



| Radiated Power (EIRP) for LTE Band 4 / 15M |               |        |         |                       |               |               |                        |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 12.91                 | 2.35          | 10.13         | 20.69                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.79                 | 2.36          | 10.16         | 20.59                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.89                 | 2.37          | 10.22         | 20.74                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 14.4                  | 2.35          | 10.13         | 22.18                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 14.1                  | 2.36          | 10.16         | 21.90                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 14.28                 | 2.37          | 10.22         | 22.13                  | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 12.62                 | 2.35          | 10.13         | 20.40                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.42                 | 2.36          | 10.16         | 20.22                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.71                 | 2.37          | 10.22         | 20.56                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 14.1                  | 2.35          | 10.13         | 21.88                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.85                 | 2.36          | 10.16         | 21.65                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 14.07                 | 2.37          | 10.22         | 21.92                  | Vertical                        | Pass       |
| Limit                                      | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 4 / 20M |               |        |         |                       |               |               |                        |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 13.07                 | 2.35          | 10.13         | 20.85                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 13.05                 | 2.36          | 10.16         | 20.85                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 13.04                 | 2.37          | 10.22         | 20.89                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 14.47                 | 2.35          | 10.13         | 22.25                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 14.54                 | 2.36          | 10.16         | 22.34                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 14.45                 | 2.37          | 10.22         | 22.30                  | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 12.85                 | 2.35          | 10.13         | 20.63                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.89                 | 2.36          | 10.16         | 20.69                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 13                    | 2.37          | 10.22         | 20.85                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 14.22                 | 2.35          | 10.13         | 22.00                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 14.33                 | 2.36          | 10.16         | 22.13                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 14.3                  | 2.37          | 10.22         | 22.15                  | Vertical                        | Pass       |
| Limit                                      | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |



| Radiated Power (ERP) for LTE Band 5 / 1.4M |                 |        |         |                       |               |               |                          |                     |                |            |
|--------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|----------------|------------|
| Modulation                                 | RB              |        | Channel | Result                |               |               |                          |                     | Polarization   | Conclusion |
|                                            | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Of Max.<br>ERP |            |
| QPSK                                       | 1               | 0      | Lowest  | 18.88                 | 1.27          | 6.70          | 2.15                     | 22.16               | Horizontal     | Pass       |
|                                            | 1               | 0      | Middle  | 18.98                 | 1.28          | 6.70          | 2.15                     | 22.25               | Horizontal     | Pass       |
|                                            | 1               | 0      | Highest | 19.05                 | 1.29          | 6.70          | 2.15                     | 22.31               | Horizontal     | Pass       |
|                                            | 1               | 0      | Lowest  | 20.25                 | 1.27          | 6.70          | 2.15                     | 23.53               | Vertical       | Pass       |
|                                            | 1               | 0      | Middle  | 20.38                 | 1.28          | 6.70          | 2.15                     | 23.65               | Vertical       | Pass       |
|                                            | 1               | 0      | Highest | 20.44                 | 1.29          | 6.70          | 2.15                     | 23.70               | Vertical       | Pass       |
| 16QAM                                      | 1               | 0      | Lowest  | 18.72                 | 1.27          | 6.70          | 2.15                     | 22.00               | Horizontal     | Pass       |
|                                            | 1               | 0      | Middle  | 18.82                 | 1.28          | 6.70          | 2.15                     | 22.09               | Horizontal     | Pass       |
|                                            | 1               | 0      | Highest | 18.71                 | 1.29          | 6.70          | 2.15                     | 21.97               | Horizontal     | Pass       |
|                                            | 1               | 0      | Lowest  | 20.22                 | 1.27          | 6.70          | 2.15                     | 23.50               | Vertical       | Pass       |
|                                            | 1               | 0      | Middle  | 20.15                 | 1.28          | 6.70          | 2.15                     | 23.42               | Vertical       | Pass       |
|                                            | 1               | 0      | Highest | 20.2                  | 1.29          | 6.70          | 2.15                     | 23.46               | Vertical       | Pass       |
| Limit                                      | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                |            |

| Radiated Power (ERP) for LTE Band 5 / 3M |                 |        |         |                       |               |               |                          |                     |                |            |
|------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|----------------|------------|
| Modulation                               | RB              |        | Channel | Result                |               |               |                          |                     | Polarization   | Conclusion |
|                                          | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Of Max.<br>ERP |            |
| QPSK                                     | 1               | 0      | Lowest  | 18.82                 | 1.27          | 6.70          | 2.15                     | 22.10               | Horizontal     | Pass       |
|                                          | 1               | 0      | Middle  | 19.13                 | 1.28          | 6.70          | 2.15                     | 22.40               | Horizontal     | Pass       |
|                                          | 1               | 0      | Highest | 19.2                  | 1.29          | 6.70          | 2.15                     | 22.46               | Horizontal     | Pass       |
|                                          | 1               | 0      | Lowest  | 20.24                 | 1.27          | 6.70          | 2.15                     | 23.52               | Vertical       | Pass       |
|                                          | 1               | 0      | Middle  | 20.53                 | 1.28          | 6.70          | 2.15                     | 23.80               | Vertical       | Pass       |
|                                          | 1               | 0      | Highest | 20.54                 | 1.29          | 6.70          | 2.15                     | 23.80               | Vertical       | Pass       |
| 16QAM                                    | 1               | 0      | Lowest  | 18.52                 | 1.27          | 6.70          | 2.15                     | 21.80               | Horizontal     | Pass       |
|                                          | 1               | 0      | Middle  | 18.74                 | 1.28          | 6.70          | 2.15                     | 22.01               | Horizontal     | Pass       |
|                                          | 1               | 0      | Highest | 18.84                 | 1.29          | 6.70          | 2.15                     | 22.10               | Horizontal     | Pass       |
|                                          | 1               | 0      | Lowest  | 19.89                 | 1.27          | 6.70          | 2.15                     | 23.17               | Vertical       | Pass       |
|                                          | 1               | 0      | Middle  | 20.18                 | 1.28          | 6.70          | 2.15                     | 23.45               | Vertical       | Pass       |
|                                          | 1               | 0      | Highest | 20.17                 | 1.29          | 6.70          | 2.15                     | 23.43               | Vertical       | Pass       |
| Limit                                    | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                |            |



| Radiated Power (ERP) for LTE Band 5 / 5M |                 |        |         |                       |               |               |                          |                     |                                |            |
|------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                               | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                          | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                     | 1               | 0      | Lowest  | 19.04                 | 1.27          | 6.70          | 2.15                     | 22.32               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Middle  | 19.08                 | 1.28          | 6.70          | 2.15                     | 22.35               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Highest | 19.4                  | 1.29          | 6.70          | 2.15                     | 22.66               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Lowest  | 20.39                 | 1.27          | 6.70          | 2.15                     | 23.67               | Vertical                       | Pass       |
|                                          | 1               | 0      | Middle  | 20.52                 | 1.28          | 6.70          | 2.15                     | 23.79               | Vertical                       | Pass       |
|                                          | 1               | 0      | Highest | 20.7                  | 1.29          | 6.70          | 2.15                     | 23.96               | Vertical                       | Pass       |
| 16QAM                                    | 1               | 0      | Lowest  | 18.76                 | 1.27          | 6.70          | 2.15                     | 22.04               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Middle  | 18.8                  | 1.28          | 6.70          | 2.15                     | 22.07               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Highest | 19.18                 | 1.29          | 6.70          | 2.15                     | 22.44               | Horizontal                     | Pass       |
|                                          | 1               | 0      | Lowest  | 20.13                 | 1.27          | 6.70          | 2.15                     | 23.41               | Vertical                       | Pass       |
|                                          | 1               | 0      | Middle  | 20.17                 | 1.28          | 6.70          | 2.15                     | 23.44               | Vertical                       | Pass       |
|                                          | 1               | 0      | Highest | 20.5                  | 1.29          | 6.70          | 2.15                     | 23.76               | Vertical                       | Pass       |
| Limit                                    | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |

| Radiated Power (ERP) for LTE Band 5 / 10M |                 |        |         |                       |               |               |                          |                     |                                |            |
|-------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                           | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                      | 1               | 0      | Lowest  | 19.36                 | 1.27          | 6.70          | 2.15                     | 22.64               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Middle  | 19.41                 | 1.28          | 6.70          | 2.15                     | 22.68               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Highest | 19.37                 | 1.29          | 6.70          | 2.15                     | 22.63               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Lowest  | 20.7                  | 1.27          | 6.70          | 2.15                     | 23.98               | Vertical                       | Pass       |
|                                           | 1               | 0      | Middle  | 20.71                 | 1.28          | 6.70          | 2.15                     | 23.98               | Vertical                       | Pass       |
|                                           | 1               | 0      | Highest | 20.78                 | 1.29          | 6.70          | 2.15                     | 24.04               | Vertical                       | Pass       |
| 16QAM                                     | 1               | 0      | Lowest  | 19.07                 | 1.27          | 6.70          | 2.15                     | 22.35               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Middle  | 19.12                 | 1.28          | 6.70          | 2.15                     | 22.39               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Highest | 19.04                 | 1.29          | 6.70          | 2.15                     | 22.30               | Horizontal                     | Pass       |
|                                           | 1               | 0      | Lowest  | 20.48                 | 1.27          | 6.70          | 2.15                     | 23.76               | Vertical                       | Pass       |
|                                           | 1               | 0      | Middle  | 20.49                 | 1.28          | 6.70          | 2.15                     | 23.76               | Vertical                       | Pass       |
|                                           | 1               | 0      | Highest | 20.46                 | 1.29          | 6.70          | 2.15                     | 23.72               | Vertical                       | Pass       |
| Limit                                     | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (ERP) for LTE Band 12 / 1.4M |                 |        |         |                       |               |               |                          |                     |                |            |
|---------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|----------------|------------|
| Modulation                                  | RB              |        | Channel | Result                |               |               |                          |                     | Polarization   | Conclusion |
|                                             | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Of Max.<br>ERP |            |
| QPSK                                        | 1               | 0      | Lowest  | 18.25                 | 1.21          | 6.40          | 2.15                     | 21.29               | Horizontal     | Pass       |
|                                             | 1               | 0      | Middle  | 18.35                 | 1.22          | 6.40          | 2.15                     | 21.38               | Horizontal     | Pass       |
|                                             | 1               | 0      | Highest | 18.29                 | 1.23          | 6.40          | 2.15                     | 21.31               | Horizontal     | Pass       |
|                                             | 1               | 0      | Lowest  | 19.73                 | 1.21          | 6.40          | 2.15                     | 22.77               | Vertical       | Pass       |
|                                             | 1               | 0      | Middle  | 19.84                 | 1.22          | 6.40          | 2.15                     | 22.87               | Vertical       | Pass       |
|                                             | 1               | 0      | Highest | 19.75                 | 1.23          | 6.40          | 2.15                     | 22.77               | Vertical       | Pass       |
| 16QAM                                       | 1               | 0      | Lowest  | 18.1                  | 1.21          | 6.40          | 2.15                     | 21.14               | Horizontal     | Pass       |
|                                             | 1               | 0      | Middle  | 18.38                 | 1.22          | 6.40          | 2.15                     | 21.41               | Horizontal     | Pass       |
|                                             | 1               | 0      | Highest | 18.06                 | 1.23          | 6.40          | 2.15                     | 21.08               | Horizontal     | Pass       |
|                                             | 1               | 0      | Lowest  | 19.5                  | 1.21          | 6.40          | 2.15                     | 22.54               | Vertical       | Pass       |
|                                             | 1               | 0      | Middle  | 19.74                 | 1.22          | 6.40          | 2.15                     | 22.77               | Vertical       | Pass       |
|                                             | 1               | 0      | Highest | 19.5                  | 1.23          | 6.40          | 2.15                     | 22.52               | Vertical       | Pass       |
| Limit                                       | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                     |                |            |

| Radiated Power (ERP) for LTE Band 12 / 3M |                 |        |         |                       |               |               |                          |                     |                |            |
|-------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|----------------|------------|
| Modulation                                | RB              |        | Channel | Result                |               |               |                          |                     | Polarization   | Conclusion |
|                                           | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Of Max.<br>ERP |            |
| QPSK                                      | 1               | 0      | Lowest  | 18                    | 1.21          | 6.40          | 2.15                     | 21.04               | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 18.15                 | 1.22          | 6.40          | 2.15                     | 21.18               | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 18.12                 | 1.23          | 6.40          | 2.15                     | 21.14               | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 19.42                 | 1.21          | 6.40          | 2.15                     | 22.46               | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 19.53                 | 1.22          | 6.40          | 2.15                     | 22.56               | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 19.62                 | 1.23          | 6.40          | 2.15                     | 22.64               | Vertical       | Pass       |
| 16QAM                                     | 1               | 0      | Lowest  | 17.99                 | 1.21          | 6.40          | 2.15                     | 21.03               | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 17.95                 | 1.22          | 6.40          | 2.15                     | 20.98               | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 18.02                 | 1.23          | 6.40          | 2.15                     | 21.04               | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 19.32                 | 1.21          | 6.40          | 2.15                     | 22.36               | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 19.37                 | 1.22          | 6.40          | 2.15                     | 22.40               | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 19.38                 | 1.23          | 6.40          | 2.15                     | 22.40               | Vertical       | Pass       |
| Limit                                     | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                     |                |            |



| Radiated Power (ERP) for LTE Band 12 / 5M |                 |        |         |                       |               |               |                          |                     |                |            |
|-------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|----------------|------------|
| Modulation                                | RB              |        | Channel | Result                |               |               |                          |                     |                | Conclusion |
|                                           |                 |        |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization   |            |
|                                           | Size            | Offset |         |                       |               |               |                          |                     | Of Max.<br>ERP |            |
| QPSK                                      | 1               | 0      | Lowest  | 18.53                 | 1.21          | 6.40          | 2.15                     | 21.57               | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 18.27                 | 1.22          | 6.40          | 2.15                     | 21.30               | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 18.22                 | 1.23          | 6.40          | 2.15                     | 21.24               | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 19.86                 | 1.21          | 6.40          | 2.15                     | 22.90               | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 19.62                 | 1.22          | 6.40          | 2.15                     | 22.65               | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 19.56                 | 1.23          | 6.40          | 2.15                     | 22.58               | Vertical       | Pass       |
| 16QAM                                     | 1               | 0      | Lowest  | 18.23                 | 1.21          | 6.40          | 2.15                     | 21.27               | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 18.07                 | 1.22          | 6.40          | 2.15                     | 21.10               | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 17.99                 | 1.23          | 6.40          | 2.15                     | 21.01               | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 19.63                 | 1.21          | 6.40          | 2.15                     | 22.67               | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 19.55                 | 1.22          | 6.40          | 2.15                     | 22.58               | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 19.36                 | 1.23          | 6.40          | 2.15                     | 22.38               | Vertical       | Pass       |
| Limit                                     | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                     |                |            |

| Radiated Power (ERP) for LTE Band 12 / 10M |                 |        |         |                       |               |               |                          |                     |            |                |
|--------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|------------|----------------|
| Modulation                                 | RB              |        | Channel | Result                |               |               |                          |                     | Conclusion |                |
|                                            |                 |        |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) |            | Polarization   |
|                                            | Size            | Offset |         |                       |               |               |                          |                     |            | Of Max.<br>ERP |
| QPSK                                       | 1               | 0      | Lowest  | 18.68                 | 1.21          | 6.40          | 2.15                     | 21.72               | Horizontal | Pass           |
|                                            | 1               | 0      | Middle  | 18.58                 | 1.22          | 6.40          | 2.15                     | 21.61               | Horizontal | Pass           |
|                                            | 1               | 0      | Highest | 18.63                 | 1.23          | 6.40          | 2.15                     | 21.65               | Horizontal | Pass           |
|                                            | 1               | 0      | Lowest  | 19.99                 | 1.21          | 6.40          | 2.15                     | 23.03               | Vertical   | Pass           |
|                                            | 1               | 0      | Middle  | 19.94                 | 1.22          | 6.40          | 2.15                     | 22.97               | Vertical   | Pass           |
|                                            | 1               | 0      | Highest | 20.08                 | 1.23          | 6.40          | 2.15                     | 23.10               | Vertical   | Pass           |
| 16QAM                                      | 1               | 0      | Lowest  | 18.32                 | 1.21          | 6.40          | 2.15                     | 21.36               | Horizontal | Pass           |
|                                            | 1               | 0      | Middle  | 18.35                 | 1.22          | 6.40          | 2.15                     | 21.38               | Horizontal | Pass           |
|                                            | 1               | 0      | Highest | 18.4                  | 1.23          | 6.40          | 2.15                     | 21.42               | Horizontal | Pass           |
|                                            | 1               | 0      | Lowest  | 19.73                 | 1.21          | 6.40          | 2.15                     | 22.77               | Vertical   | Pass           |
|                                            | 1               | 0      | Middle  | 19.68                 | 1.22          | 6.40          | 2.15                     | 22.71               | Vertical   | Pass           |
|                                            | 1               | 0      | Highest | 19.78                 | 1.23          | 6.40          | 2.15                     | 22.80               | Vertical   | Pass           |
| Limit                                      | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                     |            |                |



| Radiated Power (ERP) for LTE Band 13 / 5M |                 |        |         |                       |               |               |                          |                      |                |            |
|-------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|----------------------|----------------|------------|
| Modulation                                | RB              |        | Channel | Result                |               |               |                          |                      |                | Conclusion |
|                                           |                 |        |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P.(dBm) | Polarization   |            |
|                                           | Size            | Offset |         |                       |               |               |                          |                      | Of Max.<br>ERP |            |
| QPSK                                      | 1               | 0      | Lowest  | 15.56                 | 1.21          | 6.40          | 2.15                     | 18.60                | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 15.74                 | 1.22          | 6.40          | 2.15                     | 18.77                | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 15.68                 | 1.23          | 6.40          | 2.15                     | 18.70                | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 16.99                 | 1.21          | 6.40          | 2.15                     | 20.03                | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 17.07                 | 1.22          | 6.40          | 2.15                     | 20.10                | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 17.08                 | 1.23          | 6.40          | 2.15                     | 20.10                | Vertical       | Pass       |
| 16QAM                                     | 1               | 0      | Lowest  | 15.46                 | 1.21          | 6.40          | 2.15                     | 18.50                | Horizontal     | Pass       |
|                                           | 1               | 0      | Middle  | 15.3                  | 1.22          | 6.40          | 2.15                     | 18.33                | Horizontal     | Pass       |
|                                           | 1               | 0      | Highest | 15.42                 | 1.23          | 6.40          | 2.15                     | 18.44                | Horizontal     | Pass       |
|                                           | 1               | 0      | Lowest  | 16.79                 | 1.21          | 6.40          | 2.15                     | 19.83                | Vertical       | Pass       |
|                                           | 1               | 0      | Middle  | 16.76                 | 1.22          | 6.40          | 2.15                     | 19.79                | Vertical       | Pass       |
|                                           | 1               | 0      | Highest | 16.85                 | 1.23          | 6.40          | 2.15                     | 19.87                | Vertical       | Pass       |
| Limit                                     | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                      |                |            |

