

# Frequency Stability

CAT-M

CAT-M Band 2 QPSK 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1880 MHz     |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -7.01               | ±4700       | Pass    |
|                 | -20              | -10.29              |             |         |
|                 | -10              | -6.57               |             |         |
|                 | 0                | -7.55               |             |         |
|                 | +10              | -7.68               |             |         |
|                 | +20              | -8.33               |             |         |
|                 | +25              | -8.14               |             |         |
|                 | +30              | -9.43               |             |         |
|                 | +40              | -8.85               |             |         |
|                 | +50              | -10.1               |             |         |
| 4.5             | +25              | -10.87              |             |         |
| 2.5             | +25              | -12.37              |             |         |

CAT-M Band 2 16QAM 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1880 MHz     |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -6.18               | ±4700       | Pass    |
|                 | -20              | -9.3                |             |         |
|                 | -10              | -6.47               |             |         |
|                 | 0                | -7.4                |             |         |
|                 | +10              | -7.27               |             |         |
|                 | +20              | -8.28               |             |         |
|                 | +25              | -8.15               |             |         |
|                 | +30              | -9.16               |             |         |
|                 | +40              | -9.01               |             |         |
|                 | +50              | -9.37               |             |         |
| 4.5             | +25              | -10.97              |             |         |
| 2.5             | +25              | -12.22              |             |         |

#### CAT-M Band 4 QPSK 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1732.5 MHz   |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 4.31                | ±4331.25    | Pass    |
|                 | -20              | 2.36                |             |         |
|                 | -10              | 2.98                |             |         |
|                 | 0                | 2.36                |             |         |
|                 | +10              | 3.23                |             |         |
|                 | +20              | 2.16                |             |         |
|                 | +25              | 2.5                 |             |         |
|                 | +30              | 1.76                |             |         |
|                 | +40              | 2.92                |             |         |
|                 | +50              | 2.12                |             |         |
| 4.5             | +25              | 1.67                |             |         |
| 2.5             | +25              | 1.59                |             |         |

#### CAT-M Band 4 16QAM 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1732.5 MHz   |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 3.1                 | ±4331.25    | Pass    |
|                 | -20              | 3.48                |             |         |
|                 | -10              | 3.46                |             |         |
|                 | 0                | 2.1                 |             |         |
|                 | +10              | 2.9                 |             |         |
|                 | +20              | 2.7                 |             |         |
|                 | +25              | 2.75                |             |         |
|                 | +30              | 2.36                |             |         |
|                 | +40              | 3.13                |             |         |
|                 | +50              | 2.29                |             |         |
| 4.5             | +25              | 1.2                 |             |         |
| 2.5             | +25              | 2.17                |             |         |

### CAT-M Band 5 QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>836.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -0.67               | ±2091.25    | Pass    |
|                 | -20              | -1.16               |             |         |
|                 | -10              | -1.63               |             |         |
|                 | 0                | -2.53               |             |         |
|                 | +10              | -2.96               |             |         |
|                 | +20              | -3.78               |             |         |
|                 | +25              | -3.58               |             |         |
|                 | +30              | -3.05               |             |         |
|                 | +40              | -2.96               |             |         |
|                 | +50              | -2.4                |             |         |
| 4.5             | +25              | -4.18               |             |         |
| 2.5             | +25              | -4.15               |             |         |

### CAT-M Band 5 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>836.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -1.24               | ±2091.25    | Pass    |
|                 | -20              | -0.82               |             |         |
|                 | -10              | -1.42               |             |         |
|                 | 0                | -1.79               |             |         |
|                 | +10              | -1.67               |             |         |
|                 | +20              | -1.23               |             |         |
|                 | +25              | -1.72               |             |         |
|                 | +30              | -1.76               |             |         |
|                 | +40              | -2.46               |             |         |
|                 | +50              | -2.47               |             |         |
| 4.5             | +25              | -2.8                |             |         |
| 2.5             | +25              | -2.56               |             |         |

### CAT-M Band 12 QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>707.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.3                | ±1768.75    | Pass    |
|                 | -20              | -4.29               |             |         |
|                 | -10              | -3.96               |             |         |
|                 | 0                | -3.6                |             |         |
|                 | +10              | -4.41               |             |         |
|                 | +20              | -3.4                |             |         |
|                 | +25              | -3.82               |             |         |
|                 | +30              | -3.88               |             |         |
|                 | +40              | -3.76               |             |         |
|                 | +50              | -3.43               |             |         |
| 4.5             | +25              | -3.56               |             |         |
| 2.5             | +25              | -3.88               |             |         |

### CAT-M Band 12 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>707.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.72               | ±1768.75    | Pass    |
|                 | -20              | -3.82               |             |         |
|                 | -10              | -3.6                |             |         |
|                 | 0                | -4.08               |             |         |
|                 | +10              | -3.89               |             |         |
|                 | +20              | -3.99               |             |         |
|                 | +25              | -4.06               |             |         |
|                 | +30              | -2.63               |             |         |
|                 | +40              | -3.43               |             |         |
|                 | +50              | -3.45               |             |         |
| 4.5             | +25              | -2.45               |             |         |
| 2.5             | +25              | -4.16               |             |         |

### CAT-M Band 13 QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>782 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -2.26               | ±1955       | Pass    |
|                 | -20              | -3.83               |             |         |
|                 | -10              | -2.25               |             |         |
|                 | 0                | -3.06               |             |         |
|                 | +10              | -3.81               |             |         |
|                 | +20              | -4.18               |             |         |
|                 | +25              | -4.75               |             |         |
|                 | +30              | -3.48               |             |         |
|                 | +40              | -4.89               |             |         |
|                 | +50              | -5.06               |             |         |
| 4.5             | +25              | -3.83               |             |         |
| 2.5             | +25              | -4.86               |             |         |

### CAT-M Band 13 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>782 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.1                | ±1955       | Pass    |
|                 | -20              | -4.68               |             |         |
|                 | -10              | -4.29               |             |         |
|                 | 0                | -4.33               |             |         |
|                 | +10              | -4.49               |             |         |
|                 | +20              | -2.52               |             |         |
|                 | +25              | -2.45               |             |         |
|                 | +30              | -2.55               |             |         |
|                 | +40              | -2.23               |             |         |
|                 | +50              | -5.42               |             |         |
| 4.5             | +25              | -3.29               |             |         |
| 2.5             | +25              | -4.35               |             |         |

### CAT-M Band 14 QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>793 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -4.51               | ±1982.5     | Pass    |
|                 | -20              | -5.56               |             |         |
|                 | -10              | -6.52               |             |         |
|                 | 0                | -6.48               |             |         |
|                 | +10              | -5.22               |             |         |
|                 | +20              | -5.56               |             |         |
|                 | +25              | -5.95               |             |         |
|                 | +30              | -7.41               |             |         |
|                 | +40              | -6.05               |             |         |
|                 | +50              | -6.28               |             |         |
| 4.5             | +25              | -8.1                |             |         |
| 2.5             | +25              | -7.4                |             |         |

### CAT-M Band 14 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>793 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.99               | ±1982.5     | Pass    |
|                 | -20              | -4.35               |             |         |
|                 | -10              | -3.92               |             |         |
|                 | 0                | -3.96               |             |         |
|                 | +10              | -5.25               |             |         |
|                 | +20              | -4.84               |             |         |
|                 | +25              | -4.61               |             |         |
|                 | +30              | -6.81               |             |         |
|                 | +40              | -4.82               |             |         |
|                 | +50              | -6.84               |             |         |
| 4.5             | +25              | -5.38               |             |         |
| 2.5             | +25              | -4.41               |             |         |

### CAT-M Band 18(part22) QPSK 5 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>827 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 1.32                | ±2067.5     | Pass    |
|                 | -20              | -1.29               |             |         |
|                 | -10              | -4.06               |             |         |
|                 | 0                | -6.08               |             |         |
|                 | +10              | -7.47               |             |         |
|                 | +20              | 0.54                |             |         |
|                 | +25              | 0.16                |             |         |
|                 | +30              | -0.37               |             |         |
|                 | +40              | -0.93               |             |         |
|                 | +50              | -0.72               |             |         |
| 4.5             | +25              | -1.56               |             |         |
| 2.5             | +25              | -1.07               |             |         |

### CAT-M Band 18(part22) 16QAM 5 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>827 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 1.19                | ±2067.5     | Pass    |
|                 | -20              | -0.94               |             |         |
|                 | -10              | -2.66               |             |         |
|                 | 0                | -5.48               |             |         |
|                 | +10              | -6.38               |             |         |
|                 | +20              | 3.02                |             |         |
|                 | +25              | 1.19                |             |         |
|                 | +30              | 0.74                |             |         |
|                 | +40              | 0.84                |             |         |
|                 | +50              | -0.19               |             |         |
| 4.5             | +25              | -0.54               |             |         |
| 2.5             | +25              | -1.22               |             |         |

### CAT-M Band 18(part90) QPSK 5 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>819.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 4.53                | ±2048.75    | Pass    |
|                 | -20              | 3.72                |             |         |
|                 | -10              | 3.42                |             |         |
|                 | 0                | 3.33                |             |         |
|                 | +10              | 2.99                |             |         |
|                 | +20              | 3.85                |             |         |
|                 | +25              | 2.93                |             |         |
|                 | +30              | 3.08                |             |         |
|                 | +40              | 2.8                 |             |         |
|                 | +50              | 2.59                |             |         |
| 4.5             | +25              | 2.55                | ±2048.75    | Pass    |
| 2.5             | +25              | 2.26                |             |         |

### CAT-M Band 18(part90) 16QAM 5 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>819.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 5.65                | ±2048.75    | Pass    |
|                 | -20              | 4.42                |             |         |
|                 | -10              | 4.36                |             |         |
|                 | 0                | 4.39                |             |         |
|                 | +10              | 4.86                |             |         |
|                 | +20              | 4.23                |             |         |
|                 | +25              | 3.93                |             |         |
|                 | +30              | 3.46                |             |         |
|                 | +40              | 3.78                |             |         |
|                 | +50              | 3.32                |             |         |
| 4.5             | +25              | 3.62                | ±2048.75    | Pass    |
| 2.5             | +25              | 3.1                 |             |         |

### CAT-M Band 25 QPSK 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1882.5 MHz   |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 4.35                | ±4706.25    | Pass    |
|                 | -20              | 1.29                |             |         |
|                 | -10              | -0.16               |             |         |
|                 | 0                | -3.42               |             |         |
|                 | +10              | -3.23               |             |         |
|                 | +20              | -5.58               |             |         |
|                 | +25              | -6.77               |             |         |
|                 | +30              | -7.22               |             |         |
|                 | +40              | -8.35               |             |         |
|                 | +50              | -8.55               |             |         |
| 4.5             | +25              | -9.47               |             |         |
| 2.5             | +25              | -0.2                |             |         |

### CAT-M Band 25 16QAM 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1882.5 MHz   |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | 1.96                | ±4706.25    | Pass    |
|                 | -20              | 0.37                |             |         |
|                 | -10              | -3.32               |             |         |
|                 | 0                | -4.31               |             |         |
|                 | +10              | -4.95               |             |         |
|                 | +20              | -6.44               |             |         |
|                 | +25              | -6.69               |             |         |
|                 | +30              | -7.54               |             |         |
|                 | +40              | -9.33               |             |         |
|                 | +50              | -9.36               |             |         |
| 4.5             | +25              | -7.52               |             |         |
| 2.5             | +25              | -0.97               |             |         |

### CAT-M Band 26(part22) QPSK 15 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>836.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.53               | ±2091.25    | Pass    |
|                 | -20              | -3.43               |             |         |
|                 | -10              | -3.19               |             |         |
|                 | 0                | -3.93               |             |         |
|                 | +10              | -3.49               |             |         |
|                 | +20              | -5.24               |             |         |
|                 | +25              | -3.82               |             |         |
|                 | +30              | -4.79               |             |         |
|                 | +40              | -4.09               |             |         |
|                 | +50              | -3.83               |             |         |
| 4.5             | +25              | -4.73               |             |         |
| 2.5             | +25              | -4.61               |             |         |

### CAT-M Band 26(part22) 16QAM 15 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>836.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.36               | ±2091.25    | Pass    |
|                 | -20              | -2.47               |             |         |
|                 | -10              | -3.85               |             |         |
|                 | 0                | -3.48               |             |         |
|                 | +10              | -3.71               |             |         |
|                 | +20              | -3.12               |             |         |
|                 | +25              | -3.18               |             |         |
|                 | +30              | -4.12               |             |         |
|                 | +40              | -3.33               |             |         |
|                 | +50              | -4.35               |             |         |
| 4.5             | +25              | -3.85               |             |         |
| 2.5             | +25              | -4.32               |             |         |

### CAT-M Band 26(part90) QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>819 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -3.13               | ±2053.75    | Pass    |
|                 | -20              | -3.49               |             |         |
|                 | -10              | -4.08               |             |         |
|                 | 0                | -4.76               |             |         |
|                 | +10              | -4.98               |             |         |
|                 | +20              | -5.55               |             |         |
|                 | +25              | -6.35               |             |         |
|                 | +30              | -5.12               |             |         |
|                 | +40              | -5.05               |             |         |
|                 | +50              | -5.99               |             |         |
| 4.5             | +25              | -6.11               |             |         |
| 2.5             | +25              | -6.64               |             |         |

