00             | 2.80            | 30.20           | 0.6               | 34.8               | 500.0        | -23.2       | Average  |

**Table 19: Radiated Emission Test Data >1GHz, High Channel  
(2dbi –Co-Linear Antenna)**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) | Comments |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|----------|
| 2781.75         | V            | 185.00           | 2.40            | 47.33           | -2.2              | 180.6              | 5000.0       | -28.8       | Peak     |
| 3709.00         | V            | 90.00            | 2.40            | 43.80           | -0.4              | 147.9              | 5000.0       | -30.6       | Peak     |
| 4636.25         | V            | 125.00           | 2.28            | 43.50           | 0.6               | 160.4              | 5000.0       | -29.9       | Peak     |
| 7418.00         | V            | 350.00           | 2.25            | 43.17           | 0.0               | 143.6              | 5000.0       | -30.8       | Peak     |
| 8345.25         | V            | 200.00           | 2.25            | 43.80           | 0.6               | 166.3              | 5000.0       | -29.6       | Peak     |
| 2781.75         | V            | 185.00           | 2.40            | 39.00           | -2.2              | 69.2               | 500.0        | -17.2       | Average  |
| 3709.00         | V            | 90.00            | 2.40            | 30.00           | -0.4              | 30.2               | 500.0        | -24.4       | Average  |
| 4636.25         | V            | 125.00           | 2.28            | 30.00           | 0.6               | 33.9               | 500.0        | -23.4       | Average  |
| 7418.00         | V            | 350.00           | 2.25            | 29.50           | 0.0               | 29.8               | 500.0        | -24.5       | Average  |
| 8345.25         | V            | 200.00           | 2.25            | 29.93           | 0.6               | 33.7               | 500.0        | -23.4       | Average  |
| 2781.75         | H            | 300.00           | 3.03            | 44.70           | -2.2              | 133.4              | 5000.0       | -31.5       | Peak     |
| 3709.00         | H            | 175.00           | 2.46            | 44.00           | -0.4              | 151.3              | 5000.0       | -30.4       | Peak     |
| 4636.25         | H            | 300.00           | 2.46            | 43.17           | 0.6               | 154.4              | 5000.0       | -30.2       | Peak     |
| 7418.00         | H            | 200.00           | 2.45            | 43.30           | 0.0               | 145.8              | 5000.0       | -30.7       | Peak     |
| 8345.25         | H            | 45.00            | 2.37            | 43.00           | 0.6               | 151.7              | 5000.0       | -30.4       | Peak     |
| 2781.75         | H            | 300.00           | 3.03            | 33.80           | -2.2              | 38.0               | 500.0        | -22.4       | Average  |
| 3709.00         | H            | 175.00           | 2.46            | 30.50           | -0.4              | 32.0               | 500.0        | -23.9       | Average  |
| 4636.25         | H            | 300.00           | 2.46            | 29.50           | 0.6               | 32.0               | 500.0        | -23.9       | Average  |
| 7418.00         | H            | 200.00           | 2.45            | 29.50           | 0.0               | 29.8               | 500.0        | -24.5       | Average  |
| 8345.25         | H            | 45.00            | 2.37            | 29.50           | 0.6               | 32.1               | 500.0        | -23.9       | Average  |

## 5.7 Receiver Radiated Spurious Emissions: (RSS-210 sect 2.6)

The EUT must comply with the requirements for radiated spurious emissions that fall within the restricted bands. These emissions must meet the limits specified in §15.209 and §15.35(b) for peak measurements.

### 5.7.1 Test Procedure

The EUT was placed on motorized turntable for radiated testing on a 3-meter open field test site. The emissions from the EUT were measured continuously at every azimuth by rotating the turntable. Receiving antennas were mounted on an antenna mast to determine the height of maximum emissions. The height of the antenna was varied between 1 and 4 meters. The peripherals were placed on the table in accordance with ANSI C63.4-2003. Cables were varied in position to produce maximum emissions. Both the horizontal and vertical field components were measured.