| Radiated Power (ERP) for LTE Band 13 / 10M |                 |        |         |                       |               |               |                          |                      |                |            |
|--------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|----------------------|----------------|------------|
| Modulation                                 | RB              |        | Channel | Result                |               |               |                          |                      |                | Conclusion |
|                                            |                 |        |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P.(dBm) | Polarization   |            |
|                                            | Size            | Offset |         |                       |               |               |                          |                      | Of Max.<br>ERP |            |
| QPSK                                       | 1               | 0      | Middle  | 16.29                 | 1.22          | 6.40          | 2.15                     | 19.32                | Horizontal     | Pass       |
|                                            | 1               | 0      | Middle  | 17.7                  | 1.22          | 6.40          | 2.15                     | 20.73                | Vertical       | Pass       |
| 16QAM                                      | 1               | 0      | Middle  | 16.19                 | 1.22          | 6.40          | 2.15                     | 19.22                | Horizontal     | Pass       |
|                                            | 1               | 0      | Middle  | 17.62                 | 1.22          | 6.40          | 2.15                     | 20.65                | Vertical       | Pass       |
| Limit                                      | ERP<3W=34.77dBm |        |         |                       |               |               |                          |                      |                |            |



| Radiated Power (EIRP) for LTE Band 25 / 1.4M |               |        |         |                       |               |               |                           |                                 |            |
|----------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                   | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                              | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                         | 1             | 0      | Lowest  | 12.49                 | 2.37          | 10.40         | 20.52                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Middle  | 12.34                 | 2.39          | 10.42         | 20.37                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Highest | 12.46                 | 2.40          | 10.44         | 20.50                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Lowest  | 13.86                 | 2.37          | 10.40         | 21.89                     | Vertical                        | Pass       |
|                                              | 1             | 0      | Middle  | 13.68                 | 2.39          | 10.42         | 21.71                     | Vertical                        | Pass       |
|                                              | 1             | 0      | Highest | 13.92                 | 2.40          | 10.44         | 21.96                     | Vertical                        | Pass       |
| 16QAM                                        | 1             | 0      | Lowest  | 12.25                 | 2.37          | 10.40         | 20.28                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Middle  | 12.2                  | 2.39          | 10.42         | 20.23                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Highest | 12.12                 | 2.40          | 10.44         | 20.16                     | Horizontal                      | Pass       |
|                                              | 1             | 0      | Lowest  | 13.6                  | 2.37          | 10.40         | 21.63                     | Vertical                        | Pass       |
|                                              | 1             | 0      | Middle  | 13.51                 | 2.39          | 10.42         | 21.54                     | Vertical                        | Pass       |
|                                              | 1             | 0      | Highest | 13.55                 | 2.40          | 10.44         | 21.59                     | Vertical                        | Pass       |
| Limit                                        | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |

| Radiated Power (EIRP) for LTE Band 25 / 3M |               |        |         |                       |               |               |                           |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 12.23                 | 2.37          | 10.40         | 20.26                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.03                 | 2.39          | 10.42         | 20.06                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.32                 | 2.40          | 10.44         | 20.36                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.56                 | 2.37          | 10.40         | 21.59                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.53                 | 2.39          | 10.42         | 21.56                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.73                 | 2.40          | 10.44         | 21.77                     | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 11.93                 | 2.37          | 10.40         | 19.96                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.08                 | 2.39          | 10.42         | 20.11                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.11                 | 2.40          | 10.44         | 20.15                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.25                 | 2.37          | 10.40         | 21.28                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.4                  | 2.39          | 10.42         | 21.43                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.49                 | 2.40          | 10.44         | 21.53                     | Vertical                        | Pass       |
| Limit                                      | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |



| Radiated Power (EIRP) for LTE Band 25 / 5M |               |        |         |                       |               |               |                           |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 11.95                 | 2.37          | 10.40         | 19.98                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.1                  | 2.39          | 10.42         | 20.13                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.13                 | 2.40          | 10.44         | 20.17                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.44                 | 2.37          | 10.40         | 21.47                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.53                 | 2.39          | 10.42         | 21.56                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.5                  | 2.40          | 10.44         | 21.54                     | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 11.81                 | 2.37          | 10.40         | 19.84                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 11.81                 | 2.39          | 10.42         | 19.84                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 11.79                 | 2.40          | 10.44         | 19.83                     | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.13                 | 2.37          | 10.40         | 21.16                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.31                 | 2.39          | 10.42         | 21.34                     | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.25                 | 2.40          | 10.44         | 21.29                     | Vertical                        | Pass       |
| Limit                                      | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |

| Radiated Power (EIRP) for LTE Band 25 / 10M |               |        |         |                       |               |               |                           |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.63                 | 2.37          | 10.40         | 20.66                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.28                 | 2.39          | 10.42         | 20.31                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.44                 | 2.40          | 10.44         | 20.48                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.93                 | 2.37          | 10.40         | 21.96                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.67                 | 2.39          | 10.42         | 21.70                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.88                 | 2.40          | 10.44         | 21.92                     | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 12.24                 | 2.37          | 10.40         | 20.27                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.98                 | 2.39          | 10.42         | 20.01                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.24                 | 2.40          | 10.44         | 20.28                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.64                 | 2.37          | 10.40         | 21.67                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.43                 | 2.39          | 10.42         | 21.46                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.69                 | 2.40          | 10.44         | 21.73                     | Vertical                        | Pass       |
| Limit                                       | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |



| Radiated Power (EIRP) for LTE Band 25 / 15M |               |        |         |                       |               |               |                           |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.46                 | 2.37          | 10.40         | 20.49                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.41                 | 2.39          | 10.42         | 20.44                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.48                 | 2.40          | 10.44         | 20.52                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.8                  | 2.37          | 10.40         | 21.83                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.75                 | 2.39          | 10.42         | 21.78                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.94                 | 2.40          | 10.44         | 21.98                     | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 11.98                 | 2.37          | 10.40         | 20.01                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.29                 | 2.39          | 10.42         | 20.32                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.34                 | 2.40          | 10.44         | 20.38                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.42                 | 2.37          | 10.40         | 21.45                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.6                  | 2.39          | 10.42         | 21.63                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.7                  | 2.40          | 10.44         | 21.74                     | Vertical                        | Pass       |
| Limit                                       | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |

| Radiated Power (EIRP) for LTE Band 25 / 20M |               |        |         |                       |               |               |                           |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|---------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                           |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.<br>R.P(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.54                 | 2.37          | 10.40         | 20.57                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.69                 | 2.39          | 10.42         | 20.72                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.74                 | 2.40          | 10.44         | 20.78                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.99                 | 2.37          | 10.40         | 22.02                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 14.16                 | 2.39          | 10.42         | 22.19                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 14.13                 | 2.40          | 10.44         | 22.17                     | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 12.39                 | 2.37          | 10.40         | 20.42                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.59                 | 2.39          | 10.42         | 20.62                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.47                 | 2.40          | 10.44         | 20.51                     | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.74                 | 2.37          | 10.40         | 21.77                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.93                 | 2.39          | 10.42         | 21.96                     | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.82                 | 2.40          | 10.44         | 21.86                     | Vertical                        | Pass       |
| Limit                                       | EIRP<2W=33dBm |        |         |                       |               |               |                           |                                 |            |



| Radiated Power (ERP) for LTE Band 26(Part 22) / 1.4M |                 |        |         |                       |               |               |                          |                     |                                |            |
|------------------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                           | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                      | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                                 | 1               | 0      | Lowest  | 15.53                 | 2.35          | 10.13         | 2.15                     | 21.16               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Middle  | 15.3                  | 2.36          | 10.16         | 2.15                     | 20.95               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Highest | 15.44                 | 2.37          | 10.22         | 2.15                     | 21.14               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Lowest  | 16.9                  | 2.35          | 10.13         | 2.15                     | 22.53               | Vertical                       | Pass       |
|                                                      | 1               | 0      | Middle  | 16.72                 | 2.36          | 10.16         | 2.15                     | 22.37               | Vertical                       | Pass       |
|                                                      | 1               | 0      | Highest | 16.83                 | 2.37          | 10.22         | 2.15                     | 22.53               | Vertical                       | Pass       |
| 16QAM                                                | 1               | 0      | Lowest  | 15.2                  | 2.35          | 10.13         | 2.15                     | 20.83               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Middle  | 15.11                 | 2.36          | 10.16         | 2.15                     | 20.76               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Highest | 15.14                 | 2.37          | 10.22         | 2.15                     | 20.84               | Horizontal                     | Pass       |
|                                                      | 1               | 0      | Lowest  | 16.56                 | 2.35          | 10.13         | 2.15                     | 22.19               | Vertical                       | Pass       |
|                                                      | 1               | 0      | Middle  | 16.53                 | 2.36          | 10.16         | 2.15                     | 22.18               | Vertical                       | Pass       |
|                                                      | 1               | 0      | Highest | 16.5                  | 2.37          | 10.22         | 2.15                     | 22.20               | Vertical                       | Pass       |
| Limit                                                | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |

| Radiated Power (ERP) for LTE Band 26(Part 22) / 3M |                 |        |         |                       |               |               |                          |                     |                                |            |
|----------------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                         | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                    | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                               | 1               | 0      | Lowest  | 15                    | 2.35          | 10.13         | 2.15                     | 20.63               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Middle  | 15.07                 | 2.36          | 10.16         | 2.15                     | 20.72               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Highest | 15.28                 | 2.37          | 10.22         | 2.15                     | 20.98               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Lowest  | 16.44                 | 2.35          | 10.13         | 2.15                     | 22.07               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Middle  | 16.55                 | 2.36          | 10.16         | 2.15                     | 22.20               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Highest | 16.61                 | 2.37          | 10.22         | 2.15                     | 22.31               | Vertical                       | Pass       |
| 16QAM                                              | 1               | 0      | Lowest  | 14.81                 | 2.35          | 10.13         | 2.15                     | 20.44               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Middle  | 14.82                 | 2.36          | 10.16         | 2.15                     | 20.47               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Highest | 14.91                 | 2.37          | 10.22         | 2.15                     | 20.61               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Lowest  | 16.19                 | 2.35          | 10.13         | 2.15                     | 21.82               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Middle  | 16.26                 | 2.36          | 10.16         | 2.15                     | 21.91               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Highest | 16.38                 | 2.37          | 10.22         | 2.15                     | 22.08               | Vertical                       | Pass       |
| Limit                                              | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (ERP) for LTE Band 26(Part 22) / 5M |                 |        |         |                       |               |               |                          |                     |                                |            |
|----------------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                         | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                    | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                               | 1               | 0      | Lowest  | 15.27                 | 2.35          | 10.13         | 2.15                     | 20.90               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Middle  | 15.4                  | 2.36          | 10.16         | 2.15                     | 21.05               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Highest | 15.4                  | 2.37          | 10.22         | 2.15                     | 21.10               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Lowest  | 16.59                 | 2.35          | 10.13         | 2.15                     | 22.22               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Middle  | 16.72                 | 2.36          | 10.16         | 2.15                     | 22.37               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Highest | 16.72                 | 2.37          | 10.22         | 2.15                     | 22.42               | Vertical                       | Pass       |
| 16QAM                                              | 1               | 0      | Lowest  | 14.82                 | 2.35          | 10.13         | 2.15                     | 20.45               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Middle  | 15.05                 | 2.36          | 10.16         | 2.15                     | 20.70               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Highest | 15.01                 | 2.37          | 10.22         | 2.15                     | 20.71               | Horizontal                     | Pass       |
|                                                    | 1               | 0      | Lowest  | 16.31                 | 2.35          | 10.13         | 2.15                     | 21.94               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Middle  | 16.45                 | 2.36          | 10.16         | 2.15                     | 22.10               | Vertical                       | Pass       |
|                                                    | 1               | 0      | Highest | 16.44                 | 2.37          | 10.22         | 2.15                     | 22.14               | Vertical                       | Pass       |
| Limit                                              | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |

| Radiated Power (ERP) for LTE Band 26(Part 22) / 10M |                 |        |         |                       |               |               |                          |                     |                                |            |
|-----------------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                          | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                     | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                                | 1               | 0      | Lowest  | 15                    | 2.35          | 10.13         | 2.15                     | 20.63               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Middle  | 15.13                 | 2.36          | 10.16         | 2.15                     | 20.78               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Highest | 14.61                 | 2.37          | 10.22         | 2.15                     | 20.31               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Lowest  | 16.48                 | 2.35          | 10.13         | 2.15                     | 22.11               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Middle  | 16.44                 | 2.36          | 10.16         | 2.15                     | 22.09               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Highest | 16.03                 | 2.37          | 10.22         | 2.15                     | 21.73               | Vertical                       | Pass       |
| 16QAM                                               | 1               | 0      | Lowest  | 14.82                 | 2.35          | 10.13         | 2.15                     | 20.45               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Middle  | 14.87                 | 2.36          | 10.16         | 2.15                     | 20.52               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Highest | 14.3                  | 2.37          | 10.22         | 2.15                     | 20.00               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Lowest  | 16.18                 | 2.35          | 10.13         | 2.15                     | 21.81               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Middle  | 16.22                 | 2.36          | 10.16         | 2.15                     | 21.87               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Highest | 15.78                 | 2.37          | 10.22         | 2.15                     | 21.48               | Vertical                       | Pass       |
| Limit                                               | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (ERP) for LTE Band 26(Part 22) / 15M |                 |        |         |                       |               |               |                          |                     |                                |            |
|-----------------------------------------------------|-----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                          | RB              |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                     | Size            | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                                | 1               | 0      | Lowest  | 15.59                 | 2.35          | 10.13         | 2.15                     | 21.22               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Middle  | 15.39                 | 2.36          | 10.16         | 2.15                     | 21.04               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Highest | 15.41                 | 2.37          | 10.22         | 2.15                     | 21.11               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Lowest  | 16.94                 | 2.35          | 10.13         | 2.15                     | 22.57               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Middle  | 16.83                 | 2.36          | 10.16         | 2.15                     | 22.48               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Highest | 16.87                 | 2.37          | 10.22         | 2.15                     | 22.57               | Vertical                       | Pass       |
| 16QAM                                               | 1               | 0      | Lowest  | 15.13                 | 2.35          | 10.13         | 2.15                     | 20.76               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Middle  | 15.19                 | 2.36          | 10.16         | 2.15                     | 20.84               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Highest | 15.14                 | 2.37          | 10.22         | 2.15                     | 20.84               | Horizontal                     | Pass       |
|                                                     | 1               | 0      | Lowest  | 16.57                 | 2.35          | 10.13         | 2.15                     | 22.20               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Middle  | 16.62                 | 2.36          | 10.16         | 2.15                     | 22.27               | Vertical                       | Pass       |
|                                                     | 1               | 0      | Highest | 16.61                 | 2.37          | 10.22         | 2.15                     | 22.31               | Vertical                       | Pass       |
| Limit                                               | ERP<7W=38.45dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (ERP) for LTE Band 26(Part 90) / 1.4M |                |        |         |                       |               |               |                          |                     |                                |            |
|------------------------------------------------------|----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                           | RB             |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                      | Size           | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                                 | 1              | 0      | Lowest  | 15.63                 | 2.35          | 10.13         | 2.15                     | 21.26               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Middle  | 15.48                 | 2.36          | 10.16         | 2.15                     | 21.13               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Highest | 15.52                 | 2.37          | 10.22         | 2.15                     | 21.22               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Lowest  | 16.99                 | 2.35          | 10.13         | 2.15                     | 22.62               | Vertical                       | Pass       |
|                                                      | 1              | 0      | Middle  | 16.88                 | 2.36          | 10.16         | 2.15                     | 22.53               | Vertical                       | Pass       |
|                                                      | 1              | 0      | Highest | 16.92                 | 2.37          | 10.22         | 2.15                     | 22.62               | Vertical                       | Pass       |
| 16QAM                                                | 1              | 0      | Lowest  | 15.25                 | 2.35          | 10.13         | 2.15                     | 20.88               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Middle  | 15.26                 | 2.36          | 10.16         | 2.15                     | 20.91               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Highest | 15.24                 | 2.37          | 10.22         | 2.15                     | 20.94               | Horizontal                     | Pass       |
|                                                      | 1              | 0      | Lowest  | 16.69                 | 2.35          | 10.13         | 2.15                     | 22.32               | Vertical                       | Pass       |
|                                                      | 1              | 0      | Middle  | 16.57                 | 2.36          | 10.16         | 2.15                     | 22.22               | Vertical                       | Pass       |
|                                                      | 1              | 0      | Highest | 16.64                 | 2.37          | 10.22         | 2.15                     | 22.34               | Vertical                       | Pass       |
| Limit                                                | ERP<100W=50dBm |        |         |                       |               |               |                          |                     |                                |            |

| Radiated Power (ERP) for LTE Band 26(Part 90) / 3M |                |        |         |                       |               |               |                          |                     |                                |            |
|----------------------------------------------------|----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                         | RB             |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                    | Size           | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                               | 1              | 0      | Lowest  | 15.73                 | 2.35          | 10.13         | 2.15                     | 21.36               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Middle  | 15.52                 | 2.36          | 10.16         | 2.15                     | 21.17               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Highest | 15.59                 | 2.37          | 10.22         | 2.15                     | 21.29               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Lowest  | 17.04                 | 2.35          | 10.13         | 2.15                     | 22.67               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Middle  | 16.98                 | 2.36          | 10.16         | 2.15                     | 22.63               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Highest | 16.89                 | 2.37          | 10.22         | 2.15                     | 22.59               | Vertical                       | Pass       |
| 16QAM                                              | 1              | 0      | Lowest  | 15.44                 | 2.35          | 10.13         | 2.15                     | 21.07               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Middle  | 15.25                 | 2.36          | 10.16         | 2.15                     | 20.90               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Highest | 15.25                 | 2.37          | 10.22         | 2.15                     | 20.95               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Lowest  | 16.86                 | 2.35          | 10.13         | 2.15                     | 22.49               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Middle  | 16.72                 | 2.36          | 10.16         | 2.15                     | 22.37               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Highest | 16.7                  | 2.37          | 10.22         | 2.15                     | 22.40               | Vertical                       | Pass       |
| Limit                                              | ERP<100W=50dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (ERP) for LTE Band 26(Part 90) / 5M |                |        |         |                       |               |               |                          |                     |                                |            |
|----------------------------------------------------|----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                         | RB             |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                    | Size           | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                               | 1              | 0      | Lowest  | 15.84                 | 2.35          | 10.13         | 2.15                     | 21.47               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Middle  | 15.67                 | 2.36          | 10.16         | 2.15                     | 21.32               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Highest | 15.56                 | 2.37          | 10.22         | 2.15                     | 21.26               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Lowest  | 17.15                 | 2.35          | 10.13         | 2.15                     | 22.78               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Middle  | 16.99                 | 2.36          | 10.16         | 2.15                     | 22.64               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Highest | 17.05                 | 2.37          | 10.22         | 2.15                     | 22.75               | Vertical                       | Pass       |
| 16QAM                                              | 1              | 0      | Lowest  | 15.52                 | 2.35          | 10.13         | 2.15                     | 21.15               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Middle  | 15.4                  | 2.36          | 10.16         | 2.15                     | 21.05               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Highest | 15.44                 | 2.37          | 10.22         | 2.15                     | 21.14               | Horizontal                     | Pass       |
|                                                    | 1              | 0      | Lowest  | 16.88                 | 2.35          | 10.13         | 2.15                     | 22.51               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Middle  | 16.85                 | 2.36          | 10.16         | 2.15                     | 22.50               | Vertical                       | Pass       |
|                                                    | 1              | 0      | Highest | 16.74                 | 2.37          | 10.22         | 2.15                     | 22.44               | Vertical                       | Pass       |
| Limit                                              | ERP<100W=50dBm |        |         |                       |               |               |                          |                     |                                |            |