### CAT-M Band 26(part90) 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>819 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -0.11               | ±2053.75    | Pass    |
|                 | -20              | -1.49               |             |         |
|                 | -10              | -2.59               |             |         |
|                 | 0                | -3.03               |             |         |
|                 | +10              | -2.7                |             |         |
|                 | +20              | -3.83               |             |         |
|                 | +25              | -4.25               |             |         |
|                 | +30              | -3.03               |             |         |
|                 | +40              | -3.26               |             |         |
|                 | +50              | -4.38               |             |         |
| 4.5             | +25              | -4.79               |             |         |
| 2.5             | +25              | -3.16               |             |         |

### CAT-M Band 66 QPSK 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1745 MHz     |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -5.09               | ±4362.5     | Pass    |
|                 | -20              | -5.54               |             |         |
|                 | -10              | -5.48               |             |         |
|                 | 0                | -6.49               |             |         |
|                 | +10              | -6.78               |             |         |
|                 | +20              | -8.48               |             |         |
|                 | +25              | -8.18               |             |         |
|                 | +30              | -8.28               |             |         |
|                 | +40              | -9.04               |             |         |
|                 | +50              | -9.57               |             |         |
| 4.5             | +25              | -5.36               |             |         |
| 2.5             | +25              | -6.04               |             |         |

### CAT-M Band 66 16QAM 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>1745 MHz     |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -4.84               | ±4362.5     | Pass    |
|                 | -20              | -5.79               |             |         |
|                 | -10              | -6.54               |             |         |
|                 | 0                | -7.04               |             |         |
|                 | +10              | -7.57               |             |         |
|                 | +20              | -9.36               |             |         |
|                 | +25              | -9.43               |             |         |
|                 | +30              | -8.77               |             |         |
|                 | +40              | -9.06               |             |         |
|                 | +50              | -9.37               |             |         |
| 4.5             | +25              | -5.49               |             |         |
| 2.5             | +25              | -5.98               |             |         |

### CAT-M Band 71 QPSK 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>680.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -1.89               | ±1701.25    | Pass    |
|                 | -20              | -3.6                |             |         |
|                 | -10              | -5.02               |             |         |
|                 | 0                | -6.77               |             |         |
|                 | +10              | -7.07               |             |         |
|                 | +20              | -8.11               |             |         |
|                 | +25              | -9.03               |             |         |
|                 | +30              | -9.23               |             |         |
|                 | +40              | -9.46               |             |         |
|                 | +50              | -9.84               |             |         |
| 4.5             | +25              | -10.71              |             |         |
| 2.5             | +25              | -10.47              |             |         |

### CAT-M Band 71 16QAM 20 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>680.5 MHz    |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -1.8                | ±1701.25    | Pass    |
|                 | -20              | -3.28               |             |         |
|                 | -10              | -3.59               |             |         |
|                 | 0                | -4.42               |             |         |
|                 | +10              | -5.78               |             |         |
|                 | +20              | -7.98               |             |         |
|                 | +25              | -6.9                |             |         |
|                 | +30              | -7.41               |             |         |
|                 | +40              | -9.2                |             |         |
|                 | +50              | -8.55               |             |         |
| 4.5             | +25              | -9.53               |             |         |
| 2.5             | +25              | -9.9                |             |         |

### CAT-M Band 85 QPSK 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>707 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -1.7                | ±1767.5     | Pass    |
|                 | -20              | -3.12               |             |         |
|                 | -10              | -4.29               |             |         |
|                 | 0                | -4.79               |             |         |
|                 | +10              | -4.21               |             |         |
|                 | +20              | -4.25               |             |         |
|                 | +25              | -5.05               |             |         |
|                 | +30              | -5.44               |             |         |
|                 | +40              | -5.32               |             |         |
|                 | +50              | -5.64               |             |         |
| 4.5             | +25              | -5.82               |             |         |
| 2.5             | +25              | -5.68               |             |         |

### CAT-M Band 85 16QAM 10 MHz

| Test Conditions |                  | Frequency Deviation |             | Verdict |
|-----------------|------------------|---------------------|-------------|---------|
| Power (VDC)     | Temperature (°C) | MCH<br>707 MHz      |             |         |
|                 |                  | Value(Hz)           | Limits (Hz) |         |
| 3.8             | -30              | -1.04               | ±1767.5     | Pass    |
|                 | -20              | -3.33               |             |         |
|                 | -10              | -4.33               |             |         |
|                 | 0                | -3.42               |             |         |
|                 | +10              | -3.25               |             |         |
|                 | +20              | -5.24               |             |         |
|                 | +25              | -4.89               |             |         |
|                 | +30              | -3.82               |             |         |
|                 | +40              | -4.08               |             |         |
|                 | +50              | -5.34               |             |         |
| 4.5             | +25              | -5.06               |             |         |
| 2.5             | +25              | -3.89               |             |         |

## NB-IoT

### NB-IoT Band 2

| Voltage |                              |            |         |       |                  |                     |                   |                    |                |         |
|---------|------------------------------|------------|---------|-------|------------------|---------------------|-------------------|--------------------|----------------|---------|
| Band    | Sub-carrier spacing<br>(KHz) | Modulation | Channel | Tones | Voltage<br>[Vdc] | Temperature<br>(°C) | Deviation<br>(Hz) | Deviation<br>(ppm) | Limit<br>(ppm) | Verdict |
| Band2   | 15                           | BPSK       | 18602   | 1RB#0 | VN               | NT                  | 15.129            | 0.008177           | ±2.5           | PASS    |
| Band2   | 15                           | BPSK       | 18602   | 1RB#0 | VL               | NT                  | 14.53             | 0.007853           | ±2.5           | PASS    |
| Band2   | 15                           | BPSK       | 18602   | 1RB#0 | VH               | NT                  | 13.882            | 0.007503           | ±2.5           | PASS    |
| Band2   | 15                           | BPSK       | 19198   | 1RB#0 | VN               | NT                  | 23.266            | 0.012183           | ±2.5           | PASS    |
| Band2   | 15                           | BPSK       | 19198   | 1RB#0 | VL               | NT                  | -14.284           | -0.007479          | ±2.5           | PASS    |
| Band2   | 15                           | BPSK       | 19198   | 1RB#0 | VH               | NT                  | 17.814            | 0.009328           | ±2.5           | PASS    |

| Temperature |                                 |            |         |       |                  |                     |                   |                    |                |         |
|-------------|---------------------------------|------------|---------|-------|------------------|---------------------|-------------------|--------------------|----------------|---------|
| Band        | Sub-carrier<br>Spacing<br>(KHz) | Modulation | Channel | Tones | Voltage<br>[Vdc] | Temperature<br>(°C) | Deviation<br>(Hz) | Deviation<br>(ppm) | Limit<br>(ppm) | Verdict |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | -30                 | -22.081           | -0.011934          | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | -20                 | 20.314            | 0.010979           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | -10                 | 20.14             | 0.010885           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 0                   | 20.629            | 0.011149           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 10                  | 20.723            | 0.011200           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 20                  | 19.03             | 0.010286           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 30                  | 20.795            | 0.011239           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 40                  | 19.585            | 0.010586           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 18602   | 1RB#0 | NV               | 50                  | 28.072            | 0.015173           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | -30                 | 32.009            | 0.016760           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | -20                 | 21.823            | 0.011427           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | -10                 | -26.859           | -0.014064          | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 0                   | 30.282            | 0.015856           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 10                  | 21.840            | 0.011436           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 20                  | -25.455           | -0.013329          | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 30                  | 29.671            | 0.015536           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 40                  | 21.833            | 0.011432           | ±2.5           | PASS    |
| Band2       | 15                              | BPSK       | 19198   | 1RB#0 | NV               | 50                  | 25.091            | 0.013138           | ±2.5           | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band2   | 15                        | QPSK       | 18602   | 1RB#0 | VN            | NT               | -20.147        | -0.010889       | ±2.5        | PASS    |
| Band2   | 15                        | QPSK       | 18602   | 1RB#0 | VL            | NT               | -20.779        | -0.011231       | ±2.5        | PASS    |
| Band2   | 15                        | QPSK       | 18602   | 1RB#0 | VH            | NT               | -21.394        | -0.011563       | ±2.5        | PASS    |
| Band2   | 15                        | QPSK       | 19198   | 1RB#0 | VN            | NT               | 48.312         | 0.025165        | ±2.5        | PASS    |
| Band2   | 15                        | QPSK       | 19198   | 1RB#0 | VL            | NT               | 39.744         | 0.020702        | ±2.5        | PASS    |
| Band2   | 15                        | QPSK       | 19198   | 1RB#0 | VH            | NT               | 44.001         | 0.022920        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier Spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | -30              | -18.641        | -0.010075       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | -20              | -20.63         | -0.011150       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | -10              | 14.152         | 0.007649        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 0                | -19.489        | -0.010534       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 10               | -20.058        | -0.010841       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 20               | -21.097        | -0.011403       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 30               | -19.562        | -0.010573       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 40               | -20.712        | -0.011195       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 18602   | 1RB#0 | NV            | 50               | 17.843         | 0.009644        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | -30              | 51.602         | 0.026879        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | -20              | -41.93         | -0.021842       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | -10              | -46.92         | -0.024442       | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 0                | 50.147         | 0.026121        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 10               | 41.343         | 0.021535        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 20               | 45.266         | 0.023579        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 30               | 49.397         | 0.025730        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 40               | 41.393         | 0.021561        | ±2.5        | PASS    |
| Band2       | 15                        | QPSK       | 19198   | 1RB#0 | NV            | 50               | -45.361        | -0.023628       | ±2.5        | PASS    |

## NB-IoT Band 4

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band4   | 15                        | BPSK       | 19952   | 1RB#0 | VN            | NT               | 14.704         | 0.008598        | ±2.5        | PASS    |
| Band4   | 15                        | BPSK       | 19952   | 1RB#0 | VL            | NT               | 14.611         | 0.008543        | ±2.5        | PASS    |
| Band4   | 15                        | BPSK       | 19952   | 1RB#0 | VH            | NT               | 12.635         | 0.007388        | ±2.5        | PASS    |
| Band4   | 15                        | BPSK       | 20398   | 1RB#0 | VN            | NT               | 11.295         | 0.006437        | ±2.5        | PASS    |
| Band4   | 15                        | BPSK       | 20398   | 1RB#0 | VL            | NT               | 10.284         | 0.005861        | ±2.5        | PASS    |
| Band4   | 15                        | BPSK       | 20398   | 1RB#0 | VH            | NT               | 7.697          | 0.004386        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier Spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | -30              | 19.124         | 0.011182        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | -20              | 16.841         | 0.009847        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | -10              | 32.057         | 0.018745        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 0                | -17.997        | -0.010523       | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 10               | 17.103         | 0.010001        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 20               | 16.544         | 0.009674        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 30               | 18.303         | 0.010702        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 40               | 16.369         | 0.009571        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 19952   | 1RB#0 | NV            | 50               | -22.841        | -0.013356       | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | -30              | 37.228         | 0.021215        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | -20              | 22.941         | 0.013073        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | -10              | 20.141         | 0.011478        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 0                | 36.059         | 0.020549        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 10               | 27.601         | 0.015729        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 20               | -30.853        | -0.017582       | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 30               | 35.558         | 0.020264        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 40               | 27.455         | 0.015646        | ±2.5        | PASS    |
| Band4       | 15                        | BPSK       | 20398   | 1RB#0 | NV            | 50               | 28.144         | 0.016038        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band4   | 15                        | QPSK       | 19952   | 1RB#0 | VN            | NT               | 11.704         | 0.006844        | ±2.5        | PASS    |
| Band4   | 15                        | QPSK       | 19952   | 1RB#0 | VL            | NT               | -10.611        | -0.006205       | ±2.5        | PASS    |
| Band4   | 15                        | QPSK       | 19952   | 1RB#0 | VH            | NT               | 9.635          | 0.005634        | ±2.5        | PASS    |
| Band4   | 15                        | QPSK       | 20398   | 1RB#0 | VN            | NT               | 17.854         | 0.010175        | ±2.5        | PASS    |
| Band4   | 15                        | QPSK       | 20398   | 1RB#0 | VL            | NT               | 9.046          | 0.005155        | ±2.5        | PASS    |
| Band4   | 15                        | QPSK       | 20398   | 1RB#0 | VH            | NT               | 14.020         | 0.007990        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier Spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | -30              | 22.124         | 0.012937        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | -20              | 19.841         | 0.011602        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | -10              | 54.904         | 0.032104        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 0                | 20.997         | 0.012278        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 10               | 20.103         | 0.011755        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 20               | 19.544         | 0.011428        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 30               | 21.303         | 0.012457        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 40               | 19.369         | 0.011325        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 19952   | 1RB#0 | NV            | 50               | 58.056         | 0.033947        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | -30              | 21.930         | 0.012497        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | -20              | -11.814        | -0.006732       | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | -10              | -16.838        | -0.009595       | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 0                | 20.843         | 0.011878        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 10               | 11.723         | 0.006681        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 20               | 15.320         | 0.008730        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 30               | 19.649         | 0.011197        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 40               | 11.543         | 0.006578        | ±2.5        | PASS    |
| Band4       | 15                        | QPSK       | 20398   | 1RB#0 | NV            | 50               | -54.898        | -0.031284       | ±2.5        | PASS    |

