

1. Simulation setup

1.1 Modeling for simulation

The simulation approach to perform PD assessment for a Tablet requires accurate modeling for mmWave antenna module as well as the Tablet itself. Figure 2 shows the simulation model which is mounted two mmWave antenna modules.

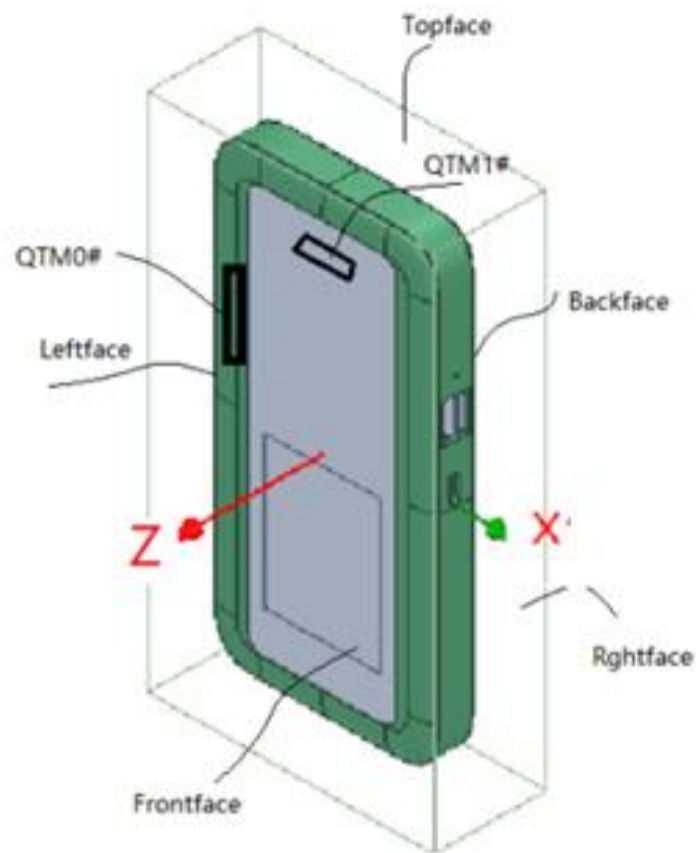


Figure 1. Simulation model which is mounted two mmWave antenna modules

1.2 PD evaluation surfaces

Table 1 shows the PD evaluation planes for each mmWave antenna module

Please note that the “right” and “left” edge of mentioned in this report are defined from the perspective of looking at the device from the front side.

Table 1. PD evaluation surfaces

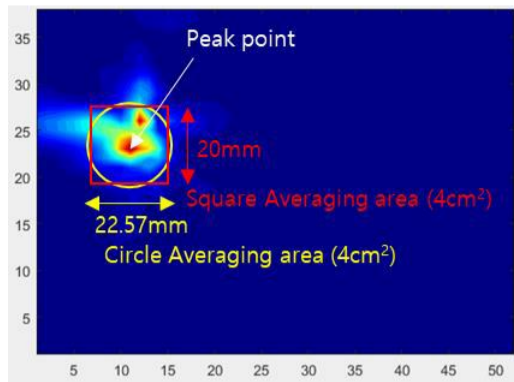
Module	Front	Back	Left	Right	Top	Bottom
QTM#0	O	O	O	O	O	X
QTM#1	O	O	O	O	O	X

2. Simulation verification

2.1 Spatial-averaged power density

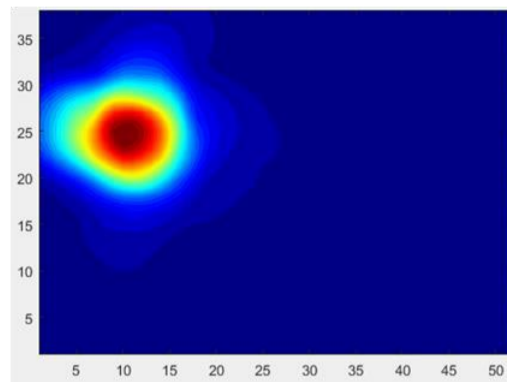
As mentioned in the previous chapter, the Poynting vector ($S^{\vec{}}$) can be obtained through crossproduct of an electric field ($E^{\vec{}}$) and complex conjugate of a magnetic field ($H^{\vec{}}$). The real term of the Poynting vector can be described as the point power density or peak power density. Using the point power density, the spatial-averaged power density can be obtained by the integral of $4cm^2$ at 2.5 mm intervals of the point power density result. Figure 6 shows examples of the distribution plot of point power density and the averaged power density

Point PD on Back-side (unit 1 = 2.5mm grid)
ID #29 (n260)



(a) Point power density

Avg. PD on Back-side (unit 1 = 2.5mm grid)
ID #29 (n260)



(b) Averaged power density Figure 6. Power density distribution (Example)

2.2 Comparison between simulation and measurement

In this section, the simulated and measured power density distributions are compared with each mmWave antenna. Based on the comparison of the power density distribution, the simulated power density and the measured power density have a good correlation. The amplitude mismatch between the simulated 4 cm² average power density and the measured 4 cm² average power density is considered a housing influence and is used to determine the input power limit of each beam for RF exposure compliance (see RF Exposure Part 0 Report).

Input power per each active port is listed below for both simulation and measurement verification and power density characterization. For simulation, these values were entered directly into the HFSS model. For measurement, it was used to input these values for each active port using Factory Test Mode S/W.

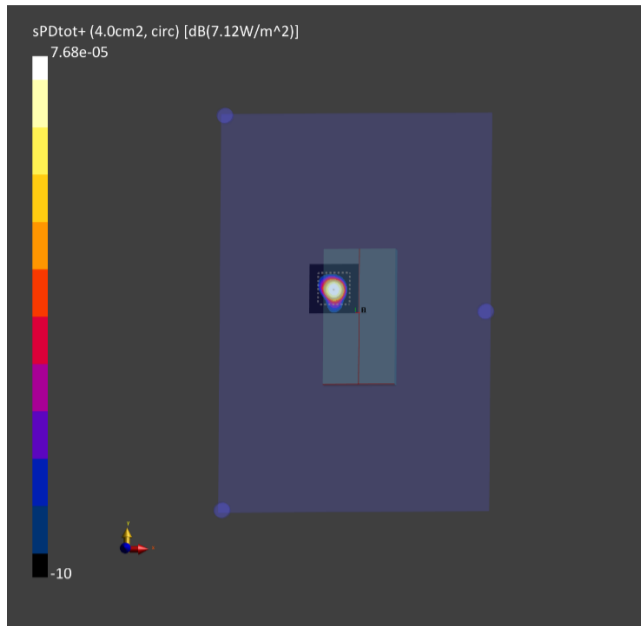
Mode/Band	Antenna	Input Power (dBm)	
		SISO	MIMO
n261	QTM#0 Patch	6	6
	QTM#1 Patch	6	6
n260	QTM#0 Patch	6	6
	QTM#1 Patch	6	6
n257	QTM#0 Patch	6	6
	QTM#1 Patch	6	6

The simulation and measurement results below were performed at 2mm evaluation distance and 28GHz / 38.5GHz. The input power limit was determined based on the results below in the RF Exposure Part 0 Report.

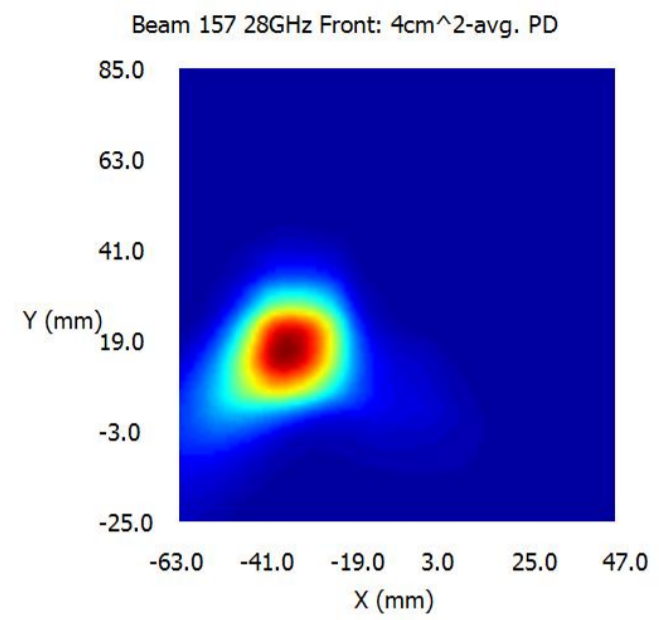
Band	Ant Type	Module	6dBm input measurement / simulation				4cm2 avg. PD(W/m2)	
			Ant Group (Ant Polarization)	beam ID	Surface	Channel	Measured	Simulated
n261	Patch	QTM0	AG1(H)	157	Front	Mid	7.12	19.5
				157	Left	Mid	4.26	13.91
			AG0(V)	32	Front	Mid	4.57	18.5
		QTM1	AG1(H)	41	Left	Mid	4.14	12.81
				153	Front	Mid	4.13	18.37
			AG0(V)	27	Front	Mid	3.49	15.63
n260	Patch	QTM0	AG1(V)	159	Front	Mid	4.18	15.48
				159	Left	Mid	5.89	13.46
			AG0(H)	30	Front	Mid	4.15	16.18
		QTM1	AG1(V)	40	Left	Mid	3.2	14.15
				154	Front	Mid	3.67	14.6
			AG0(H)	163	Top	Mid	1.60	7.62
n257	Patch	QTM0	AG1(H)	25	Front	Mid	3.28	14.25
				35	Top	Mid	1.89	6.76
			AG0(V)	157	Front	Mid	5.47	19.5
		QTM1	AG1(H)	157	Left	Mid	4.04	13.91
				32	Front	Mid	5.38	18.5
			AG0(V)	41	Left	Mid	3.39	12.81
QTM1	AG1(H)	153	Front	Mid	4.10	18.37		
		153	Top	Mid	2.07	7.17		
	AG0(V)	26	Top	Mid	2.07	5.24		
				27	Front	Mid	3.38	15.63

N261

n261 Patch antenna QTM0Ant_Group1(H-polarization) beam ID 157 Front side Mid ch.

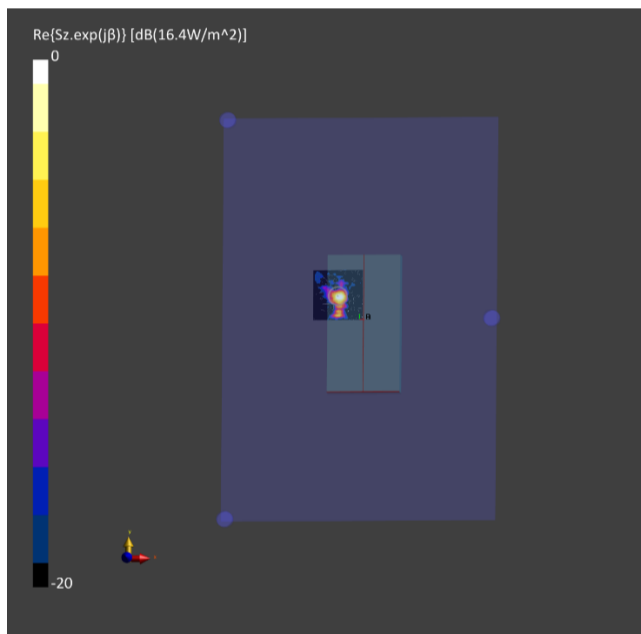


(a) Measurement

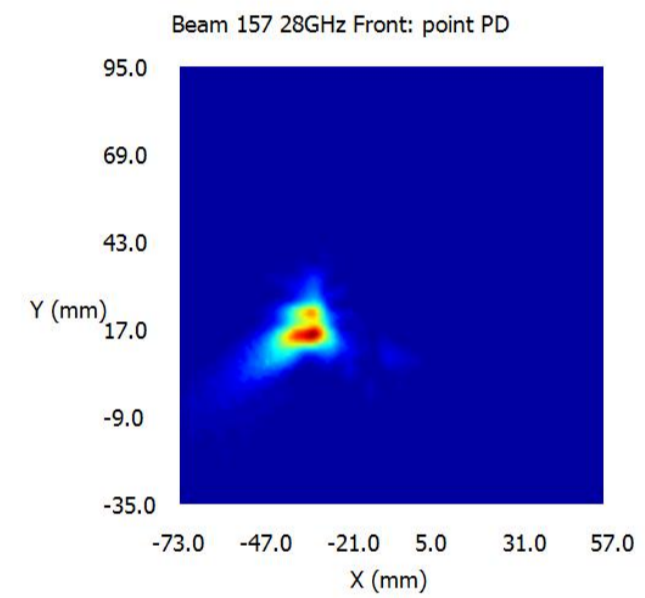


(b) Simulation

Patch antenna QTM0 AG1(H-polarization) beam ID 157, 4cm² Average power density



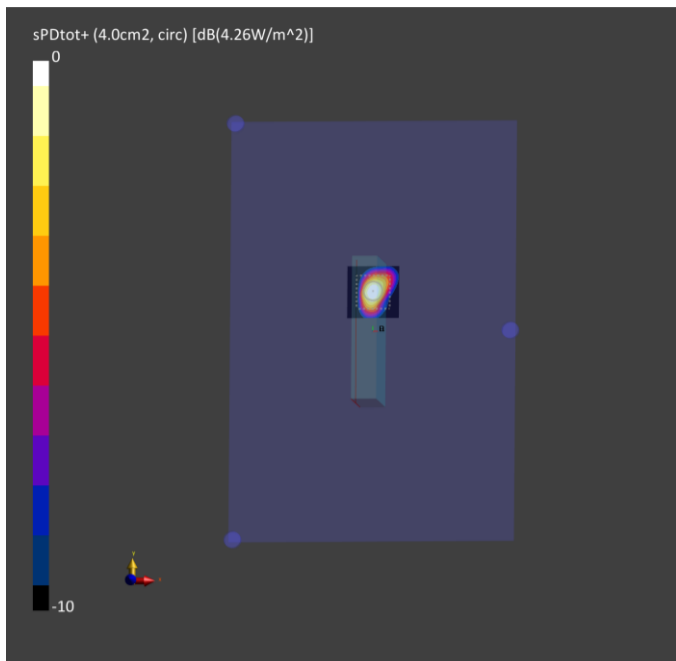
(a) Measurement



(b) Simulation

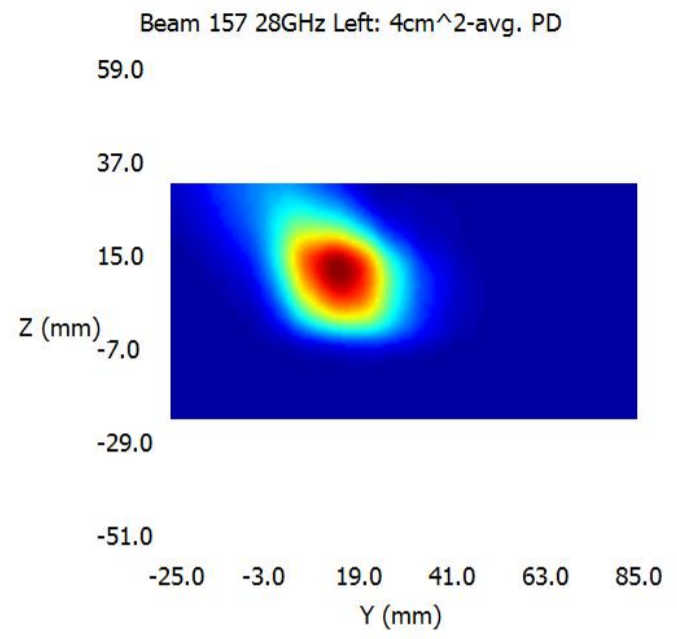
Patch antenna QTM0 AG1(H-polarization) beam ID 157, Point power density

n261 Patch antenna QTM0 Ant_Group1(H-polarization) beam ID 157 Left side Mid ch.

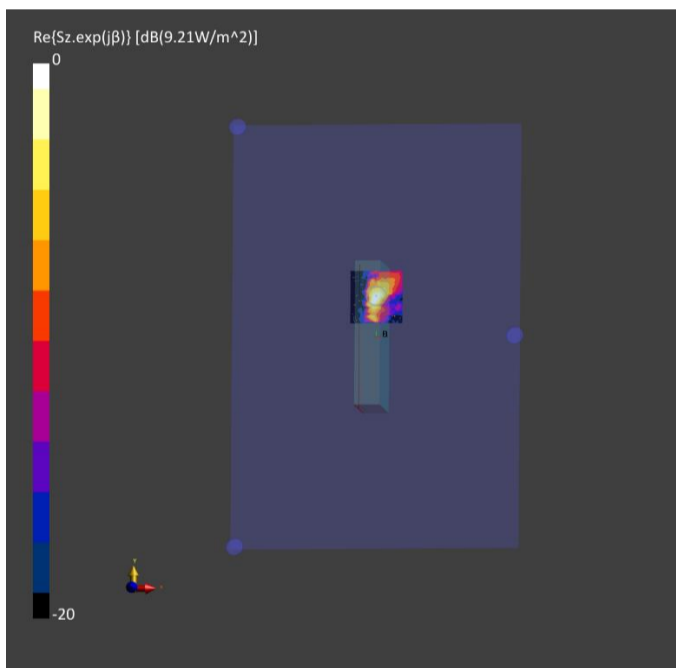


(a) Measurement

Patch antenna QTM0 AG1(H-polarization) beam ID 157, 4cm² Averaged power density

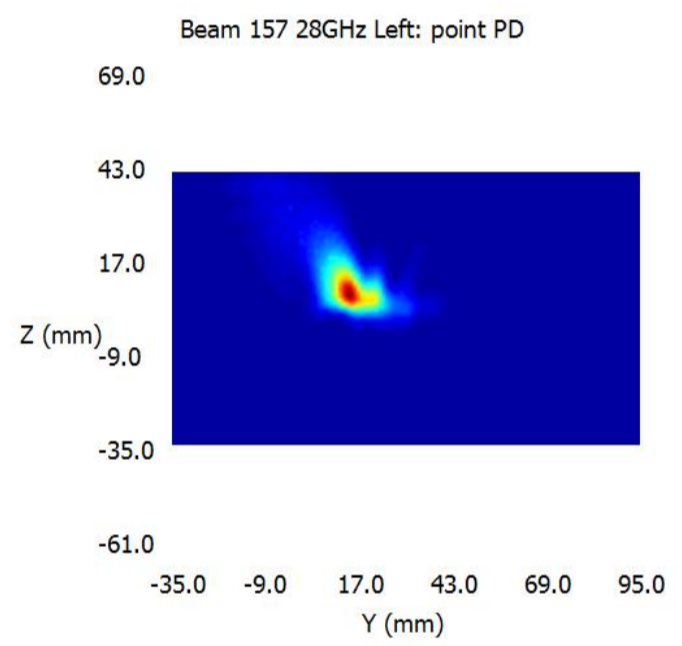


(b) Simulation



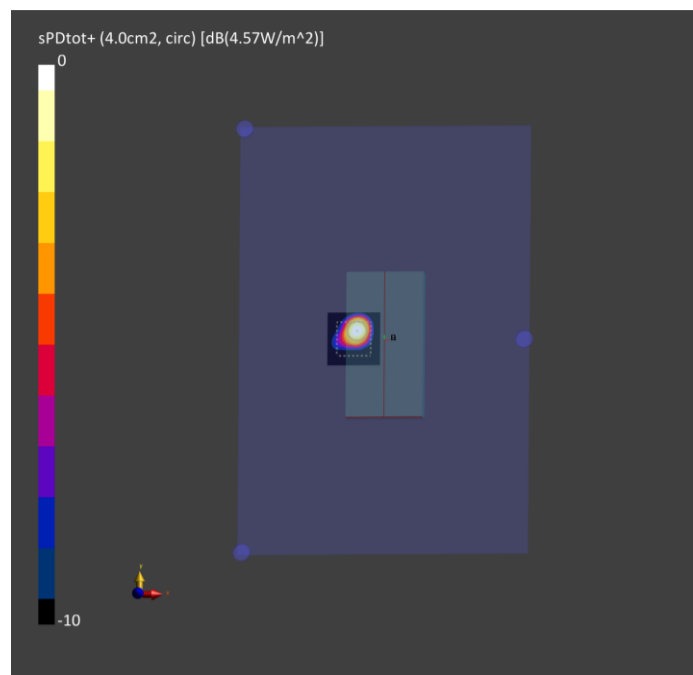
(a) Measurement

Patch antenna QTM0 AG1(H-polarization) beam ID 157, Point power density

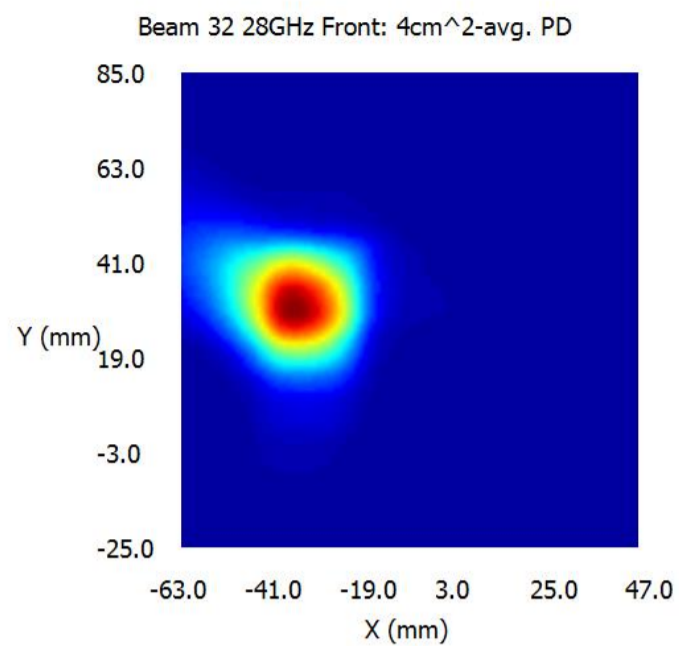


(b) Simulation

n261 Patch antenna QTM0 Ant_Group0(V-polarization) beam ID 32 Front side Mid ch.

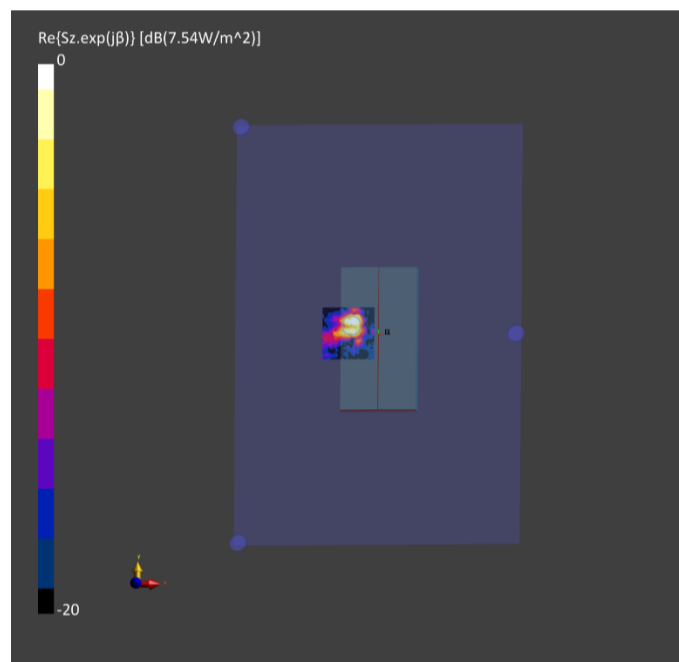


(a) Measurement

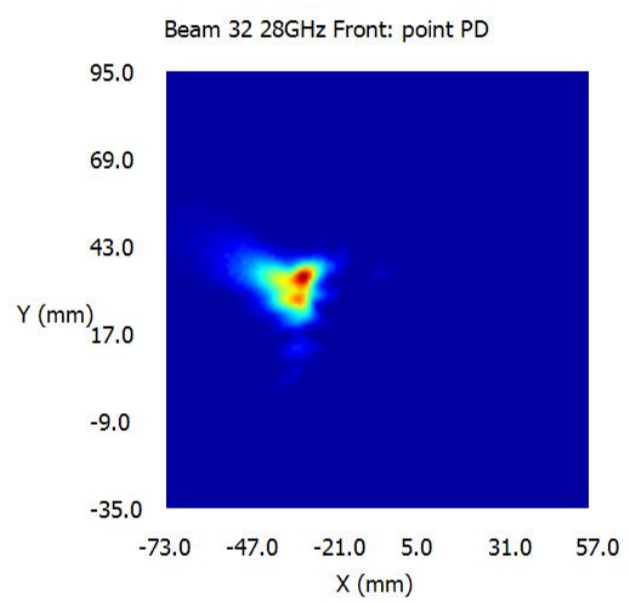


(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 32, 4cm² Averaged power density



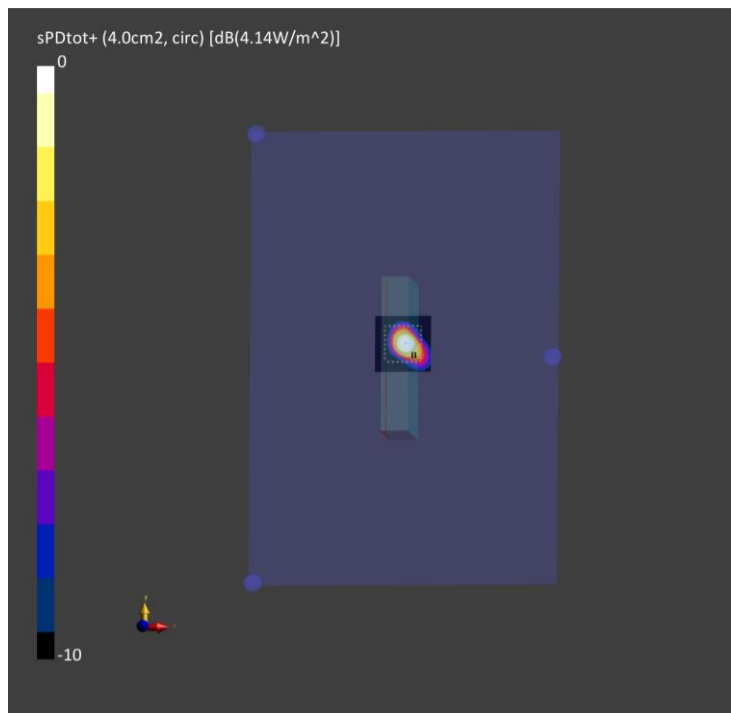
(a) Measurement



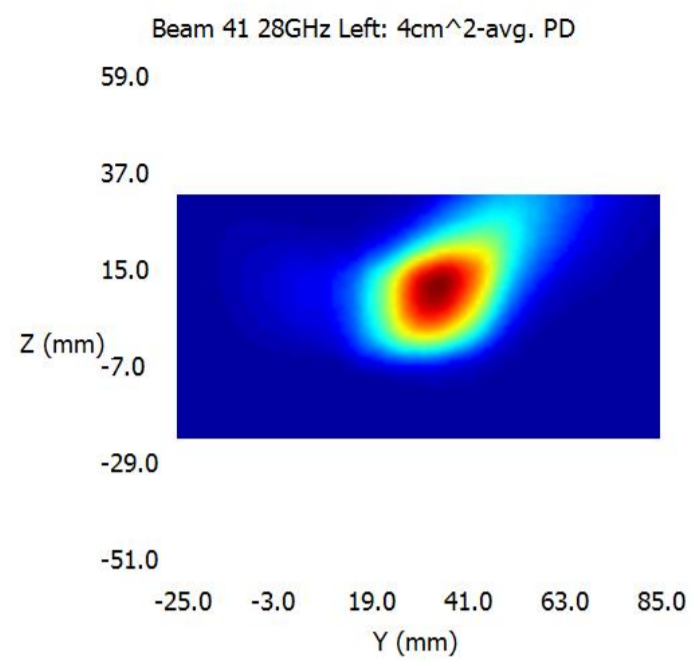
(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 32, Point power density

n261 Patch antenna QTM0 Ant_Group0(V-polarization) beam ID 41 Left-side Mid ch.