| Radiated Power (ERP) for LTE Band 26(Part 90) / 10M |                |        |         |                       |               |               |                          |                     |                                |            |
|-----------------------------------------------------|----------------|--------|---------|-----------------------|---------------|---------------|--------------------------|---------------------|--------------------------------|------------|
| Modulation                                          | RB             |        | Channel | Result                |               |               |                          |                     |                                | Conclusion |
|                                                     | Size           | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | correction<br>factor(dB) | PMeas<br>E.R.P(dBm) | Polarization<br>Of Max.<br>ERP |            |
| QPSK                                                | 1              | 0      | Middle  | 15.97                 | 2.36          | 10.16         | 2.15                     | 21.62               | Horizontal                     | Pass       |
|                                                     | 1              | 0      | Middle  | 17.21                 | 2.36          | 10.16         | 2.15                     | 22.86               | Vertical                       | Pass       |
| 16QAM                                               | 1              | 0      | Middle  | 15.61                 | 2.36          | 10.16         | 2.15                     | 21.26               | Horizontal                     | Pass       |
|                                                     | 1              | 0      | Middle  | 16.83                 | 2.36          | 10.16         | 2.15                     | 22.48               | Vertical                       | Pass       |
| Limit                                               | ERP<100W=50dBm |        |         |                       |               |               |                          |                     |                                |            |



| Radiated Power (EIRP) for LTE Band 41 / 15M |               |        |         |                       |               |               |                        |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.14                 | 2.56          | 10.60         | 20.18                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.97                 | 2.67          | 10.65         | 19.95                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.23                 | 2.72          | 10.70         | 20.21                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.51                 | 2.56          | 10.60         | 21.55                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.45                 | 2.67          | 10.65         | 21.43                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.59                 | 2.72          | 10.70         | 21.57                  | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 11.81                 | 2.56          | 10.60         | 19.85                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.71                 | 2.67          | 10.65         | 19.69                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.1                  | 2.72          | 10.70         | 20.08                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.16                 | 2.56          | 10.60         | 21.20                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.2                  | 2.67          | 10.65         | 21.18                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.45                 | 2.72          | 10.70         | 21.43                  | Vertical                        | Pass       |
| Limit                                       | EIRP<2W=33dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 41 / 20M |               |        |         |                       |               |               |                        |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.28                 | 2.56          | 10.60         | 20.32                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.58                 | 2.67          | 10.65         | 20.56                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.56                 | 2.72          | 10.70         | 20.54                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.72                 | 2.56          | 10.60         | 21.76                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.96                 | 2.67          | 10.65         | 21.94                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.88                 | 2.72          | 10.70         | 21.86                  | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 11.96                 | 2.56          | 10.60         | 20.00                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.29                 | 2.67          | 10.65         | 20.27                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.18                 | 2.72          | 10.70         | 20.16                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.31                 | 2.56          | 10.60         | 21.35                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.65                 | 2.67          | 10.65         | 21.63                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.55                 | 2.72          | 10.70         | 21.53                  | Vertical                        | Pass       |
| Limit                                       | EIRP<2W=33dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 66 / 1.4M |               |        |         |                       |               |               |                        |                                 |            |
|----------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                   | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                              | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                         | 1             | 0      | Lowest  | 12.42                 | 2.35          | 10.13         | 20.20                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Middle  | 12.3                  | 2.36          | 10.16         | 20.10                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Highest | 12.2                  | 2.37          | 10.22         | 20.05                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Lowest  | 13.8                  | 2.35          | 10.13         | 21.58                  | Vertical                        | Pass       |
|                                              | 1             | 0      | Middle  | 13.76                 | 2.36          | 10.16         | 21.56                  | Vertical                        | Pass       |
|                                              | 1             | 0      | Highest | 13.66                 | 2.37          | 10.22         | 21.51                  | Vertical                        | Pass       |
| 16QAM                                        | 1             | 0      | Lowest  | 12.09                 | 2.35          | 10.13         | 19.87                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Middle  | 12.09                 | 2.36          | 10.16         | 19.89                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Highest | 12.03                 | 2.37          | 10.22         | 19.88                  | Horizontal                      | Pass       |
|                                              | 1             | 0      | Lowest  | 13.47                 | 2.35          | 10.13         | 21.25                  | Vertical                        | Pass       |
|                                              | 1             | 0      | Middle  | 13.49                 | 2.36          | 10.16         | 21.29                  | Vertical                        | Pass       |
|                                              | 1             | 0      | Highest | 13.44                 | 2.37          | 10.22         | 21.29                  | Vertical                        | Pass       |
| Limit                                        | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |



| Radiated Power (EIRP) for LTE Band 66 / 3M |               |        |         |                       |               |               |                        |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 12.06                 | 2.35          | 10.13         | 19.84                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.2                  | 2.36          | 10.16         | 20.00                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.13                 | 2.37          | 10.22         | 19.98                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.48                 | 2.35          | 10.13         | 21.26                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.66                 | 2.36          | 10.16         | 21.46                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.55                 | 2.37          | 10.22         | 21.40                  | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 11.94                 | 2.35          | 10.13         | 19.72                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 11.91                 | 2.36          | 10.16         | 19.71                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 11.8                  | 2.37          | 10.22         | 19.65                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.32                 | 2.35          | 10.13         | 21.10                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.4                  | 2.36          | 10.16         | 21.20                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.23                 | 2.37          | 10.22         | 21.08                  | Vertical                        | Pass       |
| Limit                                      | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 66 / 5M |               |        |         |                       |               |               |                        |                                 |            |
|--------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                 | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                            | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                       | 1             | 0      | Lowest  | 12.16                 | 2.35          | 10.13         | 19.94                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 12.23                 | 2.36          | 10.16         | 20.03                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 12.14                 | 2.37          | 10.22         | 19.99                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.62                 | 2.35          | 10.13         | 21.40                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.56                 | 2.36          | 10.16         | 21.36                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.46                 | 2.37          | 10.22         | 21.31                  | Vertical                        | Pass       |
| 16QAM                                      | 1             | 0      | Lowest  | 11.83                 | 2.35          | 10.13         | 19.61                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Middle  | 11.86                 | 2.36          | 10.16         | 19.66                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Highest | 11.86                 | 2.37          | 10.22         | 19.71                  | Horizontal                      | Pass       |
|                                            | 1             | 0      | Lowest  | 13.32                 | 2.35          | 10.13         | 21.10                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Middle  | 13.33                 | 2.36          | 10.16         | 21.13                  | Vertical                        | Pass       |
|                                            | 1             | 0      | Highest | 13.25                 | 2.37          | 10.22         | 21.10                  | Vertical                        | Pass       |
| Limit                                      | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 66 / 10M |               |        |         |                       |               |               |                        |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.06                 | 2.35          | 10.13         | 19.84                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.85                 | 2.36          | 10.16         | 19.65                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 11.8                  | 2.37          | 10.22         | 19.65                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.48                 | 2.35          | 10.13         | 21.26                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.28                 | 2.36          | 10.16         | 21.08                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.27                 | 2.37          | 10.22         | 21.12                  | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 11.77                 | 2.35          | 10.13         | 19.55                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.6                  | 2.36          | 10.16         | 19.40                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 11.68                 | 2.37          | 10.22         | 19.53                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.17                 | 2.35          | 10.13         | 20.95                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.02                 | 2.36          | 10.16         | 20.82                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.16                 | 2.37          | 10.22         | 21.01                  | Vertical                        | Pass       |
| Limit                                       | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |



| Radiated Power (EIRP) for LTE Band 66 / 15M |               |        |         |                       |               |               |                        |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.06                 | 2.35          | 10.13         | 19.84                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.13                 | 2.36          | 10.16         | 19.93                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.25                 | 2.37          | 10.22         | 20.10                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.53                 | 2.35          | 10.13         | 21.31                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.56                 | 2.36          | 10.16         | 21.36                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.7                  | 2.37          | 10.22         | 21.55                  | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 12.05                 | 2.35          | 10.13         | 19.83                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 11.9                  | 2.36          | 10.16         | 19.70                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 11.84                 | 2.37          | 10.22         | 19.69                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.37                 | 2.35          | 10.13         | 21.15                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.37                 | 2.36          | 10.16         | 21.17                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.33                 | 2.37          | 10.22         | 21.18                  | Vertical                        | Pass       |
| Limit                                       | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |

| Radiated Power (EIRP) for LTE Band 66 / 20M |               |        |         |                       |               |               |                        |                                 |            |
|---------------------------------------------|---------------|--------|---------|-----------------------|---------------|---------------|------------------------|---------------------------------|------------|
| Modulation                                  | RB            |        | Channel | Result                |               |               |                        |                                 | Conclusion |
|                                             | Size          | Offset |         | S<br>G.Level<br>(dBm) | Cable<br>loss | Gain<br>(dBi) | PMeas<br>E.I.R.P.(dBm) | Polarization<br>Of Max.<br>EIRP |            |
| QPSK                                        | 1             | 0      | Lowest  | 12.57                 | 2.35          | 10.13         | 20.35                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.56                 | 2.36          | 10.16         | 20.36                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.36                 | 2.37          | 10.22         | 20.21                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.92                 | 2.35          | 10.13         | 21.70                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.91                 | 2.36          | 10.16         | 21.71                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.85                 | 2.37          | 10.22         | 21.70                  | Vertical                        | Pass       |
| 16QAM                                       | 1             | 0      | Lowest  | 12.31                 | 2.35          | 10.13         | 20.09                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Middle  | 12.24                 | 2.36          | 10.16         | 20.04                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Highest | 12.07                 | 2.37          | 10.22         | 19.92                  | Horizontal                      | Pass       |
|                                             | 1             | 0      | Lowest  | 13.76                 | 2.35          | 10.13         | 21.54                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Middle  | 13.69                 | 2.36          | 10.16         | 21.49                  | Vertical                        | Pass       |
|                                             | 1             | 0      | Highest | 13.49                 | 2.37          | 10.22         | 21.34                  | Vertical                        | Pass       |
| Limit                                       | EIRP<1W=30dBm |        |         |                       |               |               |                        |                                 |            |

## 6. OCCUPIED BANDWIDTH

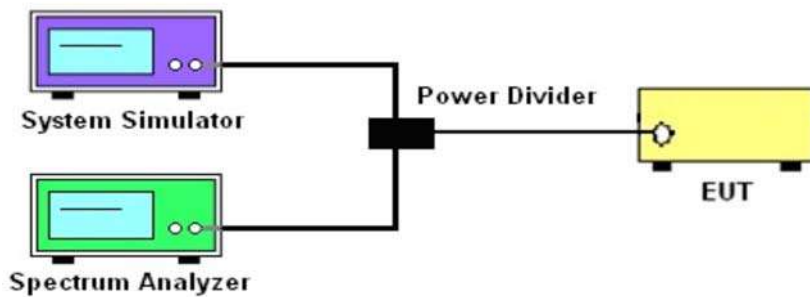
### 6.1 DESCRIPTION OF OCCUPIED BANDWIDTH MEASUREMENT

#### 6.1.1 MEASUREMENT METHOD

1.The occupied bandwidth is the width of a frequency band such that, below the lower and above the upper frequency limits, the mean powers emitted are each equal to a specified percentage 0.5% of the total mean transmitted power.

2.The 26 db emission bandwidth is defined as the frequency range between two points, one above and one below the carrier frequency, at which the spectral density of the emission is attenuated 26 db below the maximum in-band spectral density of the modulated signal. spectral density (power per unit bandwidth) is to be measured with a detector of resolution bandwidth equal to approximately 1.0% of the emission bandwidth.

#### 6.1.2 TEST SETUP



#### 6.1.3 TEST PROCEDURES

1. The testing follows FCC KDB 971168 D01 v03r01 Section 4.2 and 4.3.
2. The EUT was connected to spectrum and system simulator via a power divider.
3. Select lowest, middle, and highest channels for each band and different modulation.
4. Set the test probe and measure the Occupied Bandwidth of the spectrum analyzer.
5. Measure and record the Occupied Bandwidth from the Spectrum Analyzer.

|             | LTE    |        |        |        |         |         |
|-------------|--------|--------|--------|--------|---------|---------|
| LTE BW      | 1.4M   | 3M     | 5M     | 10M    | 15M     | 20M     |
| Span        | 3MHz   | 6MHz   | 10MHz  | 20MHz  | 30MHz   | 40MHz   |
| RBW         | 30kHz  | 30kHz  | 100kHz | 100kHz | 300kHz  | 300kHz  |
| VBW         | 100kHz | 100kHz | 300kHz | 300kHz | 1000kHz | 1000kHz |
| Detector    | PK     | PK     | PK     | PK     | PK      | PK      |
| Trace       | Max    | Max    | Max    | Max    | Max     | Max     |
| Sweep Count | Auto   | Auto   | Auto   | Auto   | Auto    | Auto    |



## 6.1.4 MEASUREMENT RESULT

| LTE Band 2 Bandwidth [MHz] |        |        |         |        |         |         |         |
|----------------------------|--------|--------|---------|--------|---------|---------|---------|
| BW [MHz]                   | Mode   | Lowest |         | Middle |         | Highest |         |
|                            |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                        | QPSK   | 1.0969 | 1.311   | 1.1048 | 1.287   | 1.0952  | 1.303   |
| 1.4                        | 16-QAM | 1.102  | 1.31    | 1.093  | 1.277   | 1.097   | 1.301   |
| 3                          | QPSK   | 2.689  | 2.921   | 2.683  | 2.925   | 2.683   | 2.925   |
| 3                          | 16-QAM | 2.682  | 2.953   | 2.6812 | 2.929   | 2.679   | 2.932   |
| 5                          | QPSK   | 4.505  | 5.027   | 4.502  | 4.991   | 4.518   | 5.006   |
| 5                          | 16-QAM | 4.5    | 5.024   | 4.533  | 5.044   | 4.5084  | 5.039   |
| 10                         | QPSK   | 8.912  | 9.626   | 8.93   | 9.732   | 8.907   | 9.626   |
| 10                         | 16-QAM | 8.912  | 9.61    | 8.927  | 9.637   | 8.9     | 9.61    |
| 15                         | QPSK   | 13.367 | 14.54   | 13.431 | 14.66   | 13.446  | 14.65   |
| 15                         | 16-QAM | 13.422 | 14.58   | 13.438 | 14.58   | 13.44   | 14.63   |
| 20                         | QPSK   | 17.832 | 19.12   | 17.875 | 19.35   | 17.883  | 19.24   |
| 20                         | 16-QAM | 17.875 | 19.22   | 17.858 | 19.29   | 17.899  | 19.3    |
| LTE Band 4 Bandwidth [MHz] |        |        |         |        |         |         |         |
| BW [MHz]                   | Mode   | Lowest |         | Middle |         | Highest |         |
|                            |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                        | QPSK   | 1.1    | 1.321   | 1.1046 | 1.284   | 1.096   | 1.305   |
| 1.4                        | 16-QAM | 1.0991 | 1.312   | 1.094  | 1.272   | 1.095   | 1.32    |
| 3                          | QPSK   | 2.686  | 2.92    | 2.683  | 2.938   | 2.6831  | 2.926   |
| 3                          | 16-QAM | 2.683  | 2.942   | 2.682  | 2.934   | 2.68    | 2.923   |
| 5                          | QPSK   | 4.508  | 5.025   | 4.5    | 4.991   | 4.517   | 5.019   |
| 5                          | 16-QAM | 4.504  | 5.013   | 4.526  | 5.023   | 4.5198  | 5.033   |
| 10                         | QPSK   | 8.915  | 9.641   | 8.93   | 9.649   | 8.934   | 9.75    |
| 10                         | 16-QAM | 8.92   | 9.584   | 8.926  | 9.667   | 8.926   | 9.634   |
| 15                         | QPSK   | 13.378 | 14.57   | 13.436 | 14.77   | 13.447  | 14.83   |
| 15                         | 16-QAM | 13.43  | 14.59   | 13.458 | 14.65   | 13.444  | 14.75   |
| 20                         | QPSK   | 17.815 | 19.11   | 17.898 | 19.41   | 17.865  | 19.115  |
| 20                         | 16-QAM | 17.877 | 19.21   | 17.891 | 19.35   | 17.861  | 19.27   |
| LTE Band 5 Bandwidth [MHz] |        |        |         |        |         |         |         |
| BW [MHz]                   | Mode   | Lowest |         | Middle |         | Highest |         |
|                            |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                        | QPSK   | 1.0989 | 1.304   | 1.108  | 1.292   | 1.098   | 1.327   |
| 1.4                        | 16-QAM | 1.099  | 1.307   | 1.094  | 1.285   | 1.099   | 1.291   |
| 3                          | QPSK   | 2.6833 | 2.914   | 2.69   | 2.942   | 2.684   | 2.932   |
| 3                          | 16-QAM | 2.681  | 2.926   | 2.681  | 2.942   | 2.6776  | 2.925   |
| 5                          | QPSK   | 4.507  | 5.023   | 4.498  | 5.025   | 4.504   | 4.981   |
| 5                          | 16-QAM | 4.502  | 5.01    | 4.526  | 4.988   | 4.501   | 4.99    |
| 10                         | QPSK   | 8.914  | 9.609   | 8.907  | 9.611   | 8.902   | 9.636   |
| 10                         | 16-QAM | 8.916  | 9.547   | 8.914  | 9.591   | 8.899   | 9.608   |