## NB-IoT Band 5

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band5   | 15                        | BPSK       | 20402   | 1RB#0 | VN            | NT               | 23.865         | 0.028955        | ±2.5        | PASS    |
| Band5   | 15                        | BPSK       | 20402   | 1RB#0 | VL            | NT               | 27.562         | 0.033441        | ±2.5        | PASS    |
| Band5   | 15                        | BPSK       | 20402   | 1RB#0 | VH            | NT               | 25.581         | 0.031037        | ±2.5        | PASS    |
| Band5   | 15                        | BPSK       | 20648   | 1RB#0 | VN            | NT               | 10.585         | 0.012470        | ±2.5        | PASS    |
| Band5   | 15                        | BPSK       | 20648   | 1RB#0 | VL            | NT               | 8.411          | 0.009909        | ±2.5        | PASS    |
| Band5   | 15                        | BPSK       | 20648   | 1RB#0 | VH            | NT               | 6.321          | 0.007447        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | -30              | 22.801         | 0.027665        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | -20              | 27.238         | 0.033048        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | -10              | 24.856         | 0.030157        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 0                | 26.700         | 0.032395        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 10               | 28.645         | 0.034755        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 20               | 29.240         | 0.035477        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 30               | 30.153         | 0.036585        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 40               | 27.923         | 0.033880        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20402   | 1RB#0 | NV            | 50               | 29.549         | 0.035852        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | -30              | 3.576          | 0.004212        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | -20              | 5.485          | 0.006462        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | -10              | 4.585          | 0.005402        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 0                | 7.208          | 0.008493        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 10               | 7.755          | 0.009137        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 20               | 9.896          | 0.011658        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 30               | 9.844          | 0.011598        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 40               | 15.029         | 0.017706        | ±2.5        | PASS    |
| Band5       | 15                        | BPSK       | 20648   | 1RB#0 | NV            | 50               | 20.314         | 0.023933        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band5   | 15                        | QPSK       | 20402   | 1RB#0 | VN            | NT               | 8.411          | 0.010205        | ±2.5        | PASS    |
| Band5   | 15                        | QPSK       | 20402   | 1RB#0 | VL            | NT               | 12.017         | 0.014580        | ±2.5        | PASS    |
| Band5   | 15                        | QPSK       | 20402   | 1RB#0 | VH            | NT               | 10.399         | 0.012617        | ±2.5        | PASS    |
| Band5   | 15                        | QPSK       | 20648   | 1RB#0 | VN            | NT               | 13.973         | 0.016462        | ±2.5        | PASS    |
| Band5   | 15                        | QPSK       | 20648   | 1RB#0 | VL            | NT               | 4.757          | 0.005605        | ±2.5        | PASS    |
| Band5   | 15                        | QPSK       | 20648   | 1RB#0 | VH            | NT               | 8.876          | 0.010457        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | -30              | 7.287          | 0.008841        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | -20              | 11.294         | 0.013703        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | -10              | 9.401          | 0.011406        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 0                | 11.073         | 0.013435        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 10               | 12.679         | 0.015383        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 20               | 13.349         | 0.016197        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 30               | 14.468         | 0.017554        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 40               | 12.393         | 0.015036        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20402   | 1RB#0 | NV            | 50               | 13.606         | 0.016508        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | -30              | 1.068          | 0.001258        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | -20              | 3.427          | 0.004037        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | -10              | 2.524          | 0.002974        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 0                | 4.747          | 0.005593        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 10               | 5.238          | 0.006171        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 20               | 7.569          | 0.008917        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 30               | 7.576          | 0.008925        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 40               | 8.968          | 0.010566        | ±2.5        | PASS    |
| Band5       | 15                        | QPSK       | 20648   | 1RB#0 | NV            | 50               | 1.590          | 0.001873        | ±2.5        | PASS    |

## NB-IoT Band 12

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band12  | 15                        | BPSK       | 23012   | 1RB#0 | VN            | NT               | 14.117         | 0.020190        | ±2.5        | PASS    |
| Band12  | 15                        | BPSK       | 23012   | 1RB#0 | VL            | NT               | 7.039          | 0.010067        | ±2.5        | PASS    |
| Band12  | 15                        | BPSK       | 23012   | 1RB#0 | VH            | NT               | -5.147         | -0.007361       | ±2.5        | PASS    |
| Band12  | 15                        | BPSK       | 23178   | 1RB#0 | VN            | NT               | 7.887          | 0.011019        | ±2.5        | PASS    |
| Band12  | 15                        | BPSK       | 23178   | 1RB#0 | VL            | NT               | 10.756         | 0.015027        | ±2.5        | PASS    |
| Band12  | 15                        | BPSK       | 23178   | 1RB#0 | VH            | NT               | -9.628         | -0.013451       | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | -30              | 10.774         | 0.015410        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | -20              | 5.453          | 0.007800        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | -10              | 7.507          | 0.010736        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 0                | 8.442          | 0.012074        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 10               | -9.173         | -0.01312        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 20               | 8.144          | 0.011648        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 30               | 6.265          | 0.008960        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 40               | -7.267         | -0.01040        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23012   | 1RB#0 | NV            | 50               | -9.719         | -0.01390        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | -30              | 9.174          | 0.012816        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | -20              | 12.448         | 0.017390        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | -10              | 10.457         | 0.014609        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 0                | 12.627         | 0.017641        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 10               | -14.462        | -0.020204       | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 20               | 14.912         | 0.020833        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 30               | 13.796         | 0.019273        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 40               | 14.485         | 0.020236        | ±2.5        | PASS    |
| Band12      | 15                        | BPSK       | 23178   | 1RB#0 | NV            | 50               | -14.990        | -0.020942       | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band12  | 15                        | QPSK       | 23012   | 1RB#0 | VN            | NT               | 5.392          | 0.007712        | ±2.5        | PASS    |
| Band12  | 15                        | QPSK       | 23012   | 1RB#0 | VL            | NT               | 7.202          | 0.010301        | ±2.5        | PASS    |
| Band12  | 15                        | QPSK       | 23012   | 1RB#0 | VH            | NT               | 7.321          | 0.010470        | ±2.5        | PASS    |
| Band12  | 15                        | QPSK       | 23178   | 1RB#0 | VN            | NT               | 9.996          | 0.013965        | ±2.5        | PASS    |
| Band12  | 15                        | QPSK       | 23178   | 1RB#0 | VL            | NT               | 12.958         | 0.018103        | ±2.5        | PASS    |
| Band12  | 15                        | QPSK       | 23178   | 1RB#0 | VH            | NT               | 11.756         | 0.016423        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | -30              | 8.340          | 0.011928        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | -20              | 3.156          | 0.004514        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | -10              | 4.661          | 0.006666        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 0                | 5.919          | 0.008466        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 10               | -11.217        | -0.016043       | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 20               | 10.038         | 0.014356        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 30               | 4.007          | 0.005730        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 40               | -10.013        | -0.014321       | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23012   | 1RB#0 | NV            | 50               | -12.351        | -0.017665       | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | -30              | 6.639          | 0.009256        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | -20              | 10.006         | 0.013978        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | -10              | 7.765          | 0.010849        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 0                | 9.898          | 0.013828        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 10               | 11.752         | 0.016418        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 20               | 12.390         | 0.017309        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 30               | 11.763         | 0.016433        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 40               | 11.593         | 0.016196        | ±2.5        | PASS    |
| Band12      | 15                        | QPSK       | 23178   | 1RB#0 | NV            | 50               | -11.725        | -0.016380       | ±2.5        | PASS    |

## NB-IoT Band 13

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band 13 | 15                        | BPSK       | 23182   | 1RB#0 | VN            | NT               | 17.908         | 0.023042        | ±2.5        | PASS    |
| Band 13 | 15                        | BPSK       | 23182   | 1RB#0 | VL            | NT               | 20.425         | 0.026280        | ±2.5        | PASS    |
| Band 13 | 15                        | BPSK       | 23182   | 1RB#0 | VH            | NT               | 21.228         | 0.027314        | ±2.5        | PASS    |
| Band 13 | 15                        | BPSK       | 23278   | 1RB#0 | VN            | NT               | 17.724         | 0.022527        | ±2.5        | PASS    |
| Band 13 | 15                        | BPSK       | 23278   | 1RB#0 | VL            | NT               | 23.484         | 0.029847        | ±2.5        | PASS    |
| Band 13 | 15                        | BPSK       | 23278   | 1RB#0 | VH            | NT               | 21.980         | 0.027936        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | -30              | 22.592         | 0.029069        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | -20              | 20.575         | 0.026473        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | -10              | 19.234         | 0.024747        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 0                | 27.125         | 0.034901        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 10               | 22.049         | 0.028370        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 20               | 20.306         | 0.026127        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 30               | 27.183         | 0.034976        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 40               | 21.274         | 0.027373        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23182   | 1RB#0 | NV            | 50               | 20.277         | 0.026089        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | -30              | 20.174         | 0.025641        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | -20              | 28.250         | 0.035904        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | -10              | 24.672         | 0.031358        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 0                | 24.951         | 0.031713        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 10               | 22.087         | 0.028072        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 20               | 19.759         | 0.025113        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 30               | 26.887         | 0.034172        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 40               | 19.925         | 0.025324        | ±2.5        | PASS    |
| Band 13     | 15                        | BPSK       | 23278   | 1RB#0 | NV            | 50               | 25.337         | 0.032203        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band 13 | 15                        | QPSK       | 23182   | 1RB#0 | VN            | NT               | 20.714         | 0.026652        | ±2.5        | PASS    |
| Band 13 | 15                        | QPSK       | 23182   | 1RB#0 | VL            | NT               | 25.166         | 0.032380        | ±2.5        | PASS    |
| Band 13 | 15                        | QPSK       | 23182   | 1RB#0 | VH            | NT               | 24.037         | 0.030928        | ±2.5        | PASS    |
| Band 13 | 15                        | QPSK       | 23278   | 1RB#0 | VN            | NT               | 15.101         | 0.019193        | ±2.5        | PASS    |
| Band 13 | 15                        | QPSK       | 23278   | 1RB#0 | VL            | NT               | -24.316        | -0.030905       | ±2.5        | PASS    |
| Band 13 | 15                        | QPSK       | 23278   | 1RB#0 | VH            | NT               | 19.84          | 0.025216        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | -30              | -25.103        | -0.032299       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | -20              | 18.142         | 0.023343        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | -10              | 17.012         | 0.021889        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 0                | -24.793        | -0.031900       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 10               | 19.105         | 0.024582        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 20               | 17.796         | 0.022898        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 30               | -24.543        | -0.031579       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 40               | 18.850         | 0.024253        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23182   | 1RB#0 | NV            | 50               | 17.419         | 0.022413        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | -30              | -14.103        | -0.017925       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | -20              | -26.142        | -0.033226       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | -10              | 22.012         | 0.027977        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 0                | -22.273        | -0.028308       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 10               | 19.106         | 0.024283        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 20               | 17.076         | 0.021703        | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 30               | -24.675        | -0.031362       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 40               | -17.408        | -0.022125       | ±2.5        | PASS    |
| Band 13     | 15                        | QPSK       | 23278   | 1RB#0 | NV            | 50               | 28.596         | 0.036345        | ±2.5        | PASS    |

## NB-IoT Band 14

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band14  | 15                        | BPSK       | 23282   | 1RB#0 | VN            | NT               | 16.038         | 0.020348        | ±2.5        | PASS    |
| Band14  | 15                        | BPSK       | 23282   | 1RB#0 | VL            | NT               | 18.321         | 0.023244        | ±2.5        | PASS    |
| Band14  | 15                        | BPSK       | 23282   | 1RB#0 | VH            | NT               | 18.626         | 0.023631        | ±2.5        | PASS    |
| Band14  | 15                        | BPSK       | 23378   | 1RB#0 | VN            | NT               | 19.432         | 0.024357        | ±2.5        | PASS    |
| Band14  | 15                        | BPSK       | 23378   | 1RB#0 | VL            | NT               | 20.034         | 0.025111        | ±2.5        | PASS    |
| Band14  | 15                        | BPSK       | 23378   | 1RB#0 | VH            | NT               | 18.501         | 0.023190        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | -30              | 20.834         | 0.026432        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | -20              | 18.598         | 0.023596        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | -10              | 17.161         | 0.021773        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 0                | 24.923         | 0.031620        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 10               | 19.775         | 0.025089        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 20               | 11.854         | 0.015039        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 30               | 19.428         | 0.024648        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 40               | 19.321         | 0.024513        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23282   | 1RB#0 | NV            | 50               | 17.346         | 0.022007        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | -30              | 14.559         | 0.018249        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | -20              | 26.831         | 0.033631        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | -10              | 22.954         | 0.028771        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 0                | -23.104        | -0.028960       | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 10               | 19.992         | 0.025059        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 20               | 17.694         | 0.022179        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 30               | 26.052         | 0.032655        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 40               | 18.068         | 0.022647        | ±2.5        | PASS    |
| Band14      | 15                        | BPSK       | 23378   | 1RB#0 | NV            | 50               | -28.555        | -0.035792       | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band14  | 15                        | QPSK       | 23282   | 1RB#0 | VN            | NT               | 13.484         | 0.017107        | ±2.5        | PASS    |
| Band14  | 15                        | QPSK       | 23282   | 1RB#0 | VL            | NT               | 17.222         | 0.021849        | ±2.5        | PASS    |
| Band14  | 15                        | QPSK       | 23282   | 1RB#0 | VH            | NT               | -16.456        | -0.020878       | ±2.5        | PASS    |
| Band14  | 15                        | QPSK       | 23378   | 1RB#0 | VN            | NT               | 18.101         | 0.022689        | ±2.5        | PASS    |
| Band14  | 15                        | QPSK       | 23378   | 1RB#0 | VL            | NT               | 18.316         | 0.022958        | ±2.5        | PASS    |
| Band14  | 15                        | QPSK       | 23378   | 1RB#0 | VH            | NT               | 17.096         | 0.021429        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | -30              | -22.917        | -0.029075       | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | -20              | 21.093         | 0.026761        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | -10              | 19.923         | 0.025277        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 0                | 27.115         | 0.034401        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 10               | 21.804         | 0.027663        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 20               | 14.483         | 0.018375        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 30               | -21.966        | -0.027869       | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 40               | 21.391         | 0.027139        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23282   | 1RB#0 | NV            | 50               | 20.066         | 0.025458        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | -30              | 17.288         | 0.021669        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | -20              | 29.804         | 0.037357        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | -10              | 25.836         | 0.032385        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 0                | 25.404         | 0.031843        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 10               | 22.484         | 0.028183        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 20               | 20.402         | 0.025572        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 30               | 28.061         | 0.035173        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 40               | 20.417         | 0.025592        | ±2.5        | PASS    |
| Band14      | 15                        | QPSK       | 23378   | 1RB#0 | NV            | 50               | 31.479         | 0.039457        | ±2.5        | PASS    |

