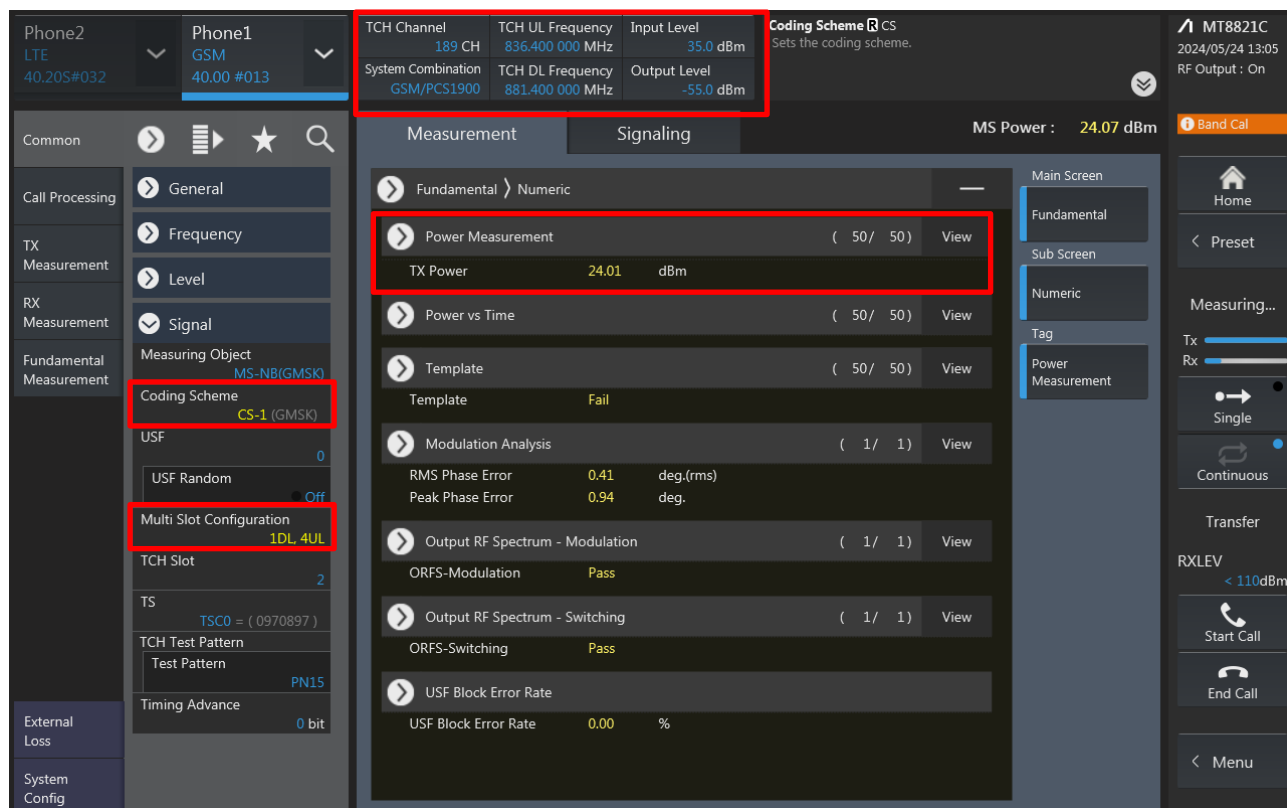


Power measurement connection diagram:

The power measurement for 2G/3G/LTE/5G FR1/UL and DL CA is to establish a connection between device and call box, and via call box to configure Bands, channel, BWs, RB size, carrier aggregation of CA, frequency channels, SCS and maximum output power. Hereunder is screenshot call box connection information for 2G/3G/LTE/5G FR1/UL and DL CA.

<GSM>



The screenshot displays the SPORTON LAB. software interface for GSM power measurement. The interface is divided into several sections:

- Top Bar:** Shows Phone2 (LTE, 40.205#032) and Phone1 (GSM, 40.00 #013). A table at the top right lists TCH Channel (189 CH), TCH UL Frequency (836.400 000 MHz), Input Level (35.0 dBm), TCH DL Frequency (881.400 000 MHz), and Output Level (-55.0 dBm). The Coding Scheme is set to CS.
- Left Sidebar:** Contains navigation options like Common, Call Processing, TX Measurement, RX Measurement, Fundamental Measurement, and External Loss. The 'Fundamental Measurement' section is expanded, showing 'Coding Scheme' (CS-1 (GMSK)) and 'Multi Slot Configuration' (1DL, 4UL).
- Main Area:** Displays 'Measurement' and 'Signaling' tabs. The 'Measurement' tab is active, showing 'Fundamental' and 'Numeric' views. The 'Power Measurement' section is highlighted, showing 'TX Power' (24.01 dBm). Other measurements include 'Power vs Time', 'Template', 'Modulation Analysis', 'Output RF Spectrum - Modulation', 'Output RF Spectrum - Switching', and 'USF Block Error Rate'.
- Right Sidebar:** Shows 'Main Screen' and 'Sub Screen' options. The 'Power Measurement' tag is selected. The 'MT8821C' device is connected, with 'RF Output : On' and 'Band Cal' button. The 'TX' and 'RX' levels are shown, with 'RXLEV' at < 110dBm.

<WCDMA>

Phone2 LTE 40.20S#032 Phone1 W-CDMA 40.00 #013

UL Channel 9400 CH UL Frequency 1 880.000 000 MHz Input Level 35.0 dBm
DL Channel 9800 CH DL Frequency 1 960.000 000 MHz Output Level -65.7 dBm

Average Count PWR_AVG
Sets the average count (measurement count) for power measurement.

MT8821C 2024/05/24 12:58 RF Output : On

Common Measurement Signaling UE Power : 22.6 dBm

Physical Channel Authentication / Integrity Integrity Protection On
Call Processing SIM Model Number P0035
TX Measurement Authentication Algorithm XOR
RX Measurement Authentication Key Ki 00112233 44556677 8899AABB CCDDDEFF
Fundamental Measurement AMF 0000 H
Opc 00000000 00000000 00000000 00000000
Connection Setting Measurement Report
Meas Setup Inner Loop Power Control Power Control Algorithm Algorithm 1
TPC StepSize 1
External Loss Power Control All 1
System Config User Command 10101 01010 10101 01010 10101 01010

Fundamental > Numeric
Power Measurement (50 / 50)
TX Power 23.28 dBm
Frequency Error (1 / 1)
Carrier Frequency Error -0.0002 kHz
Freq. Err 0.00 ppm
Occupied Bandwidth (1 / 1) View
OBW 4.163 MHz
Spectrum Emission Mask (1 / 1) View
SEM Pass
Adjacent Channel Power (1 / 1)
ACLR(-5MHz) -40.24 dB
ACLR(+5MHz) -42.79 dB
Modulation Analysis (1 / 1) View
EVM 5.15 %(rms)
Peak Code Domain Error (1 / 1)
PCDE -39.86 dB

Main Screen
Fundamental
Sub Screen
Numeric
Tag
Power Measurement

Measuring...
Tx
Rx
Single
Continuous
Loop Mode 1
Start Call
End Call
Menu

<LTE>

Phone2 LTE 40.20S#021 Phone1 LTE 40.20S#021

UL Channel 21100 ch TPC Pattern All +3dB Input Level 30.0 dBm
Operation Band 7 Channel Bandwidth 20 MHz Output Level -67.0 dBm

External Loss - Main DL DLEXTLOSS
This sets the DL offset at the Main connector. Loss is set as a positive value. The argument tx enables setting a different loss value per internal signal generator.