The emissions were measured using the following resolution bandwidths:

**Table 20: Spectrum Analyzer Settings**

| Frequency Range | Resolution Bandwidth | Video Bandwidth           |
|-----------------|----------------------|---------------------------|
| 30MHz-1000 MHz  | 120kHz               | >100 kHz                  |
| >1000 MHz       | 1 MHz                | 10 Hz (Avg.), 1MHz (Peak) |

**Table 21: Radiated Emission Test Data, Receiver**

| Frequency (MHz) | Polarity H/V | Azimuth (Degree) | Ant. Height (m) | SA Level (dBuV) | Corr Factors (dB) | Corr. Level (uV/m) | Limit (uV/m) | Margin (dB) |
|-----------------|--------------|------------------|-----------------|-----------------|-------------------|--------------------|--------------|-------------|
| 66.80           | V            | 180.00           | 1.00            | 22.20           | 11.1              | 46.1               | 100.0        | -6.7        |
| 73.77           | V            | 0.00             | 1.00            | 9.60            | 11.3              | 11.1               | 100.0        | -19.1       |
| 86.57           | V            | 165.00           | 1.00            | 16.10           | 10.6              | 21.7               | 100.0        | -13.3       |
| 109.13          | V            | 95.00            | 1.00            | 8.40            | 14.6              | 14.1               | 150.0        | -20.6       |
| 112.90          | V            | 95.00            | 1.00            | 9.40            | 14.9              | 16.4               | 150.0        | -19.2       |
| 164.25          | V            | 45.00            | 1.00            | 10.40           | 14.6              | 17.9               | 150.0        | -18.5       |
| 171.86          | V            | 125.00           | 2.15            | 13.70           | 14.0              | 24.4               | 150.0        | -15.8       |
| 184.48          | V            | 125.00           | 2.60            | 14.40           | 13.5              | 24.9               | 150.0        | -15.6       |
| 254.67          | V            | 265.00           | 2.04            | 20.30           | 14.3              | 53.9               | 200.0        | -11.4       |
| 326.24          | V            | 270.00           | 1.54            | 12.40           | 17.2              | 30.2               | 200.0        | -16.4       |
| 966.90          | V            | 0.00             | 1.23            | 10.80           | 27.9              | 86.0               | 500.0        | -15.3       |
| 56.14           | H            | 0.00             | 3.37            | 17.60           | 9.8               | 23.4               | 100.0        | -12.6       |
| 73.75           | H            | 180.00           | 4.00            | 12.70           | 11.3              | 15.9               | 100.0        | -16.0       |
| 75.00           | H            | 180.00           | 4.00            | 12.10           | 11.5              | 15.2               | 100.0        | -16.4       |
| 85.38           | H            | 120.00           | 3.58            | 12.60           | 10.5              | 14.2               | 100.0        | -16.9       |
| 117.02          | H            | 185.00           | 4.00            | 15.90           | 15.3              | 36.4               | 150.0        | -12.3       |
| 132.00          | H            | 300.00           | 4.00            | 9.40            | 15.8              | 18.1               | 150.0        | -18.4       |
| 164.27          | H            | 90.00            | 3.50            | 17.00           | 14.6              | 38.2               | 150.0        | -11.9       |
| 169.17          | H            | 125.00           | 2.83            | 13.90           | 14.4              | 26.1               | 150.0        | -15.2       |
| 184.80          | H            | 95.00            | 3.46            | 19.20           | 13.5              | 43.3               | 150.0        | -10.8       |
| 240.00          | H            | 350.00           | 3.00            | 19.20           | 14.1              | 46.2               | 200.0        | -12.7       |
| 244.82          | H            | 265.00           | 1.95            | 19.50           | 14.2              | 48.4               | 200.0        | -12.3       |
| 323.47          | H            | 125.00           | 1.78            | 13.30           | 17.2              | 33.5               | 200.0        | -15.5       |
| 399.00          | H            | 200.00           | 3.20            | 16.90           | 18.8              | 60.7               | 200.0        | -10.4       |

No frequencies noted above 1GHz

## 5.8 AC Conducted Emissions (FCC Part §15.207)

### 5.8.1 Requirements

Test Arrangement: Table Top

Compliance Standard: FCC Class B

| FCC Compliance Limits |                    |                    |
|-----------------------|--------------------|--------------------|
| Frequency             | Quasi-peak         | Average            |
| 0.15 - 0.5MHz         | 66 to 56dB $\mu$ V | 56 to 46dB $\mu$ V |
| 0.5 - 5MHz            | 56dB $\mu$ V       | 46dB $\mu$ V       |
| 5 - 30MHz             | 60dB $\mu$ V       | 50dB $\mu$ V       |