# NB-IoT Band 18(part22)

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | VN            | NT               | 21.506         | 0.026094        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | VL            | NT               | 20.952         | 0.025421        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | VH            | NT               | -21.511        | -0.026100       | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | VN            | NT               | 30.015         | 0.036171        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | VL            | NT               | 30.912         | 0.037253        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | VH            | NT               | 26.625         | 0.032086        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | -30              | 20.654         | 0.025059        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | -20              | 20.029         | 0.024301        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | -10              | 18.037         | 0.021884        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 0                | 24.009         | 0.029130        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 10               | -19.581        | -0.023757       | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 20               | 17.731         | 0.021513        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 30               | 20.389         | 0.024738        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 40               | 19.327         | 0.023449        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23942   | 1RB#0 | NV            | 50               | 17.919         | 0.021741        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | -30              | 24.246         | 0.029219        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | -20              | 26.252         | 0.031636        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | -10              | -22.047        | -0.026569       | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 0                | -33.604        | -0.040497       | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 10               | 20.141         | 0.024272        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 20               | 22.776         | 0.027447        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 30               | 24.558         | 0.029596        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 40               | 23.046         | 0.027773        | ±2.5        | PASS    |
| B18(824-830) | 15                        | BPSK       | 23998   | 1RB#0 | NV            | 50               | 25.581         | 0.030828        | ±2.5        | PASS    |

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | VN            | NT               | 24.395         | 0.029598        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | VL            | NT               | 23.388         | 0.0283766       | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | VH            | NT               | 24.251         | 0.029424        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | VN            | NT               | 30.016         | 0.036173        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | VL            | NT               | 31.066         | 0.037438        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | VH            | NT               | 26.847         | 0.032354        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | -30              | 22.824         | 0.027692        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | -20              | 22.831         | 0.027701        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | -10              | 20.343         | 0.024682        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 0                | 26.101         | 0.031668        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 10               | -22.358        | -0.027127       | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 20               | 20.63          | 0.025030        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 30               | 23.277         | 0.028242        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 40               | 21.816         | 0.02647         | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23942   | 1RB#0 | NV            | 50               | 6.562          | 0.007962        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | -30              | 22.553         | 0.027179        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | -20              | 25.229         | 0.030404        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | -10              | 20.615         | 0.024843        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 0                | 31.979         | 0.038538        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 10               | 8.705          | 0.010490        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 20               | 21.483         | 0.025889        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 30               | 23.381         | 0.028177        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 40               | 21.987         | 0.026497        | ±2.5        | PASS    |
| B18(824-830) | 15                        | QPSK       | 23998   | 1RB#0 | NV            | 50               | -40.928        | -0.049323       | ±2.5        | PASS    |

# NB-IoT Band 18(part90)

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | VN            | NT               | 10.181         | 0.012489        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | VL            | NT               | 8.847          | 0.010853        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | VH            | NT               | 8.706          | 0.010680        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | VN            | NT               | 13.363         | 0.016221        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | VL            | NT               | 14.888         | 0.018072        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | VH            | NT               | 10.436         | 0.012669        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | -30              | 10.363         | 0.012712        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | -20              | 10.780         | 0.013224        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | -10              | -7.529         | -0.009236       | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 0                | 13.817         | 0.016950        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 10               | 9.863          | 0.012099        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 20               | 7.839          | 0.009616        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 30               | 10.582         | 0.012981        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 40               | 8.933          | 0.010958        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23852   | 1RB#0 | NV            | 50               | -11.095        | -0.013610       | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | -30              | 10.087         | 0.01224         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | -20              | 12.250         | 0.01487         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | -10              | -8.113         | -0.00985        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 0                | 14.586         | 0.01771         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 10               | 11.295         | 0.01371         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 20               | -8.617         | -0.01046        | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 30               | 11.303         | 0.01372         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 40               | 9.027          | 0.01096         | ±2.5        | PASS    |
| B18(815-824) | 15                        | BPSK       | 23938   | 1RB#0 | NV            | 50               | 10.595         | 0.01286         | ±2.5        | PASS    |

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | VN            | NT               | 8.395          | 0.010298        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | VL            | NT               | 7.388          | 0.009062        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | VH            | NT               | 7.251          | 0.008895        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | VN            | NT               | 14.016         | 0.017013        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | VL            | NT               | 15.066         | 0.018289        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | VH            | NT               | 10.847         | 0.013167        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | -30              | 6.824          | 0.008371        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | -20              | 6.831          | 0.0083793       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | -10              | 4.343          | 0.0053271       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 0                | 10.101         | 0.0123913       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 10               | 6.358          | 0.0077994       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 20               | 4.630          | 0.0056795       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 30               | 7.277          | 0.0089269       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 40               | 5.816          | 0.0071343       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23852   | 1RB#0 | NV            | 50               | -9.438         | -0.011578       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | -30              | 6.553          | 0.007954        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | -20              | 9.229          | 0.011203        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | -10              | 4.615          | 0.005603        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 0                | -14.979        | -0.018182       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 10               | -7.295         | -0.008855       | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 20               | 5.483          | 0.006656        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 30               | 7.381          | 0.008959        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 40               | 5.987          | 0.007268        | ±2.5        | PASS    |
| B18(815-824) | 15                        | QPSK       | 23938   | 1RB#0 | NV            | 50               | 24.928         | 0.030260        | ±2.5        | PASS    |

## NB-IoT Band 25

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band25  | 15                        | BPSK       | 26042   | 1RB#0 | VN            | NT               | 14.016         | 0.007575        | ±2.5        | PASS    |
| Band25  | 15                        | BPSK       | 26042   | 1RB#0 | VL            | NT               | 15.441         | 0.008346        | ±2.5        | PASS    |
| Band25  | 15                        | BPSK       | 26042   | 1RB#0 | VH            | NT               | 16.507         | 0.008922        | ±2.5        | PASS    |
| Band25  | 15                        | BPSK       | 26688   | 1RB#0 | VN            | NT               | 17.151         | 0.008957        | ±2.5        | PASS    |
| Band25  | 15                        | BPSK       | 26688   | 1RB#0 | VL            | NT               | 12.862         | 0.006717        | ±2.5        | PASS    |
| Band25  | 15                        | BPSK       | 26688   | 1RB#0 | VH            | NT               | 17.393         | 0.009084        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | -30              | 15.830         | 0.008556        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | -20              | 10.140         | 0.005481        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | -10              | 10.020         | 0.005416        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 0                | 16.041         | 0.008670        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 10               | 16.021         | 0.008659        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 20               | -12.123        | -0.006552       | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 30               | 13.913         | 0.007520        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 40               | 20.678         | 0.011176        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26042   | 1RB#0 | NV            | 50               | 15.241         | 0.008238        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | -30              | 13.083         | 0.006833        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | -20              | 15.427         | 0.008057        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | -10              | 23.180         | 0.012105        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 0                | -10.217        | -0.005336       | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 10               | 12.478         | 0.006517        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 20               | -23.130        | -0.012080       | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 30               | 11.313         | 0.005908        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 40               | 16.334         | 0.008531        | ±2.5        | PASS    |
| Band25      | 15                        | BPSK       | 26688   | 1RB#0 | NV            | 50               | 16.591         | 0.008665        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band25  | 15                        | QPSK       | 26042   | 1RB#0 | VN            | NT               | 12.954         | 0.007001        | ±2.5        | PASS    |
| Band25  | 15                        | QPSK       | 26042   | 1RB#0 | VL            | NT               | 17.935         | 0.009694        | ±2.5        | PASS    |
| Band25  | 15                        | QPSK       | 26042   | 1RB#0 | VH            | NT               | 15.185         | 0.008207        | ±2.5        | PASS    |
| Band25  | 15                        | QPSK       | 26688   | 1RB#0 | VN            | NT               | 20.142         | 0.010519        | ±2.5        | PASS    |
| Band25  | 15                        | QPSK       | 26688   | 1RB#0 | VL            | NT               | 11.021         | 0.005756        | ±2.5        | PASS    |
| Band25  | 15                        | QPSK       | 26688   | 1RB#0 | VH            | NT               | 15.671         | 0.008184        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | -30              | 14.708         | 0.007949        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | -20              | 1.720          | 0.000930        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | -10              | 8.751          | 0.004730        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 0                | 14.855         | 0.008029        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 10               | 2.771          | 0.001497        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 20               | 5.047          | 0.002728        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 30               | 12.490         | 0.006751        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 40               | 18.984         | 0.010261        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26042   | 1RB#0 | NV            | 50               | 3.260          | 0.001762        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | -30              | 8.842          | 0.004618        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | -20              | 11.029         | 0.005760        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | -10              | 18.261         | 0.009537        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 0                | 5.542          | 0.002894        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 10               | 5.155          | 0.002692        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 20               | 18.776         | 0.009806        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 30               | 6.453          | 0.003370        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 40               | 12.166         | 0.006354        | ±2.5        | PASS    |
| Band25      | 15                        | QPSK       | 26688   | 1RB#0 | NV            | 50               | 12.025         | 0.006280        | ±2.5        | PASS    |

# NB-IoT Band 26(part22)

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | VN            | NT               | 22.099         | 0.026813        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | VL            | NT               | 20.234         | 0.024550        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | VH            | NT               | 20.360         | 0.024703        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | VN            | NT               | 17.315         | 0.020400        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | VL            | NT               | 17.896         | 0.021084        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | VH            | NT               | 20.481         | 0.024129        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | -30              | 25.603         | 0.031064        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | -20              | 21.062         | 0.025554        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | -10              | 21.805         | 0.026457        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 0                | 23.573         | 0.028601        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 10               | 18.017         | 0.021860        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 20               | 18.444         | 0.022378        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 30               | 20.659         | 0.025066        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 40               | 25.014         | 0.030349        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 26792   | 1RB#0 | NV            | 50               | 23.128         | 0.028061        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | -30              | 20.277         | 0.023889        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | -20              | 23.258         | 0.027401        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | -10              | 20.437         | 0.024078        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 0                | 22.762         | 0.026817        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 10               | 24.769         | 0.029182        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 20               | 25.583         | 0.030140        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 30               | 24.547         | 0.028920        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 40               | 25.126         | 0.029601        | ±2.5        | PASS    |
| B26(824-849) | 15                        | BPSK       | 27038   | 1RB#0 | NV            | 50               | 28.503         | 0.033580        | ±2.5        | PASS    |

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | VN            | NT               | 20.725         | 0.025146        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | VL            | NT               | 23.073         | 0.027994        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | VH            | NT               | 22.616         | 0.027440        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | VN            | NT               | -15.015        | -0.017689       | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | VL            | NT               | 18.733         | 0.022070        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | VH            | NT               | 17.633         | 0.020773        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | -30              | 23.957         | 0.029067        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | -20              | 19.065         | 0.023132        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | -10              | 19.841         | 0.024074        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 0                | 21.725         | 0.026359        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 10               | 26.394         | 0.032024        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 20               | 25.467         | 0.030900        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 30               | 19.384         | 0.023518        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 40               | 25.516         | 0.030959        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 26792   | 1RB#0 | NV            | 50               | 13.393         | 0.016250        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | -30              | 22.520         | 0.026532        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | -20              | 25.579         | 0.030135        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | -10              | 22.926         | 0.027010        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 0                | 25.025         | 0.029482        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 10               | 27.350         | 0.032222        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 20               | 28.103         | 0.033109        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 30               | 26.856         | 0.031641        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 40               | 27.315         | 0.032180        | ±2.5        | PASS    |
| B26(824-849) | 15                        | QPSK       | 27038   | 1RB#0 | NV            | 50               | 13.970         | 0.016458        | ±2.5        | PASS    |