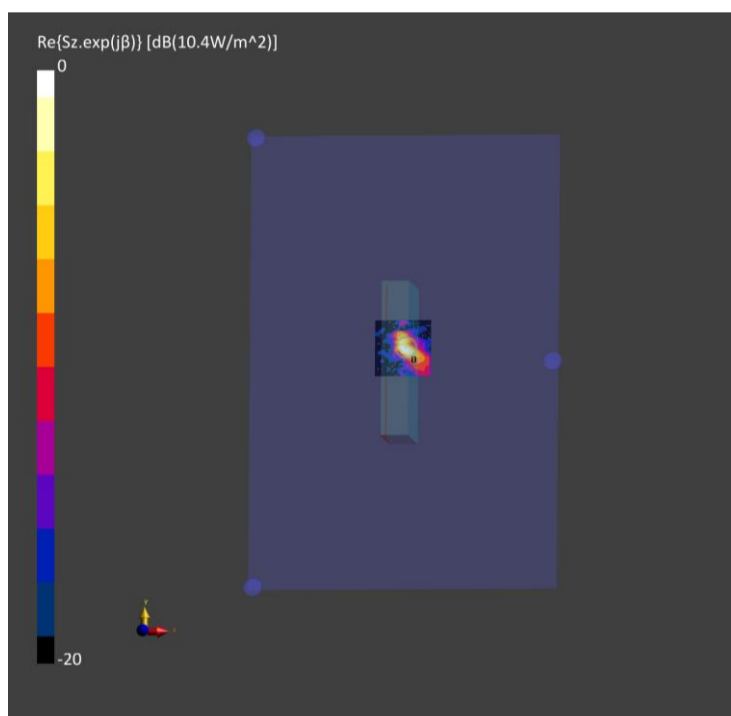


(a) Measurement

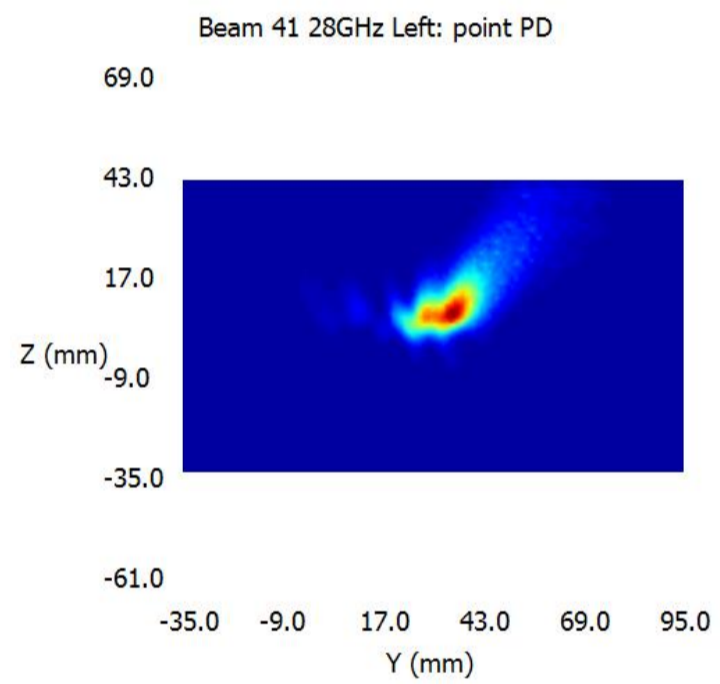


(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 41, 4cm² Averaged power density



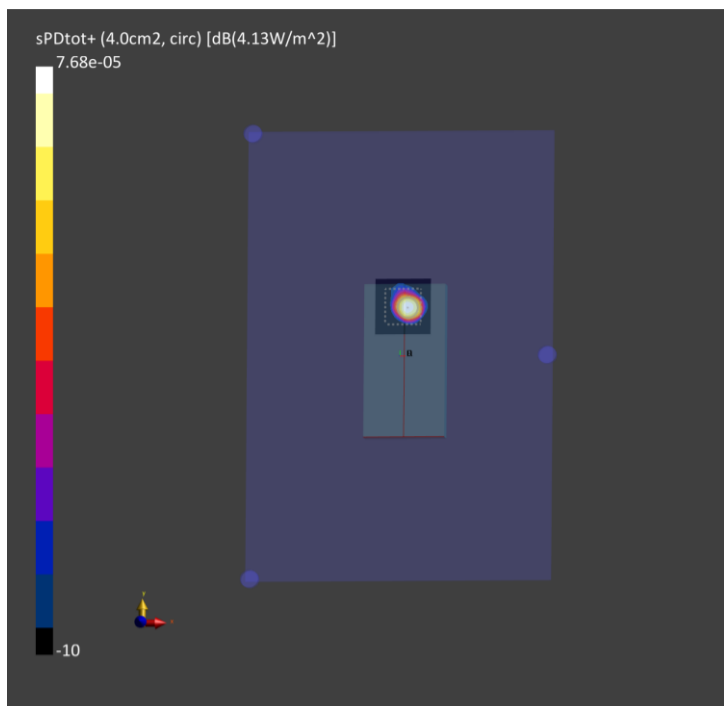
(a) Measurement



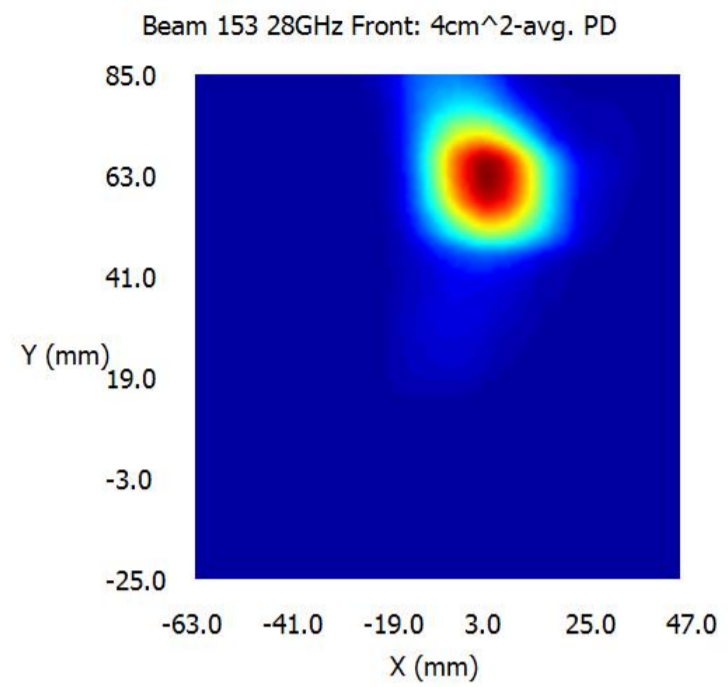
(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 41, Point power density

n261 Patch antenna QTM1 Ant_Group1(H-polarization) beam ID 153 Front-side Mid ch.

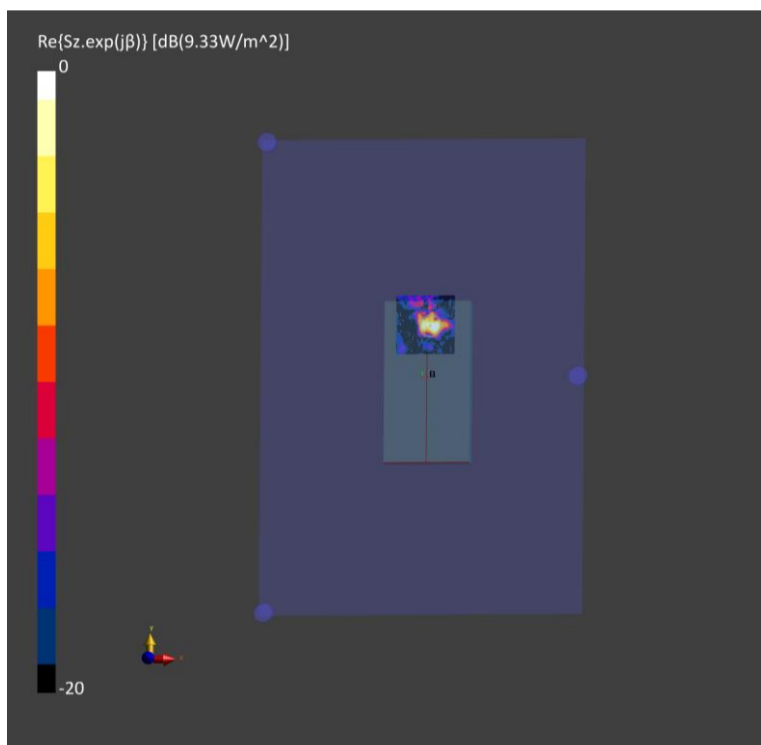


(a) Measurement

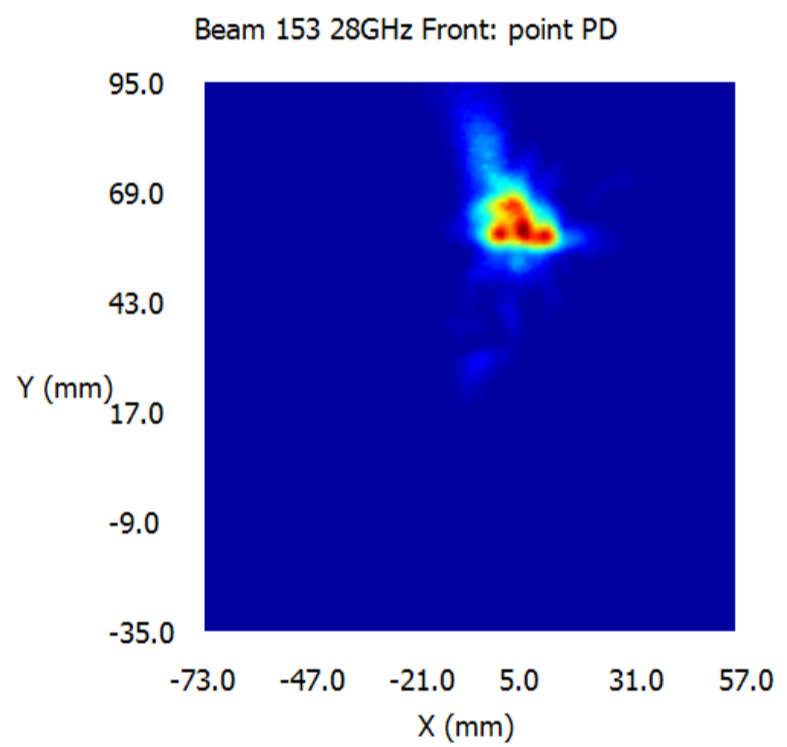


(b) Simulation

Patch antenna QTM1 AG1(H-polarization) beam ID 153, 4cm² power density



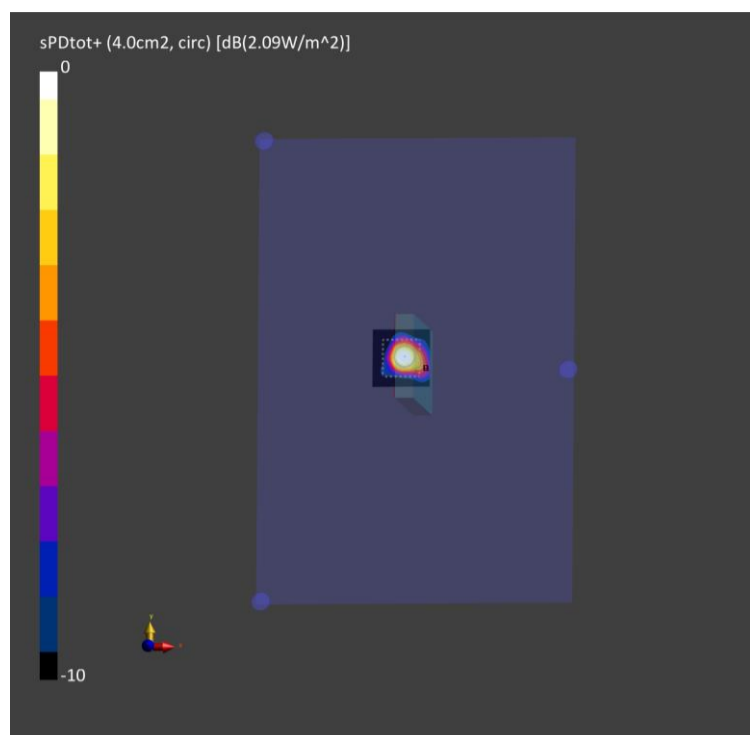
(a) Measurement



(b) Simulation

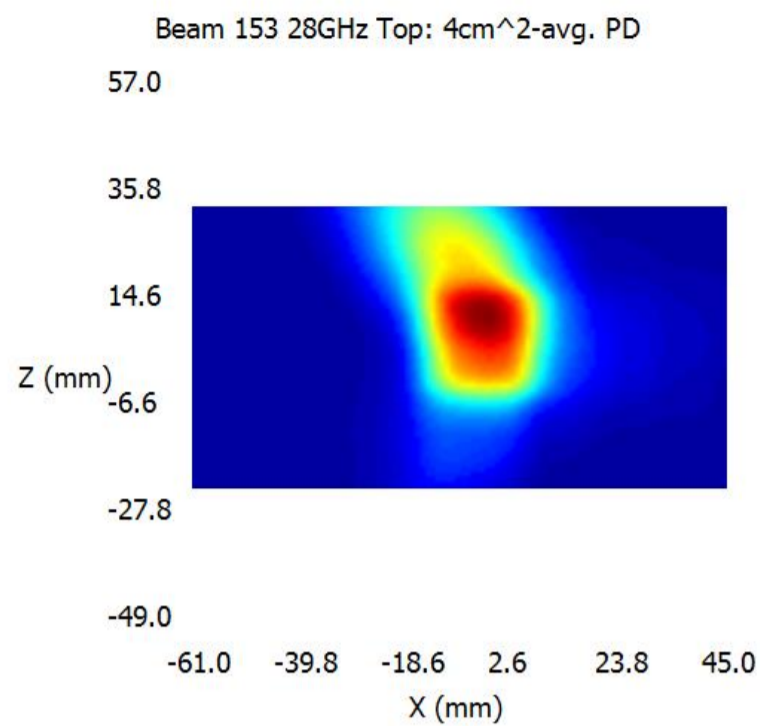
Patch antenna QTM1 AG1(H-polarization) beam ID 153, Point power density

n261 Patch antenna QTM1 Ant_Group1(H-polarization) beam ID 153 Top-side Mid ch.

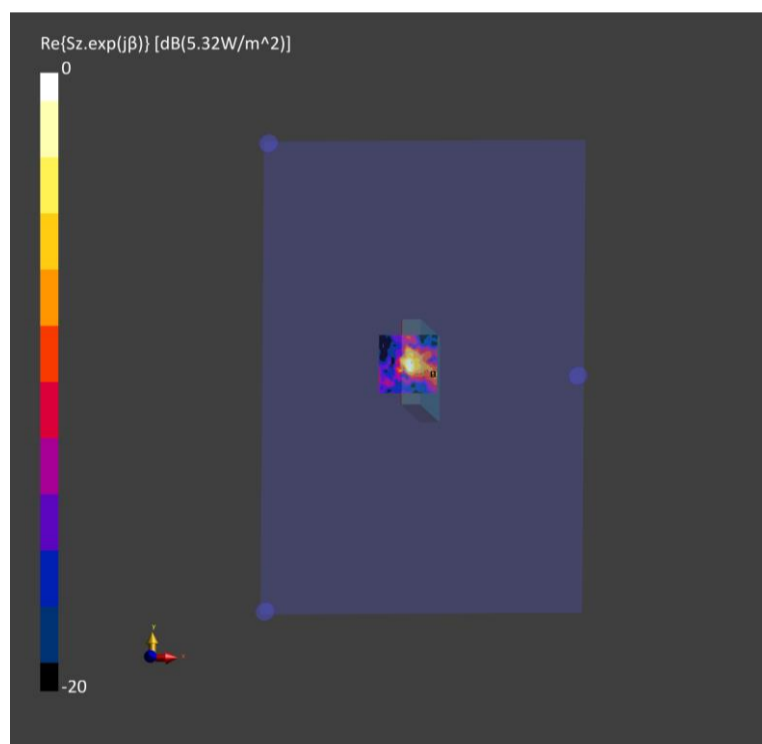


(a) Measurement

Patch antenna QTM1 AG1(H-polarization) beam ID 153, 4cm² Averaged power density

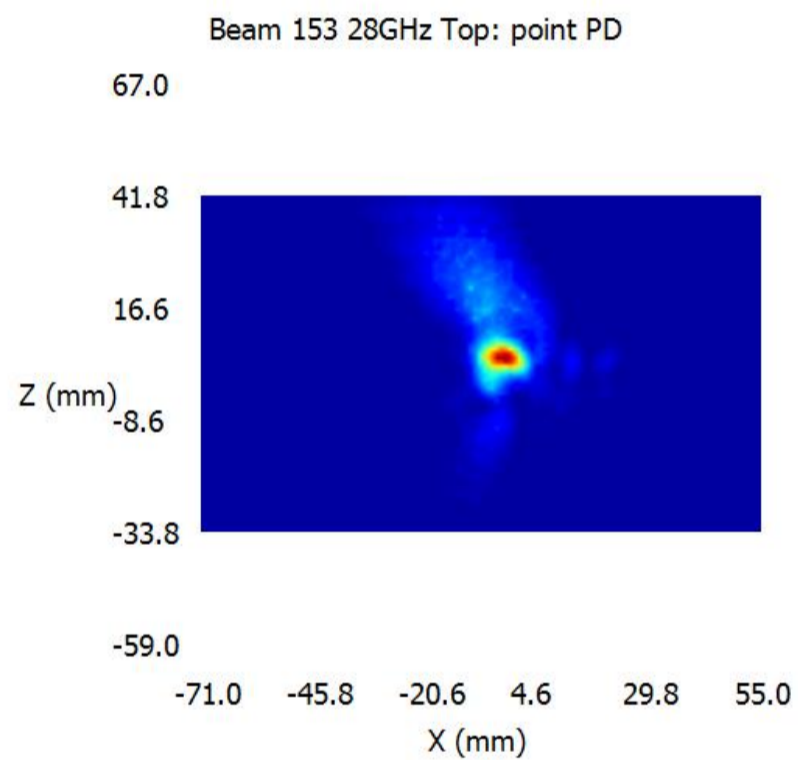


(b) Simulation



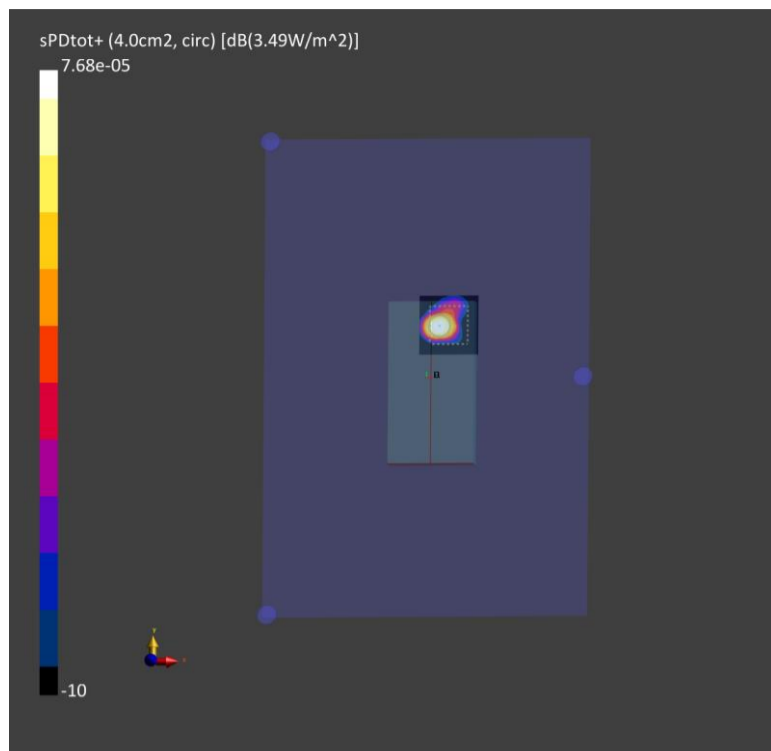
(a) Measurement

Patch antenna QTM1 AG1(H-polarization) beam ID 153, point power density

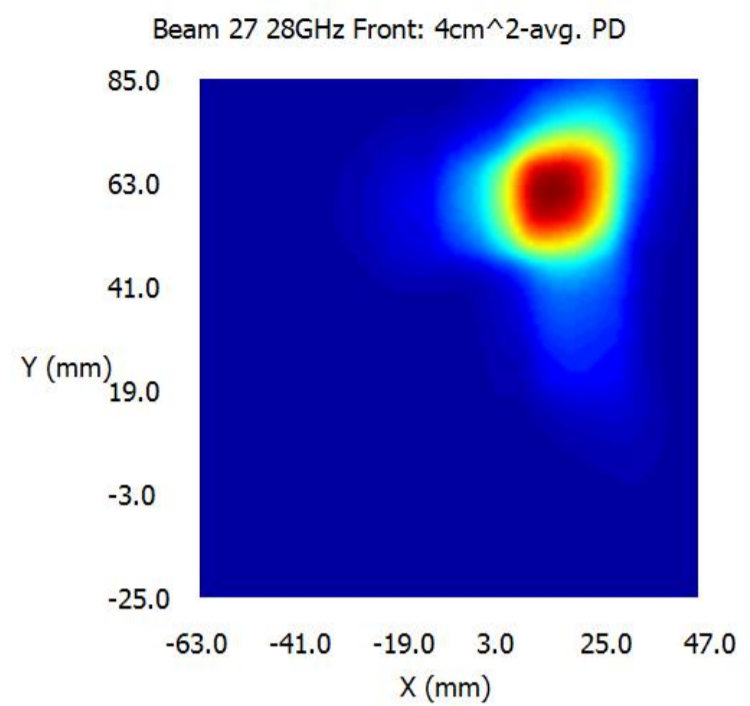


(b) Simulation

n261 Patch antenna QTM1 Ant_Group0(V-polarization) beam ID 27 Front-side Mid ch.

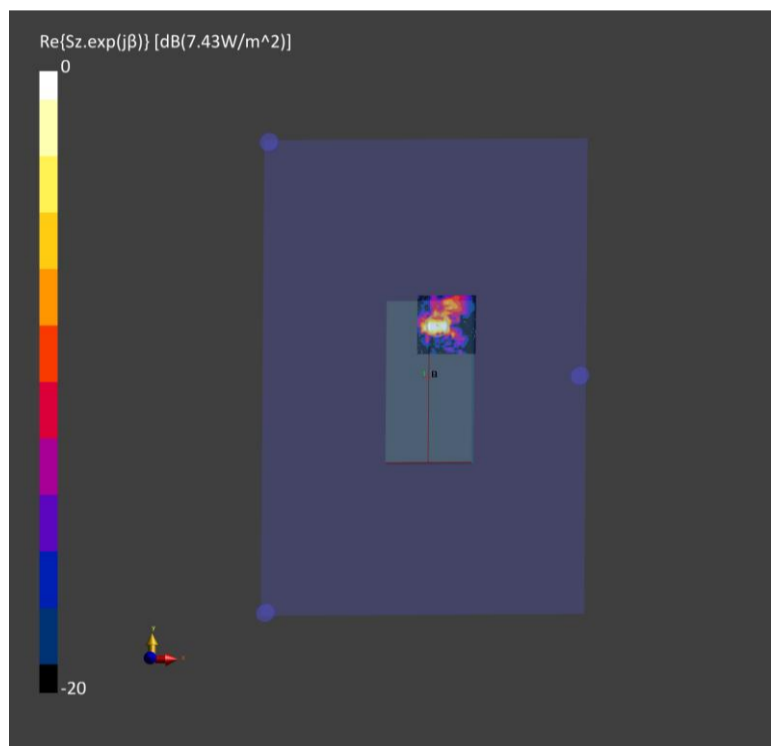


(a) Measurement

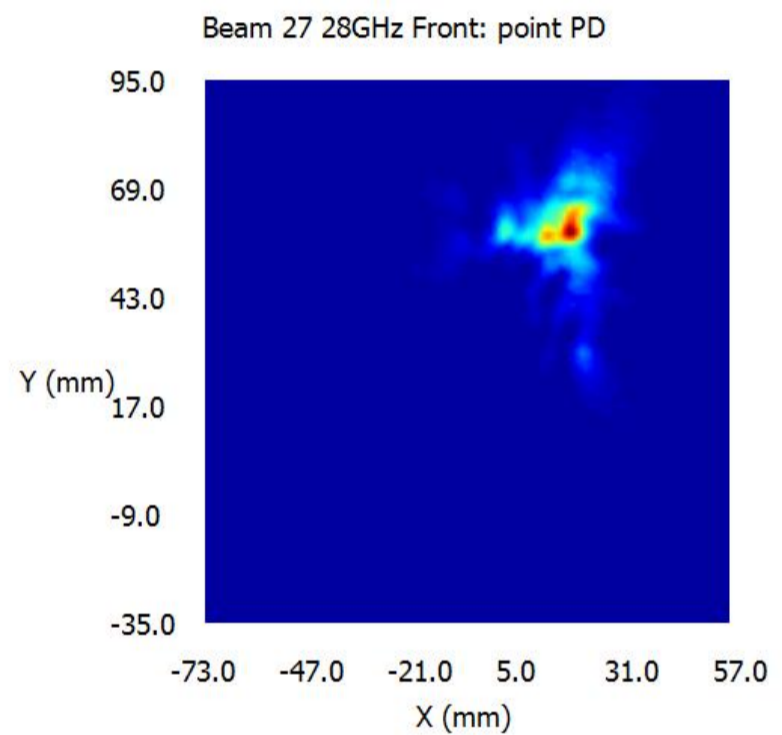


(b) Simulation

Patch antenna QTM1 AG0(V-polarization) beam ID 27, 4cm² Averaged power density



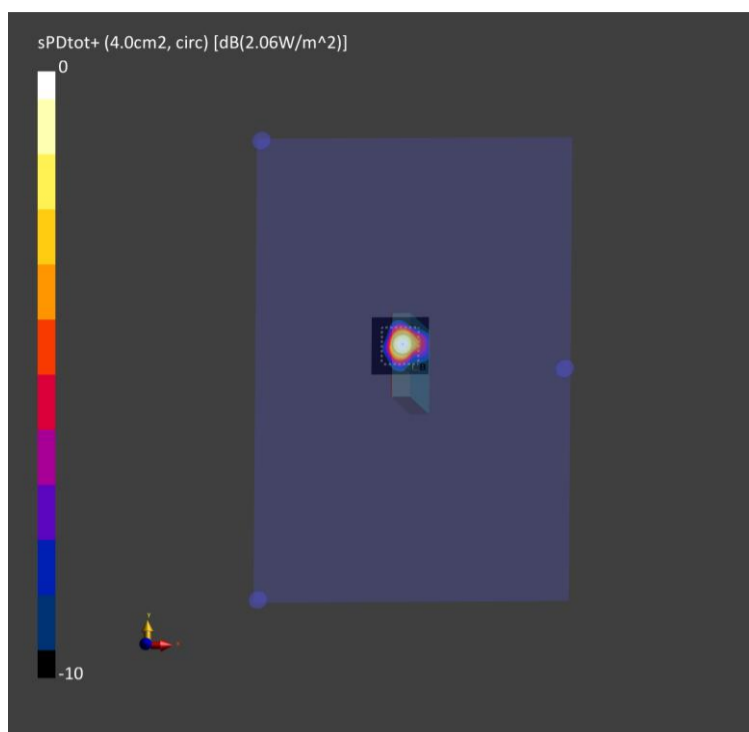
(a) Measurement



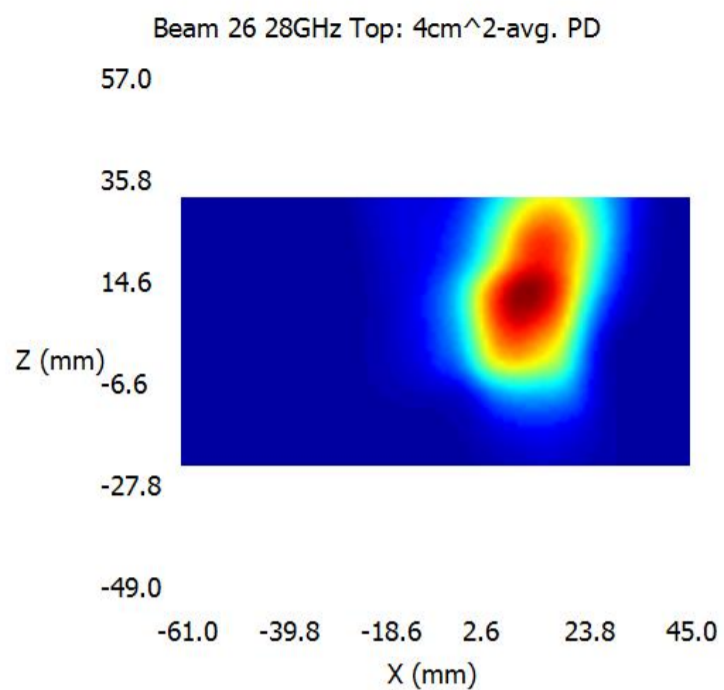
(b) Simulation

Patch antenna QTM1 AG0(V-polarization) beam ID 27, Point power density

n261 Patch antenna QTM1 Ant_Group0(V-polarization) beam ID 26 Top side Mid ch.