MT8821C 2024/05/31 13:15 RF Output : On

PCC SCC1 SCC2 SCC3 >> Measurement Signaling UE Power : 23.4 dBm

Common > General > Frequency > Level > Signal
TX Measurement UL RMC
RX Measurement DL RMC
Fundamental Measurement TDD
Test Parameter Uplink Downlink Configuration 1: (5ms) D S U U D D S U U D
Special Subframe Configuration 4

Numeric
TX Power 23.01 dBm
Occupied Bandwidth
Spectrum Emission Mask
Adjacent Channel Power
In-Band Emission
Spectrum Flatness
EVM
Phase Error
Magnitude Error
Constellation
Throughput

Main Screen
Fundamental
Sub Screen
Top

Measuring...
Tx
Rx
Single
Continuous
Connected
Start Call
End Call
Menu

<LTE TDD Power class 3>

Phone2
LTE
40.20S#021

Phone1
LTE
40.20S#021

UL Channel
40620 ch

TPC Pattern
All +3dB

Input Level
30.0 dBm

TDD - Special Subframe Configuration
TDDSSFCNF
This is the parameter to select the special subframe configuration.

Operation Band
41

Channel Bandwidth
20 MHz

Output Level
-54.2 dBm

MT8821C
2024/05/31 12:39
RF Output : On

PCC SCC1 SCC2 SCC3 >>

Common
Frequency
Level
Signal
UL RMC
DL RMC
TDD
Uplink Downlink Configuration
0 : (5ms) D S U U U D S U U U
Special Subframe Configuration
5

Physical Channel
Call Processing
TX Measurement
RX Measurement
Fundamental Measurement
Test Parameter
Band Definition
External Loss
System Config

Measurement

Signaling

UE Power : 23.5 dBm

Numeric
TX Power 23.19 dBm

Occupied Bandwidth

Spectrum Emission Mask

Adjacent Channel Power

In-Band Emission

Spectrum Flatness

EVM

Phase Error

Magnitude Error

Constellation

Throughput

Main Screen
Fundamental
Sub Screen
Top

Home

< Preset

Measuring...

Tx
Rx

Single

Continuous

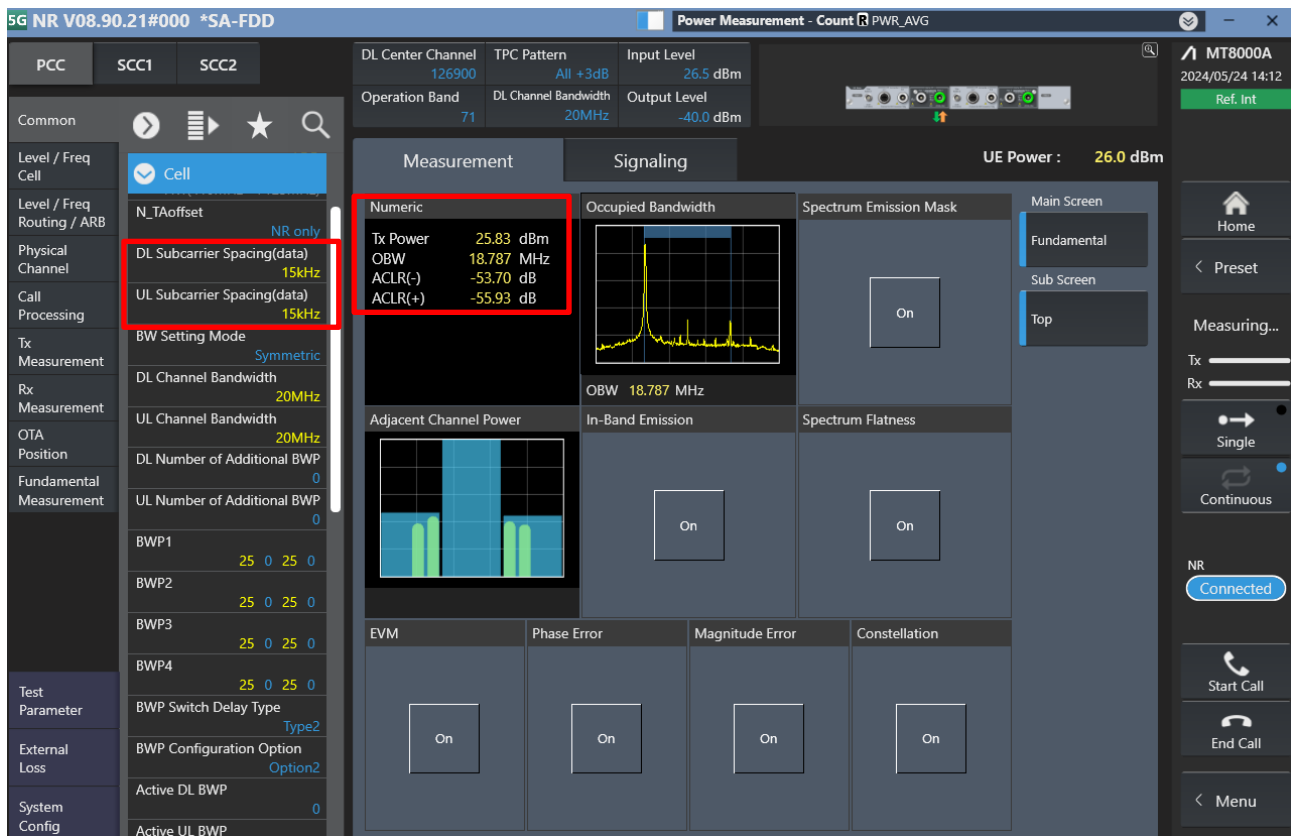
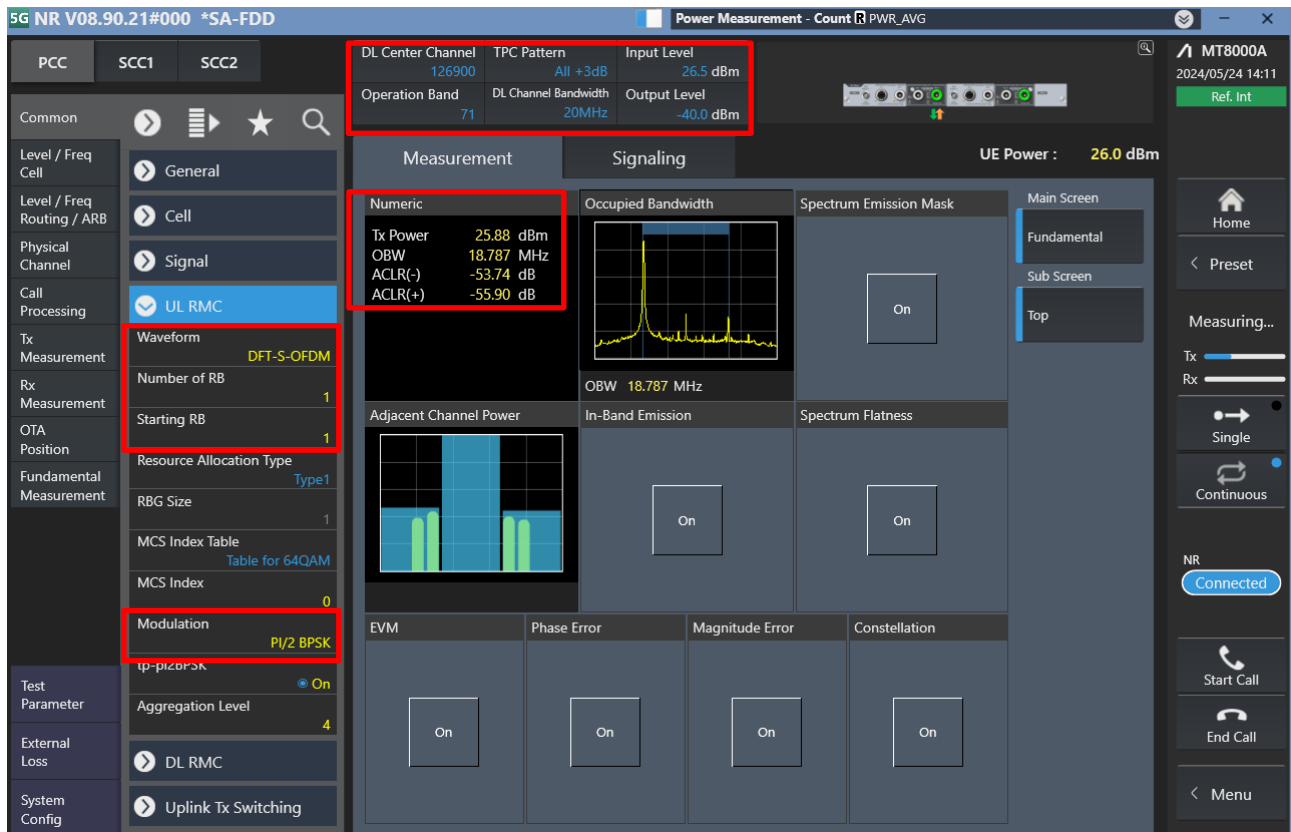
Connected