# NB-IoT Band 26(part90)

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | VN            | NT               | 23.179         | 0.028469        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | VL            | NT               | 21.713         | 0.026668        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | VH            | NT               | 21.056         | 0.025862        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | VN            | NT               | 26.343         | 0.031978        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | VL            | NT               | 22.852         | 0.027740        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | VH            | NT               | 23.043         | 0.027972        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | -30              | 24.023         | 0.029505        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | -20              | 22.621         | 0.027783        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | -10              | 20.196         | 0.024805        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 0                | 23.564         | 0.028941        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 10               | 23.230         | 0.028532        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 20               | 21.847         | 0.026833        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 30               | 20.314         | 0.024950        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 40               | 22.728         | 0.027914        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26692   | 1RB#0 | NV            | 50               | 19.843         | 0.024371        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | -30              | 20.169         | 0.024483        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | -20              | 23.121         | 0.028067        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | -10              | 28.495         | 0.034589        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 0                | 20.331         | 0.024680        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 10               | 23.389         | 0.028392        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 20               | 26.520         | 0.032192        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 30               | 22.843         | 0.027729        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 40               | 24.155         | 0.029321        | ±2.5        | PASS    |
| B26(814-824) | 15                        | BPSK       | 26788   | 1RB#0 | NV            | 50               | 27.140         | 0.032945        | ±2.5        | PASS    |

| Voltage      |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | VN            | NT               | 21.348         | 0.026220        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | VL            | NT               | 20.224         | 0.024839        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | VH            | NT               | 19.724         | 0.024226        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | VN            | NT               | 25.315         | 0.030729        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | VL            | NT               | 16.858         | 0.020464        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | VH            | NT               | 21.457         | 0.026047        | ±2.5        | PASS    |

| Temperature  |                           |            |         |       |               |                  |                |                 |             |         |
|--------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band         | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | -30              | -23.019        | -0.028272       | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | -20              | 21.333         | 0.026202        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | -10              | 27.094         | 0.033277        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 0                | 22.496         | 0.027630        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 10               | 21.761         | 0.026727        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 20               | -20.816        | -0.025566       | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 30               | 22.172         | 0.027232        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 40               | 20.861         | 0.025622        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26692   | 1RB#0 | NV            | 50               | 23.934         | 0.029396        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | -30              | 32.480         | 0.039427        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | -20              | -21.545        | -0.026153       | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | -10              | -26.645        | -0.032345       | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 0                | 30.823         | 0.037416        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 10               | 21.738         | 0.026388        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 20               | 25.505         | 0.030960        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 30               | 30.122         | 0.036565        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 40               | 22.309         | 0.027080        | ±2.5        | PASS    |
| B26(814-824) | 15                        | QPSK       | 26788   | 1RB#0 | NV            | 50               | -25.192        | -0.030580       | ±2.5        | PASS    |

## NB-IoT Band 66

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band66  | 15                        | BPSK       | 131974  | 1RB#0 | VN            | NT               | 51.017         | 0.029831        | ±2.5        | PASS    |
| Band66  | 15                        | BPSK       | 131974  | 1RB#0 | VL            | NT               | 50.223         | 0.029367        | ±2.5        | PASS    |
| Band66  | 15                        | BPSK       | 131974  | 1RB#0 | VH            | NT               | 49.827         | 0.029135        | ±2.5        | PASS    |
| Band66  | 15                        | BPSK       | 132670  | 1RB#0 | VN            | NT               | 52.252         | 0.029032        | ±2.5        | PASS    |
| Band66  | 15                        | BPSK       | 132670  | 1RB#0 | VL            | NT               | 53.908         | 0.029952        | ±2.5        | PASS    |
| Band66  | 15                        | BPSK       | 132670  | 1RB#0 | VH            | NT               | 54.023         | 0.030016        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | -30              | 49.315         | 0.028836        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | -20              | 49.998         | 0.029235        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | -10              | 52.396         | 0.030637        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 0                | 50.810         | 0.029710        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 10               | 48.996         | 0.028649        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 20               | 55.841         | 0.032652        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 30               | 49.437         | 0.028907        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 40               | 48.842         | 0.028559        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 131974  | 1RB#0 | NV            | 50               | 49.598         | 0.029002        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | -30              | 53.210         | 0.029564        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | -20              | 52.565         | 0.029206        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | -10              | 50.541         | 0.028081        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 0                | 52.559         | 0.029203        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 10               | 52.831         | 0.029354        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 20               | 51.018         | 0.028347        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 30               | 53.487         | 0.029718        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 40               | 51.646         | 0.028695        | ±2.5        | PASS    |
| Band66      | 15                        | BPSK       | 132670  | 1RB#0 | NV            | 50               | 51.077         | 0.028379        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band66  | 15                        | QPSK       | 131974  | 1RB#0 | VN            | NT               | 51.967         | 0.030386        | ±2.5        | PASS    |
| Band66  | 15                        | QPSK       | 131974  | 1RB#0 | VL            | NT               | 50.865         | 0.029742        | ±2.5        | PASS    |
| Band66  | 15                        | QPSK       | 131974  | 1RB#0 | VH            | NT               | 50.362         | 0.029448        | ±2.5        | PASS    |
| Band66  | 15                        | QPSK       | 132670  | 1RB#0 | VN            | NT               | 58.051         | 0.032617        | ±2.5        | PASS    |
| Band66  | 15                        | QPSK       | 132670  | 1RB#0 | VL            | NT               | -49.407        | -0.027760       | ±2.5        | PASS    |
| Band66  | 15                        | QPSK       | 132670  | 1RB#0 | VH            | NT               | 54.355         | 0.030540        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | -30              | 50.173         | 0.029337        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | -20              | 50.209         | 0.029359        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | -10              | 48.438         | 0.028323        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 0                | -51.066        | -0.029860       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 10               | 49.955         | 0.029210        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 20               | 48.626         | 0.028433        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 30               | 50.379         | 0.029458        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 40               | 49.803         | 0.029121        | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 131974  | 1RB#0 | NV            | 50               | -47.978        | -0.028054       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | -30              | 50.358         | 0.0282941       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | -20              | 49.580         | 0.0278570       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | -10              | 48.170         | 0.0270650       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 0                | 50.323         | 0.0282747       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 10               | 50.102         | 0.0281504       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 20               | 48.891         | 0.0274702       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 30               | 50.739         | 0.0285085       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 40               | 49.581         | 0.0278577       | ±2.5        | PASS    |
| Band66      | 15                        | QPSK       | 132670  | 1RB#0 | NV            | 50               | 48.266         | 0.0271189       | ±2.5        | PASS    |

## NB-IoT Band 71

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band71  | 15                        | BPSK       | 133124  | 1RB#0 | VN            | NT               | 14.471         | 0.021820        | ±2.5        | PASS    |
| Band71  | 15                        | BPSK       | 133124  | 1RB#0 | VL            | NT               | 14.211         | 0.021427        | ±2.5        | PASS    |
| Band71  | 15                        | BPSK       | 133124  | 1RB#0 | VH            | NT               | 13.839         | 0.020867        | ±2.5        | PASS    |
| Band71  | 15                        | BPSK       | 133470  | 1RB#0 | VN            | NT               | 20.889         | 0.029935        | ±2.5        | PASS    |
| Band71  | 15                        | BPSK       | 133470  | 1RB#0 | VL            | NT               | 22.014         | 0.031548        | ±2.5        | PASS    |
| Band71  | 15                        | BPSK       | 133470  | 1RB#0 | VH            | NT               | 20.140         | 0.028862        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | -30              | 14.018         | 0.021136        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | -20              | 12.868         | 0.019403        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | -10              | 10.956         | 0.016520        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 0                | 12.014         | 0.018115        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 10               | 13.443         | 0.020270        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 20               | 11.075         | 0.016699        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 30               | 13.571         | 0.020464        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 40               | 12.717         | 0.019175        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133124  | 1RB#0 | NV            | 50               | 22.609         | 0.032400        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | -30              | 18.347         | 0.026292        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | -20              | 20.226         | 0.028986        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | -10              | 16.573         | 0.023750        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 0                | 17.806         | 0.025517        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 10               | 24.301         | 0.034826        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 20               | 16.780         | 0.024047        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 30               | 19.603         | 0.028092        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 40               | 17.557         | 0.025161        | ±2.5        | PASS    |
| Band71      | 15                        | BPSK       | 133470  | 1RB#0 | NV            | 50               | 16.853         | 0.024152        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band71  | 15                        | QPSK       | 133124  | 1RB#0 | VN            | NT               | 12.153         | 0.018325        | ±2.5        | PASS    |
| Band71  | 15                        | QPSK       | 133124  | 1RB#0 | VL            | NT               | 11.328         | 0.017081        | ±2.5        | PASS    |
| Band71  | 15                        | QPSK       | 133124  | 1RB#0 | VH            | NT               | 11.298         | 0.017035        | ±2.5        | PASS    |
| Band71  | 15                        | QPSK       | 133470  | 1RB#0 | VN            | NT               | 18.584         | 0.026632        | ±2.5        | PASS    |
| Band71  | 15                        | QPSK       | 133470  | 1RB#0 | VL            | NT               | 29.775         | 0.042669        | ±2.5        | PASS    |
| Band71  | 15                        | QPSK       | 133470  | 1RB#0 | VH            | NT               | 14.697         | 0.021061        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | -30              | 11.139         | 0.016796        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | -20              | 10.529         | 0.015877        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | -10              | 8.462          | 0.012759        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 0                | 14.960         | 0.022557        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 10               | 10.866         | 0.016384        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 20               | 8.667          | 0.013069        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 30               | 10.681         | 0.016105        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 40               | 10.210         | 0.015394        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133124  | 1RB#0 | NV            | 50               | -15.020        | -0.022648       | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | -30              | 10.478         | 0.015015        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | -20              | 12.635         | 0.018107        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | -10              | 9.072          | 0.013001        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 0                | -10.377        | -0.014872       | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 10               | 16.393         | 0.023493        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 20               | 9.498          | 0.013611        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 30               | 11.614         | 0.016644        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 40               | 10.435         | 0.014954        | ±2.5        | PASS    |
| Band71      | 15                        | QPSK       | 133470  | 1RB#0 | NV            | 50               | 9.169          | 0.013139        | ±2.5        | PASS    |

## NB-IoT Band 85

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band85  | 15                        | BPSK       | 134004  | 1RB#0 | VN            | NT               | 50.898         | 0.072899        | ±2.5        | PASS    |
| Band85  | 15                        | BPSK       | 134004  | 1RB#0 | VL            | NT               | 48.530         | 0.069508        | ±2.5        | PASS    |
| Band85  | 15                        | BPSK       | 134004  | 1RB#0 | VH            | NT               | 49.824         | 0.071361        | ±2.5        | PASS    |
| Band85  | 15                        | BPSK       | 134180  | 1RB#0 | VN            | NT               | 56.473         | 0.078895        | ±2.5        | PASS    |
| Band85  | 15                        | BPSK       | 134180  | 1RB#0 | VL            | NT               | 55.638         | 0.077728        | ±2.5        | PASS    |
| Band85  | 15                        | BPSK       | 134180  | 1RB#0 | VH            | NT               | 53.384         | 0.074580        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | -30              | 49.203         | 0.070471        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | -20              | -48.451        | -0.069394       | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | -10              | 49.617         | 0.071064        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 0                | 52.449         | 0.075120        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 10               | 48.405         | 0.069329        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 20               | 46.699         | 0.066885        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 30               | 49.098         | 0.070321        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 40               | 48.242         | 0.069095        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134004  | 1RB#0 | NV            | 50               | 49.320         | 0.070638        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | -30              | 53.172         | 0.074283        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | -20              | 55.485         | 0.077514        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | -10              | -51.995        | -0.072639       | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 0                | 55.014         | 0.076857        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 10               | 48.147         | 0.067263        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 20               | 52.096         | 0.072780        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 30               | 54.397         | 0.075995        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 40               | 53.454         | 0.074677        | ±2.5        | PASS    |
| Band85      | 15                        | BPSK       | 134180  | 1RB#0 | NV            | 50               | 51.596         | 0.072081        | ±2.5        | PASS    |

| Voltage |                           |            |         |       |               |                  |                |                 |             |         |
|---------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band    | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band85  | 15                        | QPSK       | 134004  | 1RB#0 | VN            | NT               | 53.050         | 0.075981        | ±2.5        | PASS    |
| Band85  | 15                        | QPSK       | 134004  | 1RB#0 | VL            | NT               | 51.488         | 0.073745        | ±2.5        | PASS    |
| Band85  | 15                        | QPSK       | 134004  | 1RB#0 | VH            | NT               | 52.060         | 0.074563        | ±2.5        | PASS    |
| Band85  | 15                        | QPSK       | 134180  | 1RB#0 | VN            | NT               | 58.629         | 0.081930        | ±2.5        | PASS    |
| Band85  | 15                        | QPSK       | 134180  | 1RB#0 | VL            | NT               | 70.033         | 0.097866        | ±2.5        | PASS    |
| Band85  | 15                        | QPSK       | 134180  | 1RB#0 | VH            | NT               | 55.608         | 0.077709        | ±2.5        | PASS    |

| Temperature |                           |            |         |       |               |                  |                |                 |             |         |
|-------------|---------------------------|------------|---------|-------|---------------|------------------|----------------|-----------------|-------------|---------|
| Band        | Sub-carrier spacing (KHz) | Modulation | Channel | Tones | Voltage [Vdc] | Temperature (°C) | Deviation (Hz) | Deviation (ppm) | Limit (ppm) | Verdict |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | -30              | 51.364         | 0.073566        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | -20              | 50.847         | 0.072826        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | -10              | -48.952        | -0.070111       | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 0                | 55.075         | 0.078882        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 10               | 50.888         | 0.072884        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 20               | 48.994         | 0.070172        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 30               | 51.608         | 0.073916        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 40               | 50.464         | 0.072277        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134004  | 1RB#0 | NV            | 50               | 35.416         | 0.050725        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | -30              | 50.592         | 0.070698        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | -20              | 53.339         | 0.074537        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | -10              | 49.289         | 0.068878        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 0                | 29.906         | 0.041792        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 10               | -57.089        | -0.079778       | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 20               | 49.784         | 0.069570        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 30               | 52.358         | 0.073167        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 40               | 50.896         | 0.071123        | ±2.5        | PASS    |
| Band85      | 15                        | QPSK       | 134180  | 1RB#0 | NV            | 50               | -49.261        | -0.068839       | ±2.5        | PASS    |