| LTE Band 12 Bandwidth [MHz]          |        |        |         |        |         |         |         |
|--------------------------------------|--------|--------|---------|--------|---------|---------|---------|
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                                  | QPSK   | 1.0986 | 1.313   | 1.106  | 1.286   | 1.0971  | 1.307   |
| 1.4                                  | 16-QAM | 1.098  | 1.304   | 1.094  | 1.276   | 1.0969  | 1.296   |
| 3                                    | QPSK   | 2.68   | 2.916   | 2.6892 | 2.921   | 2.684   | 2.938   |
| 3                                    | 16-QAM | 2.679  | 2.927   | 2.682  | 2.95    | 2.683   | 2.924   |
| 5                                    | QPSK   | 4.498  | 4.988   | 4.505  | 5.002   | 4.521   | 5.019   |
| 5                                    | 16-QAM | 4.493  | 4.97    | 4.534  | 5.038   | 4.514   | 5.028   |
| 10                                   | QPSK   | 8.914  | 9.609   | 8.947  | 9.738   | 8.908   | 9.676   |
| 10                                   | 16-QAM | 8.918  | 9.611   | 8.94   | 9.665   | 8.901   | 9.595   |
| LTE Band 13 Bandwidth [MHz]          |        |        |         |        |         |         |         |
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 5                                    | QPSK   | 4.531  | 5.032   | 4.516  | 5.02    | 4.5     | 4.984   |
| 5                                    | 16-QAM | 4.531  | 5.065   | 4.5099 | 5.014   | 4.521   | 5.038   |
| 10                                   | QPSK   | N/A    | N/A     | 8.966  | 9.758   | N/A     | N/A     |
| 10                                   | 16-QAM | N/A    | N/A     | 8.946  | 9.758   | N/A     | N/A     |
| LTE Band 25 Bandwidth [MHz]          |        |        |         |        |         |         |         |
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                                  | QPSK   | 1.101  | 1.316   | 1.104  | 1.281   | 1.0967  | 1.296   |
| 1.4                                  | 16-QAM | 1.0926 | 1.278   | 1.0966 | 1.303   | 1.03    | 1.325   |
| 3                                    | QPSK   | 2.689  | 2.924   | 2.684  | 2.927   | 2.686   | 2.93    |
| 3                                    | 16-QAM | 2.6833 | 2.936   | 2.6814 | 2.928   | 2.685   | 2.923   |
| 5                                    | QPSK   | 4.506  | 5.005   | 4.495  | 4.997   | 4.531   | 5.01    |
| 5                                    | 16-QAM | 4.525  | 5.01    | 4.524  | 5.058   | 4.5122  | 5.019   |
| 10                                   | QPSK   | 8.912  | 9.721   | 8.905  | 9.669   | 8.903   | 9.628   |
| 10                                   | 16-QAM | 8.903  | 9.565   | 8.922  | 9.651   | 8.895   | 9.593   |
| 15                                   | QPSK   | 13.368 | 14.53   | 13.422 | 14.67   | 13.371  | 14.63   |
| 15                                   | 16-QAM | 13.406 | 14.55   | 13.408 | 14.68   | 13.369  | 14.52   |
| 20                                   | QPSK   | 17.803 | 19.13   | 17.845 | 19.31   | 17.798  | 18.95   |
| 20                                   | 16-QAM | 17.838 | 19.17   | 17.808 | 19.17   | 17.832  | 19.04   |
| LTE Band 26(Part 22) Bandwidth [MHz] |        |        |         |        |         |         |         |
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                                  | QPSK   | 1.096  | 1.311   | 1.0985 | 1.341   | 1.108   | 1.288   |
| 1.4                                  | 16-QAM | 1.1    | 1.308   | 1.095  | 1.29    | 1.1     | 1.32    |
| 3                                    | QPSK   | 2.683  | 2.922   | 2.684  | 2.945   | 2.682   | 2.933   |
| 3                                    | 16-QAM | 2.681  | 2.913   | 2.681  | 2.939   | 2.68    | 2.914   |
| 5                                    | QPSK   | 4.509  | 5.008   | 4.499  | 5.014   | 4.5     | 4.977   |
| 5                                    | 16-QAM | 4.504  | 5.008   | 4.53   | 5.021   | 4.509   | 5       |
| 10                                   | QPSK   | 8.916  | 9.608   | 8.904  | 9.601   | 8.918   | 9.7     |
| 10                                   | 16-QAM | 8.905  | 9.533   | 8.918  | 9.583   | 8.903   | 9.6     |
| 15                                   | QPSK   | 13.364 | 14.55   | 13.426 | 14.64   | 13.443  | 14.67   |
| 15                                   | 16-QAM | 13.378 | 14.56   | 13.445 | 14.59   | 13.48   | 14.67   |



| LTE Band 26(Part 90) Bandwidth [MHz] |        |        |         |        |         |         |         |
|--------------------------------------|--------|--------|---------|--------|---------|---------|---------|
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                                  | QPSK   | 1.096  | 1.312   | 1.104  | 1.293   | 1.0968  | 1.325   |
| 1.4                                  | 16-QAM | 1.094  | 1.293   | 1.097  | 1.311   | 1.0992  | 1.305   |
| 3                                    | QPSK   | 2.687  | 2.914   | 2.681  | 2.946   | 2.683   | 2.931   |
| 3                                    | 16-QAM | 2.68   | 2.939   | 2.68   | 2.927   | 2.6791  | 2.939   |
| 5                                    | QPSK   | 4.501  | 5.005   | 4.502  | 5.019   | 4.527   | 5.017   |
| 5                                    | 4.5084 | 4.5084 | 5.008   | 4.5259 | 5.027   | 4.506   | 5.017   |
| 10                                   | QPSK   | N/A    | N/A     | 8.923  | 9.747   | N/A     | N/A     |
| 10                                   | 16-QAM | N/A    | N/A     | 8.9253 | 11.77   | N/A     | N/A     |
| LTE Band 41 Bandwidth [MHz]          |        |        |         |        |         |         |         |
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 5                                    | QPSK   | 4.52   | 4.996   | 4.502  | 5       | 4.501   | 5.021   |
| 5                                    | 16-QAM | 4.505  | 5.096   | 4.511  | 5.06    | 4.5019  | 4.958   |
| 10                                   | QPSK   | 8.932  | 10.05   | 8.9352 | 9.759   | 8.924   | 9.664   |
| 10                                   | 16-QAM | 8.939  | 9.598   | 8.924  | 9.507   | 8.91    | 9.623   |
| 15                                   | QPSK   | 13.439 | 14.63   | 13.439 | 16.39   | 13.472  | 15.35   |
| 15                                   | 16-QAM | 13.49  | 15.24   | 13.482 | 14.79   | 13.45   | 14.66   |
| 20                                   | QPSK   | 17.876 | 19.32   | 17.865 | 19.82   | 17.899  | 19.08   |
| 20                                   | 16-QAM | 17.873 | 20.24   | 17.85  | 19.93   | 17.864  | 19.22   |
| LTE Band 66 Bandwidth [MHz]          |        |        |         |        |         |         |         |
| BW [MHz]                             | Mode   | Lowest |         | Middle |         | Highest |         |
|                                      |        | 99% BW | 26dB BW | 99% BW | 26dB BW | 99% BW  | 26dB BW |
| 1.4                                  | QPSK   | 1.106  | 1.285   | 1.0948 | 1.295   | 1.1005  | 1.325   |
| 1.4                                  | 16-QAM | 1.093  | 1.315   | 1.093  | 1.275   | 1.098   | 1.327   |
| 3                                    | QPSK   | 2.689  | 2.926   | 2.684  | 2.941   | 2.6833  | 2.918   |
| 3                                    | 16-QAM | 2.6812 | 2.948   | 2.6812 | 2.917   | 2.68    | 2.946   |
| 5                                    | QPSK   | 4.504  | 4.988   | 4.501  | 4.996   | 4.524   | 5.02    |
| 5                                    | 16-QAM | 4.5    | 5.009   | 4.527  | 5.034   | 4.531   | 5.039   |
| 10                                   | QPSK   | 8.912  | 9.612   | 8.93   | 9.678   | 8.933   | 9.771   |
| 10                                   | 16-QAM | 8.911  | 9.666   | 8.918  | 9.633   | 8.93    | 9.666   |
| 15                                   | QPSK   | 13.378 | 14.54   | 13.422 | 14.77   | 13.437  | 14.76   |
| 15                                   | 16-QAM | 13.416 | 14.65   | 13.442 | 14.67   | 13.43   | 14.72   |
| 20                                   | QPSK   | 17.824 | 19.17   | 17.889 | 19.46   | 17.835  | 19.14   |
| 20                                   | 16-QAM | 17.87  | 19.3    | 17.877 | 19.37   | 17.807  | 19.21   |

Note: Test chart See Appendix A



## 7. CONDUCTED BAND EDGE

### 7.1 DESCRIPTION OF CONDUCTED BAND EDGE MEASUREMENT

#### 7.1.1 MEASUREMENT METHOD

##### 1. §22.917(a)

For operations in the 824 – 849 MHz band, the FCC limit is  $43 + 10\log_{10}(P[\text{Watts}])$  dB below the transmitter power  $P(\text{Watts})$  in a 100kHz bandwidth. However, in the 1MHz bands immediately outside and adjacent to the licensee's frequency block, a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter may be employed.

##### 2. §24.238 (a)

For operations in the 1850-1910 and 1930-1990 MHz band, the FCC limit is  $43 + 10\log_{10}(P[\text{Watts}])$  dB below the transmitter power  $P(\text{Watts})$  in a 1MHz bandwidth. However, in the 1 MHz bands immediately outside and adjacent to the frequency block a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter may be employed

##### 3. §27.53 (h)

For operations in the 1710 – 1755 MHz band, the FCC limit is  $43 + 10\log_{10}(P[\text{Watts}])$  dB below the transmitter power  $P(\text{Watts})$  in a 1 MHz bandwidth. However, in the 1MHz bands immediately outside and adjacent to the licensee's frequency block, a resolution bandwidth of at least one percent of the emission bandwidth of the fundamental emission of the transmitter may be employed.