### 5.8.2 Test Procedure

The EUT was placed on an 80 cm high 1 X 1.5 m non-conductive table above a ground plane. Power to the EUT was provided through a Solar Corporation 50  $\Omega$ /50  $\mu$ H Line Impedance Stabilization Network bonded to a 3 X 2 meter ground plane. The LISN has its AC input supplied from a filtered AC power source. Power was supplied to the peripherals through a second LISN. The peripherals were placed on the table in accordance with ANSI C63.4-2003. Power and data cables were moved about to obtain maximum emissions.

The 50  $\Omega$  output of the LISN was connected to the input of the spectrum analyzer and the emissions in the frequency range of 150 kHz to 30 MHz were measured. The detector function was set to quasi-peak, peak, or average as appropriate, and the resolution bandwidth during testing was at least 9 kHz, with all post-detector filtering no less than 10 times the resolution bandwidth. For average measurements the post-detector filter was set to 10 Hz.

At frequencies where quasi-peak or peak measurements comply with the average limit, no average measurements need be performed.

At frequencies where quasi-peak or peak measurements comply with the average limit, no average measurements need be performed. The Conducted emissions level to be compared to the FCC limit is calculated as shown in the following example.

Example:

Spectrum Analyzer Voltage: VdB $\mu$ V

LISN Correction Factor: LISN dB

Cable Correction Factor: CF dB

Electric Field: EdB $\mu$ V = V dB $\mu$ V + LISN dB + CF dB

### 5.8.3 Test Data

The EUT complied with the Class B Conducted Emissions requirements. This system runs off of 120VAC or 230VAC. The following tables provide the test results for phase and neutral line power line conducted emissions.

Conducted Emissions was tested with both the 915MHz radio and the Zigbee radio in the “transmit on” state.

**Table 22: Conducted Emissions Data 120VAC, Transmit On**

#### 120 VAC NEUTRAL

| Frequency (MHz) | Level QP (dBμV) | Level AVG (dBμV) | Cable Loss (dB) | LISN Corr (dB) | Level QP Corr (dBμV) | Level Corr Avg (dBμV) | Limit QP (dBμV) | Limit AVG (dBμV) | Margin QP (dB) | Margin AVG (dB) |
|-----------------|-----------------|------------------|-----------------|----------------|----------------------|-----------------------|-----------------|------------------|----------------|-----------------|
| 0.192           | 28.9            | 9.8              | 10.3            | 0.4            | 39.6                 | 20.5                  | 63.9            | 53.9             | -24.4          | -33.5           |
| 0.275           | 23.0            | 9.5              | 10.2            | 0.5            | 33.7                 | 20.2                  | 61.0            | 51.0             | -27.2          | -30.7           |
| 0.476           | 27.1            | 10.3             | 10.2            | 0.4            | 37.7                 | 20.9                  | 56.4            | 46.4             | -18.7          | -25.5           |
| 0.967           | 20.4            | 6.9              | 10.4            | 0.4            | 31.1                 | 17.6                  | 56.0            | 46.0             | -24.9          | -28.4           |
| 1.585           | 18.8            | 6.9              | 10.5            | 0.4            | 29.7                 | 17.8                  | 56.0            | 46.0             | -26.3          | -28.2           |
| 11.353          | 24.4            | 13.5             | 11.1            | 0.8            | 36.3                 | 25.4                  | 60.0            | 50.0             | -23.7          | -24.6           |