## 1. Cat-M\_Band2

### 1.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 18900      | 20              | 0           | 6            | 0              | QPSK          | -7.01         | -4700            | 4700             | Pass    |
| -30 Degree       | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -6.18         | -4700            | 4700             | Pass    |

## 1.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 18900      | 20              | 0           | 6            | 0              | QPSK          | -10.29        | -4700            | 4700             | Pass    |
| -20 Degree       | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -9.3          | -4700            | 4700             | Pass    |

### 1.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 18900      | 20              | 0           | 6            | 0              | QPSK          | -6.57         | -4700            | 4700             | Pass    |
| -10 Degree       | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -6.47         | -4700            | 4700             | Pass    |

#### 1.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 18900      | 20              | 0           | 6            | 0              | QPSK          | -7.55         | -4700            | 4700             | Pass    |
| 0 Degree         | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -7.4          | -4700            | 4700             | Pass    |

### 1.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -7.68         | -4700            | 4700             | Pass    |
| 10 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -7.27         | -4700            | 4700             | Pass    |

## 1.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -8.33         | -4700            | 4700             | Pass    |
| 20 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -8.28         | -4700            | 4700             | Pass    |

### 1.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -8.14         | -4700            | 4700             | Pass    |
| 25 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -8.15         | -4700            | 4700             | Pass    |

## 1.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -9.43         | -4700            | 4700             | Pass    |
| 30 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -9.16         | -4700            | 4700             | Pass    |

### 1.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -8.85         | -4700            | 4700             | Pass    |
| 40 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -9.01         | -4700            | 4700             | Pass    |

### 1.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 18900      | 20              | 0           | 6            | 0              | QPSK          | -10.1         | -4700            | 4700             | Pass    |
| 50 Degree        | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -9.37         | -4700            | 4700             | Pass    |

### 1.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 18900      | 20              | 0           | 6            | 0              | QPSK          | -10.87        | -4700            | 4700             | Pass    |
| NTHV             | 18900      | 20              | 0           | 5            | 0              | 16QAM         | -10.97        | -4700            | 4700             | Pass    |

### 1.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environm ent | UL Chann el | Bandwid th (MHz) | UL NB Inde x | UL RB Numb er | UL RB Positi on | UL Modulati on | Measur ed (Hz) | Low er Limit (Hz) | Upp er Limit (Hz) | Verdi ct |
|-------------------|-------------|------------------|--------------|---------------|-----------------|----------------|----------------|-------------------|-------------------|----------|
| NTLV              | 18900       | 20               | 0            | 6             | 0               | QPSK           | -12.37         | -4700             | 4700              | Pass     |
| NTLV              | 18900       | 20               | 0            | 5             | 0               | 16QAM          | -12.22         | -4700             | 4700              | Pass     |

## 2. Cat-M\_Band4

### 2.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 20175      | 20              | 0           | 6            | 0              | QPSK          | 4.31          | -4331.25         | 4331.25          | Pass    |
| -30 Degree       | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 3.1           | -4331.25         | 4331.25          | Pass    |

## 2.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.36          | -4331.25         | 4331.25          | Pass    |
| -20 Degree       | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 3.48          | -4331.25         | 4331.25          | Pass    |

### 2.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.98          | -4331.25         | 4331.25          | Pass    |
| -10 Degree       | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 3.46          | -4331.25         | 4331.25          | Pass    |

## 2.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.36          | -4331.25         | 4331.25          | Pass    |
| 0 Degree         | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.1           | -4331.25         | 4331.25          | Pass    |

## 2.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 3.23          | -4331.25         | 4331.25          | Pass    |
| 10 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.9           | -4331.25         | 4331.25          | Pass    |

## 2.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.16          | -4331.25         | 4331.25          | Pass    |
| 20 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.7           | -4331.25         | 4331.25          | Pass    |

## 2.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.5           | -4331.25         | 4331.25          | Pass    |
| 25 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.75          | -4331.25         | 4331.25          | Pass    |

## 2.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 1.76          | -4331.25         | 4331.25          | Pass    |
| 30 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.36          | -4331.25         | 4331.25          | Pass    |

## 2.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.92          | -4331.25         | 4331.25          | Pass    |
| 40 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 3.13          | -4331.25         | 4331.25          | Pass    |

## 2.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 20175      | 20              | 0           | 6            | 0              | QPSK          | 2.12          | -4331.25         | 4331.25          | Pass    |
| 50 Degree        | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.29          | -4331.25         | 4331.25          | Pass    |

## 2.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 20175      | 20              | 0           | 6            | 0              | QPSK          | 1.67          | -4331.25         | 4331.25          | Pass    |
| NTHV             | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 1.2           | -4331.25         | 4331.25          | Pass    |

## 2.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 20175      | 20              | 0           | 6            | 0              | QPSK          | 1.59          | -4331.25         | 4331.25          | Pass    |
| NTLV             | 20175      | 20              | 0           | 5            | 0              | 16QAM         | 2.17          | -4331.25         | 4331.25          | Pass    |

### 3. Cat-M\_Band5

#### 3.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 20525      | 10              | 0           | 6            | 0              | QPSK          | -0.67         | -2091.25         | 2091.25          | Pass    |
| -30 Degree       | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.24         | -2091.25         | 2091.25          | Pass    |

### 3.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environm ent | UL Chann el | Bandwi dth (MHz) | UL NB Inde x | UL RB Numb er | UL RB Positi on | UL Modulati on | Measur ed (Hz) | Lower Limit (Hz) | Uppe r Limit (Hz) | Verdi ct |
|-------------------|-------------|------------------|--------------|---------------|-----------------|----------------|----------------|------------------|-------------------|----------|
| -20 Degree        | 20525       | 10               | 0            | 6             | 0               | QPSK           | -1.16          | -2091.25         | 2091.25           | Pass     |
| -20 Degree        | 20525       | 10               | 0            | 5             | 0               | 16QAM          | -0.82          | -2091.25         | 2091.25           | Pass     |

### 3.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 20525      | 10              | 0           | 6            | 0              | QPSK          | -1.63         | -2091.25         | 2091.25          | Pass    |
| -10 Degree       | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.42         | -2091.25         | 2091.25          | Pass    |

### 3.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 20525      | 10              | 0           | 6            | 0              | QPSK          | -2.53         | -2091.25         | 2091.25          | Pass    |
| 0 Degree         | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.79         | -2091.25         | 2091.25          | Pass    |

### 3.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -2.96         | -2091.25         | 2091.25          | Pass    |
| 10 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.67         | -2091.25         | 2091.25          | Pass    |

### 3.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -3.78         | -2091.25         | 2091.25          | Pass    |
| 20 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.23         | -2091.25         | 2091.25          | Pass    |

### 3.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -3.58         | -2091.25         | 2091.25          | Pass    |
| 25 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.72         | -2091.25         | 2091.25          | Pass    |

### 3.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -3.05         | -2091.25         | 2091.25          | Pass    |
| 30 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -1.76         | -2091.25         | 2091.25          | Pass    |

### 3.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -2.96         | -2091.25         | 2091.25          | Pass    |
| 40 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -2.46         | -2091.25         | 2091.25          | Pass    |

### 3.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 20525      | 10              | 0           | 6            | 0              | QPSK          | -2.4          | -2091.25         | 2091.25          | Pass    |
| 50 Degree        | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -2.47         | -2091.25         | 2091.25          | Pass    |

### 3.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 20525      | 10              | 0           | 6            | 0              | QPSK          | -4.18         | -2091.25         | 2091.25          | Pass    |
| NTHV             | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -2.8          | -2091.25         | 2091.25          | Pass    |

### 3.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 20525      | 10              | 0           | 6            | 0              | QPSK          | -4.15         | -2091.25         | 2091.25          | Pass    |
| NTLV             | 20525      | 10              | 0           | 5            | 0              | 16QAM         | -2.56         | -2091.25         | 2091.25          | Pass    |

## 4. Cat-M\_Band12

### 4.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.3          | -1768.75         | 1768.75          | Pass    |
| -30 Degree       | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.72         | -1768.75         | 1768.75          | Pass    |

#### 4.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environm<br>ent | UL Chann<br>el | Bandwi<br>dth<br>(MHz) | UL<br>NB<br>Inde<br>x | UL RB<br>Numb<br>er | UL RB<br>Positi<br>on | UL<br>Modulati<br>on | Measur<br>ed (Hz) | Lower<br>Limit<br>(Hz) | Uppe<br>r<br>Limit<br>(Hz) | Verdi<br>ct |
|----------------------|----------------|------------------------|-----------------------|---------------------|-----------------------|----------------------|-------------------|------------------------|----------------------------|-------------|
| -20<br>Degree        | 23095          | 10                     | 0                     | 6                   | 0                     | QPSK                 | -4.29             | -1768.<br>75           | 1768.<br>75                | Pass        |
| -20<br>Degree        | 23095          | 10                     | 0                     | 5                   | 0                     | 16QAM                | -3.82             | -1768.<br>75           | 1768.<br>75                | Pass        |

#### 4.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.96         | -1768.75         | 1768.75          | Pass    |
| -10 Degree       | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.6          | -1768.75         | 1768.75          | Pass    |

#### 4.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.6          | -1768.75         | 1768.75          | Pass    |
| 0 Degree         | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -4.08         | -1768.75         | 1768.75          | Pass    |

#### 4.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -4.41         | -1768.75         | 1768.75          | Pass    |
| 10 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.89         | -1768.75         | 1768.75          | Pass    |

#### 4.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.4          | -1768.75         | 1768.75          | Pass    |
| 20 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.99         | -1768.75         | 1768.75          | Pass    |

#### 4.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.82         | -1768.75         | 1768.75          | Pass    |
| 25 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -4.06         | -1768.75         | 1768.75          | Pass    |

#### 4.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.88         | -1768.75         | 1768.75          | Pass    |
| 30 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -2.63         | -1768.75         | 1768.75          | Pass    |

#### 4.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.76         | -1768.75         | 1768.75          | Pass    |
| 40 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.43         | -1768.75         | 1768.75          | Pass    |

#### 4.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.43         | -1768.75         | 1768.75          | Pass    |
| 50 Degree        | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -3.45         | -1768.75         | 1768.75          | Pass    |

#### 4.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.56         | -1768.75         | 1768.75          | Pass    |
| NTHV             | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -2.45         | -1768.75         | 1768.75          | Pass    |

#### 4.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 23095      | 10              | 0           | 6            | 0              | QPSK          | -3.88         | -1768.75         | 1768.75          | Pass    |
| NTLV             | 23095      | 10              | 0           | 5            | 0              | 16QAM         | -4.16         | -1768.75         | 1768.75          | Pass    |

## 5. Cat-M\_Band13

### 5.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 23230      | 10              | 0           | 6            | 0              | QPSK          | -2.26         | -1955            | 1955             | Pass    |
| -30 Degree       | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -3.1          | -1955            | 1955             | Pass    |

## 5.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 23230      | 10              | 0           | 6            | 0              | QPSK          | -3.83         | -1955            | 1955             | Pass    |
| -20 Degree       | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -4.68         | -1955            | 1955             | Pass    |

### 5.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 23230      | 10              | 0           | 6            | 0              | QPSK          | -2.25         | -1955            | 1955             | Pass    |
| -10 Degree       | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -4.29         | -1955            | 1955             | Pass    |

#### 5.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 23230      | 10              | 0           | 6            | 0              | QPSK          | -3.06         | -1955            | 1955             | Pass    |
| 0 Degree         | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -4.33         | -1955            | 1955             | Pass    |

## 5.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -3.81         | -1955            | 1955             | Pass    |
| 10 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -4.49         | -1955            | 1955             | Pass    |

## 5.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -4.18         | -1955            | 1955             | Pass    |
| 20 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -2.52         | -1955            | 1955             | Pass    |

### 5.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -4.75         | -1955            | 1955             | Pass    |
| 25 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -2.45         | -1955            | 1955             | Pass    |

## 5.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -3.48         | -1955            | 1955             | Pass    |
| 30 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -2.55         | -1955            | 1955             | Pass    |

### 5.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -4.89         | -1955            | 1955             | Pass    |
| 40 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -2.23         | -1955            | 1955             | Pass    |

### 5.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 23230      | 10              | 0           | 6            | 0              | QPSK          | -5.06         | -1955            | 1955             | Pass    |
| 50 Degree        | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -5.42         | -1955            | 1955             | Pass    |

### 5.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 23230      | 10              | 0           | 6            | 0              | QPSK          | -3.83         | -1955            | 1955             | Pass    |
| NTHV             | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -3.29         | -1955            | 1955             | Pass    |

## 5.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 23230      | 10              | 0           | 6            | 0              | QPSK          | -4.86         | -1955            | 1955             | Pass    |
| NTLV             | 23230      | 10              | 0           | 5            | 0              | 16QAM         | -4.35         | -1955            | 1955             | Pass    |