##### 4. §27.53(m)(4)

For operations in the 2496 MHz ~ 2690 MHz band this section, the attenuation factor shall be not less than  $40 + 10 \log (P)$  dB on all frequencies between the channel edge and 5 megahertz from the channel edge,  $43 + 10 \log (P)$  dB on all frequencies between 5 megahertz and X megahertz from the channel edge, and  $55 + 10 \log (P)$  dB on all frequencies more than X megahertz from the channel edge, where X is the greater of 6 megahertz or the actual emission bandwidth as defined in paragraph (m)(6) of this section. In addition, the attenuation factor shall not be less that  $43 + 10 \log (P)$  dB on all frequencies between 2490.5 MHz and 2496 MHz and  $55 + 10 \log (P)$  dB at or below 2490.5 MHz. Mobile Satellite Service licensees operating on frequencies below 2495 MHz may also submit a documented interference complaint against BRS licensees operating on channel BRS Channel 1 on the same terms and conditions as adjacent channel BRS or EBS licensees.

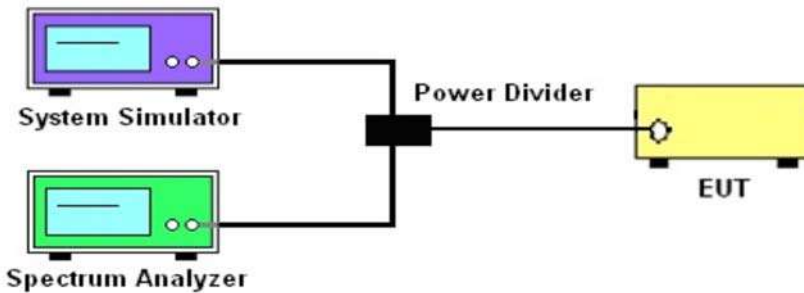
##### 5. §27.53 (g)

For operations in the 698 -746 MHz band, the FCC limit is  $43 + 10\log_{10}(P[\text{Watts}])$  dB below the transmitter power  $P(\text{Watts})$  in a 100 kHz bandwidth. However, in the 100 kilohertz bands immediately outside and adjacent to a licensee's frequency block, a resolution bandwidth of at least 30 kHz may be employed.

#### 6. §90.691 (a)

For any frequency removed from the EA licensee's frequency block greater than 37.5 kHz, the power of any emission shall be attenuated below the transmitter power (P) in watts by at least  $43 + 10\log_{10}(P)$  decibels or 80 decibels, whichever is the lesser attenuation, where f is the frequency removed from the center of the outer channel in the block in kilohertz and where f is greater than 37.5 kHz.

#### 7.1.2 TEST SETUP



#### 7.1.3 TEST PROCEDURES

1. The testing FCC KDB 971168 D01 v03r01 Section 6.0 and ANSI C63.26 2015 Section 5.7.
2. The EUT was connected to spectrum analyzer and system simulator via a power divider.
3. The band edges of low and high channels for the highest RF powers were measured. Set RBW  $\geq 1\%$  EBW in the 1MHz band immediately outside and adjacent to the band edge.
4. Set spectrum analyzer with RMS/AVG detector.
5. The RF fundamental frequency should be excluded against the limit line in the operating frequency band.
6. The limit line is derived from  $43 + 10\log(P)$  dB below the transmitter power P(Watts)  
 $= P(W) - [43 + 10\log(P)]$  (dB)  
 $= [30 + 10\log(P)]$  (dBm) -  $[43 + 10\log(P)]$  (dB)  
 $= -13$  dBm.

|             | LTE    |        |        |        |         |         |
|-------------|--------|--------|--------|--------|---------|---------|
| LTE BW      | 1.4M   | 3M     | 5M     | 10M    | 15M     | 20M     |
| Span        | 12MHz  | 13MHz  | 15MHz  | 20MHz  | 25MHz   | 30MHz   |
| RBW         | 30kHz  | 30kHz  | 100kHz | 100kHz | 300kHz  | 300kHz  |
| VBW         | 100kHz | 100kHz | 300kHz | 300kHz | 1000kHz | 1000kHz |
| Detector    | RMS    | RMS    | RMS    | RMS    | RMS     | RMS     |
| Trace       | Max    | Max    | Max    | Max    | Max     | Max     |
| Sweep Count | Auto   | Auto   | Auto   | Auto   | Auto    | Auto    |

#### 7.1.4 MEASUREMENT RESULT

Note: Test chart See Appendix B

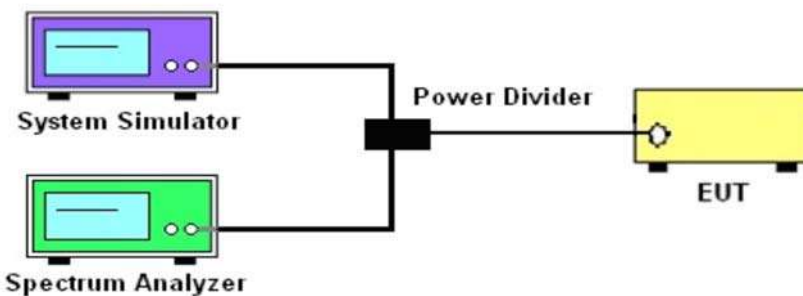
## 8. CONDUCTED SPURIOUS EMISSION

### 8.1 DESCRIPTION OF CONDUCTED SPURIOUS EMISSION MEASUREMENT

#### 8.1.1 MEASUREMENT METHOD

The power of any emission outside of the authorized operating frequency ranges must be lower than the transmitter power (P) by a factor of at least  $43 + 10 \log (P)$  dB. It is measured by means of a calibrated spectrum analyzer and scanned from 30 MHz up to a frequency including its 10th harmonic.

#### 8.1.2 TEST SETUP



#### 8.1.3 TEST PROCEDURES

1. The testing FCC KDB 971168 D01 v03r01 Section 6.0 and ANSI C63.26 2015 Section 5.7.
2. The EUT was connected to spectrum analyzer and system simulator via a power divider.
3. The RF output of EUT was connected to the spectrum analyzer by RF cable and attenuator. The path loss was compensated to the results for each measurement
4. Make the measurement with the spectrum analyzer's RBW = 1MHz, VBW = 3MHz, taking the record of maximum spurious emission.
5. The RF fundamental frequency should be excluded against the limit line in the operating frequency band.
6. The limit line is derived from  $43 + 10\log(P)$  dB below the transmitter power P(Watts)  
 $= P(W) - [43 + 10\log(P)] \text{ (dB)} = [30 + 10\log(P)] \text{ (dBm)} - [43 + 10\log(P)] \text{ (dB)}$   
 $= -13\text{dBm}.$

|          | LTE     |         |         |         |         |         |
|----------|---------|---------|---------|---------|---------|---------|
| LTE BW   | 1.4M    | 3M      | 5M      | 10M     | 15M     | 20M     |
| Span     | Auto    | Auto    | Auto    | Auto    | Auto    | Auto    |
| RBW      | 1000kHz | 1000kHz | 1000kHz | 1000kHz | 1000kHz | 1000kHz |
| VBW      | 3000kHz | 3000kHz | 3000kHz | 3000kHz | 3000kHz | 3000kHz |
| Detector | PK      | PK      | PK      | PK      | PK      | PK      |
| Trace    | Max     | Max     | Max     | Max     | Max     | Max     |

#### 8.1.4 TEST RESULTS

Note: Test chart See Appendix C

## 9. RADIATED SPURIOUS EMISSION

### 9.1 DESCRIPTION OF RADIATED SPURIOUS EMISSION

#### 9.1.1 MEASUREMENT METHOD

The radiated spurious emission was measured by substitution method according to ANSI C63.26 2015. The power of any emission outside of the authorized operating frequency ranges must be attenuated below the transmitter power (P) by a factor of at least  $43 + 10 \log (P)$  dB.

#### 9.1.2 TEST SETUP

The procedure of radiated spurious emissions is as follows:

a) Pre-calibration With pre-calibration method, the Radiated Spurious Emissions(RSE) is calculated as,  $RSE = Rx \text{ (dBuV)} + CL \text{ (dB)} + SA \text{ (dB)} + Gain \text{ (dBi)} - 107 \text{ (dBuV to dBm)}$  The SA is calibrated using following setup.

b) EUT was placed on 1.5 m non-conductive stand at a 3 m test distance from the receive antenna. A receiving antenna was placed on the antenna mast 3 m from the test item for emission measurements. The height of receiving antenna is 0.8m. The test setup refers to figure below. Detected emissions were maximized at each frequency by rotating the test item and adjusting the receiving antenna polarization. The radiated emission measurements of all non-harmonic and harmonics of the transmit frequency through the 10th harmonic measured with peak detector and 1MHz bandwidth.

Radiated emissions measurements were made only at the upper, middle, and lower carrier frequencies It was decided that measurements at these three carrier frequencies would be sufficient to demonstrate compliance with emissions limits because it was seen that all the significant spurs occur well outside the band and no radiation was seen from a carrier in one block of any band into any of the other blocks.

The substitution method is used. Substitution values at each frequency are measured before and saved to the test software. A "reference path loss" is established and the ARpl is the attenuation of "reference path loss", and including the gain of receive antenna, the gain of the preamplifier, the cable loss and the air loss. The measurement results are obtained as described below:

Power=PMea+ARpl

For radiated test from 30MHz to 1GHz