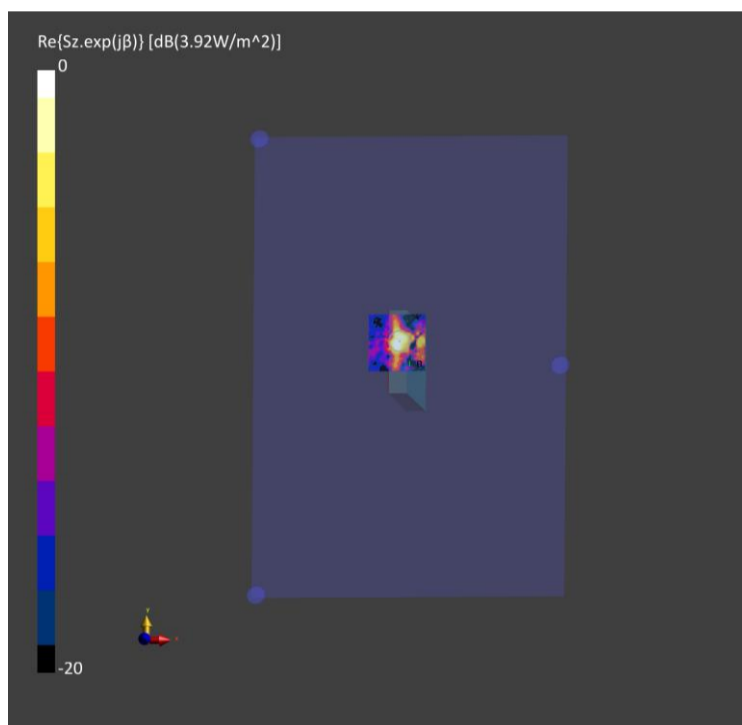


(a) Measurement

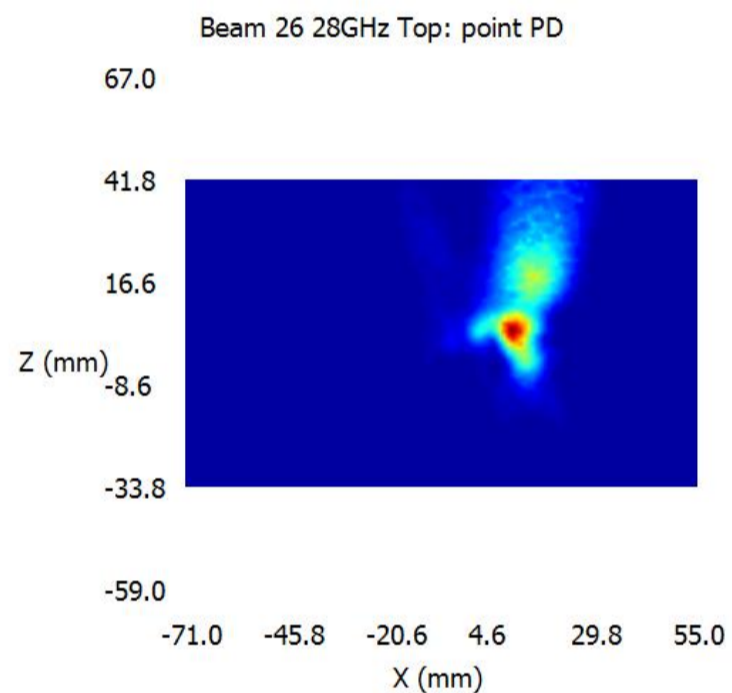


(b) Simulation

Patch antenna QTM1 AG0(V-polarization) beam ID 26, 4cm² Averaged power density



(a) Measurement

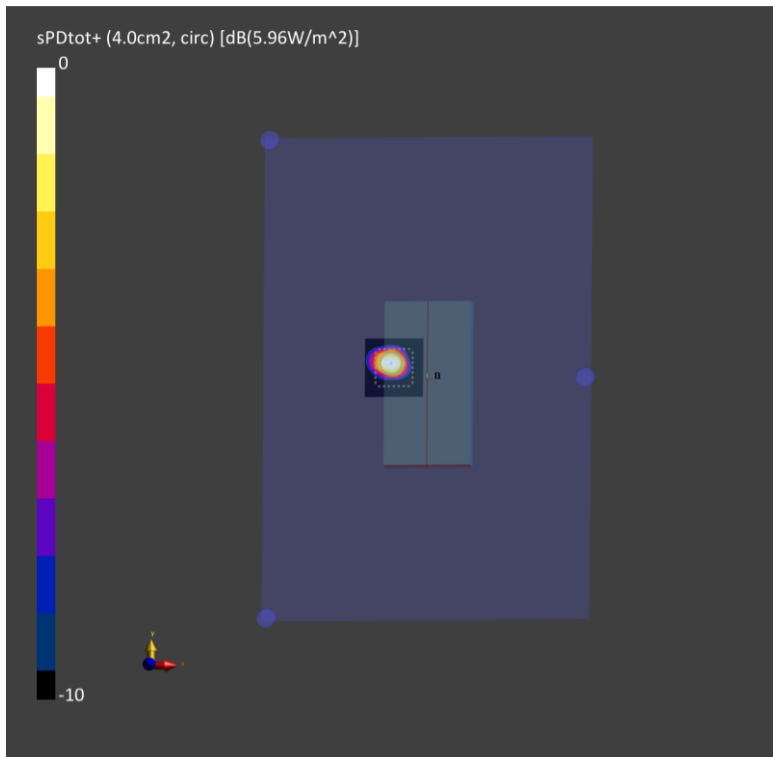


(b) Simulation

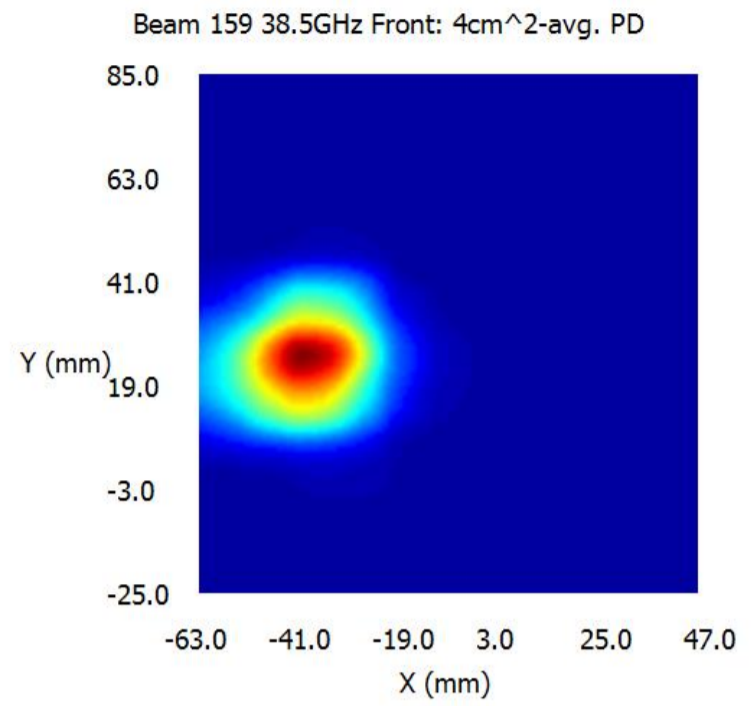
Patch antenna QTM1 AG0(V-polarization) beam ID 26, Point power density

N260

n260 Patch antenna QTM0 Ant_Group1(V-polarization) beam ID 159 Front side Mid ch.

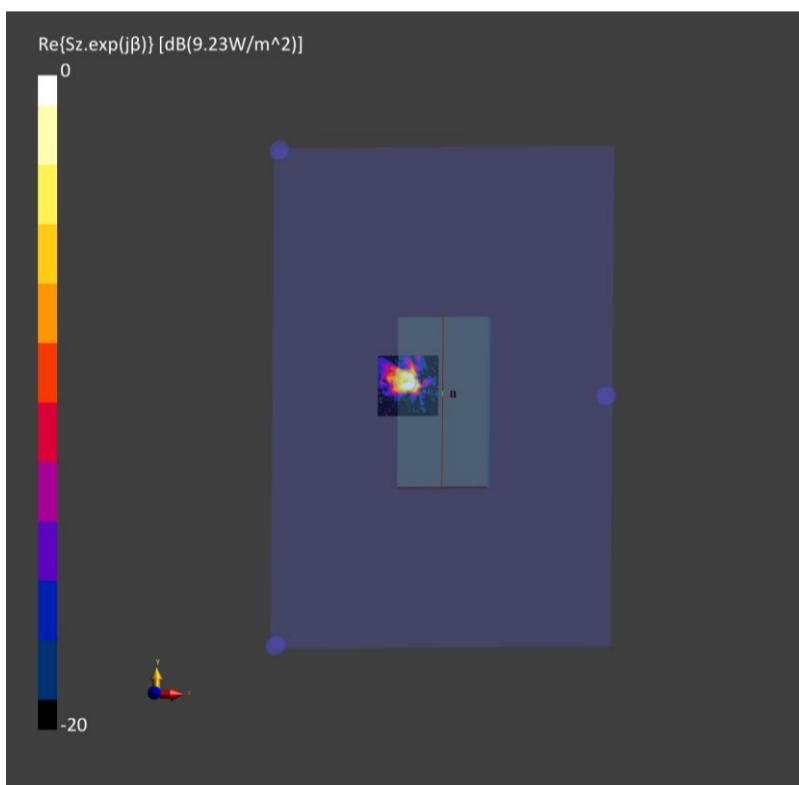


(a) Measurement

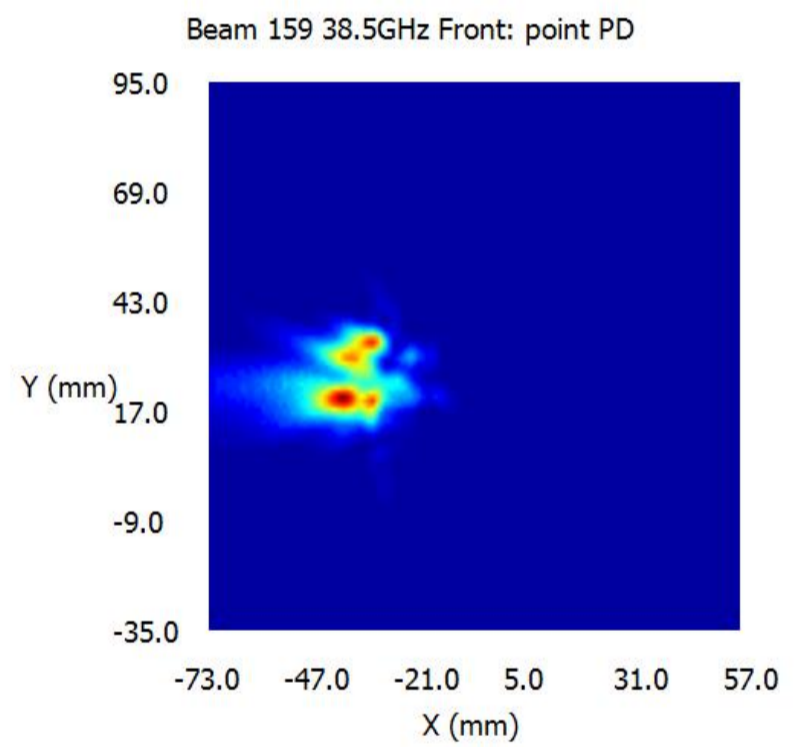


(b) Simulation

Patch antenna QTM0 AG1 (V-polarization) beam ID 159, 4cm² Averaged power density



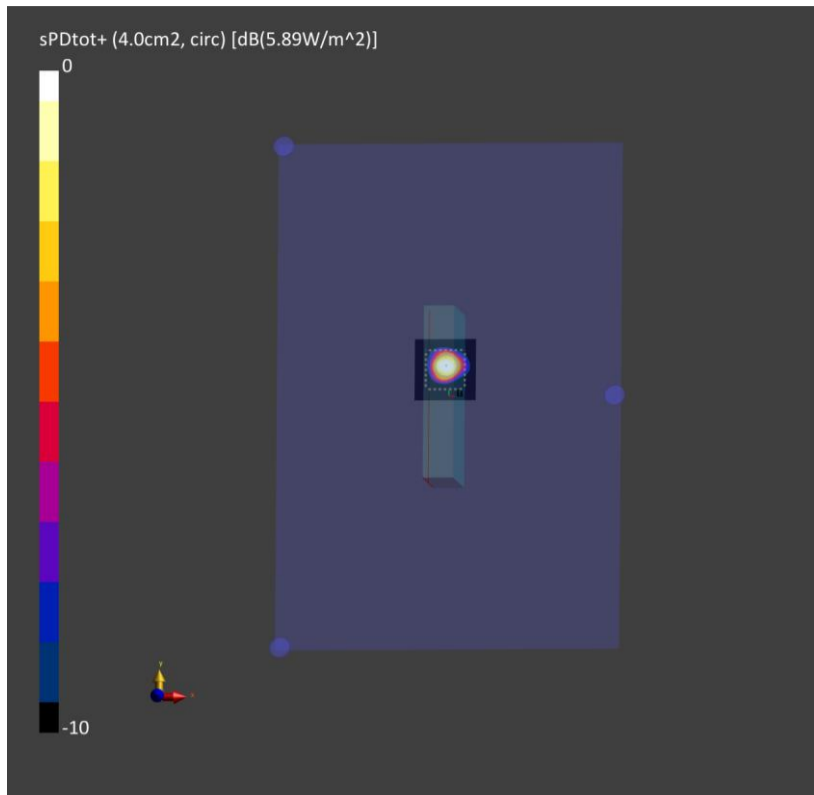
(a) Measurement



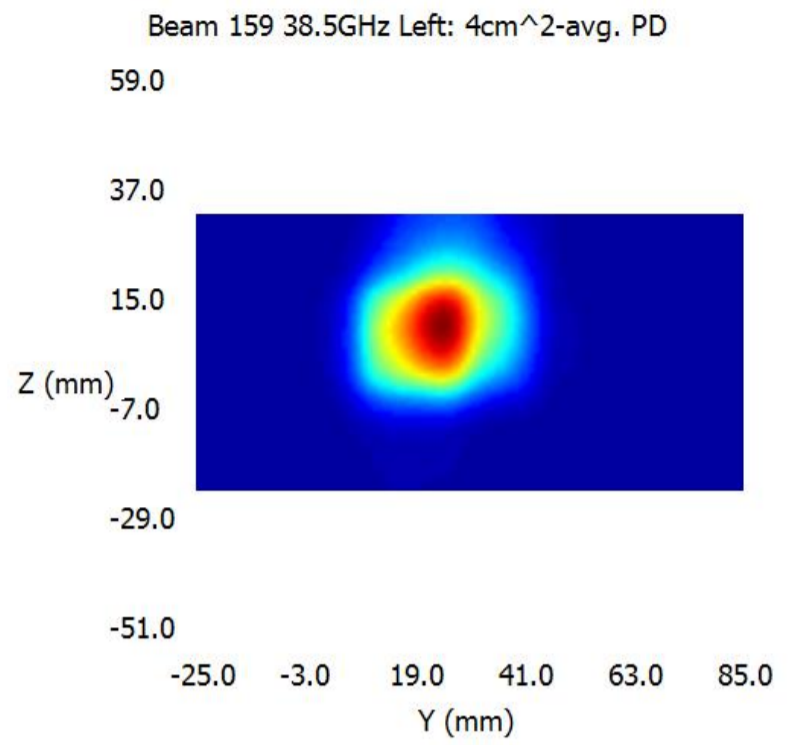
(b) Simulation

Patch antenna QTM0 AG1 (V-polarization) beam ID 159, Point power density

n260 Patch antenna QTM0 Ant_Group1(V-polarization) beam ID 159 Left side Mid ch.

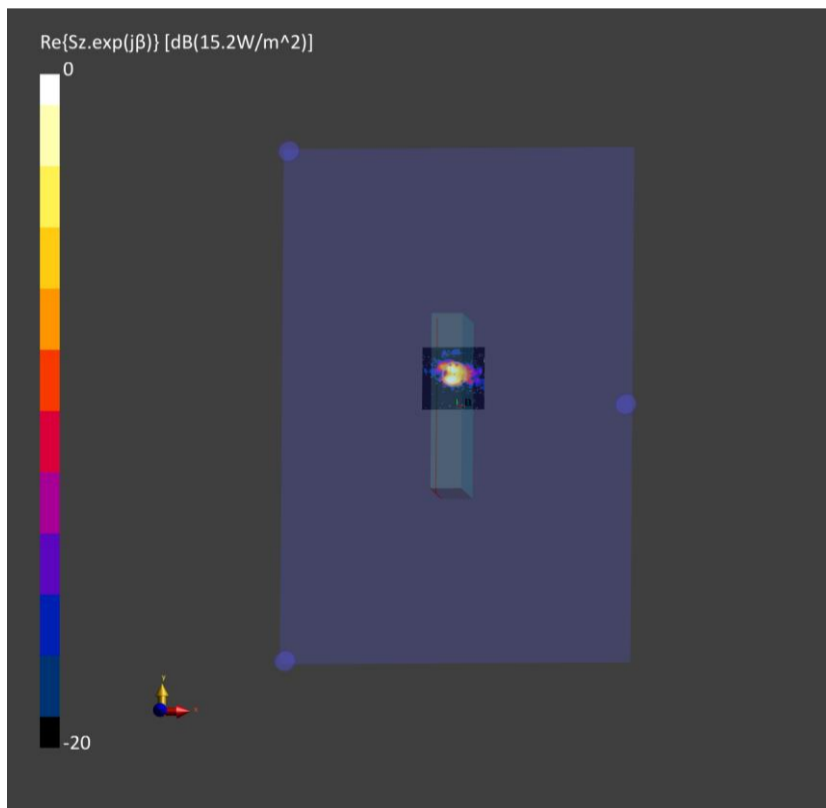


(a) Measurement

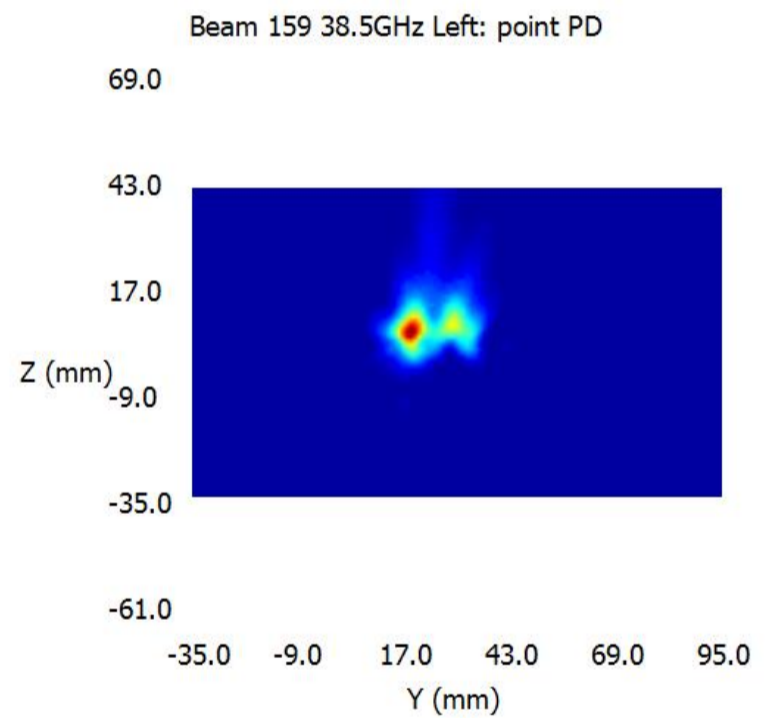


(b) Simulation

Patch antenna QTM0 AG1 (V-polarization) beam ID 159, 4cm² Averaged power density



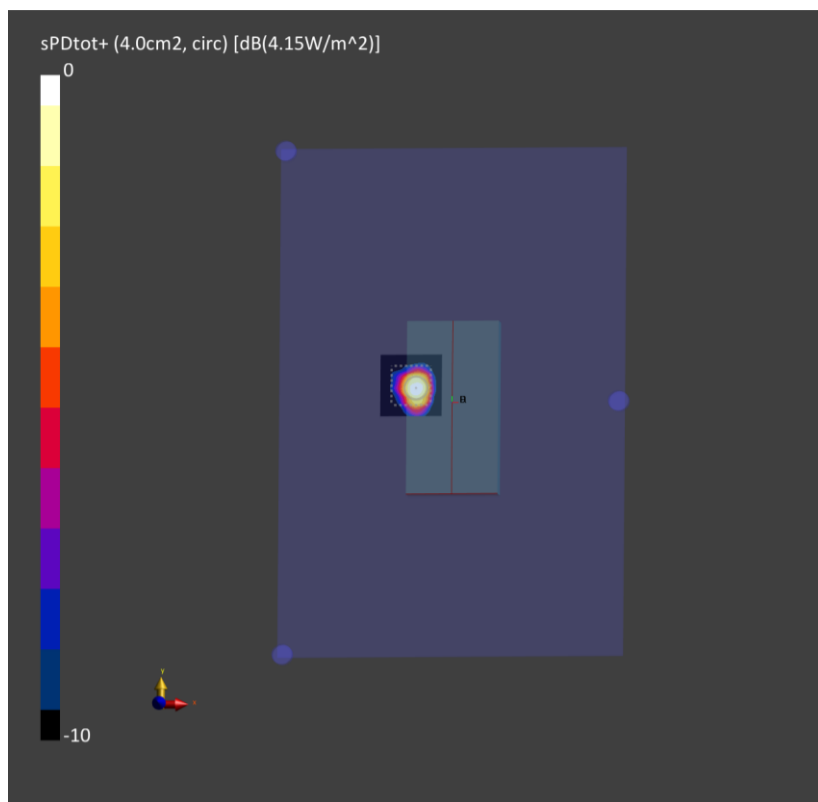
(a) Measurement



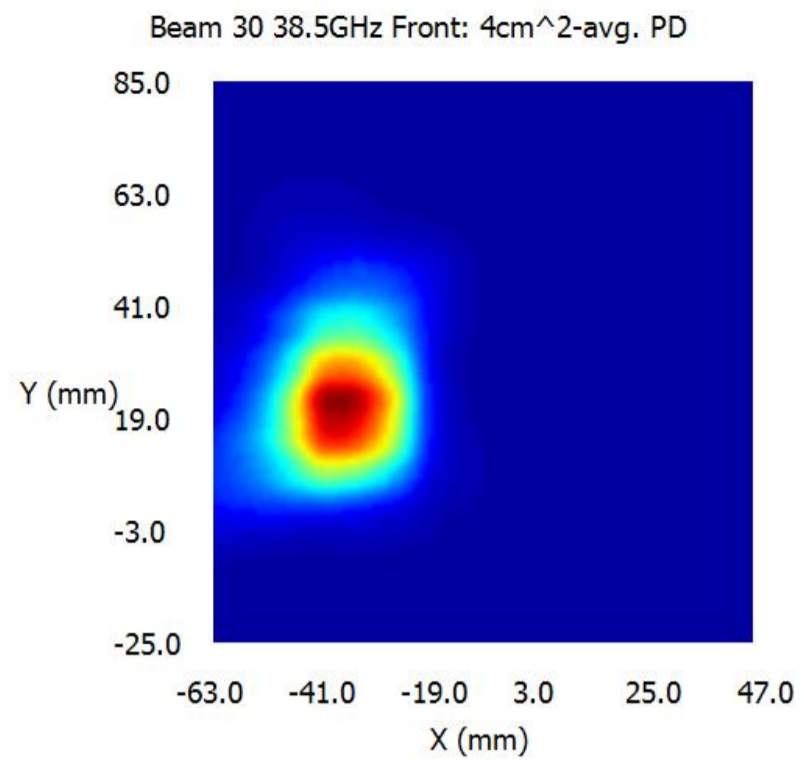
(b) Simulation

Patch antenna QTM0 AG1 (V-polarization) beam ID 159, point power density

n260 Patch antenna QTM0 Ant_Group0(H-polarization) beam ID 30 Front side Mid ch.