## 6. Cat-M\_Band18(part22)

### 6.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 23970      | 5               | 0           | 6            | 0              | QPSK          | 1.32          | -2067.5          | 2067.5           | Pass    |
| -30 Degree       | 23970      | 5               | 0           | 5            | 0              | 16QAM         | 1.19          | -2067.5          | 2067.5           | Pass    |

## 6.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 23970      | 5               | 0           | 6            | 0              | QPSK          | -1.29         | -2067.5          | 2067.5           | Pass    |
| -20 Degree       | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -0.94         | -2067.5          | 2067.5           | Pass    |

### 6.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 23970      | 5               | 0           | 6            | 0              | QPSK          | -4.06         | -2067.5          | 2067.5           | Pass    |
| -10 Degree       | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -2.66         | -2067.5          | 2067.5           | Pass    |

#### 6.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 23970      | 5               | 0           | 6            | 0              | QPSK          | -6.08         | -2067.5          | 2067.5           | Pass    |
| 0 Degree         | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -5.48         | -2067.5          | 2067.5           | Pass    |

## 6.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | -7.47         | -2067.5          | 2067.5           | Pass    |
| 10 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -6.38         | -2067.5          | 2067.5           | Pass    |

## 6.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | 0.54          | -2067.5          | 2067.5           | Pass    |
| 20 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | 3.02          | -2067.5          | 2067.5           | Pass    |

## 6.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | 0.16          | -2067.5          | 2067.5           | Pass    |
| 25 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | 1.19          | -2067.5          | 2067.5           | Pass    |

## 6.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | -0.37         | -2067.5          | 2067.5           | Pass    |
| 30 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | 0.74          | -2067.5          | 2067.5           | Pass    |

## 6.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | -0.93         | -2067.5          | 2067.5           | Pass    |
| 40 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | 0.84          | -2067.5          | 2067.5           | Pass    |

## 6.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 23970      | 5               | 0           | 6            | 0              | QPSK          | -0.72         | -2067.5          | 2067.5           | Pass    |
| 50 Degree        | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -0.19         | -2067.5          | 2067.5           | Pass    |

## 6.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 23970      | 5               | 0           | 6            | 0              | QPSK          | -1.56         | -2067.5          | 2067.5           | Pass    |
| NTHV             | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -0.54         | -2067.5          | 2067.5           | Pass    |

## 6.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 23970      | 5               | 0           | 6            | 0              | QPSK          | -1.07         | -2067.5          | 2067.5           | Pass    |
| NTLV             | 23970      | 5               | 0           | 5            | 0              | 16QAM         | -1.22         | -2067.5          | 2067.5           | Pass    |

## 7. Cat-M\_Band25

### 7.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 26365      | 20              | 0           | 6            | 0              | QPSK          | 4.35          | -4706.25         | 4706.25          | Pass    |
| -30 Degree       | 26365      | 20              | 0           | 5            | 0              | 16QAM         | 1.96          | -4706.25         | 4706.25          | Pass    |

## 7.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 26365      | 20              | 0           | 6            | 0              | QPSK          | 1.29          | -4706.25         | 4706.25          | Pass    |
| -20 Degree       | 26365      | 20              | 0           | 5            | 0              | 16QAM         | 0.37          | -4706.25         | 4706.25          | Pass    |

### 7.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 26365      | 20              | 0           | 6            | 0              | QPSK          | -0.16         | -4706.25         | 4706.25          | Pass    |
| -10 Degree       | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -3.32         | -4706.25         | 4706.25          | Pass    |

#### 7.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 26365      | 20              | 0           | 6            | 0              | QPSK          | -3.42         | -4706.25         | 4706.25          | Pass    |
| 0 Degree         | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -4.31         | -4706.25         | 4706.25          | Pass    |

## 7.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -3.23         | -4706.25         | 4706.25          | Pass    |
| 10 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -4.95         | -4706.25         | 4706.25          | Pass    |

## 7.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -5.58         | -4706.25         | 4706.25          | Pass    |
| 20 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -6.44         | -4706.25         | 4706.25          | Pass    |

## 7.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -6.77         | -4706.25         | 4706.25          | Pass    |
| 25 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -6.69         | -4706.25         | 4706.25          | Pass    |

## 7.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -7.22         | -4706.25         | 4706.25          | Pass    |
| 30 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -7.54         | -4706.25         | 4706.25          | Pass    |

## 7.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -8.35         | -4706.25         | 4706.25          | Pass    |
| 40 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -9.33         | -4706.25         | 4706.25          | Pass    |

## 7.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 26365      | 20              | 0           | 6            | 0              | QPSK          | -8.55         | -4706.25         | 4706.25          | Pass    |
| 50 Degree        | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -9.36         | -4706.25         | 4706.25          | Pass    |

### 7.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 26365      | 20              | 0           | 6            | 0              | QPSK          | -9.47         | -4706.25         | 4706.25          | Pass    |
| NTHV             | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -7.52         | -4706.25         | 4706.25          | Pass    |

## 7.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 26365      | 20              | 0           | 6            | 0              | QPSK          | -0.2          | -4706.25         | 4706.25          | Pass    |
| NTLV             | 26365      | 20              | 0           | 5            | 0              | 16QAM         | -0.97         | -4706.25         | 4706.25          | Pass    |

## 8. Cat-M\_Band26(part22)

### 8.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.53         | -2091.25         | 2091.25          | Pass    |
| -30 Degree       | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.36         | -2091.25         | 2091.25          | Pass    |

## 8.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environm ent | UL Chann el | Bandwi dth (MHz) | UL NB Inde x | UL RB Numb er | UL RB Positi on | UL Modulati on | Measur ed (Hz) | Lower Limit (Hz) | Uppe r Limit (Hz) | Verdi ct |
|-------------------|-------------|------------------|--------------|---------------|-----------------|----------------|----------------|------------------|-------------------|----------|
| -20 Degree        | 26915       | 15               | 0            | 6             | 0               | QPSK           | -3.43          | -2091.25         | 2091.25           | Pass     |
| -20 Degree        | 26915       | 15               | 0            | 5             | 0               | 16QAM          | -2.47          | -2091.25         | 2091.25           | Pass     |

### 8.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.19         | -2091.25         | 2091.25          | Pass    |
| -10 Degree       | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.85         | -2091.25         | 2091.25          | Pass    |

#### 8.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.93         | -2091.25         | 2091.25          | Pass    |
| 0 Degree         | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.48         | -2091.25         | 2091.25          | Pass    |

## 8.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.49         | -2091.25         | 2091.25          | Pass    |
| 10 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.71         | -2091.25         | 2091.25          | Pass    |

## 8.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -5.24         | -2091.25         | 2091.25          | Pass    |
| 20 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.12         | -2091.25         | 2091.25          | Pass    |

## 8.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.82         | -2091.25         | 2091.25          | Pass    |
| 25 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.18         | -2091.25         | 2091.25          | Pass    |

## 8.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -4.79         | -2091.25         | 2091.25          | Pass    |
| 30 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -4.12         | -2091.25         | 2091.25          | Pass    |

## 8.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -4.09         | -2091.25         | 2091.25          | Pass    |
| 40 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.33         | -2091.25         | 2091.25          | Pass    |

## 8.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 26915      | 15              | 0           | 6            | 0              | QPSK          | -3.83         | -2091.25         | 2091.25          | Pass    |
| 50 Degree        | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -4.35         | -2091.25         | 2091.25          | Pass    |

### 8.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 26915      | 15              | 0           | 6            | 0              | QPSK          | -4.73         | -2091.25         | 2091.25          | Pass    |
| NTHV             | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -3.85         | -2091.25         | 2091.25          | Pass    |

## 8.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 26915      | 15              | 0           | 6            | 0              | QPSK          | -4.61         | -2091.25         | 2091.25          | Pass    |
| NTLV             | 26915      | 15              | 0           | 5            | 0              | 16QAM         | -4.32         | -2091.25         | 2091.25          | Pass    |

## 9. Cat-M\_Band66

### 9.2. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 132322     | 20              | 0           | 6            | 0              | QPSK          | -5.09         | -4362.5          | 4362.5           | Pass    |
| -30 Degree       | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -4.84         | -4362.5          | 4362.5           | Pass    |

### 9.3. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 132322     | 20              | 0           | 6            | 0              | QPSK          | -5.54         | -4362.5          | 4362.5           | Pass    |
| -20 Degree       | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -5.79         | -4362.5          | 4362.5           | Pass    |

#### 9.4. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 132322     | 20              | 0           | 6            | 0              | QPSK          | -5.48         | -4362.5          | 4362.5           | Pass    |
| -10 Degree       | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -6.54         | -4362.5          | 4362.5           | Pass    |

## 9.5. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 132322     | 20              | 0           | 6            | 0              | QPSK          | -6.49         | -4362.5          | 4362.5           | Pass    |
| 0 Degree         | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -7.04         | -4362.5          | 4362.5           | Pass    |

## 9.6. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -6.78         | -4362.5          | 4362.5           | Pass    |
| 10 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -7.57         | -4362.5          | 4362.5           | Pass    |

## 9.7. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -8.48         | -4362.5          | 4362.5           | Pass    |
| 20 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -9.36         | -4362.5          | 4362.5           | Pass    |

## 9.8. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -8.18         | -4362.5          | 4362.5           | Pass    |
| 25 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -9.43         | -4362.5          | 4362.5           | Pass    |

## 9.9. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -8.28         | -4362.5          | 4362.5           | Pass    |
| 30 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -8.77         | -4362.5          | 4362.5           | Pass    |

## 9.10. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -9.04         | -4362.5          | 4362.5           | Pass    |
| 40 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -9.06         | -4362.5          | 4362.5           | Pass    |

### 9.11. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 132322     | 20              | 0           | 6            | 0              | QPSK          | -9.57         | -4362.5          | 4362.5           | Pass    |
| 50 Degree        | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -9.37         | -4362.5          | 4362.5           | Pass    |

## 9.12. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 132322     | 20              | 0           | 6            | 0              | QPSK          | -5.36         | -4362.5          | 4362.5           | Pass    |
| NTHV             | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -5.49         | -4362.5          | 4362.5           | Pass    |

### 9.13. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 132322     | 20              | 0           | 6            | 0              | QPSK          | -6.04         | -4362.5          | 4362.5           | Pass    |
| NTLV             | 132322     | 20              | 0           | 5            | 0              | 16QAM         | -5.98         | -4362.5          | 4362.5           | Pass    |

## 10. Cat-M\_Band71

### 10.2. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 133297     | 20              | 0           | 6            | 0              | QPSK          | -1.89         | -1701.25         | 1701.25          | Pass    |
| -30 Degree       | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -1.8          | -1701.25         | 1701.25          | Pass    |

### 10.3. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 133297     | 20              | 0           | 6            | 0              | QPSK          | -3.6          | -1701.25         | 1701.25          | Pass    |
| -20 Degree       | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -3.28         | -1701.25         | 1701.25          | Pass    |

#### 10.4. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 133297     | 20              | 0           | 6            | 0              | QPSK          | -5.02         | -1701.25         | 1701.25          | Pass    |
| -10 Degree       | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -3.59         | -1701.25         | 1701.25          | Pass    |

## 10.5. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 133297     | 20              | 0           | 6            | 0              | QPSK          | -6.77         | -1701.25         | 1701.25          | Pass    |
| 0 Degree         | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -4.42         | -1701.25         | 1701.25          | Pass    |

## 10.6. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -7.07         | -1701.25         | 1701.25          | Pass    |
| 10 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -5.78         | -1701.25         | 1701.25          | Pass    |

## 10.7. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -8.11         | -1701.25         | 1701.25          | Pass    |
| 20 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -7.98         | -1701.25         | 1701.25          | Pass    |

## 10.8. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -9.03         | -1701.25         | 1701.25          | Pass    |
| 25 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -6.9          | -1701.25         | 1701.25          | Pass    |

## 10.9. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -9.23         | -1701.25         | 1701.25          | Pass    |
| 30 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -7.41         | -1701.25         | 1701.25          | Pass    |

### 10.10. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -9.46         | -1701.25         | 1701.25          | Pass    |
| 40 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -9.2          | -1701.25         | 1701.25          | Pass    |

### 10.11. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 133297     | 20              | 0           | 6            | 0              | QPSK          | -9.84         | -1701.25         | 1701.25          | Pass    |
| 50 Degree        | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -8.55         | -1701.25         | 1701.25          | Pass    |

## 10.12. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 133297     | 20              | 0           | 6            | 0              | QPSK          | -10.71        | -1701.25         | 1701.25          | Pass    |
| NTHV             | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -9.53         | -1701.25         | 1701.25          | Pass    |

### 10.13. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 133297     | 20              | 0           | 6            | 0              | QPSK          | -10.47        | -1701.25         | 1701.25          | Pass    |
| NTLV             | 133297     | 20              | 0           | 5            | 0              | 16QAM         | -9.9          | -1701.25         | 1701.25          | Pass    |

## 11. Cat-M\_Band85

### 11.1. Cat-M Frequency Stability\_Part22-24-27(-30 Degree)

| Test Environm ent | UL Chann el | Bandwid th (MHz) | UL NB Inde x | UL RB Numb er | UL RB Positi on | UL Modulati on | Measur ed (Hz) | Low e r Limit (Hz) | Uppe r Limit (Hz) | Verdi ct |
|-------------------|-------------|------------------|--------------|---------------|-----------------|----------------|----------------|--------------------|-------------------|----------|
| -30 Degree        | 13409 2     | 10               | 0            | 6             | 0               | QPSK           | -1.7           | -1767 .5           | 1767. 5           | Pass     |
| -30 Degree        | 13409 2     | 10               | 0            | 5             | 0               | 16QAM          | -1.04          | -1767 .5           | 1767. 5           | Pass     |