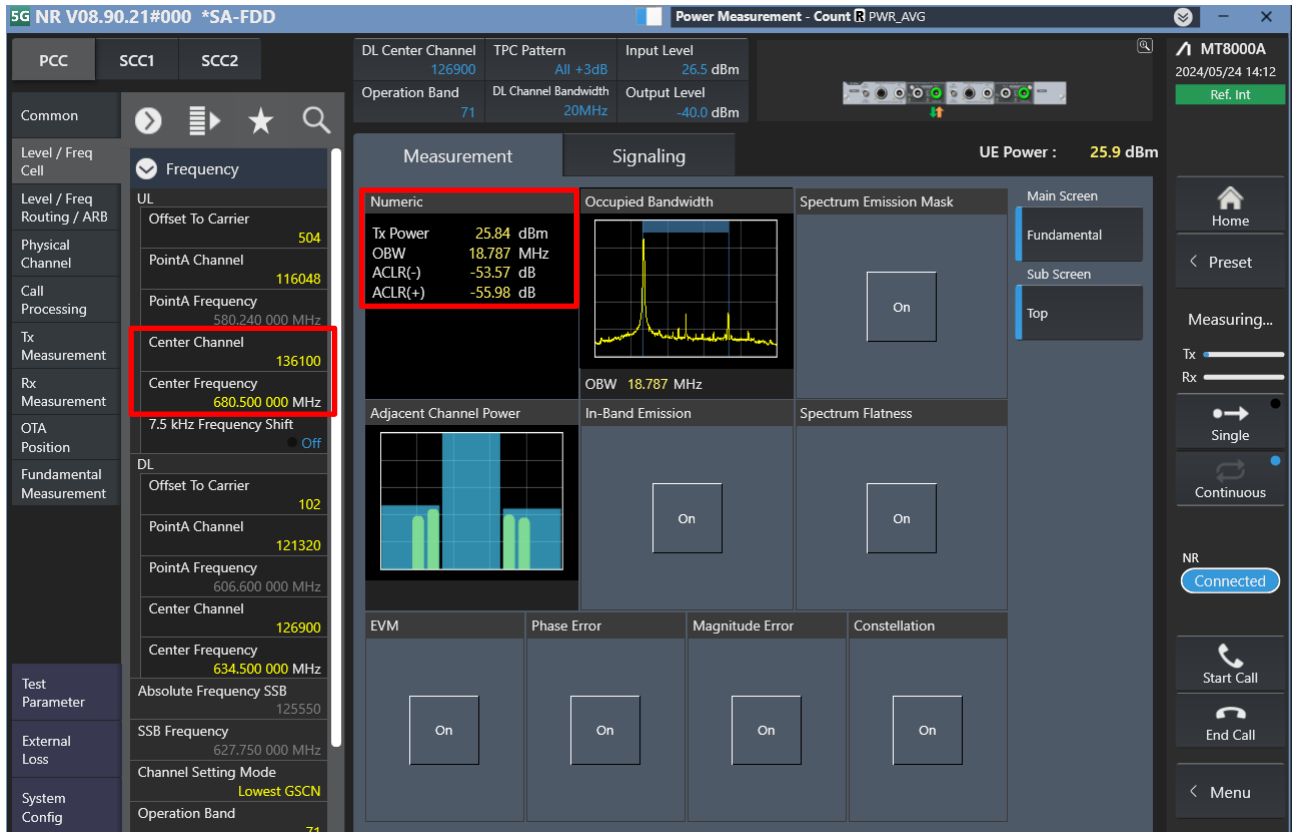
Start Call

End Call

< Menu

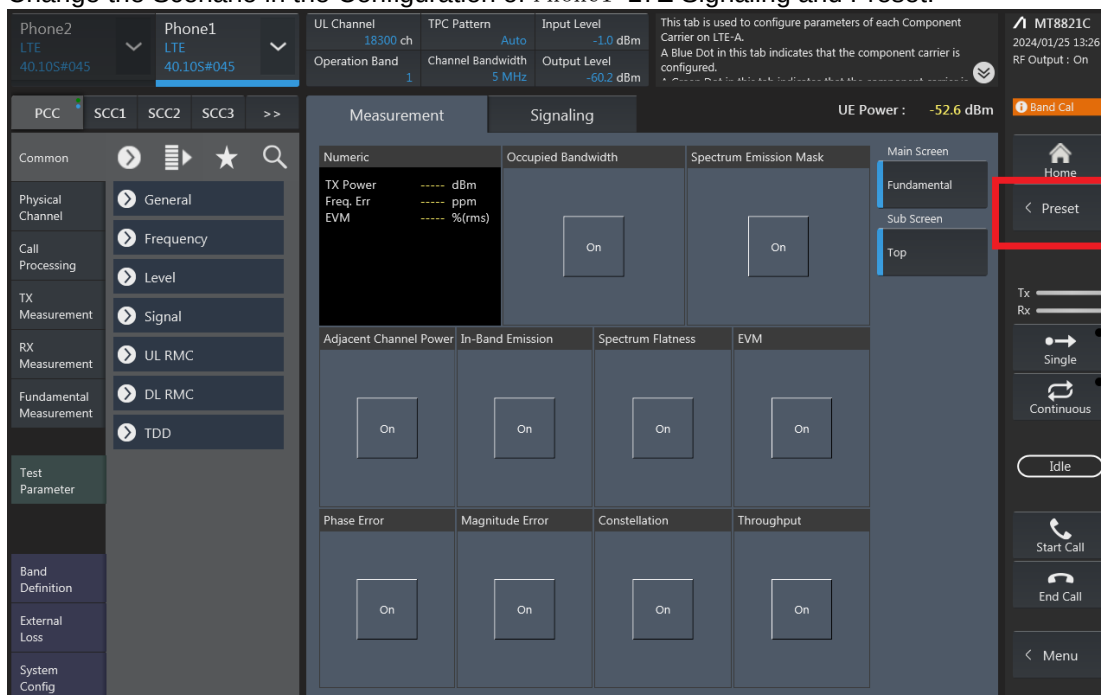
<5G NR FR1>





LTE Uplink and Downlink Carrier Aggregation configurations:

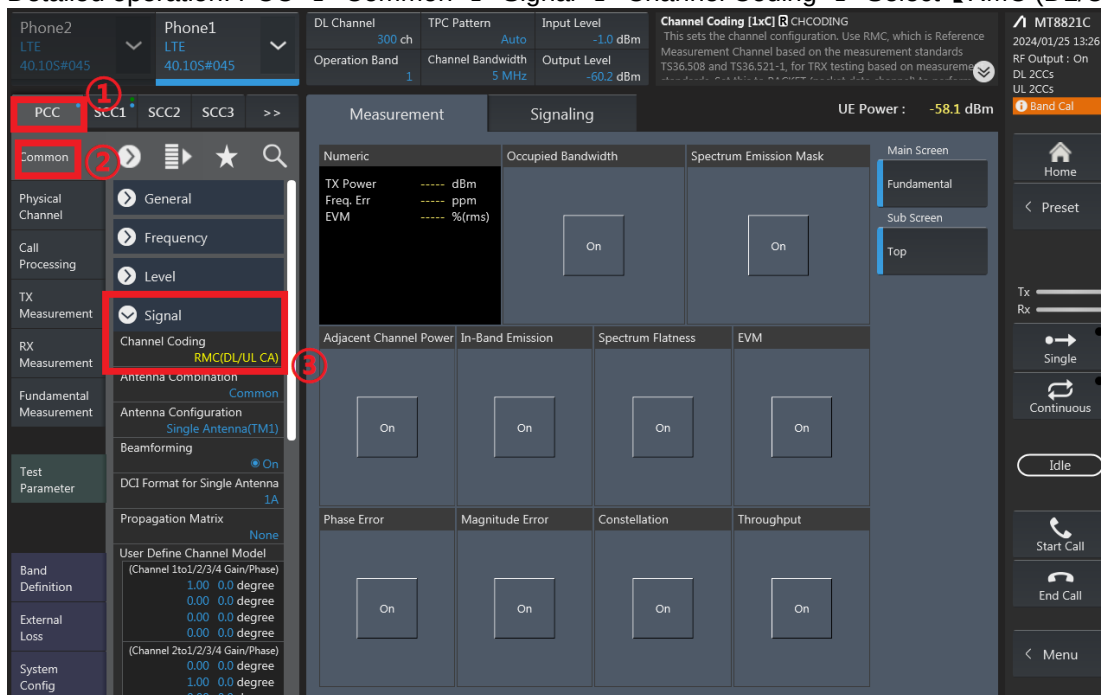
1. Change the Scenario in the Configuration of Phone1 LTE Signaling and Preset.



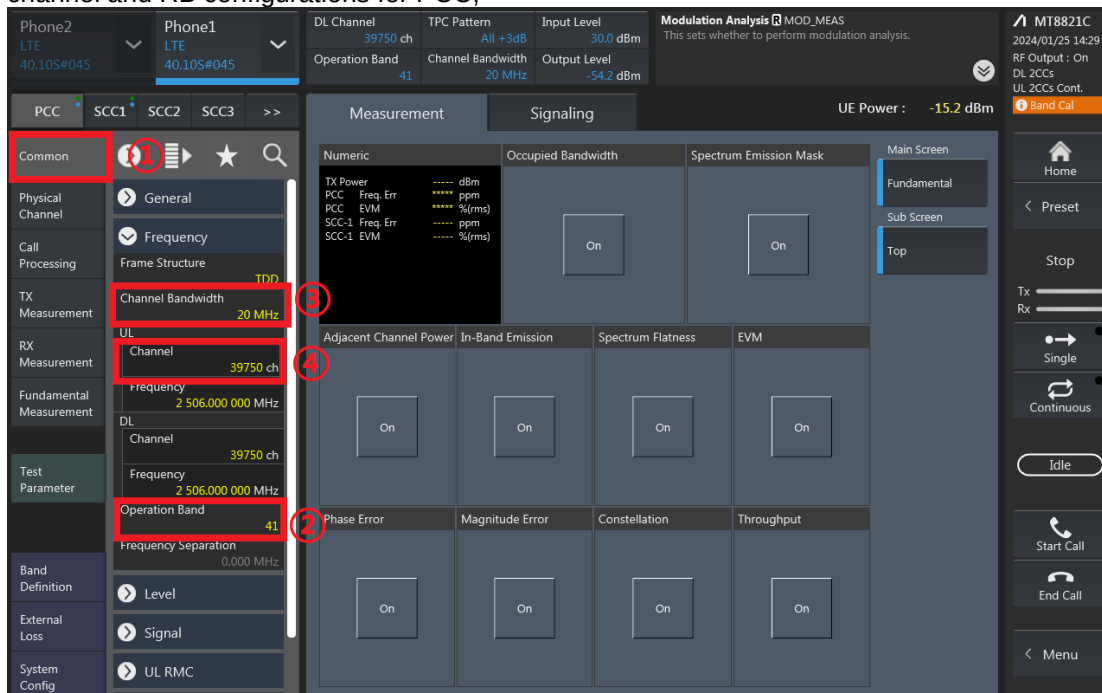
2. If Select "RMC (DL/UL CA)" for Uplink Carrier Aggregation;
If Select "RMC (DL CA)" for Downlink Carrier Aggregation.

For example, Uplink Carrier Aggregation:

Detailed operation: PCC → Common → Signal → Channel Coding → Select 【RMC (DL/UL CA)】



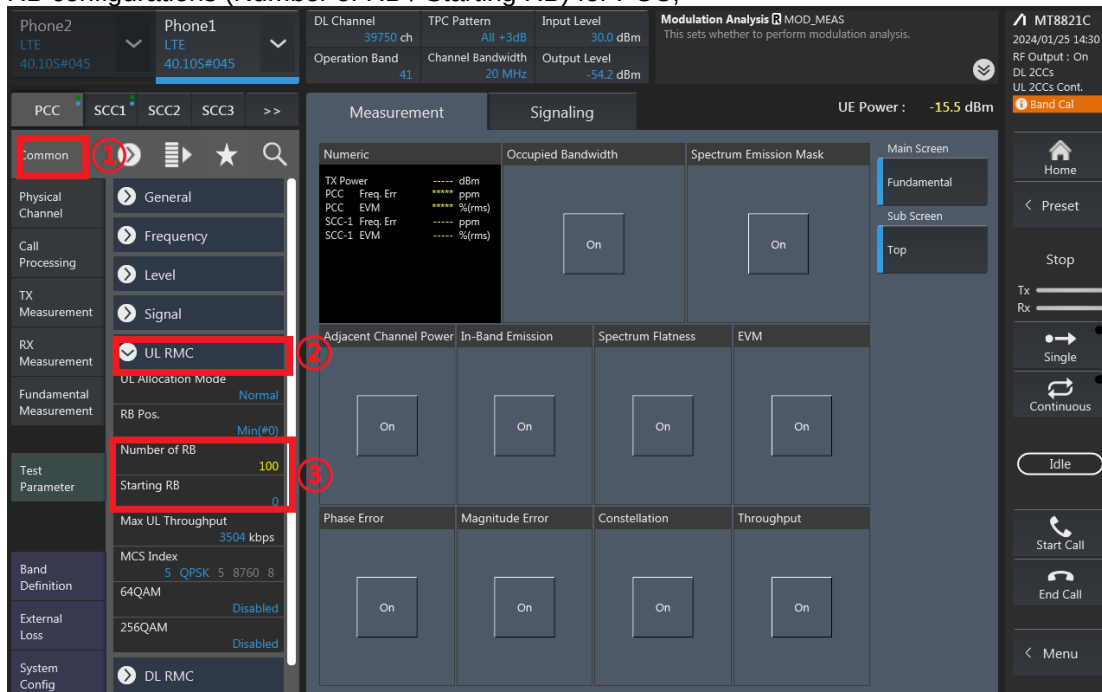
3. PCC parameter Settings: on the screen, and then select the PCC tab and Set operating band, BW, channel and RB configurations for PCC;



The screenshot displays the PCC parameter settings interface. The left sidebar contains tabs for Common, Physical Channel, Call Processing, TX Measurement, RX Measurement, Fundamental Measurement, Test Parameter, Band Definition, External Loss, and System Config. The main area is divided into Measurement and Signaling sections. Red circles and numbers highlight the following settings:

- 1. Common tab selected.
- 2. Operation Band set to 41.
- 3. Channel Bandwidth set to 20 MHz.
- 4. Channel set to 39750 ch.