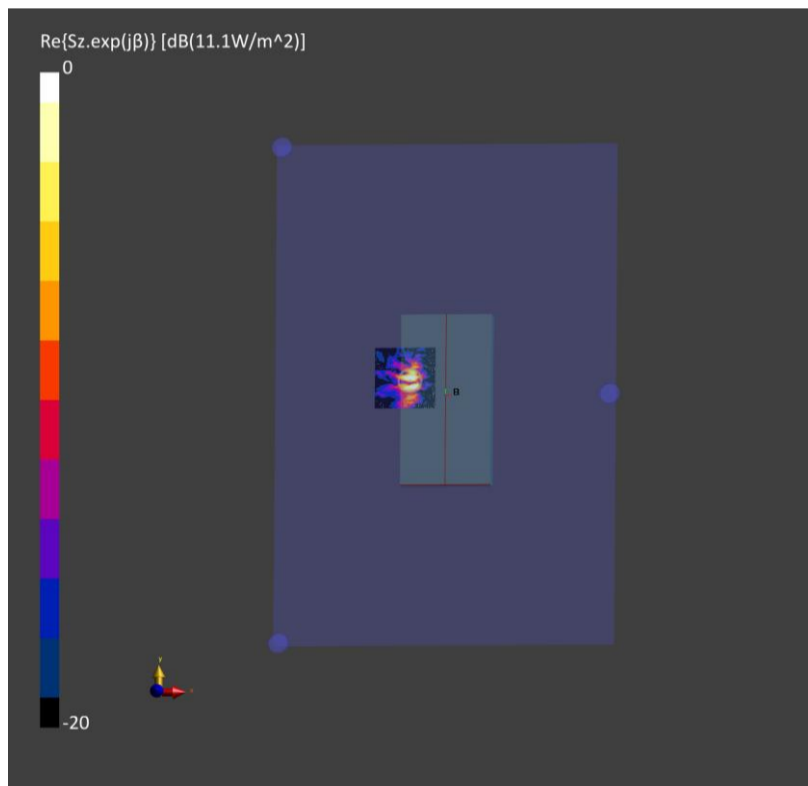


(a) Measurement

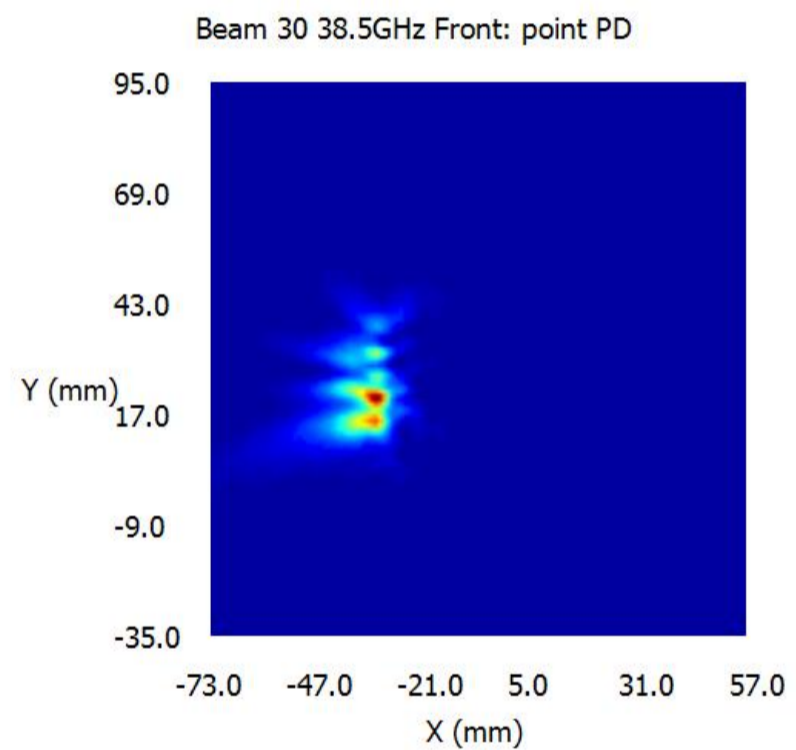


(b) Simulation

Patch antenna QTM0 AG0 (H-polarization) beam ID 30, 4cm² Averaged power density



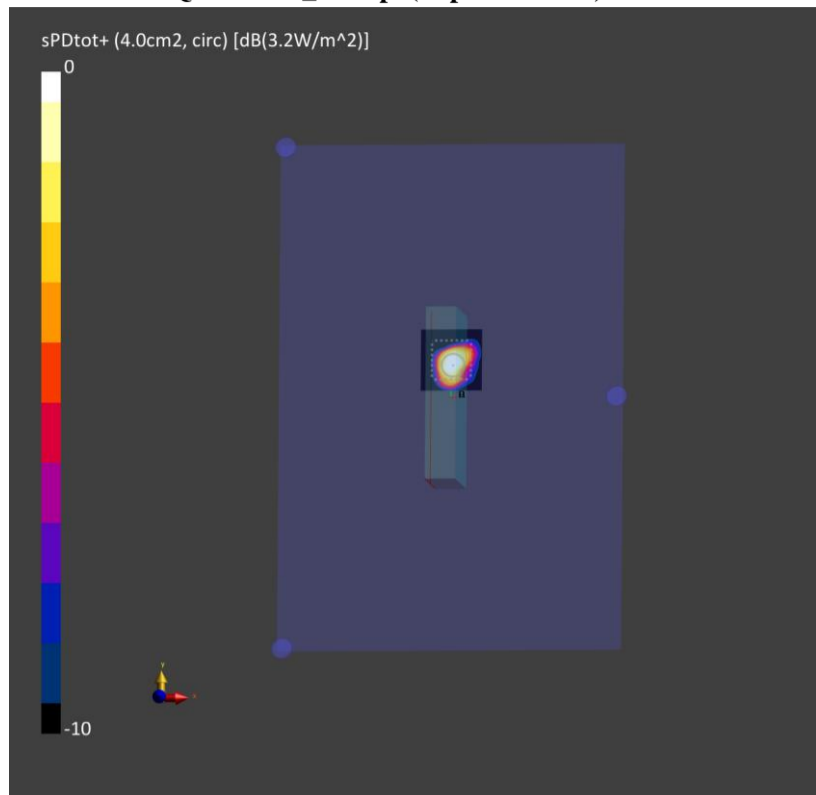
(a) Measurement



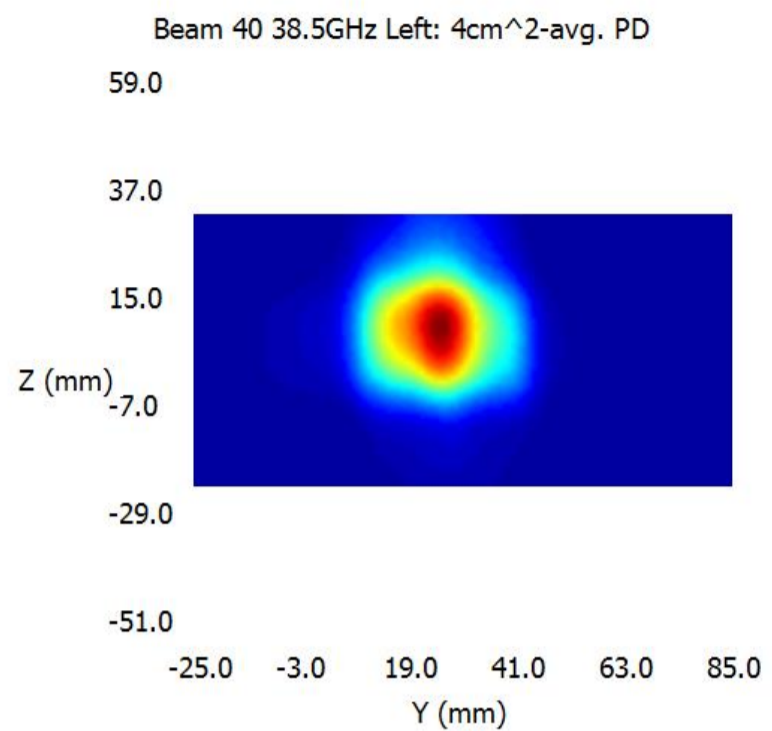
(b) Simulation

Patch antenna QTM0 AG0 (H-polarization) beam ID 30, point power density

n260 Patch antenna QTM0 Ant_Group0(H-polarization) beam ID 40 Left side Mid ch.



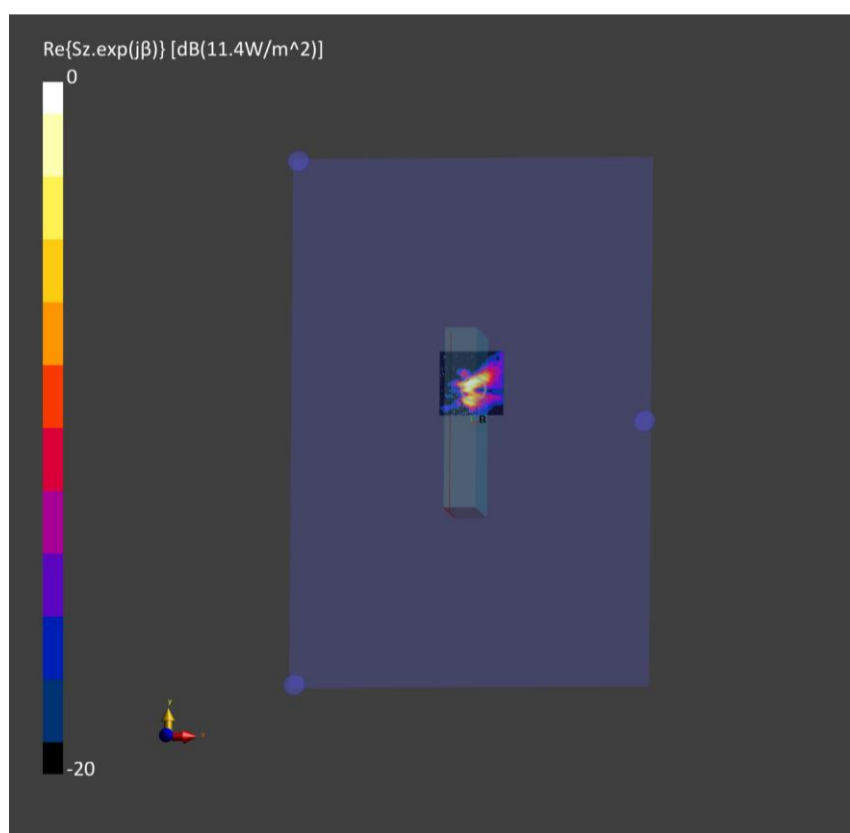
(a) Measurement



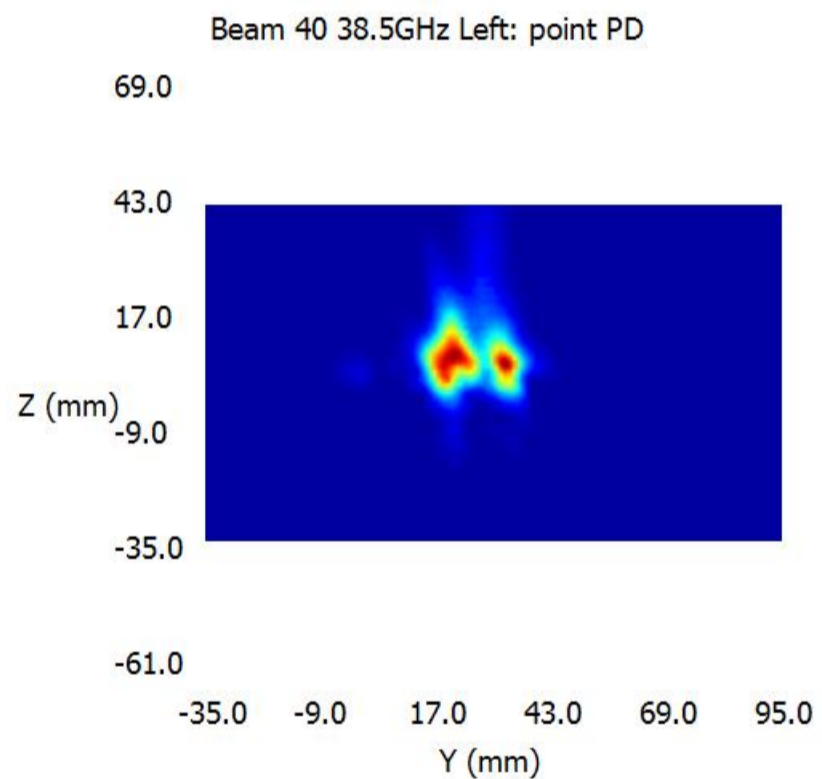
(b) Simulation

Patch antenna QTM0 AG0 (H-polarization) beam ID 40, 4cm² Averaged power density

n260 Patch antenna QTM0 Ant_Group0(H-polarization) beam ID 40 Left side Mid ch.



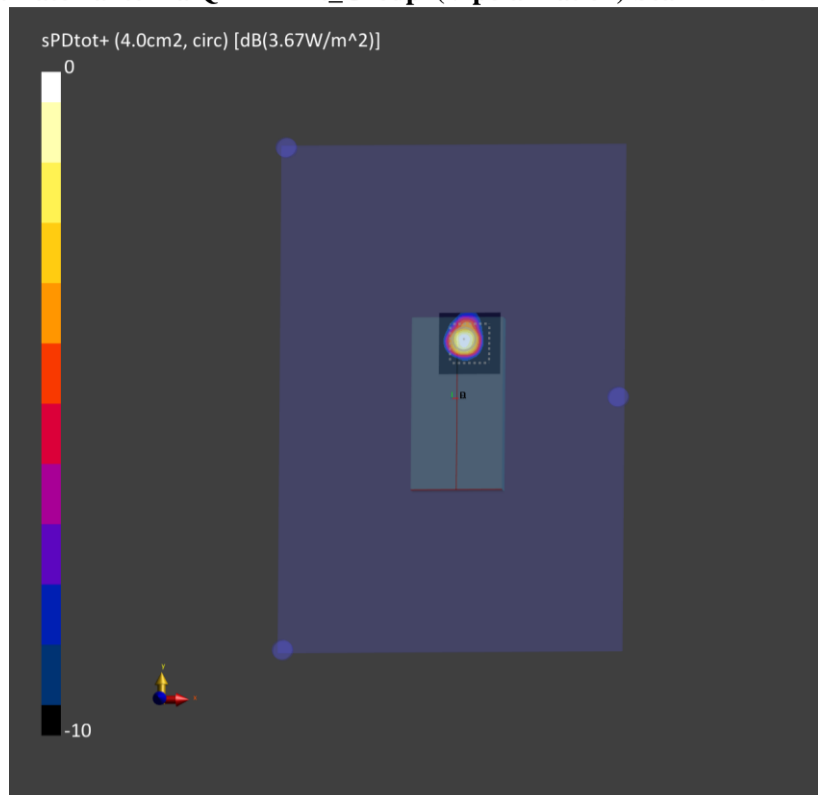
(a) Measurement



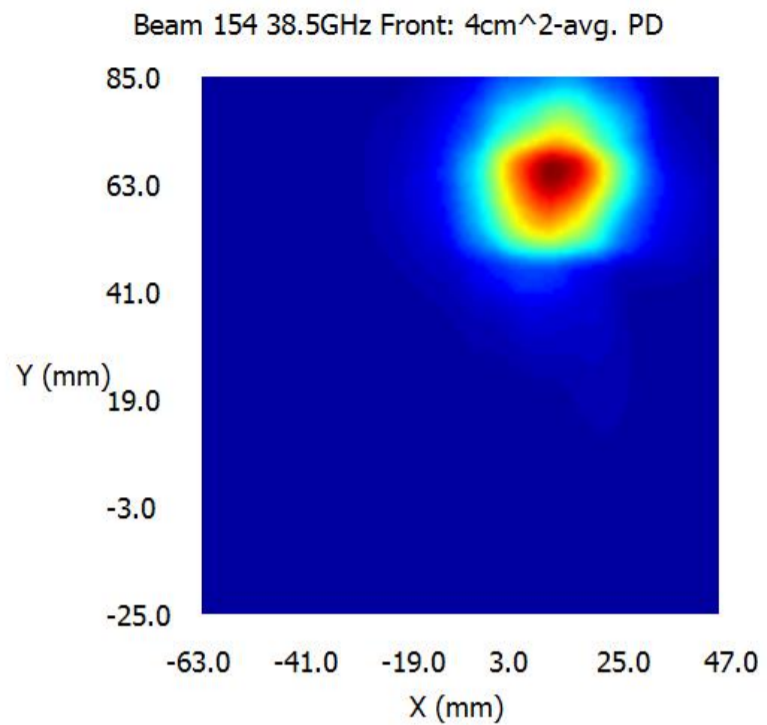
(b) Simulation

Patch antenna QTM0 AG0 (H-polarization) beam ID 40, Point power density

n260 Patch antenna QTM1 Ant_Group1(V-polarization) beam ID 154 Front-side Mid ch.



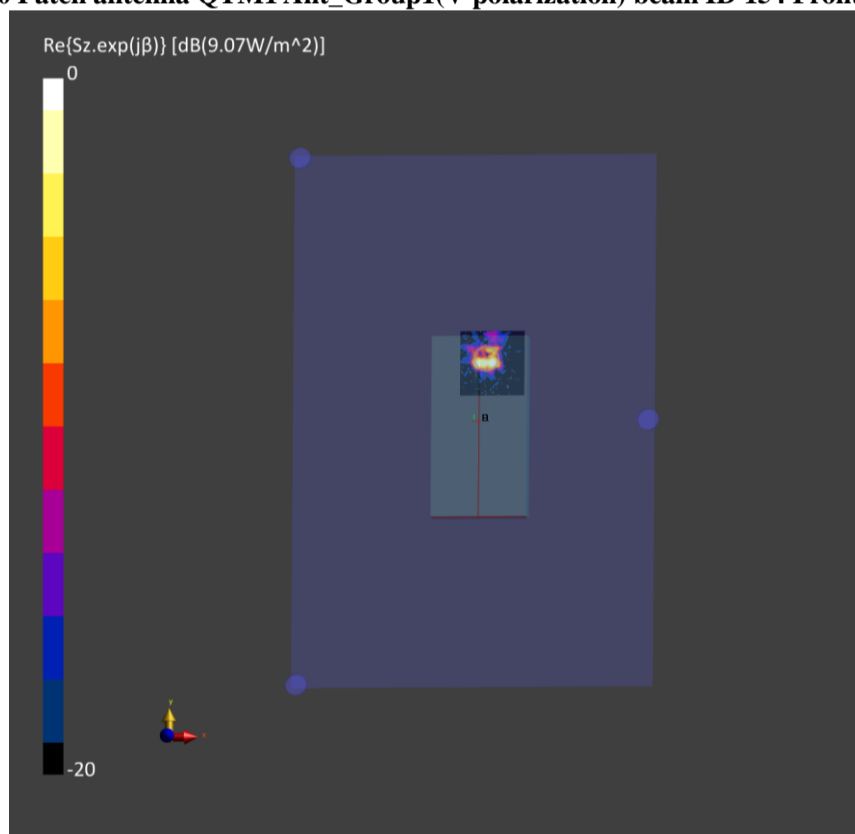
(a) Measurement



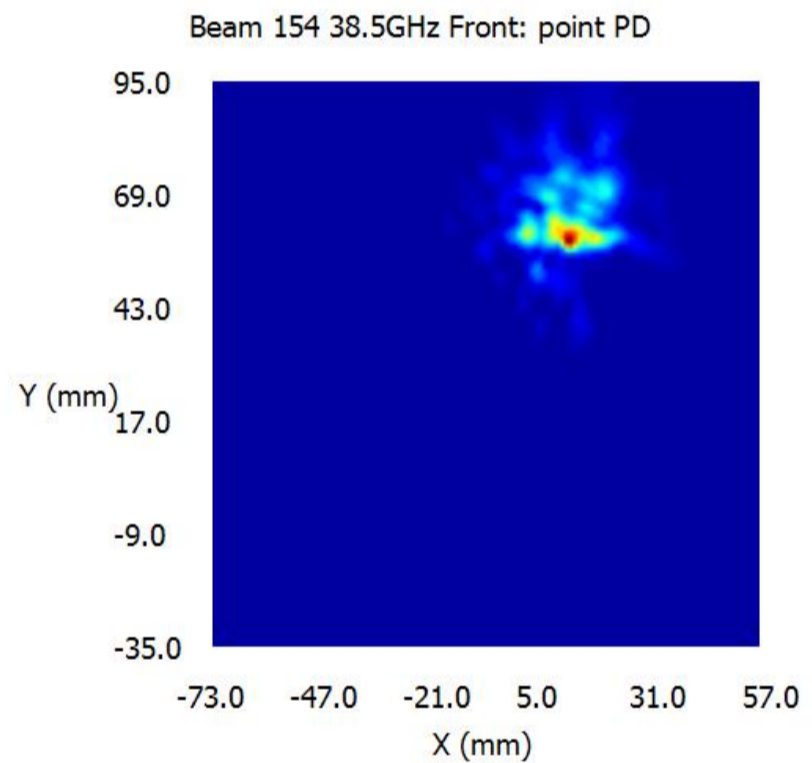
(b) Simulation

Patch antenna QTM1 AG1 (V-polarization) beam ID 154, 4cm² Averaged power density

n260 Patch antenna QTM1 Ant_Group1(V-polarization) beam ID 154 Front-side Mid ch.



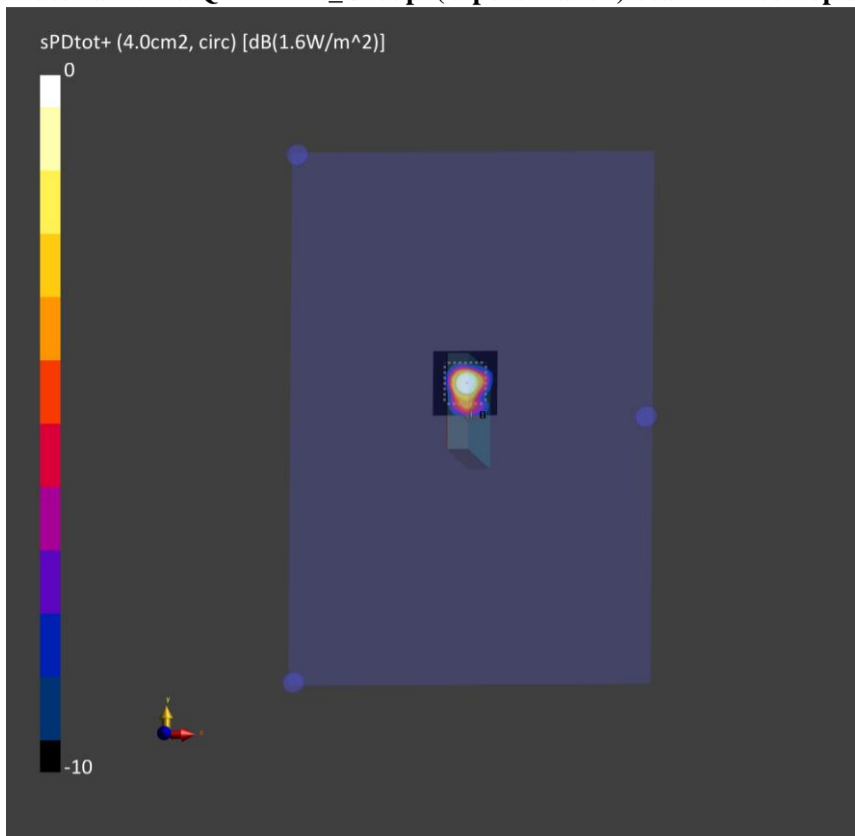
(a) Measurement



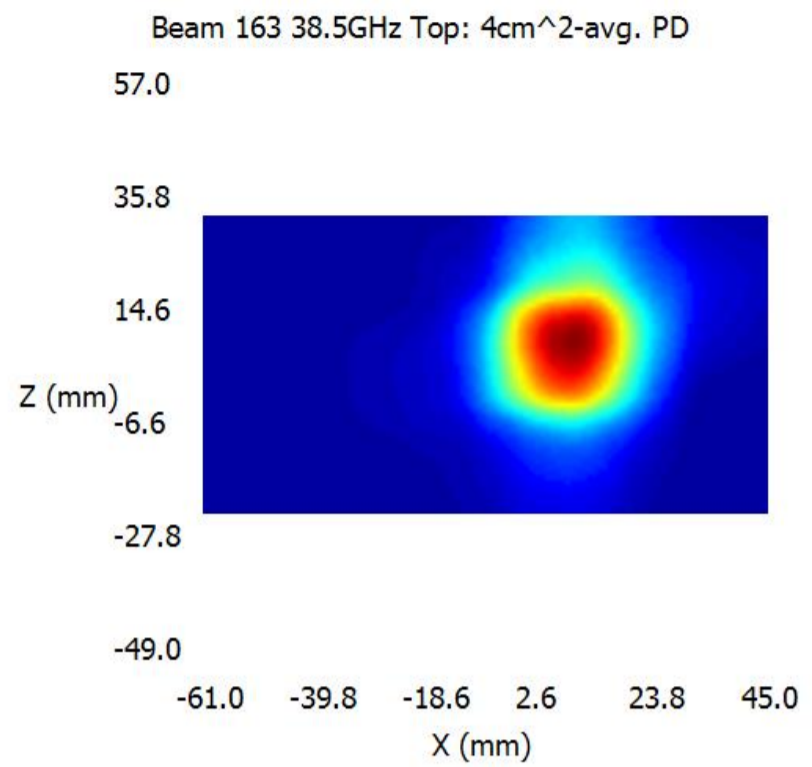
(b) Simulation

Patch antenna QTM1 AG1 (V-polarization) beam ID 154, Point power density

n260 Patch antenna QTM1 Ant_Group1(V-polarization) beam ID 163 Top-side Mid ch.

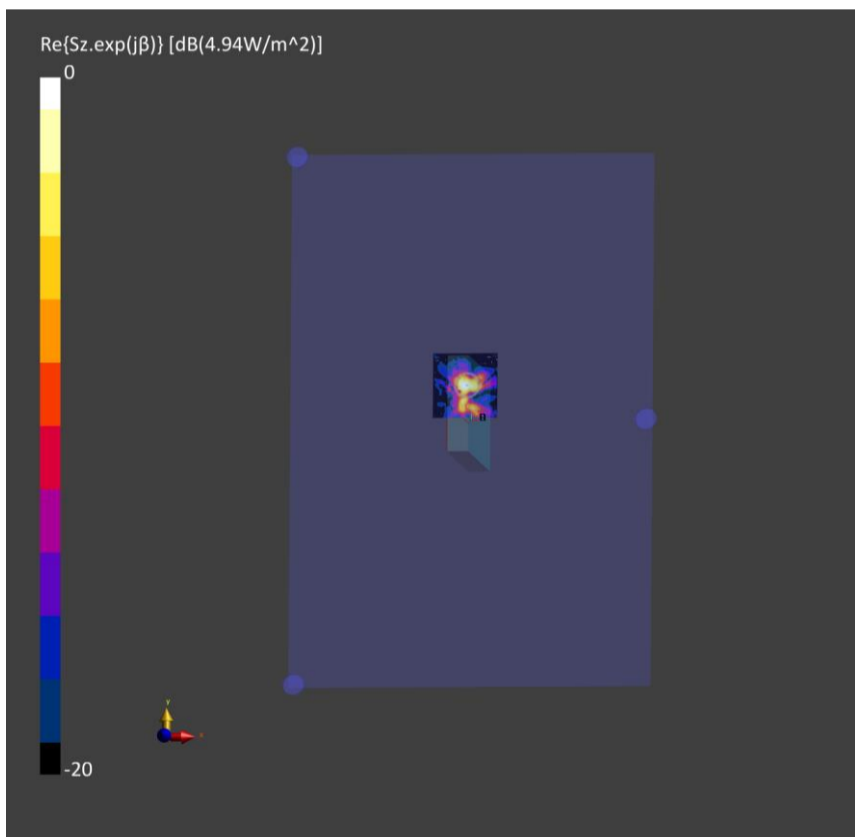


(a) Measurement

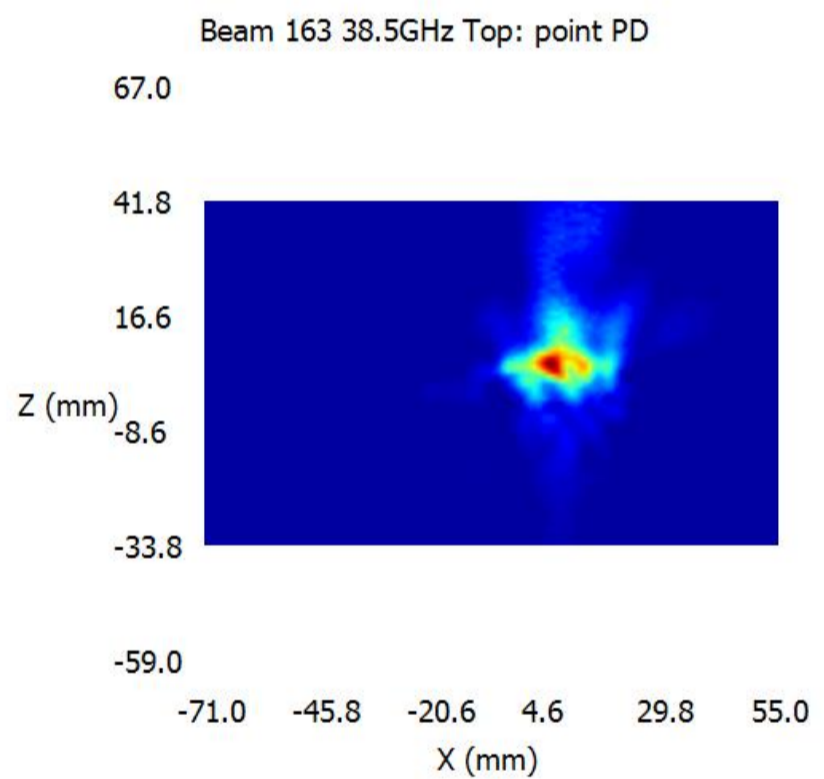


(b) Simulation

Patch antenna QTM1 AG1 (V-polarization) beam ID 163, 4cm² Averaged power density



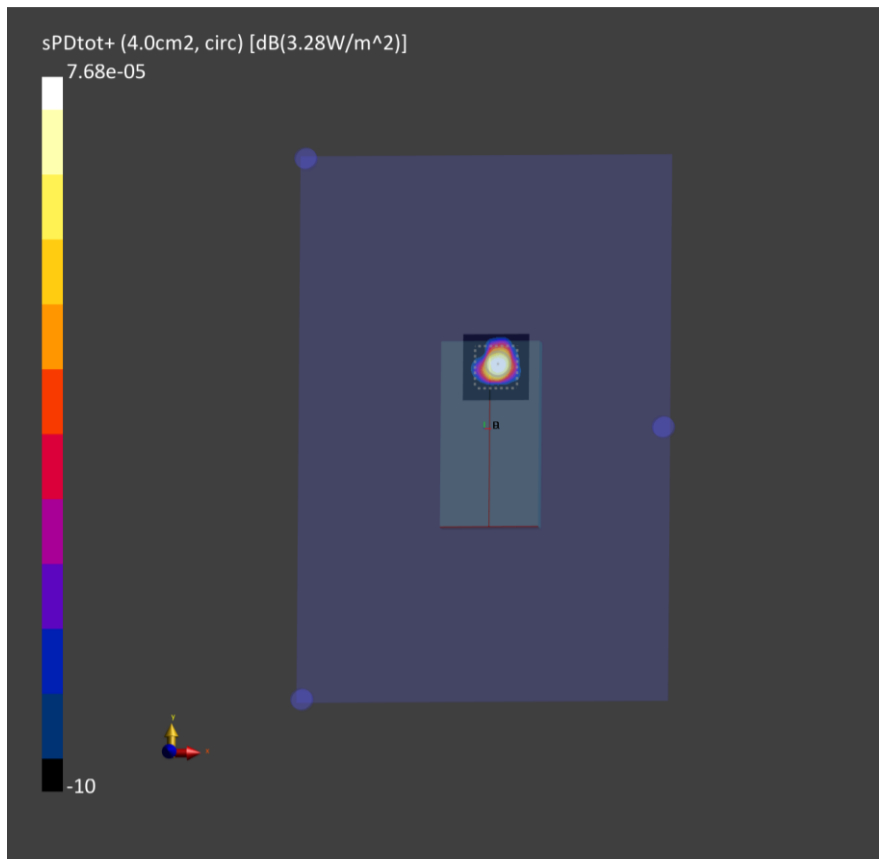
(a) Measurement



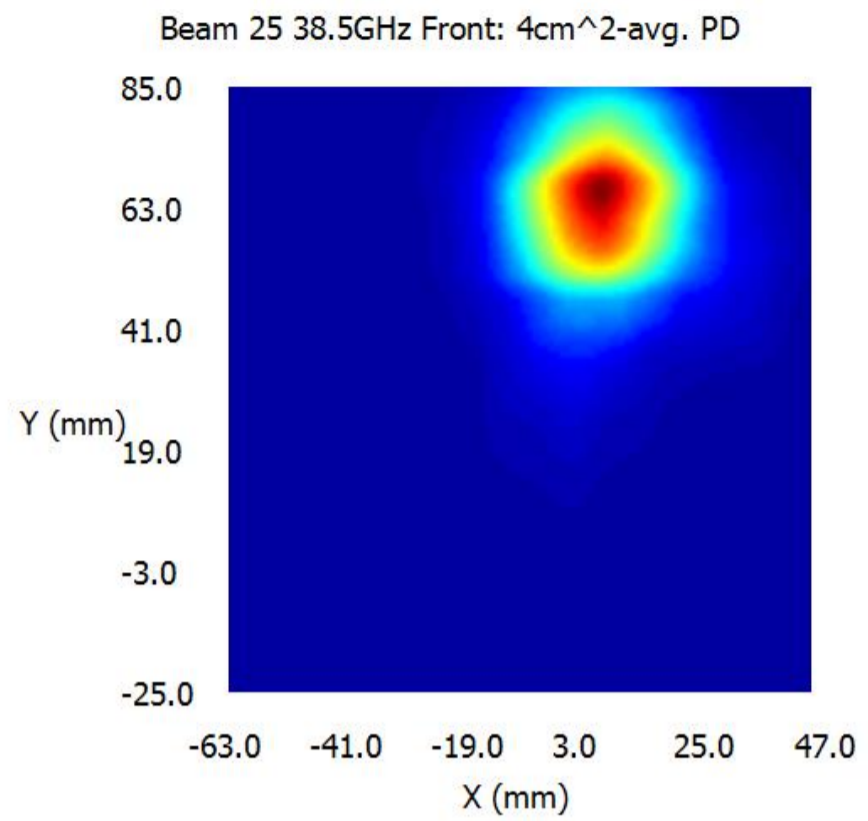
(b) Simulation

Patch antenna QTM1 AG1 (V-polarization) beam ID 163, Point power density

n260 Patch antenna QTM1 Ant_Group0(H-polarization) beam ID 25 Front-side Mid ch.