#### 120 VAC PHASE

| Frequency (MHz) | Level QP (dBμV) | Level AVG (dBμV) | Cable Loss (dB) | LISN Corr (dB) | Level QP Corr (dBμV) | Level Corr Avg (dBμV) | Limit QP (dBμV) | Limit AVG (dBμV) | Margin QP (dB) | Margin AVG (dB) |
|-----------------|-----------------|------------------|-----------------|----------------|----------------------|-----------------------|-----------------|------------------|----------------|-----------------|
| 0.192           | 29.9            | 18.2             | 10.3            | 0.7            | 40.9                 | 29.2                  | 63.9            | 53.9             | -23.0          | -24.7           |
| 0.275           | 30.0            | 20.1             | 10.2            | 0.6            | 40.8                 | 30.9                  | 61.0            | 51.0             | -20.1          | -20.0           |
| 0.476           | 38.3            | 26.5             | 10.2            | 0.4            | 48.9                 | 37.1                  | 56.4            | 46.4             | -7.5           | -9.3            |
| 0.967           | 33.1            | 19.4             | 10.4            | 0.4            | 43.8                 | 30.1                  | 56.0            | 46.0             | -12.2          | -15.9           |
| 1.585           | 30.4            | 16.8             | 10.5            | 0.4            | 41.3                 | 27.7                  | 56.0            | 46.0             | -14.7          | -18.3           |
| 11.760          | 24.1            | 13.3             | 11.1            | 1.4            | 36.6                 | 25.8                  | 60.0            | 50.0             | -23.4          | -24.2           |

**Table 23: Conducted Emissions Data 230VAC, Transmit On**

230 VAC NEUTRAL

| Frequency (MHz) | Level QP (dBµV) | Level AVG (dBµV) | Cable Loss (dB) | LISN Corr (dB) | Level QP Corr (dBµV) | Level Corr Avg (dBµV) | Limit QP (dBµV) | Limit AVG (dBµV) | Margin QP (dB) | Margin AVG (dB) |
|-----------------|-----------------|------------------|-----------------|----------------|----------------------|-----------------------|-----------------|------------------|----------------|-----------------|
| 0.204           | 31.6            | 12.8             | 10.3            | 0.3            | 42.2                 | 23.4                  | 63.4            | 53.4             | -21.2          | -30.0           |
| 0.275           | 30.0            | 11.1             | 10.2            | 0.5            | 40.7                 | 21.8                  | 61.0            | 51.0             | -20.2          | -29.1           |
| 0.469           | 27.6            | 8.5              | 10.2            | 0.4            | 38.2                 | 19.1                  | 56.5            | 46.5             | -18.4          | -27.5           |
| 0.813           | 24.2            | 7.1              | 10.3            | 0.4            | 34.9                 | 17.8                  | 56.0            | 46.0             | -21.1          | -28.2           |
| 1.218           | 19.9            | 7.2              | 10.4            | 0.4            | 30.7                 | 18.0                  | 56.0            | 46.0             | -25.3          | -28.0           |
| 10.927          | 22.4            | 9.5              | 11.1            | 0.8            | 34.2                 | 21.3                  | 60.0            | 50.0             | -25.8          | -28.7           |

230 VAC PHASE

| Frequency (MHz) | Level QP (dBµV) | Level AVG (dBµV) | Cable Loss (dB) | LISN Corr (dB) | Level QP Corr (dBµV) | Level Corr Avg (dBµV) | Limit QP (dBµV) | Limit AVG (dBµV) | Margin QP (dB) | Margin AVG (dB) |
|-----------------|-----------------|------------------|-----------------|----------------|----------------------|-----------------------|-----------------|------------------|----------------|-----------------|
| 0.205           | 36.6            | 25.2             | 10.3            | 0.7            | 47.6                 | 36.2                  | 63.4            | 53.4             | -15.8          | -17.2           |
| 0.276           | 38.7            | 27.3             | 10.2            | 0.6            | 49.5                 | 38.1                  | 60.9            | 50.9             | -11.4          | -12.8           |
| 0.472           | 39.1            | 24.8             | 10.2            | 0.4            | 49.7                 | 35.4                  | 56.5            | 46.5             | -6.8           | -11.1           |
| 0.814           | 36.9            | 16.9             | 10.3            | 0.4            | 47.6                 | 27.6                  | 56.0            | 46.0             | -8.4           | -18.4           |
| 1.150           | 34.0            | 14.7             | 10.4            | 0.4            | 44.8                 | 25.5                  | 56.0            | 46.0             | -11.2          | -20.5           |
| 1.179           | 33.5            | 16.6             | 10.4            | 0.4            | 44.3                 | 27.4                  | 56.0            | 46.0             | -11.7          | -18.6           |