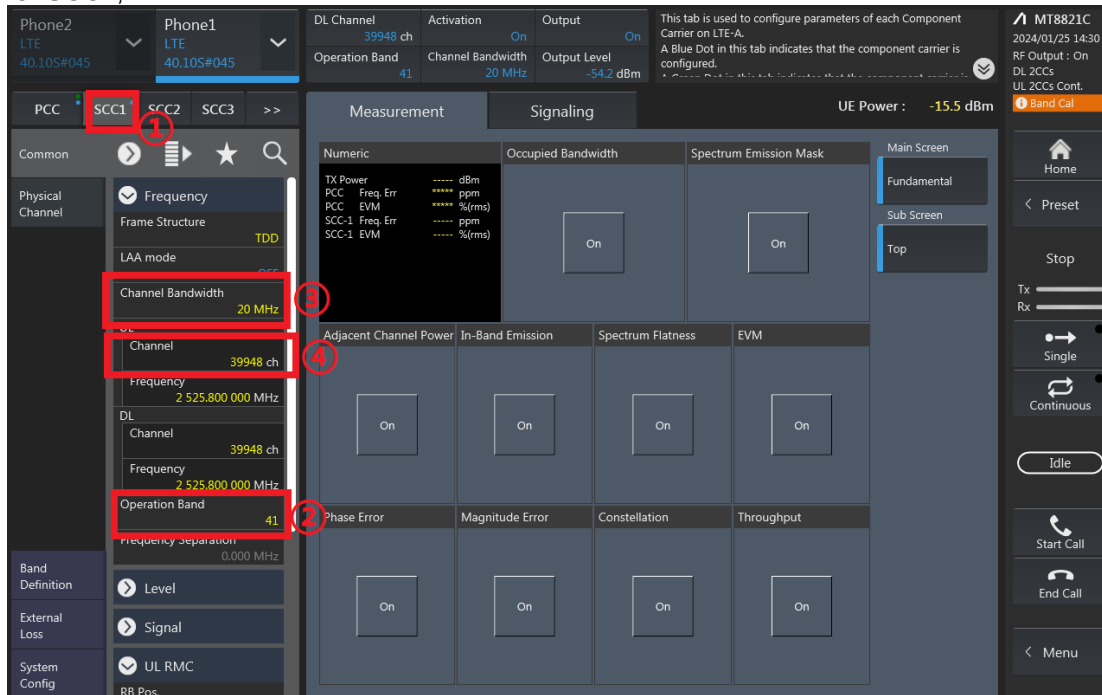
RB configurations (Number of RB / Starting RB) for PCC;



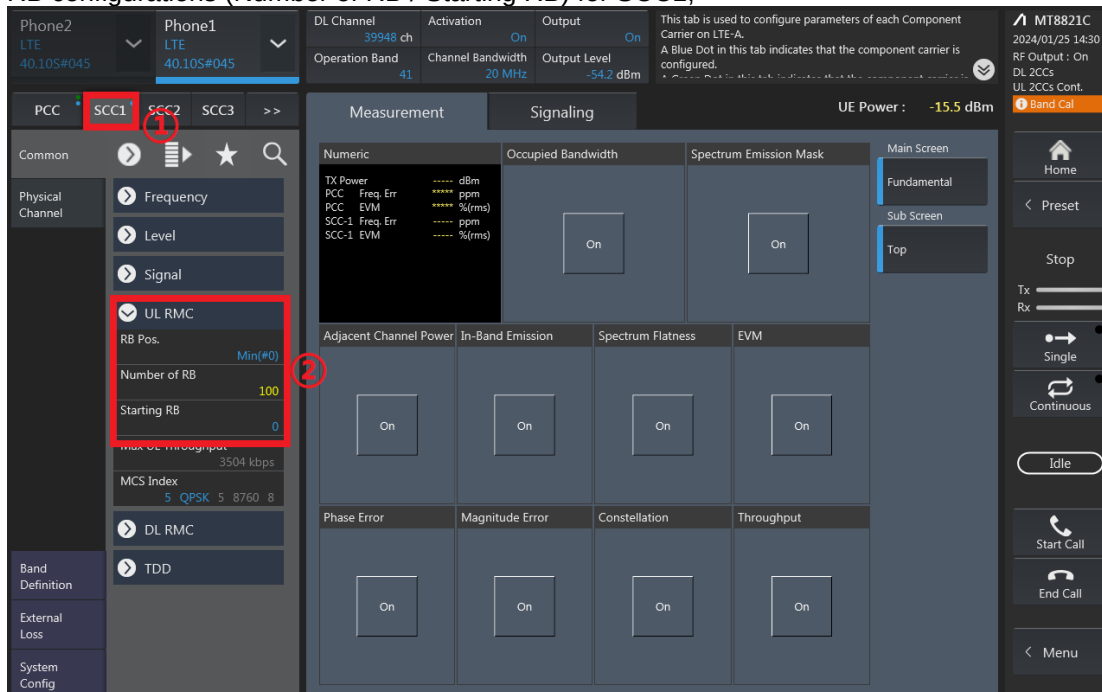
The screenshot displays the RB configurations interface. The left sidebar contains tabs for Common, Physical Channel, Call Processing, TX Measurement, RX Measurement, Fundamental Measurement, Test Parameter, Band Definition, External Loss, and System Config. The main area is divided into Measurement and Signaling sections. Red circles and numbers highlight the following settings:

- 1. Common tab selected.
- 2. UL RMC checked.
- 3. Number of RB set to 100.

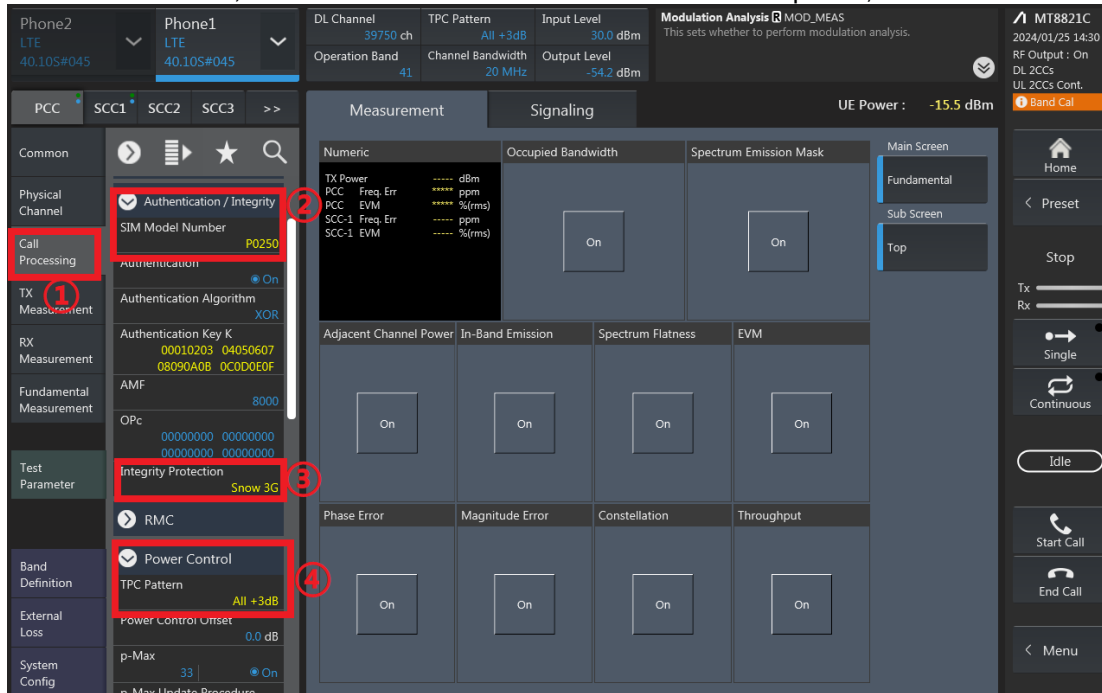
4. SCC parameter Settings: Select the SCC1 tab, Set operating band, BW, channel, and RB configurations for SCC1;