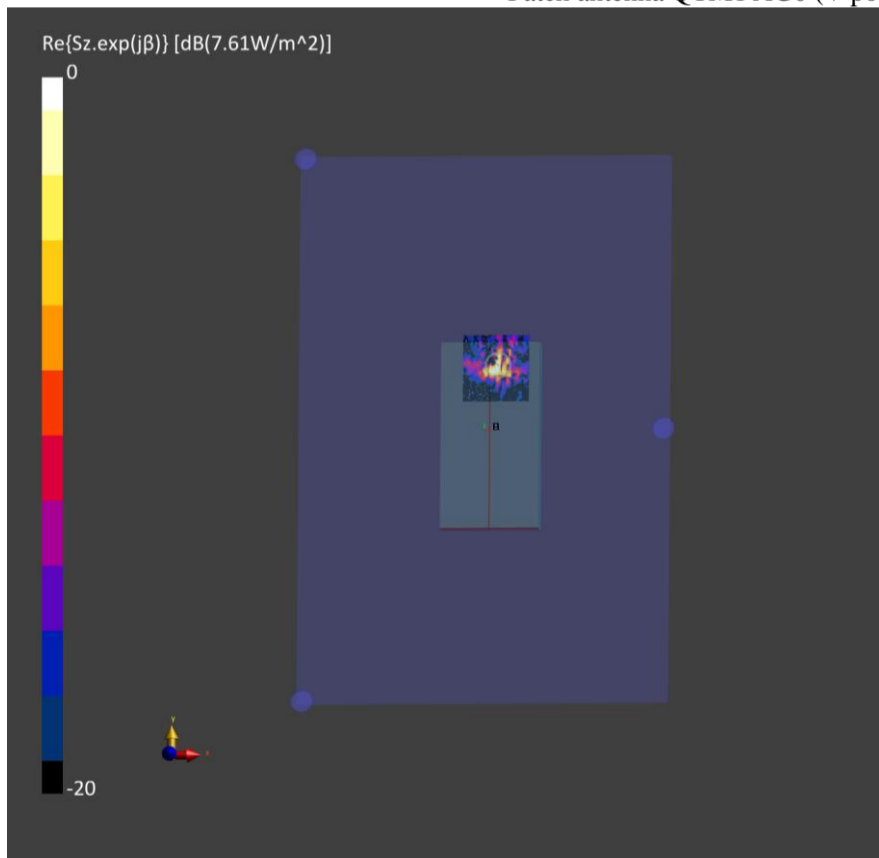


(a) Measurement

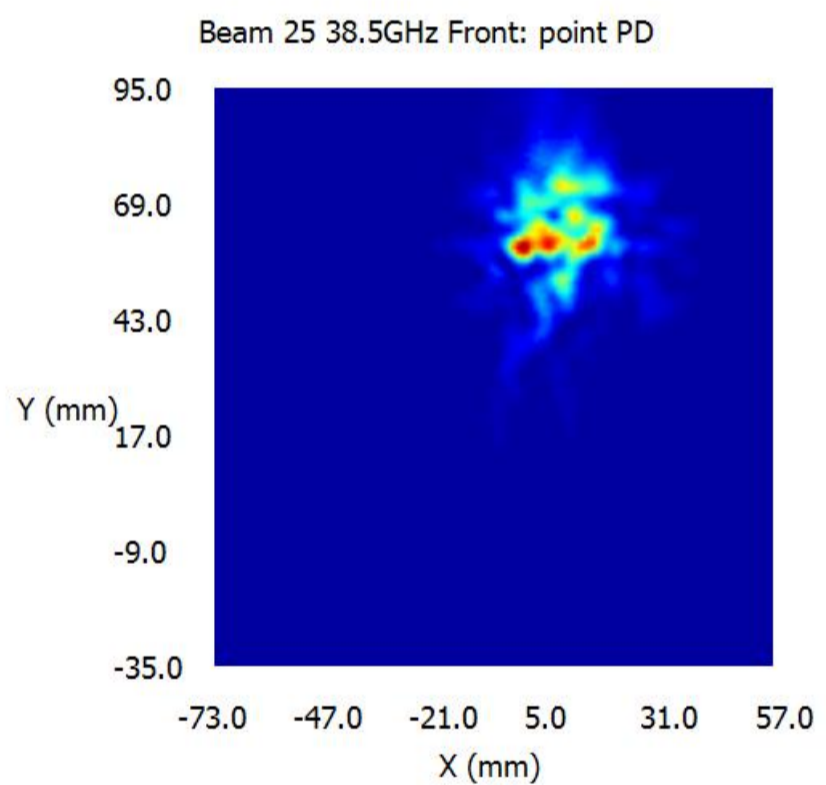


(b) Simulation

Patch antenna QTM1 AG0 (V-polarization) beam ID 25, 4cm² Averaged power density



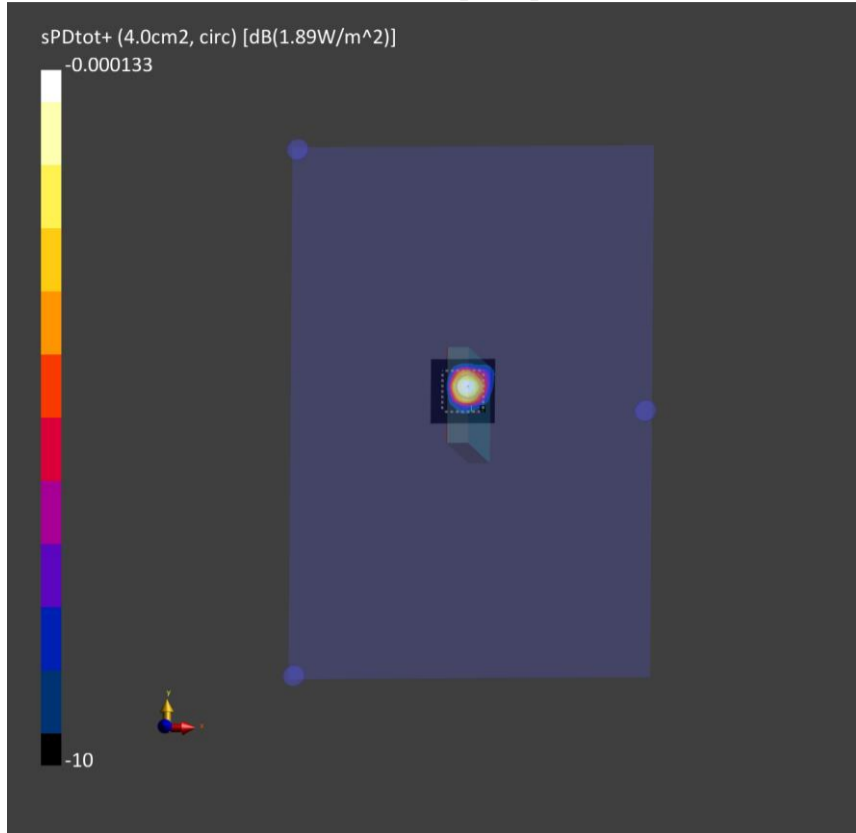
(a) Measurement



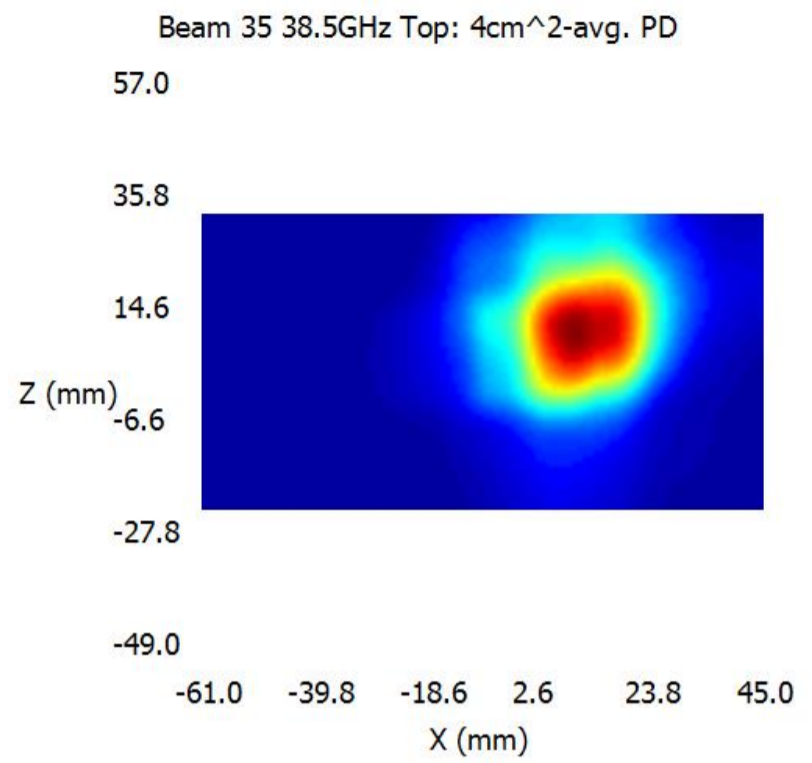
(b) Simulation

Patch antenna QTM1 AG0 (V-polarization) beam ID 25, Point power density

n260 Patch antenna QTM1 Ant_Group0(H-polarization) beam ID 35 Top-side Mid ch.

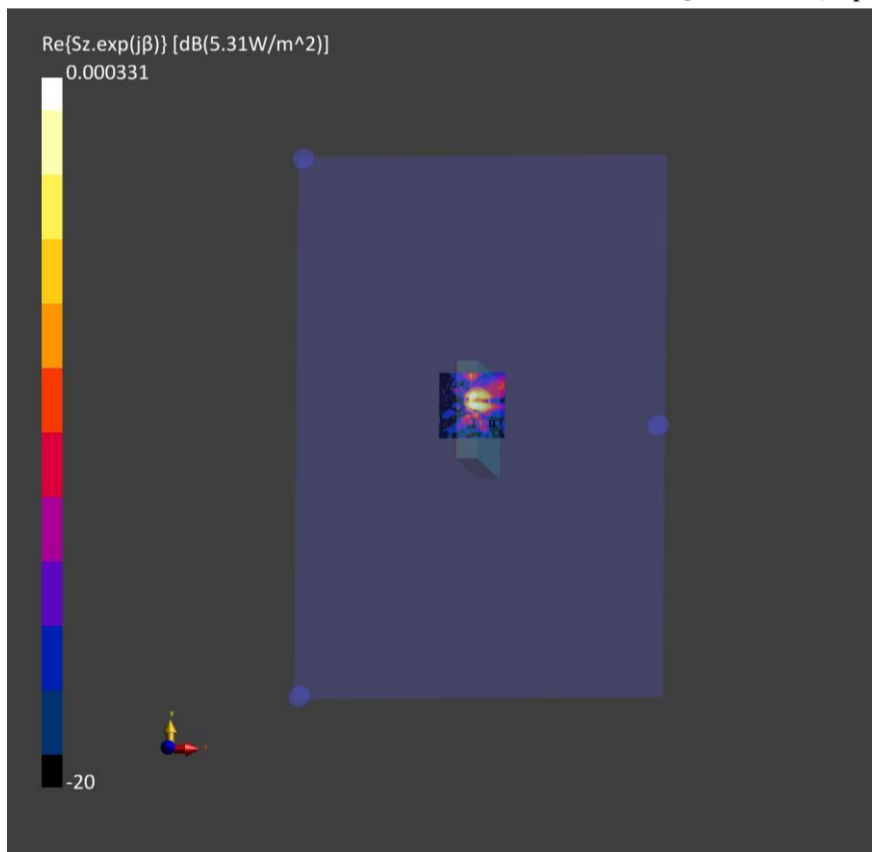


(a) Measurement

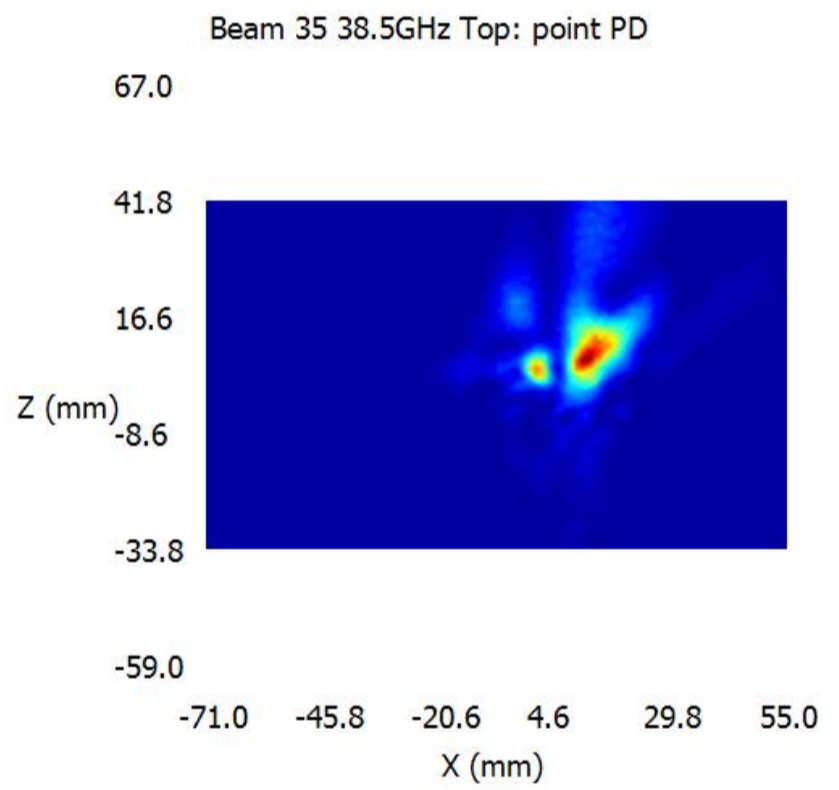


(b) Simulation

Patch antenna QTM1 AG0 (H-polarization) beam ID 35, 4cm² Averaged power density



(a) Measurement

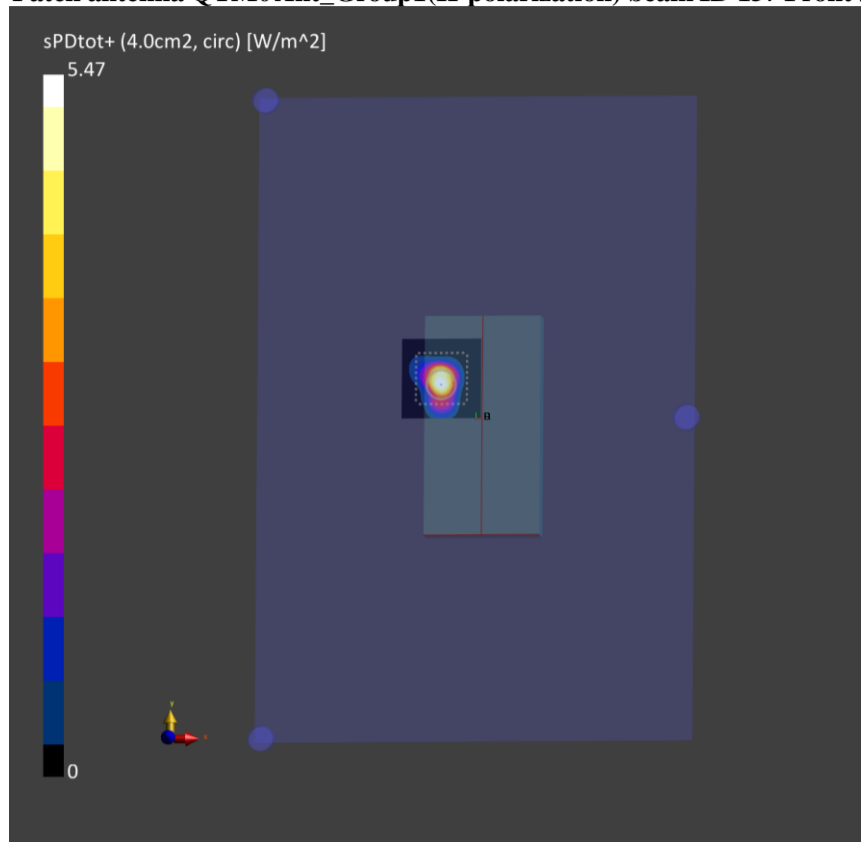


(b) Simulation

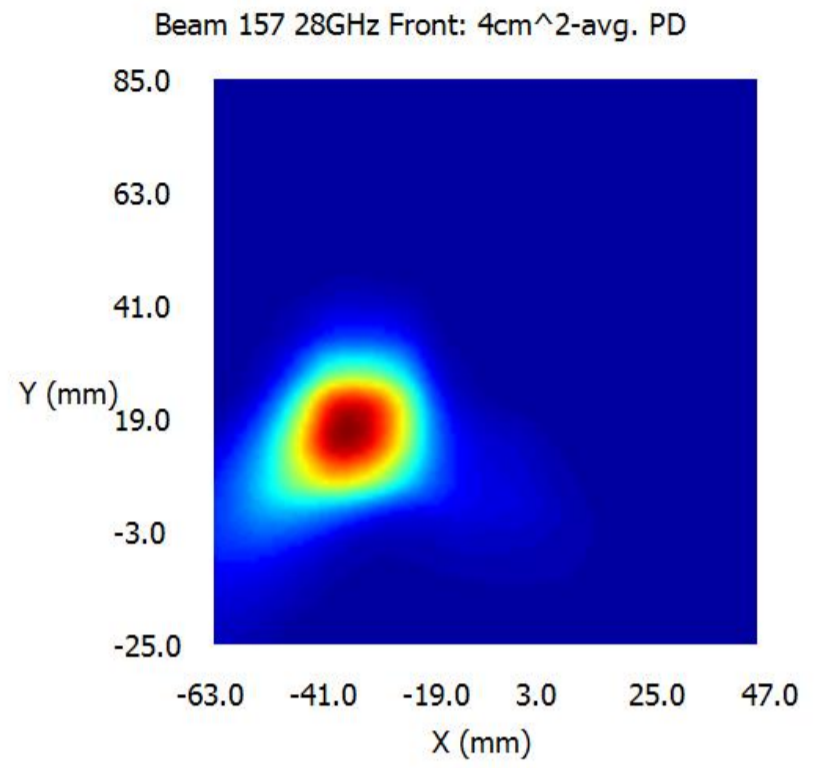
Patch antenna QTM1 AG0 (H-polarization) beam ID 35, 4cm² Averaged power density

N257

n257 Patch antenna QTM0Ant_Group1(H-polarization) beam ID 157 Front side Mid ch.

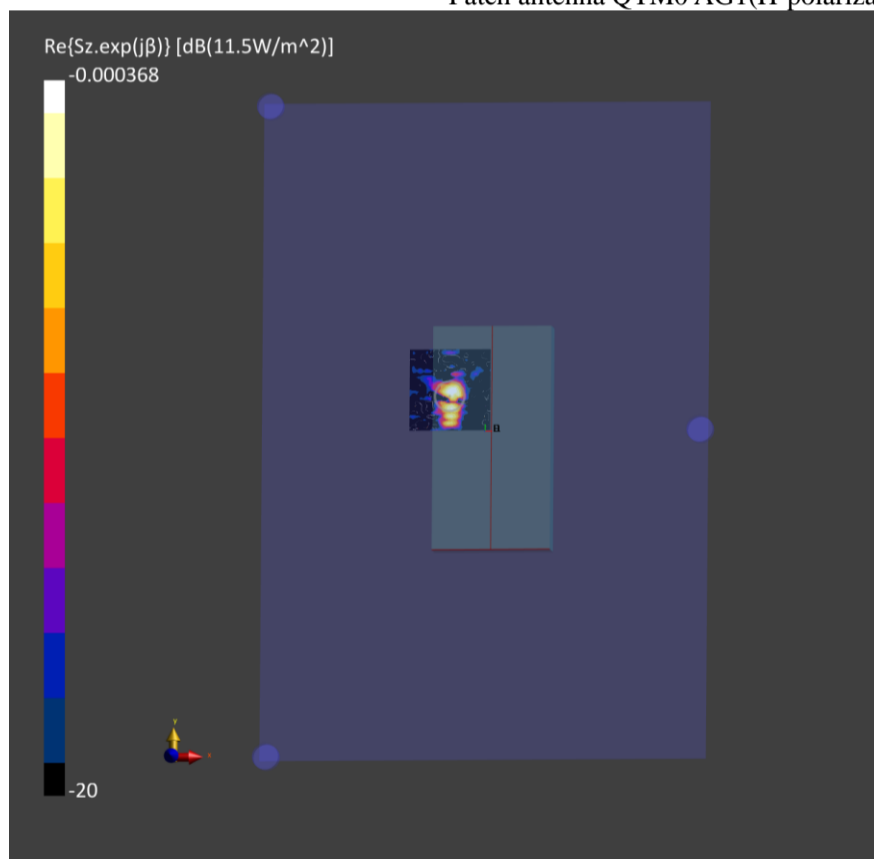


(a) Measurement

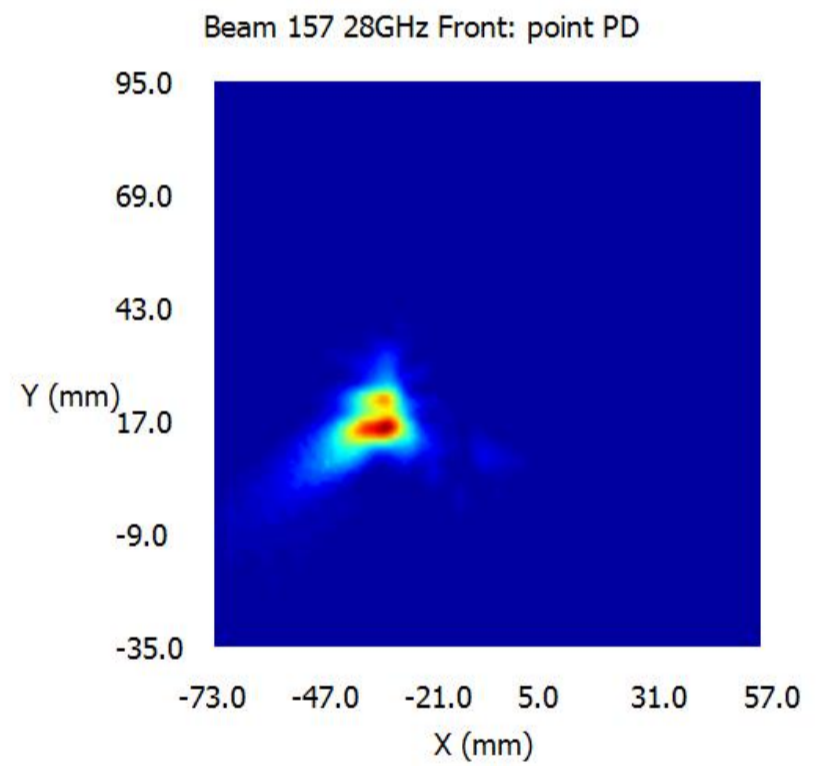


(b) Simulation

Patch antenna QTM0 AG1(H-polarization) beam ID 157, 4cm² Averaged power density



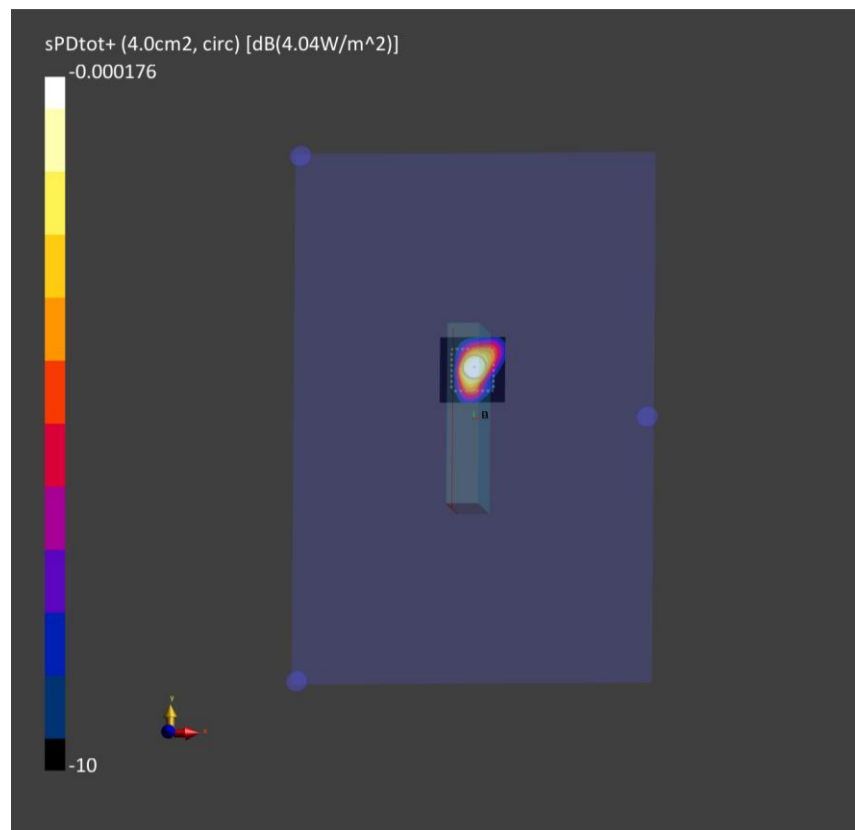
(a) Measurement



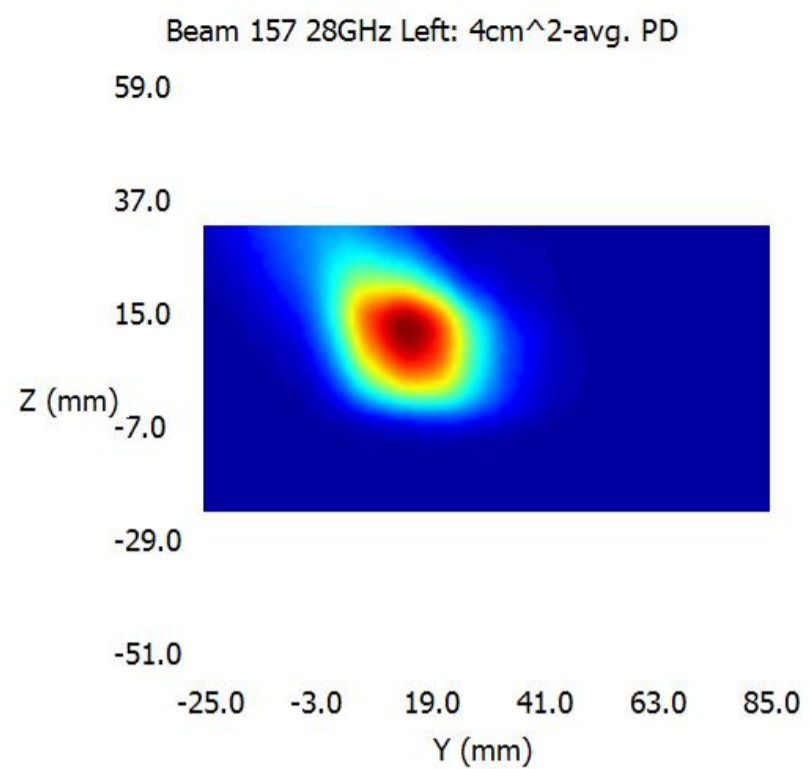
(b) Simulation

Patch antenna QTM0 AG1(H-polarization) beam ID 157, Point power density

N257 Patch antenna QTM0 Ant_Group1(H-polarization) beam ID 157 Left side Mid ch.