## 11.2. Cat-M Frequency Stability\_Part22-24-27(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 134092     | 10              | 0           | 6            | 0              | QPSK          | -3.12         | -1767.5          | 1767.5           | Pass    |
| -20 Degree       | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -3.33         | -1767.5          | 1767.5           | Pass    |

### 11.3. Cat-M Frequency Stability\_Part22-24-27(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 134092     | 10              | 0           | 6            | 0              | QPSK          | -4.29         | -1767.5          | 1767.5           | Pass    |
| -10 Degree       | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -4.33         | -1767.5          | 1767.5           | Pass    |

#### 11.4. Cat-M Frequency Stability\_Part22-24-27(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 134092     | 10              | 0           | 6            | 0              | QPSK          | -4.79         | -1767.5          | 1767.5           | Pass    |
| 0 Degree         | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -3.42         | -1767.5          | 1767.5           | Pass    |

### 11.5. Cat-M Frequency Stability\_Part22-24-27(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -4.21         | -1767.5          | 1767.5           | Pass    |
| 10 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -3.25         | -1767.5          | 1767.5           | Pass    |

## 11.6. Cat-M Frequency Stability\_Part22-24-27(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -4.25         | -1767.5          | 1767.5           | Pass    |
| 20 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -5.24         | -1767.5          | 1767.5           | Pass    |

### 11.7. Cat-M Frequency Stability\_Part22-24-27(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.05         | -1767.5          | 1767.5           | Pass    |
| 25 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -4.89         | -1767.5          | 1767.5           | Pass    |

## 11.8. Cat-M Frequency Stability\_Part22-24-27(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.44         | -1767.5          | 1767.5           | Pass    |
| 30 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -3.82         | -1767.5          | 1767.5           | Pass    |

## 11.9. Cat-M Frequency Stability\_Part22-24-27(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.32         | -1767.5          | 1767.5           | Pass    |
| 40 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -4.08         | -1767.5          | 1767.5           | Pass    |

### 11.10. Cat-M Frequency Stability\_Part22-24-27(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.64         | -1767.5          | 1767.5           | Pass    |
| 50 Degree        | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -5.34         | -1767.5          | 1767.5           | Pass    |

### 11.11. Cat-M Frequency Stability\_Part22-24-27(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.82         | -1767.5          | 1767.5           | Pass    |
| NTHV             | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -5.06         | -1767.5          | 1767.5           | Pass    |

## 11.12. Cat-M Frequency Stability\_Part22-24-27(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 134092     | 10              | 0           | 6            | 0              | QPSK          | -5.68         | -1767.5          | 1767.5           | Pass    |
| NTLV             | 134092     | 10              | 0           | 5            | 0              | 16QAM         | -3.89         | -1767.5          | 1767.5           | Pass    |

## 1. Cat-M\_Band14

### 1.1. Cat-M Frequency Stability\_Part90(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 23330      | 10              | 0           | 6            | 0              | QPSK          | -4.51         | -1982.5          | 1982.5           | Pass    |
| -30 Degree       | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -3.99         | -1982.5          | 1982.5           | Pass    |

## 1.2. Cat-M Frequency Stability\_Part90(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 23330      | 10              | 0           | 6            | 0              | QPSK          | -5.56         | -1982.5          | 1982.5           | Pass    |
| -20 Degree       | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -4.35         | -1982.5          | 1982.5           | Pass    |

### 1.3. Cat-M Frequency Stability\_Part90(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 23330      | 10              | 0           | 6            | 0              | QPSK          | -6.52         | -1982.5          | 1982.5           | Pass    |
| -10 Degree       | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -3.92         | -1982.5          | 1982.5           | Pass    |

#### 1.4. Cat-M Frequency Stability\_Part90(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 23330      | 10              | 0           | 6            | 0              | QPSK          | -6.48         | -1982.5          | 1982.5           | Pass    |
| 0 Degree         | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -3.96         | -1982.5          | 1982.5           | Pass    |

### 1.5. Cat-M Frequency Stability\_Part90(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -5.22         | -1982.5          | 1982.5           | Pass    |
| 10 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -5.25         | -1982.5          | 1982.5           | Pass    |

## 1.6. Cat-M Frequency Stability\_Part90(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -5.56         | -1982.5          | 1982.5           | Pass    |
| 20 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -4.84         | -1982.5          | 1982.5           | Pass    |

### 1.7. Cat-M Frequency Stability\_Part90(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -5.95         | -1982.5          | 1982.5           | Pass    |
| 25 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -4.61         | -1982.5          | 1982.5           | Pass    |

## 1.8. Cat-M Frequency Stability\_Part90(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -7.41         | -1982.5          | 1982.5           | Pass    |
| 30 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -6.81         | -1982.5          | 1982.5           | Pass    |

### 1.9. Cat-M Frequency Stability\_Part90(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -6.05         | -1982.5          | 1982.5           | Pass    |
| 40 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -4.82         | -1982.5          | 1982.5           | Pass    |

### 1.10. Cat-M Frequency Stability\_Part90(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 23330      | 10              | 0           | 6            | 0              | QPSK          | -6.28         | -1982.5          | 1982.5           | Pass    |
| 50 Degree        | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -6.84         | -1982.5          | 1982.5           | Pass    |

### 1.11. Cat-M Frequency Stability\_Part90(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 23330      | 10              | 0           | 6            | 0              | QPSK          | -8.1          | -1982.5          | 1982.5           | Pass    |
| NTHV             | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -5.38         | -1982.5          | 1982.5           | Pass    |

## 1.12. Cat-M Frequency Stability\_Part90(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 23330      | 10              | 0           | 6            | 0              | QPSK          | -7.4          | -1982.5          | 1982.5           | Pass    |
| NTLV             | 23330      | 10              | 0           | 5            | 0              | 16QAM         | -4.41         | -1982.5          | 1982.5           | Pass    |

## 2. Cat-M\_Band18(part90)

### 2.1. Cat-M Frequency Stability\_Part90(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 23895      | 5               | 0           | 6            | 0              | QPSK          | 4.53          | -2048.75         | 2048.75          | Pass    |
| -30 Degree       | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 5.65          | -2048.75         | 2048.75          | Pass    |

## 2.2. Cat-M Frequency Stability\_Part90(-20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -20 Degree       | 23895      | 5               | 0           | 6            | 0              | QPSK          | 3.72          | -2048.75         | 2048.75          | Pass    |
| -20 Degree       | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 4.42          | -2048.75         | 2048.75          | Pass    |

### 2.3. Cat-M Frequency Stability\_Part90(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 23895      | 5               | 0           | 6            | 0              | QPSK          | 3.42          | -2048.75         | 2048.75          | Pass    |
| -10 Degree       | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 4.36          | -2048.75         | 2048.75          | Pass    |

## 2.4. Cat-M Frequency Stability\_Part90(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 23895      | 5               | 0           | 6            | 0              | QPSK          | 3.33          | -2048.75         | 2048.75          | Pass    |
| 0 Degree         | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 4.39          | -2048.75         | 2048.75          | Pass    |

## 2.5. Cat-M Frequency Stability\_Part90(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.99          | -2048.75         | 2048.75          | Pass    |
| 10 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 4.86          | -2048.75         | 2048.75          | Pass    |

## 2.6. Cat-M Frequency Stability\_Part90(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 3.85          | -2048.75         | 2048.75          | Pass    |
| 20 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 4.23          | -2048.75         | 2048.75          | Pass    |

## 2.7. Cat-M Frequency Stability\_Part90(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.93          | -2048.75         | 2048.75          | Pass    |
| 25 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.93          | -2048.75         | 2048.75          | Pass    |

## 2.8. Cat-M Frequency Stability\_Part90(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 3.08          | -2048.75         | 2048.75          | Pass    |
| 30 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.46          | -2048.75         | 2048.75          | Pass    |

## 2.9. Cat-M Frequency Stability\_Part90(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.8           | -2048.75         | 2048.75          | Pass    |
| 40 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.78          | -2048.75         | 2048.75          | Pass    |

## 2.10. Cat-M Frequency Stability\_Part90(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.59          | -2048.75         | 2048.75          | Pass    |
| 50 Degree        | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.32          | -2048.75         | 2048.75          | Pass    |

## 2.11. Cat-M Frequency Stability\_Part90(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.55          | -2048.75         | 2048.75          | Pass    |
| NTHV             | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.62          | -2048.75         | 2048.75          | Pass    |

## 2.12. Cat-M Frequency Stability\_Part90(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 23895      | 5               | 0           | 6            | 0              | QPSK          | 2.26          | -2048.75         | 2048.75          | Pass    |
| NTLV             | 23895      | 5               | 0           | 5            | 0              | 16QAM         | 3.1           | -2048.75         | 2048.75          | Pass    |

### 3. Cat-M\_Band26(part90)

#### 3.1. Cat-M Frequency Stability\_Part90(-30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -30 Degree       | 26740      | 10              | 0           | 6            | 0              | QPSK          | -3.13         | -2053.75         | 2053.75          | Pass    |
| -30 Degree       | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -0.11         | -2053.75         | 2053.75          | Pass    |

### 3.2. Cat-M Frequency Stability\_Part90(-20 Degree)

| Test Environm<br>ent | UL Chann<br>el | Bandwi<br>dth<br>(MHz) | UL<br>NB<br>Inde<br>x | UL RB<br>Numb<br>er | UL RB<br>Positi<br>on | UL<br>Modulati<br>on | Measur<br>ed (Hz) | Lower<br>Limit<br>(Hz) | Uppe<br>r<br>Limit<br>(Hz) | Verdi<br>ct |
|----------------------|----------------|------------------------|-----------------------|---------------------|-----------------------|----------------------|-------------------|------------------------|----------------------------|-------------|
| -20<br>Degree        | 26740          | 10                     | 0                     | 6                   | 0                     | QPSK                 | -3.49             | -2053.<br>75           | 2053.<br>75                | Pass        |
| -20<br>Degree        | 26740          | 10                     | 0                     | 5                   | 0                     | 16QAM                | -1.49             | -2053.<br>75           | 2053.<br>75                | Pass        |

### 3.3. Cat-M Frequency Stability\_Part90(-10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| -10 Degree       | 26740      | 10              | 0           | 6            | 0              | QPSK          | -4.08         | -2053.75         | 2053.75          | Pass    |
| -10 Degree       | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -2.59         | -2053.75         | 2053.75          | Pass    |

### 3.4. Cat-M Frequency Stability\_Part90(0 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 0 Degree         | 26740      | 10              | 0           | 6            | 0              | QPSK          | -4.76         | -2053.75         | 2053.75          | Pass    |
| 0 Degree         | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -3.03         | -2053.75         | 2053.75          | Pass    |

### 3.5. Cat-M Frequency Stability\_Part90(10 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 10 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -4.98         | -2053.75         | 2053.75          | Pass    |
| 10 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -2.7          | -2053.75         | 2053.75          | Pass    |

### 3.6. Cat-M Frequency Stability\_Part90(20 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 20 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -5.55         | -2053.75         | 2053.75          | Pass    |
| 20 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -3.83         | -2053.75         | 2053.75          | Pass    |

### 3.7. Cat-M Frequency Stability\_Part90(25 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 25 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -6.35         | -2053.75         | 2053.75          | Pass    |
| 25 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -4.25         | -2053.75         | 2053.75          | Pass    |

### 3.8. Cat-M Frequency Stability\_Part90(30 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 30 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -5.12         | -2053.75         | 2053.75          | Pass    |
| 30 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -3.03         | -2053.75         | 2053.75          | Pass    |

### 3.9. Cat-M Frequency Stability\_Part90(40 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 40 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -5.05         | -2053.75         | 2053.75          | Pass    |
| 40 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -3.26         | -2053.75         | 2053.75          | Pass    |

### 3.10. Cat-M Frequency Stability\_Part90(50 Degree)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| 50 Degree        | 26740      | 10              | 0           | 6            | 0              | QPSK          | -5.99         | -2053.75         | 2053.75          | Pass    |
| 50 Degree        | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -4.38         | -2053.75         | 2053.75          | Pass    |

### 3.11. Cat-M Frequency Stability\_Part90(NTHV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTHV             | 26740      | 10              | 0           | 6            | 0              | QPSK          | -6.11         | -2053.75         | 2053.75          | Pass    |
| NTHV             | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -4.79         | -2053.75         | 2053.75          | Pass    |

### 3.12. Cat-M Frequency Stability\_Part90(NTLV)

| Test Environment | UL Channel | Bandwidth (MHz) | UL NB Index | UL RB Number | UL RB Position | UL Modulation | Measured (Hz) | Lower Limit (Hz) | Upper Limit (Hz) | Verdict |
|------------------|------------|-----------------|-------------|--------------|----------------|---------------|---------------|------------------|------------------|---------|
| NTLV             | 26740      | 10              | 0           | 6            | 0              | QPSK          | -6.64         | -2053.75         | 2053.75          | Pass    |
| NTLV             | 26740      | 10              | 0           | 5            | 0              | 16QAM         | -3.16         | -2053.75         | 2053.75          | Pass    |