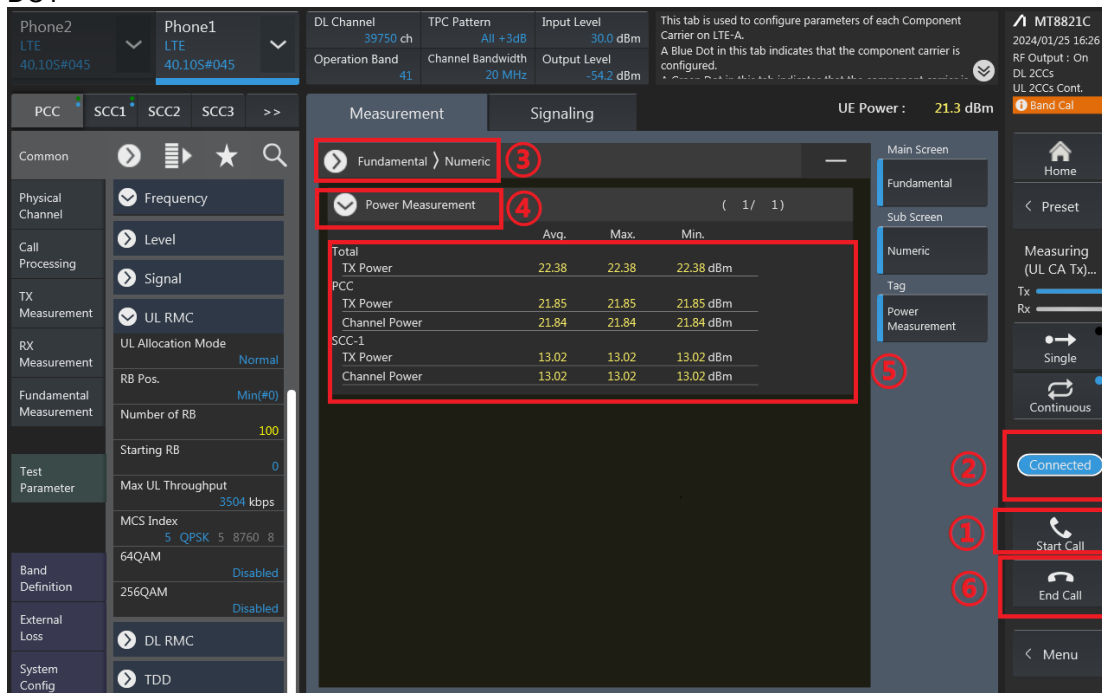
RB configurations (Number of RB / Starting RB) for SCC1;



5. Select the PCC tab, then set “SIM Model Number” and select max power;



6. Click the “Connect” button at the Right of the screen, if necessary, turn the Airplane mode on/off in the DUT



7. The inter-band DLCA test method is similar to intra-band ULCA, and DLCA test method is similar to intra-band ULCA too.



DL CA

Full Power															
2CC															
Configure		CA Configuration (BCS)	PCC							SCC				Power	
			LTE Band	BW (MHz)	UL Freq. (MHz)	UL Channel	Mod.	UL# RB	UL RB Offset	LTE Band	BW (MHz)	DL Freq. (MHz)	DL Channel	With CA Tx.Power (dBm)	W/O CA Tx.Power (dBm)
Inter-Band		CA_5A-41A	Band 5	10M	836.5	20525	QPSK	1	0	Band 41	20M	2593	40620	23.93	23.97
		CA_2A-12A	Band 2	20M	1880	18900	QPSK	1	0	Band 12	10M	737.5	5095	22.58	22.79
		CA_12A-66A	Band 12	10M	707.5	23095	QPSK	1	0	Band 66	20M	2155	66886	24.02	24.09
		CA_26A-41A	Band 26	15M	831.5	26865	QPSK	1	0	Band 41	20M	2593	40620	23.68	24.07
		CA_5A-38A	Band 5	10M	836.5	20525	QPSK	1	0	Band 38	20M	2595	38000	23.96	23.97
		CA_26A-38A	Band 26	15M	831.5	26865	QPSK	1	0	Band 38	20M	2595	38000	23.64	24.07
		CA_2A-66A	Band 2	20M	1880	18900	QPSK	1	0	Band 66	20M	2155	66886	22.58	22.79
		CA_7A-26A	Band 7	20M	2535	21100	QPSK	1	0	Band 26	15M	876.5	8865	22.92	23.00
		CA_2A-38A	Band 2	20M	1880	18900	QPSK	1	0	Band 38	20M	2595	38000	22.59	22.79
		CA_38A-66A	Band 66	20M	1745	132322	QPSK	1	0	Band 38	20M	2595	38000	23.51	23.73
Intra-Band	Non-Contiguous	CA_2A-2A	Band 2	20M	1880	18900	QPSK	1	0	Band 2	5M	1987.5	1175	22.56	22.79
	Contiguous	CA_2C	Band 2	20M	1880	18900	QPSK	1	0	Band 2	20M	1979.80	1098	22.57	22.79