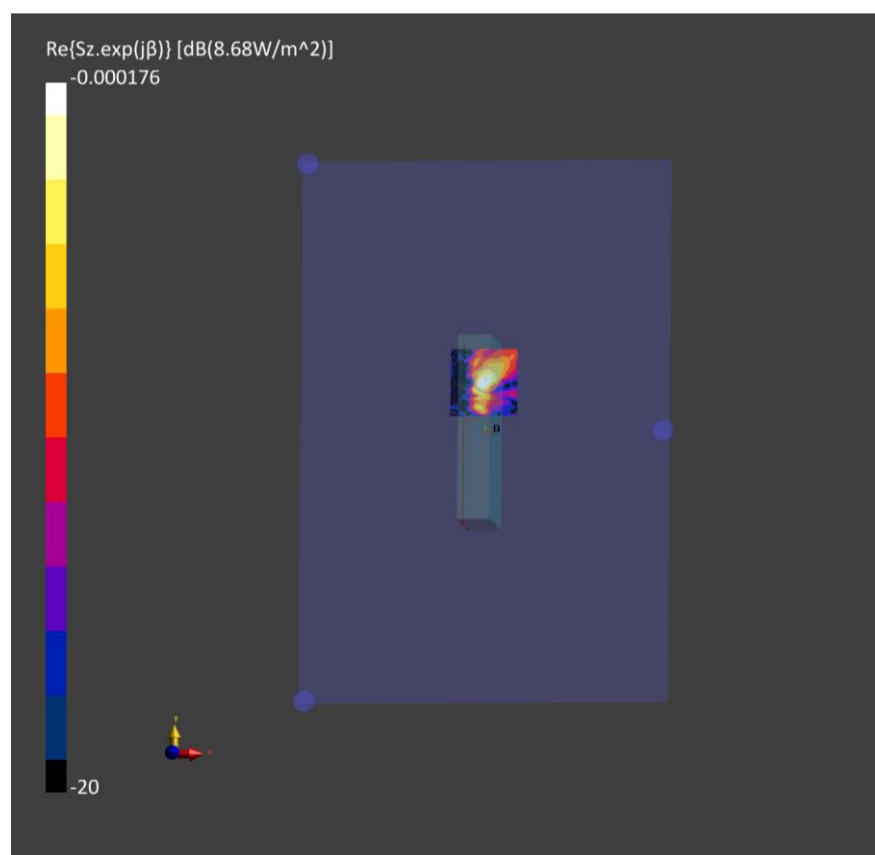


(a) Measurement

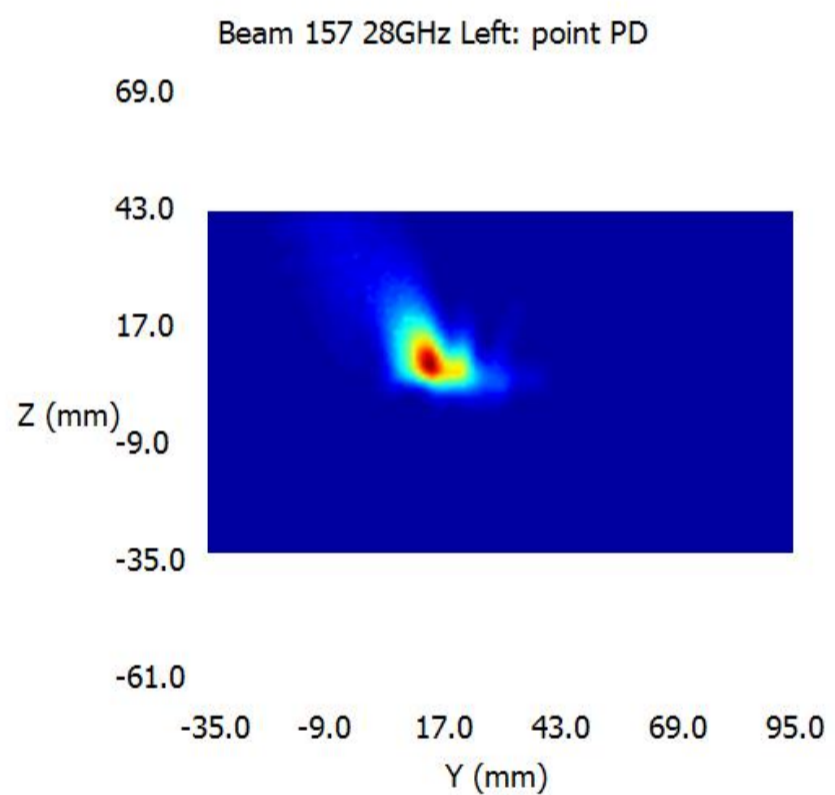


(b) Simulation

Patch antenna QTM0 AG1(H-polarization) beam ID 157, 4cm² Averaged power density



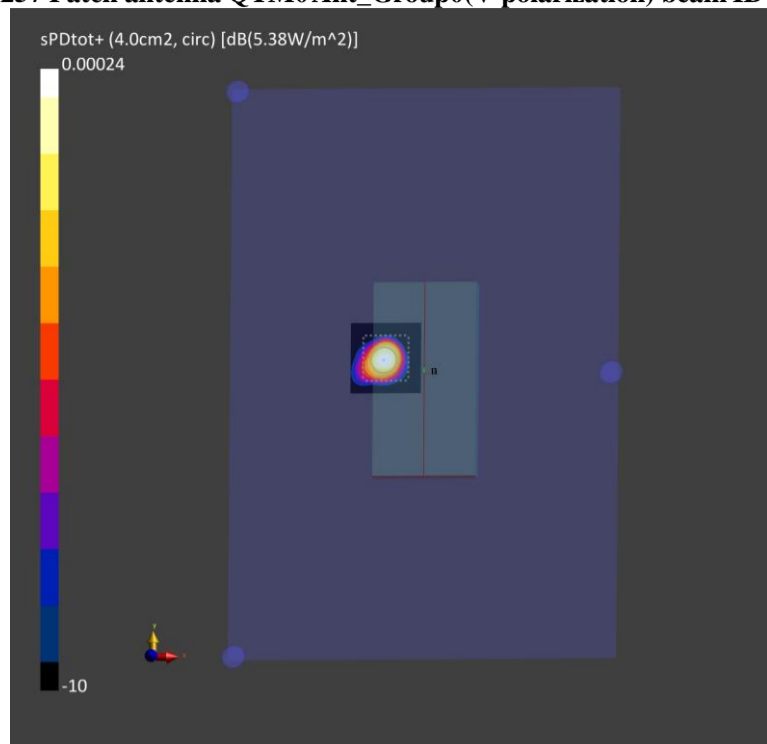
(a) Measurement



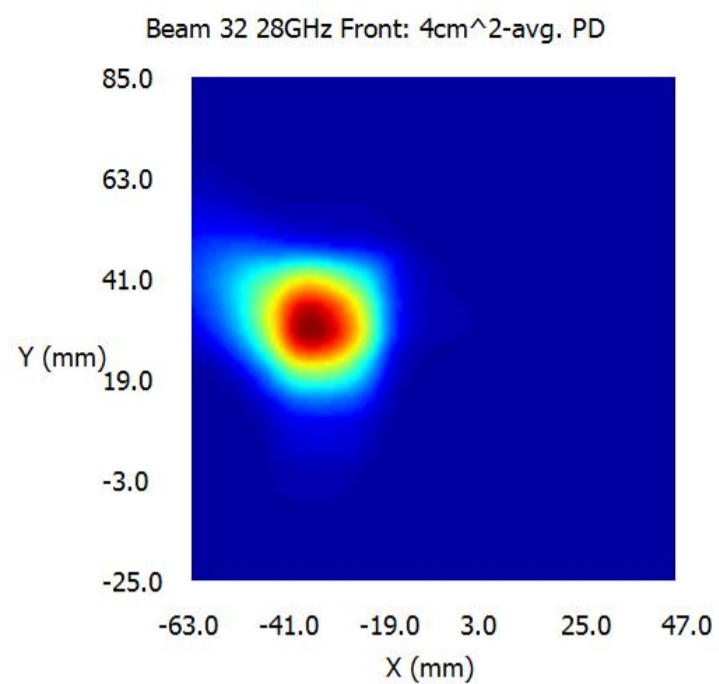
(b) Simulation

Patch antenna QTM0 AG1(H-polarization) beam ID 157, Point power density

n257 Patch antenna QTM0 Ant_Group0(V-polarization) beam ID 32 Front side Mid ch.

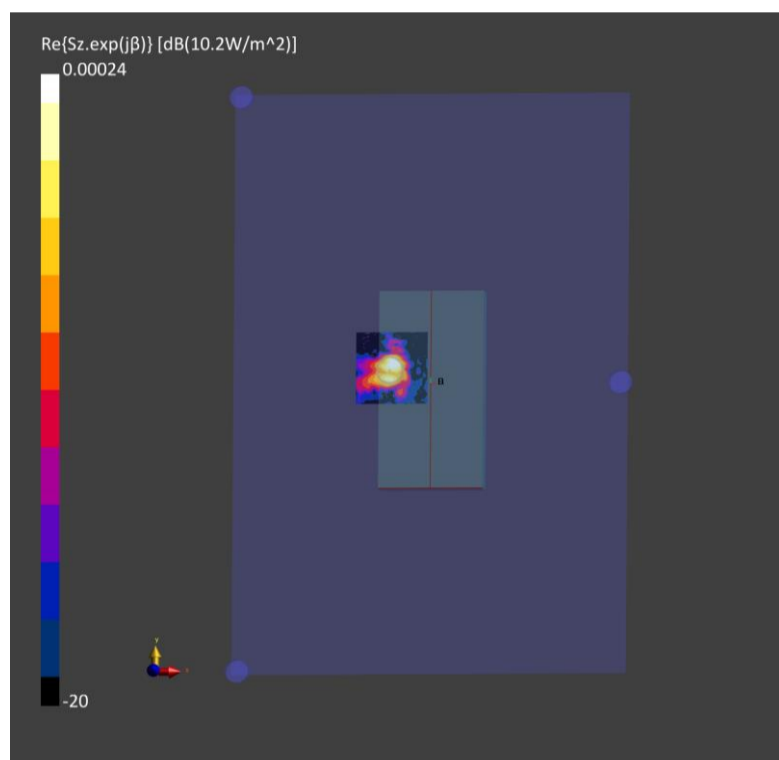


(a) Measurement

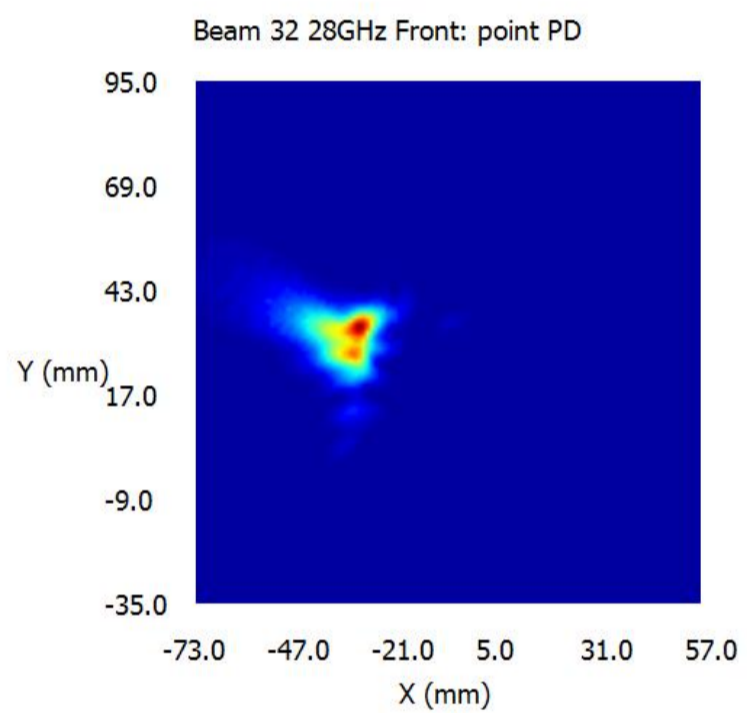


(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 32, 4cm² Averaged power density



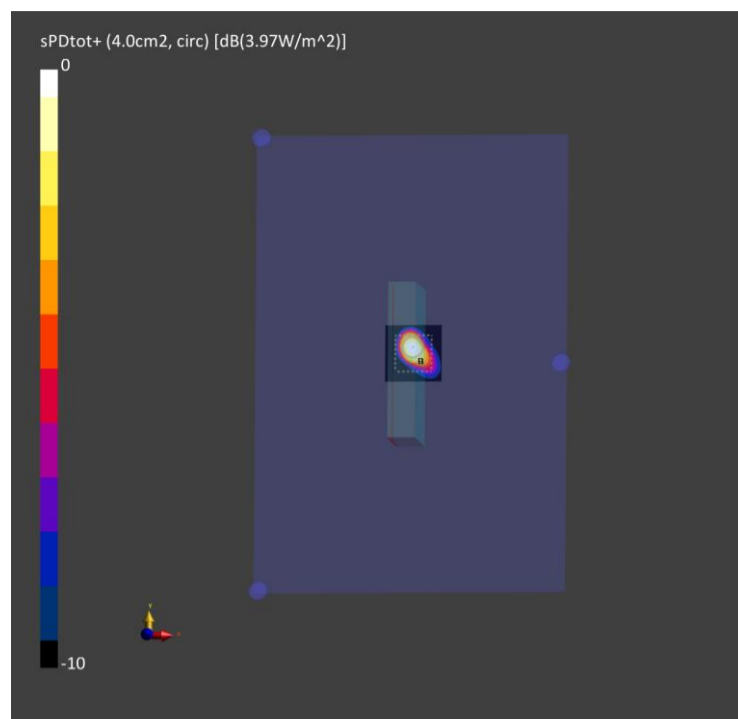
(a) Measurement



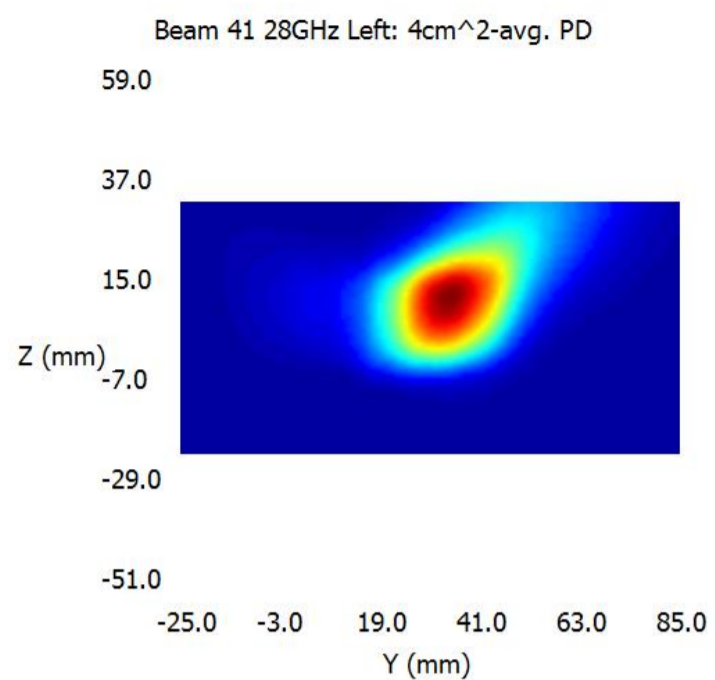
(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 32, Point power density

n257 Patch antenna QTM0 Ant_Group0(V-polarization) beam ID 41 Left side Mid ch.

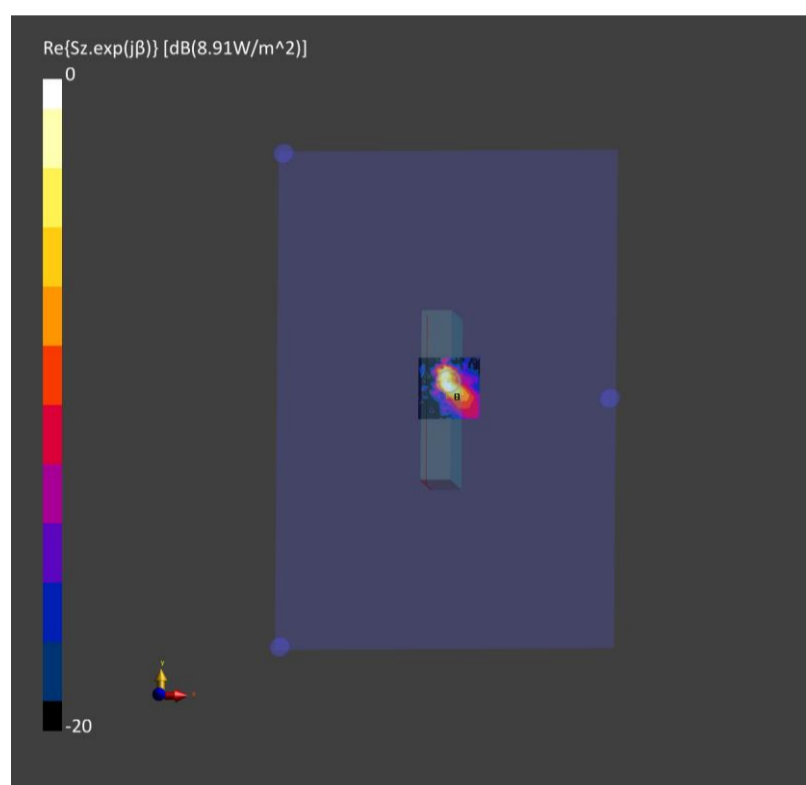


(a) Measurement

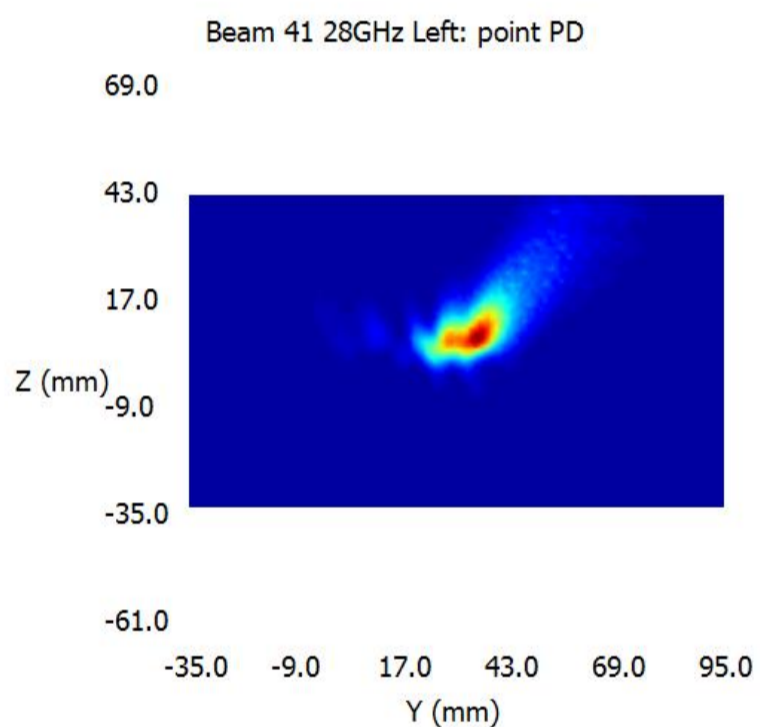


(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 41, 4cm² Averaged power density



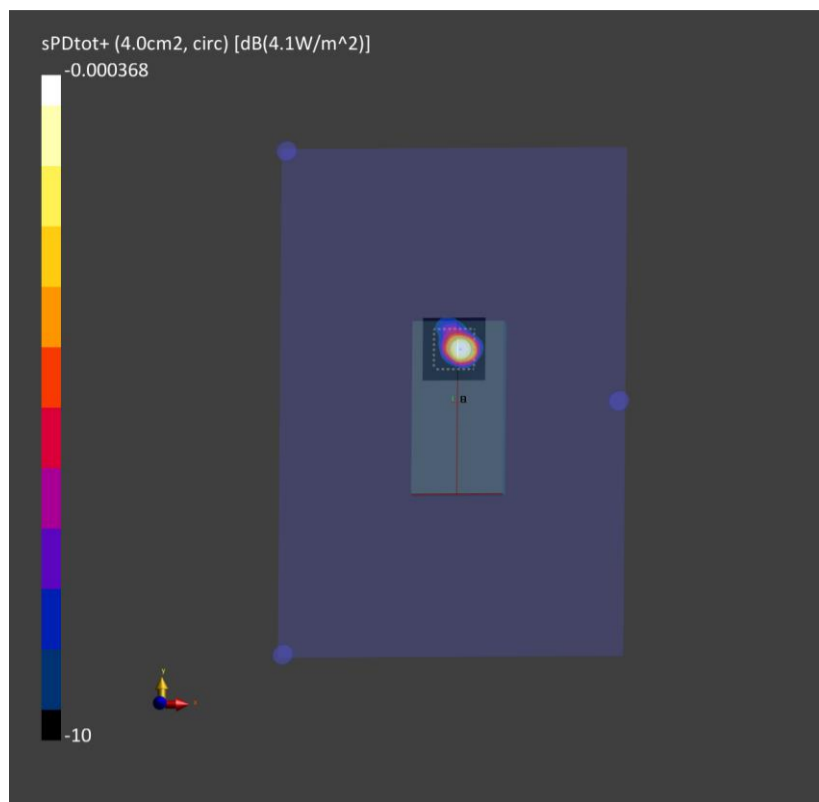
(a) Measurement



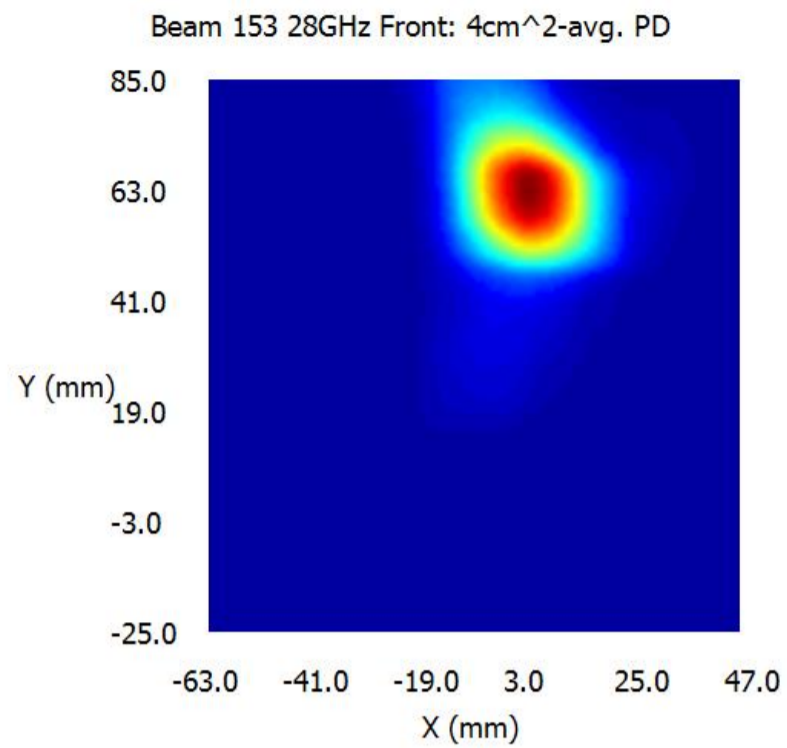
(b) Simulation

Patch antenna QTM0 AG0(V-polarization) beam ID 41, Point power density

n257 Patch antenna QTM1 Ant_Group1(H-polarization) beam ID 153 Front-side Mid ch.

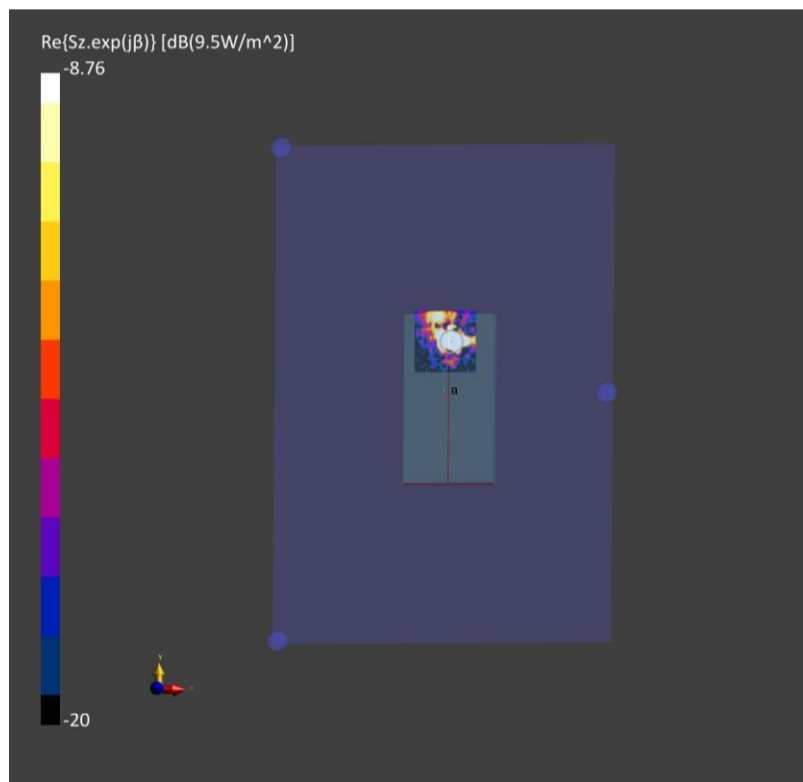


(a) Measurement

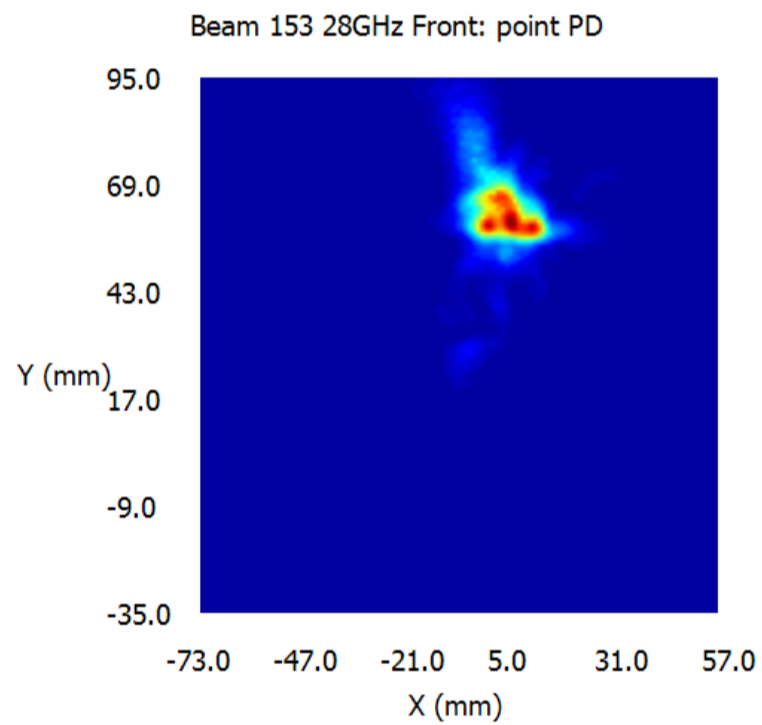


(b) Simulation

Patch antenna QTM1 AG1(H-polarization) beam ID 153, 4cm² Averaged power density



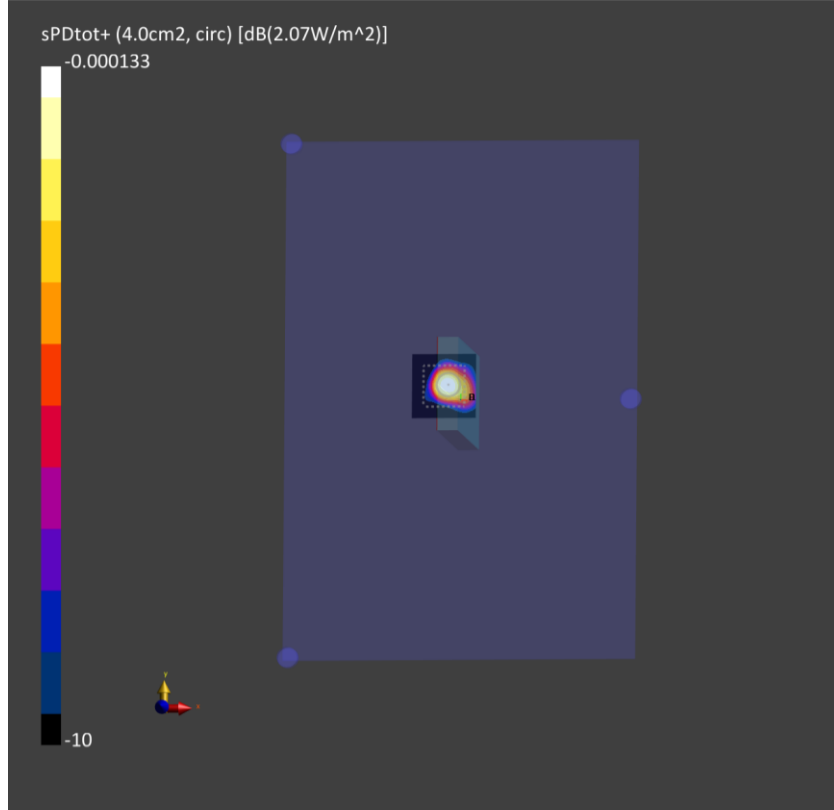
(a) Measurement



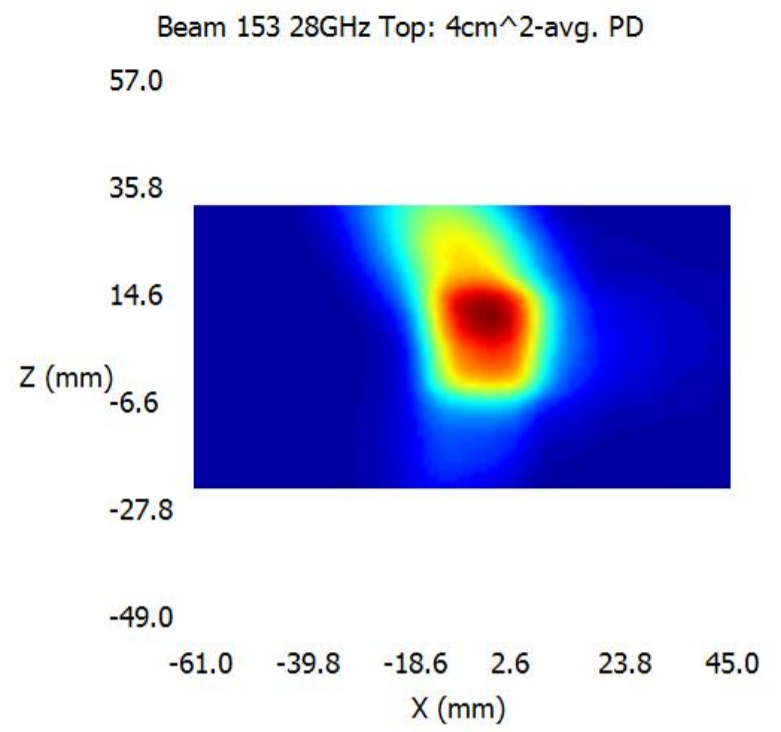
(b) Simulation

Patch antenna QTM1 AG1(H-polarization) beam ID 153, Point power density

n257 Patch antenna QTM1 Ant_Group1(H-polarization) beam ID 153 Top-side Mid ch.

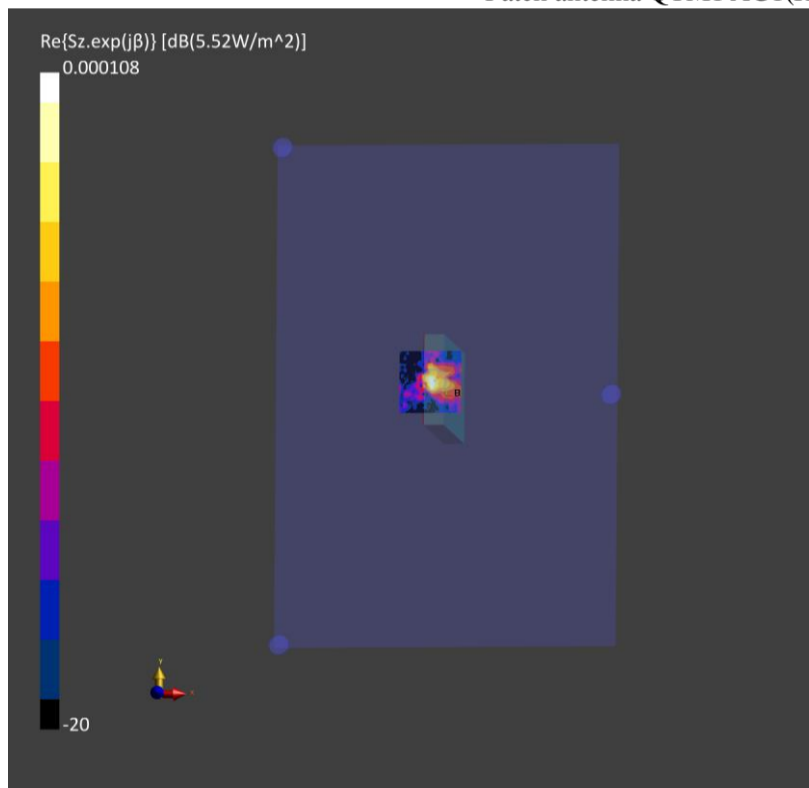


(a) Measurement

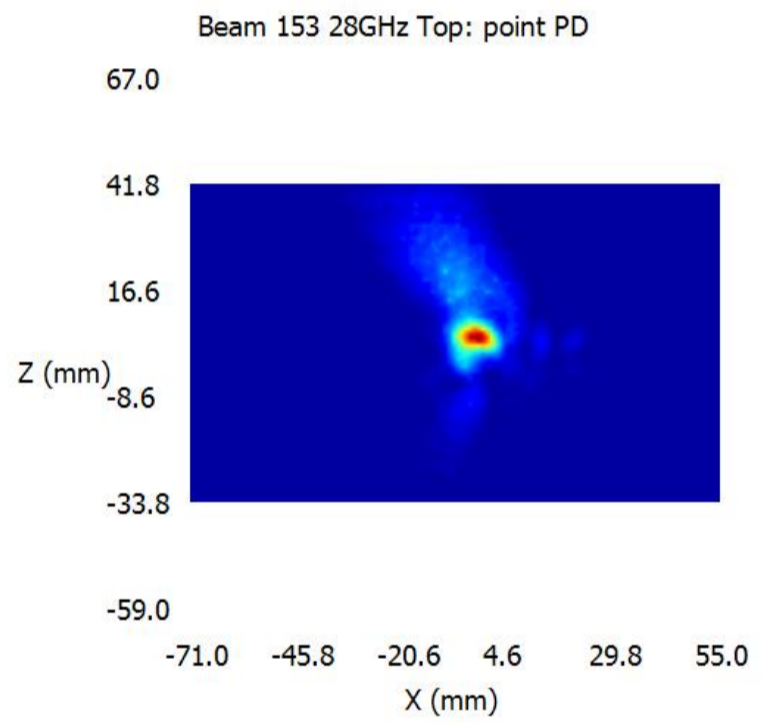


(b) Simulation

Patch antenna QTM1 AG1(H-polarization) beam ID 153, 4cm² Averaged power density



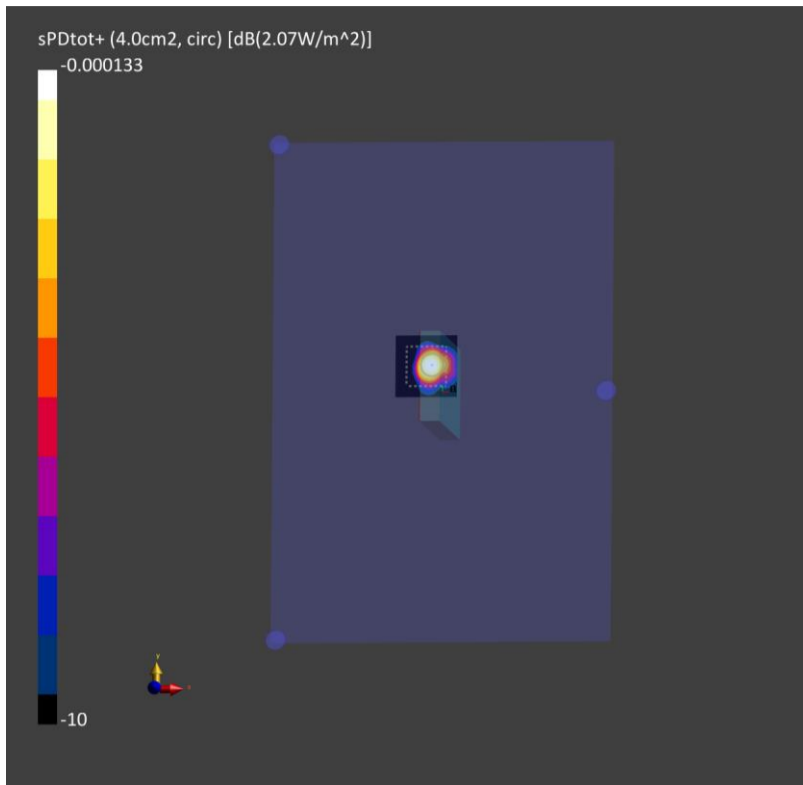
(a) Measurement



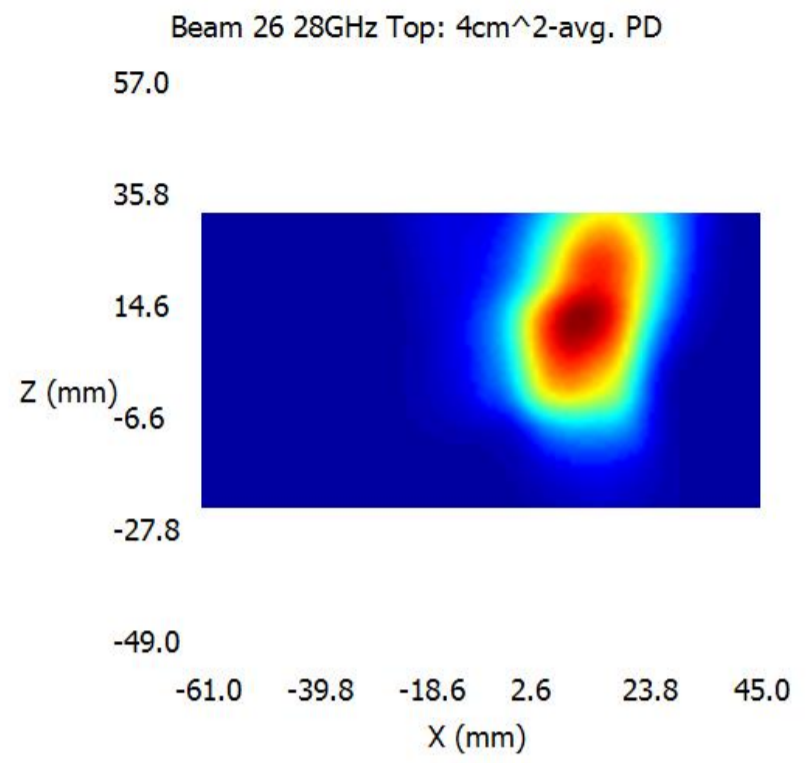
(b) Simulation

Patch antenna QTM1 AG1(H-polarization) beam ID 153, Point power density

n257 Patch antenna QTM1 Ant_Group0(V-polarization) beam ID 26 Top-side Mid ch.

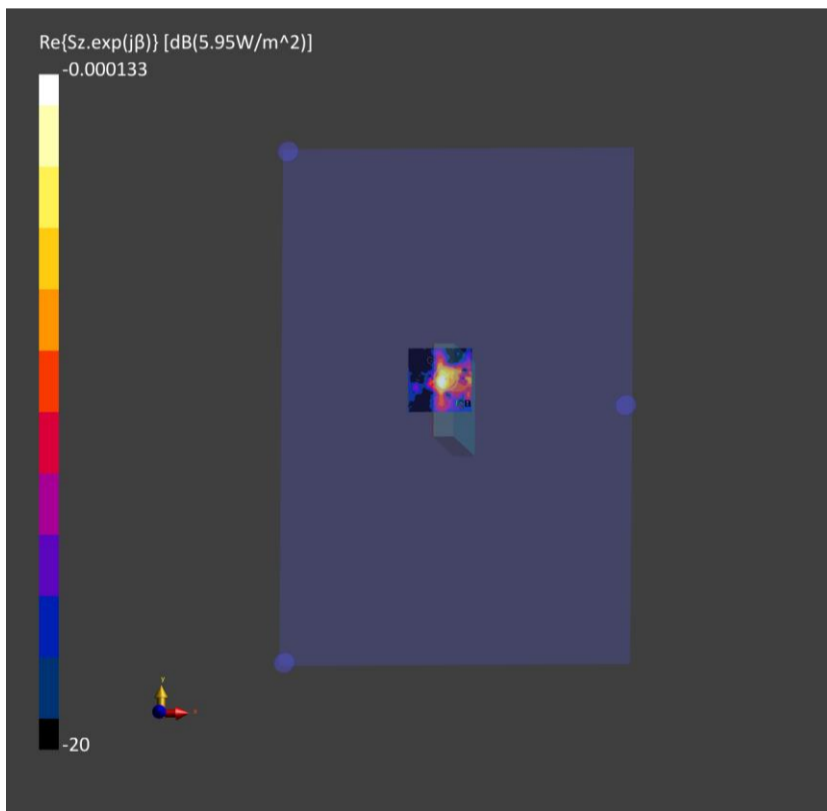


(a) Measurement

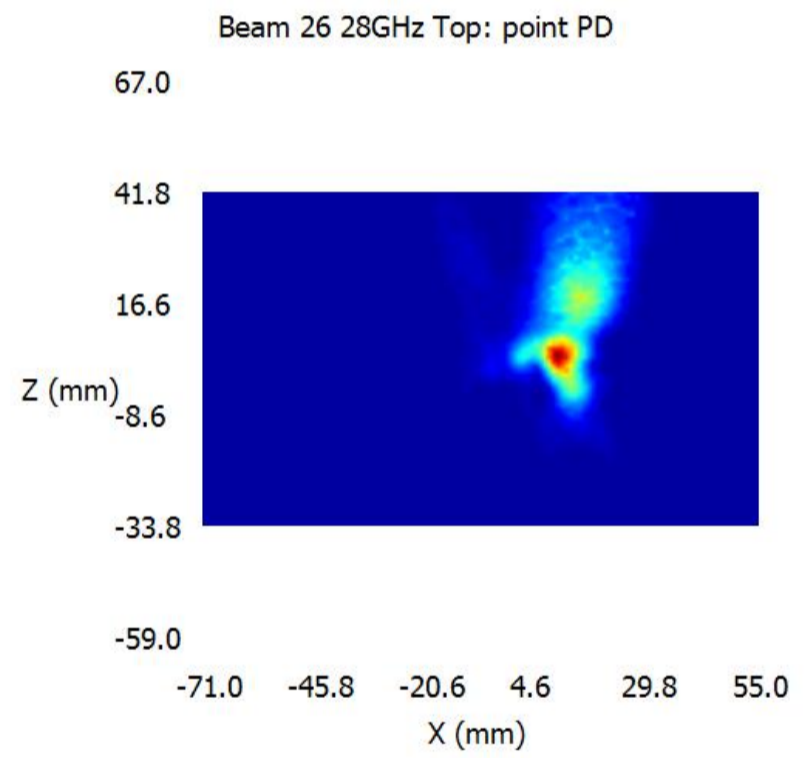


(b) Simulation

Patch antenna QTM1 AG0(V-polarization) beam ID 26, 4cm² Averaged power density



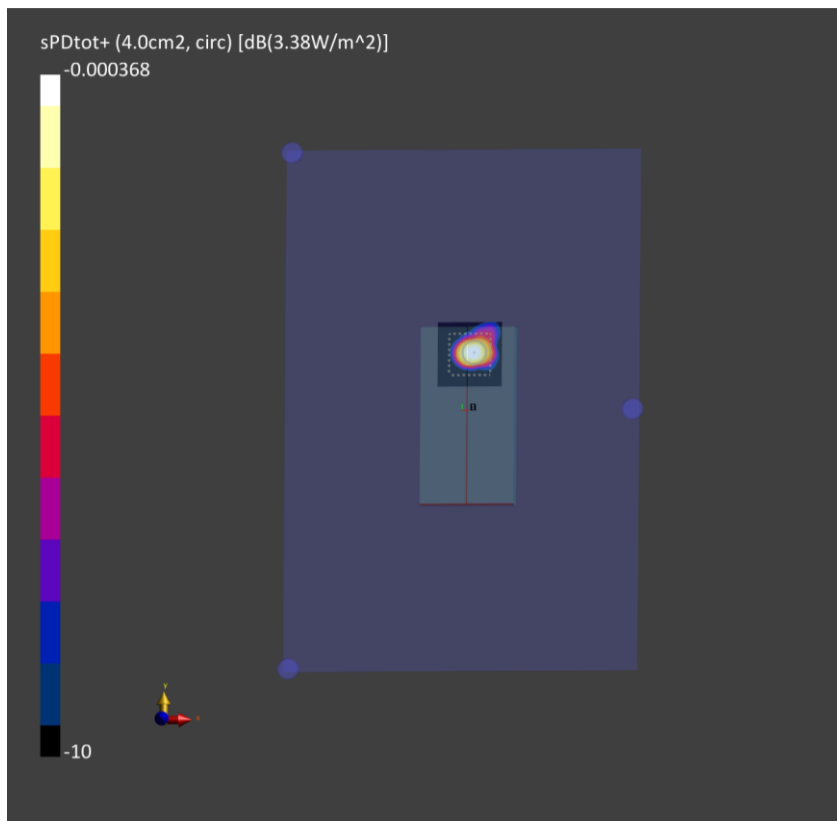
(a) Measurement



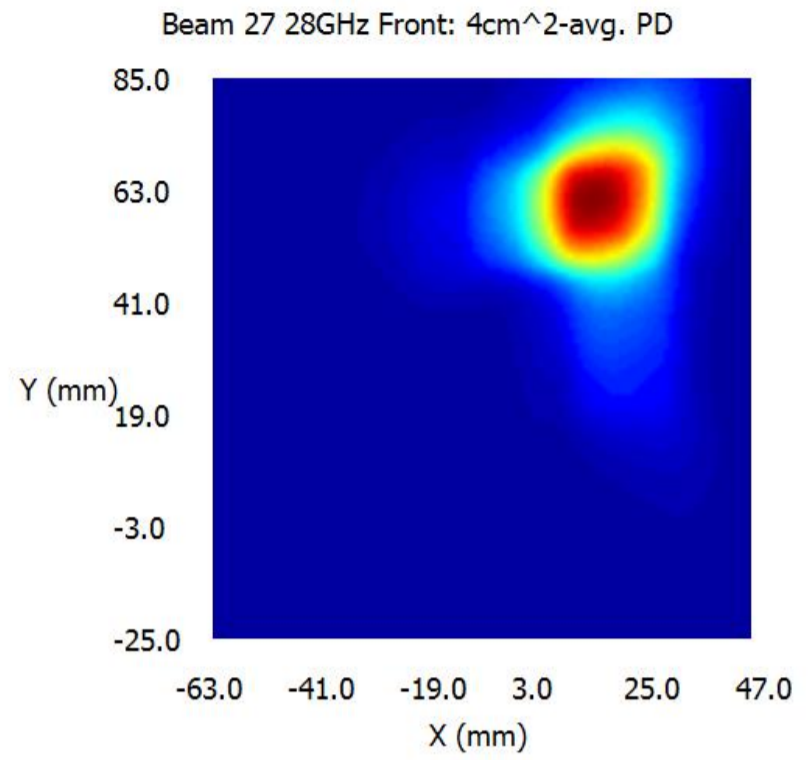
(b) Simulation

Patch antenna QTM1 AG0(V-polarization) beam ID 26, Point power density

n257 Patch antenna QTM1 Ant_Group0(V-polarization) beam ID 27 Front side Mid ch.



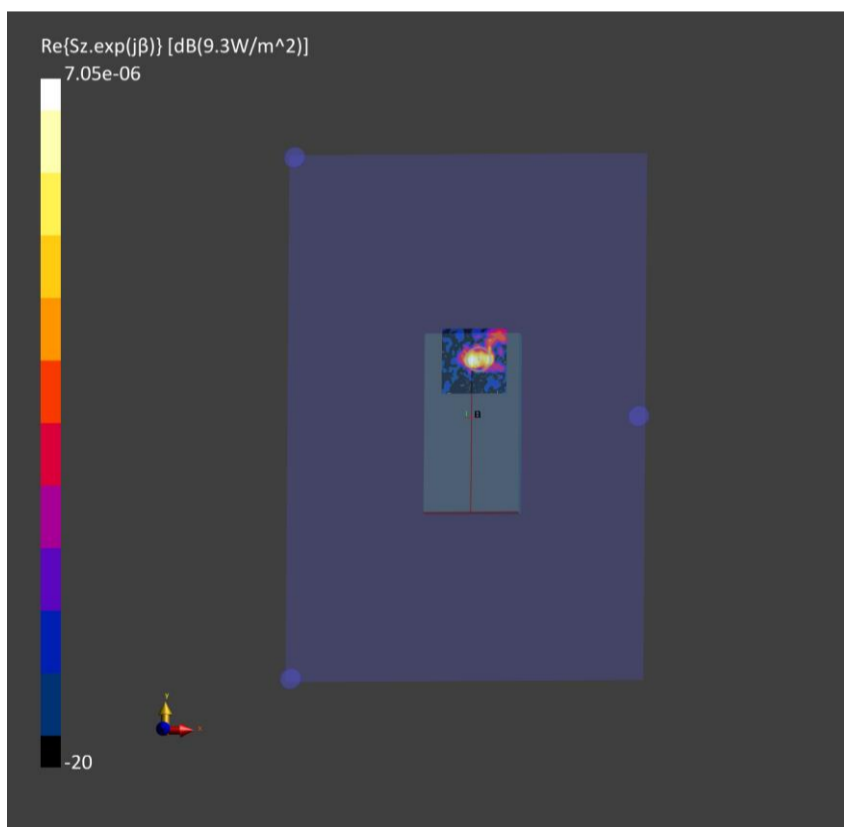
(a) Measurement



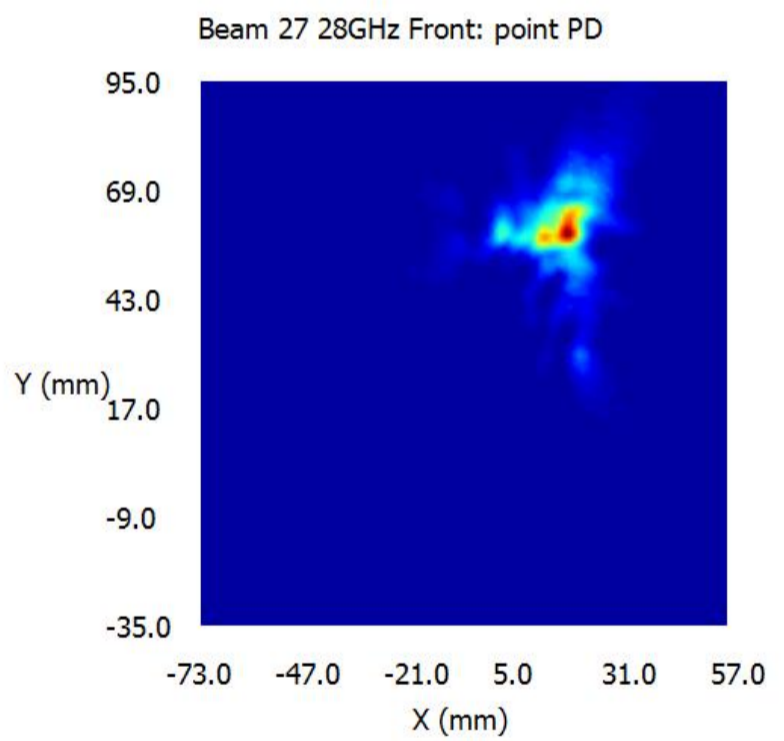
(b) Simulation

Patch antenna QTM1 AG0 (V-polarization) beam ID 27, 4cm² Averaged power density

n257 Patch antenna QTM1 Ant_Group0(V-polarization) beam ID 27 Front side Mid ch.



(a) Measurement



(b) Simulation

Patch antenna QTM1 AG0 (V-polarization) beam ID 27, Point power density

3. Simulation results:

This section shows the PD simulation results of QTM#0 and QTM#1 at 28GHz and 39GHz for each evaluation plane specified in Table 1 at two separation distances of 2mm and 10mm distance. The ratio of PD exposure from front surface to the worst surface at 2mm, and the ratio of PD exposure from 2mm to 10mm evaluation distance for each beam are also reported in this section to support RF exposure analysis for simultaneous transmission scenarios performed in Part 1 Near Field PD report.