3CC																			
Configure		CA Configuration (BCS)	PCC						SCC1				SCC2				Power		
			LTE Band	BW (MHz)	UL Freq. (MHz)	UL Channel	Mod.	UL# RB	UL RB Offset	LTE Band	BW (MHz)	DL Freq. (MHz)	DL Channel	LTE Band	BW (MHz)	DL Freq. (MHz)	DL Channel	With CA Tx.Power (dBm)	W/O CA Tx.Power (dBm)
		CA_2A-7C	Band 2	20M	1880	18900	QPSK	1	0	Band 7	20M	2655	3100	Band 7	20M	2674.8	3298	22.58	22.79
		CA_5A-66A-66A	Band 5	10M	836.5	20525	QPSK	1	0	Band 66	20M	2120	66536	Band 66	20M	2170	67036	23.81	23.97
		CA_5A-7A-7A	Band 5	10M	836.5	20525	QPSK	1	0	Band 7	20M	2655	3100	Band 7	5M	2687.5	3425	23.81	23.97
		CA_5A-7A-66A	Band 5	10M	836.5	20525	QPSK	1	0	Band 7	20M	2655	3100	Band 66	20M	2155	66886	23.88	23.97
		CA_4A-7C	Band 4	20M	1732.5	20175	QPSK	1	0	Band 7	20M	2655	3100	Band 7	20M	2674.8	3298	22.84	22.94
		CA_5A-7C	Band 5	10M	836.5	20525	QPSK	1	0	Band 7	20M	2655	3100	Band 7	20M	2674.8	3298	23.79	23.97
		CA_7A-66A-66A	Band 7	20M	2535	21100	QPSK	1	49	Band 66	20M	2120	66536	Band 66	20M	2170	67036	22.80	23.00
		CA_7C-66A	Band 7	20M	2535	21100	QPSK	1	0	Band 7	20M	2674.8	3298	Band 66	20M	2155	66886	22.86	23.00
		CA_26A-41C	Band 26	15M	831.5	26865	QPSK	1	0	Band 41	20M	2593	40620	Band 41	20M	2612.8	40818	23.96	24.07
		CA_2A-4A-5A	Band 2	20M	1880	18900	QPSK	1	0	Band 4	20M	2132.5	2175	Band 5	10M	881.5	2525	22.68	22.79
		CA_38C-66A	Band 66	20M	1745	132322	QPSK	1	0	Band 38	20M	2585.1	37901	Band 38	20M	2604.9	38099	23.55	23.73
		CA_4A-5A-7A	Band 4	20M	1732.5	20175	QPSK	1	0	Band 5	10M	881.5	2525	Band 7	20M	2655	3100	22.85	22.94
		CA_41C-66A	Band 66	20M	1745	132322	QPSK	1	0	Band 41	20M	2593	40620	Band 41	20M	2612.8	40818	23.51	23.73
		CA_5A-41C	Band 5	10M	836.5	20525	QPSK	1	0	Band 41	20M	2593	40620	Band 41	20M	2612.8	40818	23.85	23.97
		CA_2A-7A-7A	Band 2	20M	1880	18900	QPSK	1	0	Band 7	20M	2655	3100	Band 7	5M	2687.5	3425	22.64	22.79
		CA_5A-66C	Band 5	10M	836.5	20525	QPSK	1	0	Band 66	20M	2145.1	66787	Band 66	20M	2164.9	66985	23.83	23.97
		CA_4A-4A-5A	Band 4	20M	1732.5	20175	QPSK	1	0	Band 4	5M	2152.5	2375	Band 5	10M	881.5	2525	22.88	22.94
		CA_4C-7A	Band 4	20M	1720	20050	QPSK	1	0	Band 4	20M	2139.8	2248	Band 7	20M	2655	3100	22.81	22.94
		CA_4A-4A-7A	Band 4	20M	1732.5	20175	QPSK	1	0	Band 4	5M	2152.5	2375	Band 7	20M	2655	3100	22.79	22.94
		CA_2A-5A-66A	Band 2	20M	1880	18900	QPSK	1	0	Band 5	10M	881.5	2525	Band 66	20M	2155	66886	22.66	22.79
		CA_2A-5A-7A	Band 2	20M	1880	18900	QPSK	1	0	Band 5	10M	881.5	2525	Band 7	20M	2655	3100	22.71	22.79
Intra-Band	Non-Contiguous	CA_41A-41A-41A	Band 41	20M	2593	40620	QPSK	1	0	Band 41	20M	2506	39750	Band 41	20M	2680	41490	23.85	23.97
	Contiguous	CA_41D	Band 41	20M	2680	41490	QPSK	1	0	Band 41	20M	2660.2	41292	Band 41	20M	2640.4	41094	23.88	23.97

CA_7C_Ant 1											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
20850	21048	QPSK	1	0	0	0	1	0	Full	22.87	23.50
21100	20902	QPSK	1	0	0	0	1	0	Full	22.98	23.50
21350	21152	QPSK	1	0	0	0	1	0	Full	22.95	23.50
20850	21048	QPSK	1	0	0	0	1	0	ECI 1	21.45	21.75
21100	20902	QPSK	1	0	0	0	1	0	ECI 1	21.57	21.75
21350	21152	QPSK	1	0	0	0	1	0	ECI 1	21.56	21.75
20850	21048	QPSK	1	0	0	0	1	0	ECI 2	18.44	19.00
21100	20902	QPSK	1	0	0	0	1	0	ECI 2	18.50	19.00
21350	21152	QPSK	1	0	0	0	1	0	ECI 2	18.52	19.00
20850	21048	QPSK	1	0	0	0	1	0	ECI 3	21.35	21.75
21100	20902	QPSK	1	0	0	0	1	0	ECI 3	21.45	21.75
21350	21152	QPSK	1	0	0	0	1	0	ECI 3	21.46	21.75
20850	21048	QPSK	1	0	0	0	1	0	ECI 4	18.44	19.00
21100	20902	QPSK	1	0	0	0	1	0	ECI 4	18.50	19.00
21350	21152	QPSK	1	0	0	0	1	0	ECI 4	18.52	19.00

CA_7C_Ant 4											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dbm)	Tune up Power (dbm)
			RB Size	RB offset	RB Size	RB offset					
20850	21048	QPSK	1	0	0	0	1	0	Full	23.55	24.50
21100	20902	QPSK	1	0	0	0	1	0	Full	23.63	24.50
21350	21152	QPSK	1	0	0	0	1	0	Full	23.18	24.50
20850	21048	QPSK	1	0	0	0	1	0	ECI 1	22.13	23.00
21100	20902	QPSK	1	0	0	0	1	0	ECI 1	22.21	23.00
21350	21152	QPSK	1	0	0	0	1	0	ECI 1	21.94	23.00
20850	21048	QPSK	1	0	0	0	1	0	ECI 2	23.55	24.50
21100	20902	QPSK	1	0	0	0	1	0	ECI 2	23.63	24.50
21350	21152	QPSK	1	0	0	0	1	0	ECI 2	23.18	24.50
20850	21048	QPSK	1	0	0	0	1	0	ECI 3	22.13	23.00
21100	20902	QPSK	1	0	0	0	1	0	ECI 3	22.21	23.00
21350	21152	QPSK	1	0	0	0	1	0	ECI 3	21.94	23.00
20850	21048	QPSK	1	0	0	0	1	0	ECI 4	23.55	24.50
21100	20902	QPSK	1	0	0	0	1	0	ECI 4	23.63	24.50
21350	21152	QPSK	1	0	0	0	1	0	ECI 4	23.18	24.50

CA_7C_Ant 5											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
20850	21048	QPSK	1	0	0	0	1	0	Full	21.95	23.00
21100	20902	QPSK	1	0	0	0	1	0	Full	22.18	23.00
21350	21152	QPSK	1	0	0	0	1	0	Full	21.97	23.00
20850	21048	QPSK	1	0	0	0	1	0	ECI 1	19.24	20.25
21100	20902	QPSK	1	0	0	0	1	0	ECI 1	19.53	20.25
21350	21152	QPSK	1	0	0	0	1	0	ECI 1	19.28	20.25
20850	21048	QPSK	1	0	0	0	1	0	ECI 2	19.24	20.25
21100	20902	QPSK	1	0	0	0	1	0	ECI 2	19.53	20.25
21350	21152	QPSK	1	0	0	0	1	0	ECI 2	19.28	20.25
20850	21048	QPSK	1	0	0	0	1	0	ECI 3	19.24	20.25
21100	20902	QPSK	1	0	0	0	1	0	ECI 3	19.53	20.25
21350	21152	QPSK	1	0	0	0	1	0	ECI 3	19.28	20.25
20850	21048	QPSK	1	0	0	0	1	0	ECI 4	19.24	20.25
21100	20902	QPSK	1	0	0	0	1	0	ECI 4	19.53	20.25
21350	21152	QPSK	1	0	0	0	1	0	ECI 4	19.28	20.25

CA_38C_Ant 1											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
37850	38048	QPSK	1	0	0	0	1	0	Full	23.47	24.00
37901	38099	QPSK	1	0	0	0	1	0	Full	23.45	24.00
38150	37952	QPSK	1	0	0	0	1	0	Full	23.22	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 1	21.31	22.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 1	21.32	22.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 1	21.11	22.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 2	20.23	21.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 2	20.26	21.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 2	20.14	21.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 3	21.31	22.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 3	21.32	22.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 3	21.11	22.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 4	20.23	21.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 4	20.26	21.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 4	20.14	21.00

CA_38C_Ant 4											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dbm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
37850	38048	QPSK	1	0	0	0	1	0	Full	23.38	24.00
37901	38099	QPSK	1	0	0	0	1	0	Full	23.40	24.00
38150	37952	QPSK	1	0	0	0	1	0	Full	23.24	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 1	23.38	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 1	23.40	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 1	23.24	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 2	23.38	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 2	23.40	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 2	23.24	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 3	23.38	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 3	23.40	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 3	23.24	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 4	23.38	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 4	23.40	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 4	23.24	24.00

CA_38C_Ant 5											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
37850	38048	QPSK	1	0	0	0	1	0	Full	23.00	24.00
37901	38099	QPSK	1	0	0	0	1	0	Full	23.04	24.00
38150	37952	QPSK	1	0	0	0	1	0	Full	22.85	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 1	23.00	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 1	23.04	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 1	22.85	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 2	23.00	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 2	23.04	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 2	22.85	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 3	23.00	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 3	23.04	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 3	22.85	24.00
37850	38048	QPSK	1	0	0	0	1	0	ECI 4	23.00	24.00
37901	38099	QPSK	1	0	0	0	1	0	ECI 4	23.04	24.00
38150	37952	QPSK	1	0	0	0	1	0	ECI 4	22.85	24.00

CA 41C Ant 1											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dbm)	Tune up Power (dbm)
			RB Size	RB offset	RB Size	RB offset					
39750	39948	QPSK	1	0	0	0	1	0	Full	23.74	24.50
40185	39987	QPSK	1	0	0	0	1	0	Full	23.62	24.50
40620	40422	QPSK	1	0	0	0	1	0	Full	23.96	24.50
41055	40857	QPSK	1	0	0	0	1	0	Full	23.48	24.50
41490	41292	QPSK	1	0	0	0	1	0	Full	23.94	24.50
39750	39948	QPSK	1	0	0	0	1	0	ECI 1	21.05	21.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 1	21.09	21.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 1	21.26	21.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 1	20.96	21.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 1	21.25	21.75
39750	39948	QPSK	1	0	0	0	1	0	ECI 2	20.14	20.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 2	20.07	20.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 2	20.38	20.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 2	20.05	20.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 2	20.33	20.75
39750	39948	QPSK	1	0	0	0	1	0	ECI 3	21.05	21.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 3	21.09	21.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 3	21.26	21.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 3	20.96	21.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 3	21.25	21.75
39750	39948	QPSK	1	0	0	0	1	0	ECI 4	20.14	20.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 4	20.07	20.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 4	20.38	20.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 4	20.05	20.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 4	20.33	20.75

CA 41C Ant 4											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
39750	39948	QPSK	1	0	0	0	1	0	Full	24.72	25.00
40185	39987	QPSK	1	0	0	0	1	0	Full	24.64	25.00
40620	40422	QPSK	1	0	0	0	1	0	Full	24.59	25.00
41055	40857	QPSK	1	0	0	0	1	0	Full	24.02	25.00
41490	41292	QPSK	1	0	0	0	1	0	Full	23.84	25.00
39750	39948	QPSK	1	0	0	0	1	0	ECI 1	23.35	23.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 1	23.24	23.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 1	23.15	23.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 1	22.96	23.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 1	22.74	23.75
39750	39948	QPSK	1	0	0	0	1	0	ECI 2	24.72	25.00
40185	39987	QPSK	1	0	0	0	1	0	ECI 2	24.64	25.00
40620	40422	QPSK	1	0	0	0	1	0	ECI 2	24.59	25.00
41055	40857	QPSK	1	0	0	0	1	0	ECI 2	24.02	25.00
41490	41292	QPSK	1	0	0	0	1	0	ECI 2	23.84	25.00
39750	39948	QPSK	1	0	0	0	1	0	ECI 3	23.35	23.75
40185	39987	QPSK	1	0	0	0	1	0	ECI 3	23.24	23.75
40620	40422	QPSK	1	0	0	0	1	0	ECI 3	23.15	23.75
41055	40857	QPSK	1	0	0	0	1	0	ECI 3	22.96	23.75
41490	41292	QPSK	1	0	0	0	1	0	ECI 3	22.74	23.75
39750	39948	QPSK	1	0	0	0	1	0	ECI 4	24.72	25.00
40185	39987	QPSK	1	0	0	0	1	0	ECI 4	24.64	25.00
40620	40422	QPSK	1	0	0	0	1	0	ECI 4	24.59	25.00
41055	40857	QPSK	1	0	0	0	1	0	ECI 4	24.02	25.00
41490	41292	QPSK	1	0	0	0	1	0	ECI 4	23.84	25.00

CA 41C Ant 5											
Combination 20MHz+20MHz (100RB+100RB)											
PCC Channel	SCC Channel	Modulation	PCC		SCC		Total RB Size	Target MPR Level (dB)	Power State	Measured Power (dBm)	Tune up Power (dBm)
			RB Size	RB offset	RB Size	RB offset					
39750	39948	QPSK	1	0	0	0	1	0	Full	24.03	25.00
40185	39987	QPSK	1	0	0	0	1	0	Full	23.62	25.00
40620	40422	QPSK	1	0	0	0	1	0	Full	23.55	25.00
41055	40857	QPSK	1	0	0	0	1	0	Full	24.16	25.00
41490	41292	QPSK	1	0	0	0	1	0	Full	24.25	25.00
39750	39948	QPSK	1	0	0	0	1	0	ECI 1	22.94	24.00
40185	39987	QPSK	1	0	0	0	1	0	ECI 1	23.63	24.00
40620	40422	QPSK	1	0	0	0	1	0	ECI 1	22.53	24.00
41055	40857	QPSK	1	0	0	0	1	0	ECI 1	23.02	24.00
41490	41292	QPSK	1	0	0	0	1	0	ECI 1	23.17	24.00
39750	39948	QPSK	1	0	0	0	1	0	ECI 2	23.41	24.50
40185	39987	QPSK	1	0	0	0	1	0	ECI 2	23.15	24.50
40620	40422	QPSK	1	0	0	0	1	0	ECI 2	23.04	24.50
41055	40857	QPSK	1	0	0	0	1	0	ECI 2	23.52	24.50
41490	41292	QPSK	1	0	0	0	1	0	ECI 2	23.68	24.50
39750	39948	QPSK	1	0	0	0	1	0	ECI 3	22.94	24.00
40185	39987	QPSK	1	0	0	0	1	0	ECI 3	22.63	24.00
40620	40422	QPSK	1	0	0	0	1	0	ECI 3	22.53	24.00
41055	40857	QPSK	1	0	0	0	1	0	ECI 3	23.02	24.00
41490	41292	QPSK	1	0	0	0	1	0	ECI 3	23.17	24.00
39750	39948	QPSK	1	0	0	0	1	0	ECI 4	23.41	24.50
40185	39987	QPSK	1	0	0	0	1	0	ECI 4	23.15	24.50
40620	40422	QPSK	1	0	0	0	1	0	ECI 4	23.04	24.50
41055	40857	QPSK	1	0	0	0	1	0	ECI 4	23.52	24.50
41490	41292	QPSK	1	0	0	0	1	0	ECI 4	23.68	24.50