The relative phase between beam pairs is not controlled in the chipset design. Therefore, the relative phase between each beam pair was considered mathematically to identify the worst case conditions. The below tables MIMO results represent worst case of MIMO. After sweeping the relative phase between beams at 5° intervals from 0° to 360°, the highest value is attached to the MIMO simulation results. The worst-case simulated PD determined from the tables in this section were used for conservativeness in input.power.limit determination in RF Exposure Part 0 Report.

The worst-case simulated PD determined from the tables in this section were used for conservativeness in input.power.limit determination in RF Exposure Part 0 Report.

3.1 PD for Low/Mid/High Channel at N257/N260/N261

3.1.1 N260 – Patch Antenna

N260 QTM 0 low channel(37GHz)

N260 Low channel(37GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	1	QTM 0	PATCH	1	3.27	0.26	3.02	0.02	0.07	1	1.21	0.14	1.68	0.01	0.04	0.513761468
	3	QTM 0	PATCH	1	2.92	0.21	2.19	0.02	0.1	1	1.07	0.1	0.96	0.01	0.08	0.366438356
	5	QTM 0	PATCH	1	3.6	0.15	3	0.02	0.05	1	1.44	0.08	1.46	0.02	0.03	0.405555556
	7	QTM 0	PATCH	1	3.47	0.16	2.89	0.02	0.03	1	1.24	0.08	1.51	0.02	0.02	0.435158501
	9	QTM 0	PATCH	1	3.8	0.17	2.98	0.03	0.03	1	1.19	0.09	1.46	0.02	0.02	0.384210526
	14	QTM 0	PATCH	2	6.27	0.48	5.25	0.05	0.16	1	2.86	0.24	2.86	0.04	0.08	0.456140351
	15	QTM 0	PATCH	2	8.29	0.43	7.07	0.05	0.06	1	3.85	0.22	4.18	0.04	0.04	0.504221954
	16	QTM 0	PATCH	2	6.82	0.42	6.41	0.05	0.03	1	3.31	0.23	4.03	0.05	0.02	0.590909091
	17	QTM 0	PATCH	2	6.42	0.25	4.26	0.04	0.11	1	1.52	0.13	1.58	0.04	0.07	0.246105919
	21	QTM 0	PATCH	2	7.34	0.39	6.01	0.04	0.08	1	3.14	0.2	3.38	0.04	0.07	0.460490463
	22	QTM 0	PATCH	2	7.95	0.41	6.96	0.05	0.04	1	3.83	0.22	4.16	0.04	0.03	0.52327044
	23	QTM 0	PATCH	2	5.26	0.49	4.72	0.04	0.31	1	1.82	0.26	2.16	0.03	0.19	0.410646388
	29	QTM 0	PATCH	5	11.78	0.64	9.23	0.13	0.39	1	5.11	0.36	5.45	0.1	0.2	0.462648557
	30	QTM 0	PATCH	5	16.03	0.69	12.55	0.15	0.4	1	7.54	0.41	8.08	0.12	0.28	0.504054897
	31	QTM 0	PATCH	5	16.89	0.88	14.79	0.18	0.07	1	8.34	0.51	9.31	0.17	0.05	0.551213736
	32	QTM 0	PATCH	5	13.22	1.16	12.17	0.18	0.36	1	6.25	0.63	6.93	0.16	0.22	0.524205749
	33	QTM 0	PATCH	5	9.09	0.9	8.39	0.12	0.59	1	4.03	0.39	3.86	0.09	0.28	0.443344334
	38	QTM 0	PATCH	5	15.97	0.61	11.84	0.15	0.46	1	6.86	0.37	7.35	0.13	0.34	0.460237946
	39	QTM 0	PATCH	5	15.85	0.79	13.39	0.11	0.18	1	7.55	0.42	8.16	0.11	0.14	0.514826498
	40	QTM 0	PATCH	5	16.23	1.08	14.92	0.2	0.06	1	8.3	0.63	9.13	0.18	0.03	0.562538509
	41	QTM 0	PATCH	5	11.16	1.08	10.62	0.1	0.4	1	4.96	0.54	5.66	0.07	0.23	0.507168459
	129	QTM 0	PATCH	1	3.49	0.13	2.74	0.02	0.05	1	1.51	0.07	1.48	0.01	0.03	0.432664756
	131	QTM 0	PATCH	1	3.36	0.14	2.73	0.01	0.11	1	1.25	0.07	1.23	0.01	0.08	0.37202381
	133	QTM 0	PATCH	1	3.36	0.24	2.58	0.03	0.06	1	1.12	0.11	1.3	0.02	0.03	0.386904762
	135	QTM 0	PATCH	1	3.21	0.25	2.64	0.04	0.04	1	1.12	0.11	1.4	0.03	0.03	0.436137072
	137	QTM 0	PATCH	1	3.29	0.27	2.81	0.04	0.05	1	1.03	0.15	1.34	0.03	0.04	0.407294833
	142	QTM 0	PATCH	2	5.72	0.62	3.94	0.05	0.14	1	1.53	0.26	1.66	0.05	0.09	0.29020979
	143	QTM 0	PATCH	2	7.18	0.58	6.25	0.09	0.06	1	3.34	0.29	3.93	0.08	0.05	0.54735376
	144	QTM 0	PATCH	2	6.44	0.4	5.69	0.1	0.04	1	2.93	0.21	3.74	0.09	0.03	0.580745342
	145	QTM 0	PATCH	2	6.41	0.18	4.63	0.04	0.3	1	2.61	0.11	2.28	0.03	0.21	0.407176287
	149	QTM 0	PATCH	2	6.38	0.71	4.89	0.09	0.11	1	2.41	0.31	2.76	0.08	0.08	0.432601881
	150	QTM 0	PATCH	2	7.04	0.54	6.19	0.1	0.04	1	3.4	0.29	3.99	0.09	0.03	0.566761364
	151	QTM 0	PATCH	2	5.71	0.36	4.83	0.07	0.08	1	2.08	0.17	2.98	0.06	0.06	0.521891419
157	QTM 0	PATCH	5	9.88	1.31	7.02	0.12	0.73	1	3.47	0.53	3.74	0.08	0.5	0.37854251	
158	QTM 0	PATCH	5	13.19	1.5	11.86	0.32	0.31	1	6.12	0.89	6.85	0.28	0.24	0.519332828	
159	QTM 0	PATCH	5	16.93	0.95	14.72	0.22	0.08	1	8.46	0.54	9.34	0.2	0.06	0.551683402	
160	QTM 0	PATCH	5	14.43	0.72	11.25	0.09	0.43	1	6.73	0.34	6.75	0.06	0.25	0.467775468	
161	QTM 0	PATCH	5	9.06	1.06	7.7	0.14	0.46	1	3.23	0.46	3.61	0.11	0.34	0.398454746	
166	QTM 0	PATCH	5	12	1.49	10.15	0.29	0.49	1	5.13	0.81	5.42	0.26	0.38	0.451666667	
167	QTM 0	PATCH	5	14.21	1.2	12.53	0.26	0.14	1	6.76	0.69	7.78	0.24	0.1	0.547501759	
168	QTM 0	PATCH	5	16.75	0.8	14.25	0.14	0.16	1	8.05	0.45	8.82	0.12	0.1	0.526567164	
169	QTM 0	PATCH	5	11.32	0.72	8.37	0.11	0.58	1	4.29	0.36	5.06	0.1	0.35	0.446996466	
129	1	QTM 0	PATCH	2	7.18	0.59	5.93	0.04	0.17	1	2.82	0.36	3.39	0.03	0.1	0.472144847
131	3	QTM 0	PATCH	2	7.32	0.63	5.23	0.05	0.36	1	2.53	0.31	2.39	0.04	0.29	0.345628415

133	5	QTM 0	PATCH	2	7.63	0.67	5.89	0.05	0.19	1	2.8	0.34	3.2	0.05	0.09	0.419397117
135	7	QTM 0	PATCH	2	7.16	0.65	6.05	0.07	0.08	1	2.52	0.34	3.56	0.06	0.06	0.497206704
137	9	QTM 0	PATCH	2	7.89	0.64	6.1	0.08	0.1	1	2.35	0.32	3.35	0.07	0.07	0.424588086
142	14	QTM 0	PATCH	4	12.08	1.11	10.24	0.1	0.47	1	4.68	0.51	4.43	0.09	0.24	0.387417219
143	15	QTM 0	PATCH	4	16.81	1.68	14.21	0.21	0.18	1	8.14	0.92	9.02	0.17	0.14	0.536585366
144	16	QTM 0	PATCH	4	14.11	1.33	14.16	0.24	0.1	0.996468927	6.42	0.73	9.78	0.19	0.08	0.690677966
145	17	QTM 0	PATCH	4	8.6	0.49	6.37	0.08	0.68	1	3.59	0.28	3.11	0.07	0.44	0.41744186
149	21	QTM 0	PATCH	4	16.18	1.74	12.21	0.16	0.3	1	6.15	0.93	6.59	0.14	0.22	0.407292954
150	22	QTM 0	PATCH	4	15.81	1.14	13.97	0.25	0.15	1	7.55	0.67	8.89	0.2	0.11	0.56230234
151	23	QTM 0	PATCH	4	8.5	0.67	8.47	0.11	0.55	1	3.29	0.37	4.38	0.09	0.36	0.515294118
157	29	QTM 0	PATCH	10	27.4	2.89	17.59	0.33	1.35	1	8.84	1.26	7.58	0.27	0.9	0.322627737
158	30	QTM 0	PATCH	10	29.97	3.39	28.77	0.69	0.92	1	14.56	2.08	18.15	0.61	0.69	0.605605606
159	31	QTM 0	PATCH	10	34.01	3.1	32.48	0.54	0.23	1	17.11	1.88	21.22	0.53	0.18	0.623934137
160	32	QTM 0	PATCH	10	28.17	2.57	28.32	0.37	1.07	0.99470339	13.67	1.52	16.77	0.31	0.64	0.592161017
161	33	QTM 0	PATCH	10	23.54	2.54	20.45	0.26	1.51	1	10.69	1.46	8.45	0.21	0.92	0.454120646
166	38	QTM 0	PATCH	10	30.8	3.09	24.57	0.69	1.46	1	12.89	1.78	15.23	0.61	1.15	0.494480519
167	39	QTM 0	PATCH	10	31.1	3.18	29.04	0.5	0.34	1	14.47	2.01	18.93	0.46	0.26	0.608681672
168	40	QTM 0	PATCH	10	33.49	3.17	32.77	0.48	0.3	1	16.8	1.91	20.8	0.43	0.18	0.62108092
169	41	QTM 0	PATCH	10	25.29	2.2	25.56	0.23	1.47	0.98943662	10.43	1.18	13.86	0.18	0.77	0.542253521

N260 QTM 0 mid channel(38.5GHz)

N260 middle channel(38.5GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	1	QTM 0	PATCH	1	3.38	0.28	2.91	0.02	0.07	1	1.22	0.15	1.72	0.01	0.04	0.50887574
	3	QTM 0	PATCH	1	2.67	0.25	2.28	0.02	0.14	1	0.78	0.13	0.99	0.02	0.1	0.370786517
	5	QTM 0	PATCH	1	3.46	0.1	2.65	0.04	0.04	1	1.46	0.04	1.32	0.03	0.03	0.421965318
	7	QTM 0	PATCH	1	3.53	0.15	2.74	0.02	0.03	1	1.29	0.09	1.5	0.01	0.02	0.424929178
	9	QTM 0	PATCH	1	3.62	0.2	2.72	0.03	0.04	1	1.2	0.11	1.38	0.02	0.02	0.38121547
	14	QTM 0	PATCH	2	4.96	0.4	4.61	0.06	0.2	1	2.17	0.21	2.52	0.04	0.12	0.508064516
	15	QTM 0	PATCH	2	8.11	0.34	6.3	0.03	0.08	1	3.94	0.17	3.95	0.03	0.07	0.487053021
	16	QTM 0	PATCH	2	6.63	0.53	6.14	0.05	0.03	1	3.14	0.33	4.22	0.04	0.02	0.636500754
	17	QTM 0	PATCH	2	6.66	0.28	4.22	0.05	0.13	1	1.67	0.15	1.86	0.03	0.09	0.279279279
	21	QTM 0	PATCH	2	7.68	0.27	5.09	0.06	0.12	1	3.44	0.14	2.94	0.05	0.09	0.447916667
	22	QTM 0	PATCH	2	7.71	0.35	6.55	0.04	0.05	1	3.78	0.19	4.19	0.03	0.04	0.543450065
	23	QTM 0	PATCH	2	5.66	0.55	5.17	0.04	0.39	1	1.96	0.27	2.51	0.04	0.24	0.443462898
	29	QTM 0	PATCH	5	12.21	0.72	9	0.17	0.34	1	4.69	0.39	5.27	0.12	0.21	0.431613432
	30	QTM 0	PATCH	5	16.18	0.57	11.06	0.09	0.34	1	7.92	0.36	6.88	0.08	0.26	0.489493201
	31	QTM 0	PATCH	5	15.88	0.83	13.77	0.12	0.2	1	7.89	0.46	9.03	0.11	0.16	0.568639798
	32	QTM 0	PATCH	5	12.11	0.99	12.05	0.12	0.36	1	5.38	0.56	7.13	0.1	0.22	0.588769612
	33	QTM 0	PATCH	5	9.19	0.94	8.41	0.17	0.55	1	3.33	0.43	4.35	0.11	0.3	0.473340588
	38	QTM 0	PATCH	5	15.23	0.58	9.85	0.09	0.43	1	7.05	0.32	5.86	0.08	0.31	0.462902167
	39	QTM 0	PATCH	5	15.66	0.64	12.05	0.11	0.35	1	7.68	0.3	7.56	0.09	0.25	0.490421456
	40	QTM 0	PATCH	5	14.54	1.11	14.15	0.16	0.11	1	7.25	0.68	9.05	0.13	0.08	0.622420908
	41	QTM 0	PATCH	5	9.98	1.03	10.08	0.15	0.61	0.990079365	4.22	0.52	5.87	0.07	0.41	0.58234127
	129	QTM 0	PATCH	1	3.31	0.13	2.57	0.01	0.04	1	1.55	0.07	1.35	0.01	0.03	0.468277946
	131	QTM 0	PATCH	1	3.27	0.1	2.32	0.01	0.15	1	1.17	0.05	1.01	0.01	0.12	0.357798165
	133	QTM 0	PATCH	1	3.23	0.34	2.6	0.03	0.09	1	0.99	0.16	1.37	0.02	0.06	0.424148607
	135	QTM 0	PATCH	1	3.06	0.33	2.72	0.02	0.04	1	1.01	0.16	1.46	0.02	0.03	0.477124183
	137	QTM 0	PATCH	1	3.18	0.32	2.6	0.04	0.05	1	0.93	0.19	1.34	0.03	0.04	0.421383648
	142	QTM 0	PATCH	2	5.64	0.81	4.66	0.06	0.24	1	1.54	0.4	1.89	0.05	0.13	0.335106383
	143	QTM 0	PATCH	2	6.7	0.77	6.1	0.06	0.13	1	3.14	0.4	4.16	0.06	0.1	0.620895522
	144	QTM 0	PATCH	2	5.96	0.46	4.97	0.09	0.03	1	2.51	0.26	3.35	0.08	0.02	0.562080537
	145	QTM 0	PATCH	2	6.73	0.18	4.2	0.03	0.29	1	2.77	0.1	1.93	0.02	0.21	0.411589896
	149	QTM 0	PATCH	2	5.87	0.94	5.61	0.07	0.2	1	2.37	0.47	3.13	0.06	0.16	0.533219761
	150	QTM 0	PATCH	2	6.34	0.58	5.56	0.09	0.06	1	2.85	0.34	3.83	0.08	0.05	0.604100946
151	QTM 0	PATCH	2	5.81	0.51	4.58	0.09	0.06	1	2.03	0.29	2.81	0.08	0.05	0.483648881	
157	QTM 0	PATCH	5	9.15	1.35	6.87	0.11	0.92	1	3.07	0.58	3.88	0.07	0.61	0.424043716	
158	QTM 0	PATCH	5	11.14	1.78	11.94	0.18	0.57	0.932998325	5.4	1.06	7.11	0.17	0.45	0.595477387	
159	QTM 0	PATCH	5	15.48	0.93	13.46	0.19	0.16	1	7.62	0.51	8.89	0.16	0.13	0.574289406	
160	QTM 0	PATCH	5	13.84	0.6	9.93	0.15	0.43	1	6.13	0.36	6.32	0.13	0.34	0.456647399	
161	QTM 0	PATCH	5	9.67	1.1	7.37	0.08	0.47	1	3.18	0.51	3.44	0.07	0.33	0.3557394	
166	QTM 0	PATCH	5	9.63	1.82	10.18	0.18	0.59	0.945972495	4.42	1.04	5.26	0.14	0.46	0.516699411	
167	QTM 0	PATCH	5	12.96	1.27	12.45	0.17	0.28	1	6.55	0.73	8.26	0.15	0.21	0.637345679	
168	QTM 0	PATCH	5	14.1	0.58	11.41	0.12	0.2	1	6.56	0.31	7.18	0.11	0.14	0.509219858	
169	QTM 0	PATCH	5	10.95	0.9	6.97	0.11	0.7	1	4.16	0.48	4.09	0.08	0.41	0.379908676	

129	1	QTM 0	PATCH	2	6.99	0.63	5.95	0.04	0.19	1	3.09	0.34	3.44	0.03	0.11	0.492131617
131	3	QTM 0	PATCH	2	7.67	0.59	5.51	0.05	0.49	1	2.63	0.28	2.52	0.05	0.37	0.342894394
133	5	QTM 0	PATCH	2	8.05	0.66	5.76	0.08	0.2	1	3.09	0.31	3.07	0.05	0.14	0.383850932
135	7	QTM 0	PATCH	2	7.15	0.71	6.18	0.05	0.13	1	2.52	0.37	3.8	0.05	0.1	0.531468531
137	9	QTM 0	PATCH	2	7.51	0.68	6.12	0.08	0.14	1	2.44	0.38	3.64	0.07	0.09	0.484687084
142	14	QTM 0	PATCH	4	12.15	1.29	11.67	0.14	0.6	1	4.09	0.65	4.87	0.11	0.36	0.400823045
143	15	QTM 0	PATCH	4	16.09	1.66	13.15	0.12	0.37	1	7.78	0.87	8.94	0.11	0.3	0.555624612
144	16	QTM 0	PATCH	4	15.15	1.34	14.43	0.18	0.09	1	6.88	0.81	10.29	0.16	0.06	0.679207921
145	17	QTM 0	PATCH	4	8.46	0.49	5.87	0.09	0.66	1	3.75	0.27	3.06	0.07	0.49	0.443262411
149	21	QTM 0	PATCH	4	18.33	1.84	13.06	0.17	0.58	1	7.45	1	7.12	0.13	0.46	0.406437534
150	22	QTM 0	PATCH	4	15.81	1.21	14.07	0.14	0.18	1	7.2	0.65	9.49	0.12	0.15	0.600253004
151	23	QTM 0	PATCH	4	8.75	0.79	8.05	0.11	0.52	1	3.07	0.43	4.38	0.1	0.36	0.500571429
157	29	QTM 0	PATCH	10	28.86	2.91	19.24	0.36	1.92	1	9.83	1.45	9.09	0.24	1.4	0.340609841
158	30	QTM 0	PATCH	10	29.06	3.13	25.34	0.34	1.42	1	13.37	1.85	15.97	0.3	1.13	0.54955265
159	31	QTM 0	PATCH	10	35.9	2.81	33.02	0.41	0.58	1	18.04	1.57	22.41	0.38	0.46	0.624233983
160	32	QTM 0	PATCH	10	31.72	1.96	29.64	0.32	1.38	1	13.42	1.17	18.39	0.26	0.99	0.579760404
161	33	QTM 0	PATCH	10	24.93	2.67	21.83	0.31	1.75	1	8.93	1.38	10.64	0.2	1.03	0.426795026
166	38	QTM 0	PATCH	10	30.23	3.27	23.36	0.34	1.52	1	12.63	1.89	11.86	0.29	1.22	0.417796891
167	39	QTM 0	PATCH	10	32.35	2.62	28.83	0.32	0.96	1	15.89	1.59	19.23	0.29	0.74	0.594435858
168	40	QTM 0	PATCH	10	32.95	2.46	31.94	0.4	0.48	1	16.18	1.4	20.56	0.34	0.35	0.623975721
169	41	QTM 0	PATCH	10	25.9	2.23	23.16	0.28	2.14	1	10.42	1.11	13.82	0.21	1.39	0.533590734

N260 QTM 0 high channel(40GHz)

N260 high channel(40GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	1	QTM 0	PATCH	1	3.09	0.31	2.59	0.01	0.05	1	1.07	0.15	1.61	0.01	0.03	0.521035599
	3	QTM 0	PATCH	1	2.97	0.25	2.01	0.02	0.11	1	0.96	0.14	0.91	0.02	0.08	0.323232323
	5	QTM 0	PATCH	1	3.5	0.13	2.82	0.03	0.04	1	1.48	0.07	1.36	0.03	0.03	0.422857143
	7	QTM 0	PATCH	1	2.69	0.19	2.32	0.03	0.02	1	1.07	0.1	1.06	0.02	0.02	0.397769517
	9	QTM 0	PATCH	1	3.18	0.2	2.27	0.03	0.02	1	1.14	0.12	0.92	0.02	0.02	0.358490566
	14	QTM 0	PATCH	2	5.46	0.39	4.45	0.05	0.14	1	2.58	0.22	2.4	0.04	0.1	0.472527473
	15	QTM 0	PATCH	2	6.46	0.35	5.01	0.04	0.08	1	3.61	0.18	2.66	0.03	0.06	0.558823529
	16	QTM 0	PATCH	2	4.79	0.54	4.47	0.05	0.03	1	2.34	0.33	2.82	0.04	0.02	0.588726514
	17	QTM 0	PATCH	2	5.82	0.44	4.51	0.06	0.05	1	1.76	0.26	1.55	0.04	0.03	0.302405498
	21	QTM 0	PATCH	2	6.9	0.35	4.88	0.09	0.09	1	3.25	0.18	2.11	0.06	0.07	0.471014493
	22	QTM 0	PATCH	2	5.96	0.36	5.12	0.03	0.05	1	3.26	0.21	3.03	0.02	0.04	0.546979866
	23	QTM 0	PATCH	2	5.68	0.56	4.39	0.03	0.28	1	1.58	0.31	2.15	0.02	0.19	0.378521127
	29	QTM 0	PATCH	5	11.43	0.75	9.41	0.13	0.32	1	4.56	0.41	5.01	0.08	0.26	0.43832021
	30	QTM 0	PATCH	5	12.25	0.61	8.21	0.13	0.31	1	6.28	0.3	4.33	0.1	0.25	0.512653061
	31	QTM 0	PATCH	5	12.76	0.77	10.76	0.09	0.25	1	6.81	0.39	6.59	0.08	0.2	0.53369906
	32	QTM 0	PATCH	5	10.21	1.14	10	0.1	0.16	1	4.61	0.67	6.06	0.08	0.09	0.593535749
	33	QTM 0	PATCH	5	8.84	0.96	7.59	0.11	0.38	1	3.09	0.54	4.4	0.07	0.25	0.497737557
	38	QTM 0	PATCH	5	12.18	0.64	8.82	0.14	0.41	1	5.63	0.31	4.17	0.11	0.33	0.462233169
	39	QTM 0	PATCH	5	13.3	0.63	9.82	0.08	0.27	1	6.9	0.29	5.25	0.06	0.21	0.518796992
	40	QTM 0	PATCH	5	12.47	1.02	11.24	0.11	0.1	1	6.6	0.6	7.14	0.09	0.08	0.572574178
	41	QTM 0	PATCH	5	9.14	1.26	8.7	0.08	0.29	1	3.7	0.68	5.35	0.06	0.19	0.585339168
	129	QTM 0	PATCH	1	2.7	0.08	2.06	0.01	0.07	1	1.41	0.04	0.9	0.01	0.04	0.522222222
	131	QTM 0	PATCH	1	3.25	0.12	2.52	0.01	0.15	1	1.1	0.05	1.19	0.01	0.12	0.366153846
	133	QTM 0	PATCH	1	3.41	0.33	2.4	0.03	0.08	1	1.15	0.17	1.32	0.02	0.06	0.387096774
	135	QTM 0	PATCH	1	2.79	0.37	2.1	0.03	0.05	1	0.79	0.18	1.15	0.02	0.03	0.41218638
	137	QTM 0	PATCH	1	3.22	0.32	2.38	0.03	0.03	1	0.91	0.2	1.23	0.02	0.02	0.381987578
	142	QTM 0	PATCH	2	5.88	0.87	3.93	0.09	0.22	1	1.37	0.45	1.55	0.07	0.16	0.263605442
	143	QTM 0	PATCH	2	6.28	0.76	5.04	0.08	0.08	1	2.75	0.44	3.62	0.07	0.06	0.576433121
	144	QTM 0	PATCH	2	5.72	0.46	4.04	0.07	0.03	1	2.15	0.27	2.69	0.06	0.03	0.47027972
	145	QTM 0	PATCH	2	6.1	0.17	4.33	0.02	0.38	1	2.65	0.09	1.82	0.02	0.26	0.43442623
	149	QTM 0	PATCH	2	5.77	0.99	4.54	0.09	0.2	1	1.9	0.56	2.57	0.08	0.14	0.445407279
150	QTM 0	PATCH	2	5.78	0.61	4.43	0.06	0.05	1	2.35	0.39	3.12	0.05	0.04	0.539792388	
151	QTM 0	PATCH	2	5.74	0.57	3.88	0.06	0.05	1	1.76	0.32	2.21	0.05	0.04	0.385017422	
157	QTM 0	PATCH	5	8.95	1.37	7.1	0.12	1.04	1	3.61	0.69	3.41	0.1	0.71	0.403351955	
158	QTM 0	PATCH	5	10.19	1.85	8.82	0.2	0.39	1	4.06	1.13	5.34	0.15	0.29	0.52404318	
159	QTM 0	PATCH	5	13.19	0.67	10.47	0.15	0.14	1	6.14	0.39	7.21	0.12	0.11	0.546626232	
160	QTM 0	PATCH	5	11.32	0.68	8.14	0.14	0.27	1	4.9	0.39	4.8	0.12	0.2	0.432862191	
161	QTM 0	PATCH	5	9.95	1.2	7.32	0.1	0.78	1	3.33	0.61	3.35	0.08	0.47	0.336683417	
166	QTM 0	PATCH	5	9.58	1.81	8.15	0.2	0.61	1	3.54	1.1	4.62	0.15	0.44	0.482254697	
167	QTM 0	PATCH	5	11.44	1.44	9.69	0.19	0.31	1	5.21	0.84	6.65	0.15	0.23	0.581293706	

	168	QTM 0	PATCH	5	13.93	0.51	10.73	0.13	0.21	1	6.54	0.29	6.92	0.11	0.17	0.496769562
	169	QTM 0	PATCH	5	10.1	0.96	6.68	0.09	0.78	1	4.07	0.48	3.72	0.07	0.55	0.402970297
129	1	QTM 0	PATCH	2	6.14	0.58	4.98	0.03	0.22	1	2.53	0.31	2.72	0.03	0.14	0.442996743
131	3	QTM 0	PATCH	2	7.84	0.58	5.43	0.05	0.48	1	2.91	0.29	3.01	0.04	0.36	0.383928571
133	5	QTM 0	PATCH	2	8.08	0.71	6.09	0.07	0.2	1	3.16	0.36	3.41	0.05	0.12	0.422029703
135	7	QTM 0	PATCH	2	6.4	0.81	5.58	0.06	0.1	1	2.34	0.42	3.18	0.05	0.07	0.496875
137	9	QTM 0	PATCH	2	7.43	0.58	5.27	0.08	0.08	1	2.3	0.34	2.82	0.06	0.06	0.379542396
142	14	QTM 0	PATCH	4	12.97	1.31	10.43	0.19	0.45	1	4.55	0.71	4.86	0.13	0.3	0.374710871
143	15	QTM 0	PATCH	4	14.57	1.66	12.66	0.14	0.28	1	7.62	0.94	8.37	0.12	0.22	0.574468085
144	16	QTM 0	PATCH	4	14	1.21	12.44	0.18	0.08	1	6.33	0.74	8.52	0.15	0.06	0.608571429
145	17	QTM 0	PATCH	4	7.51	0.65	5.71	0.08	0.51	1	3.2	0.36	2.74	0.06	0.37	0.426098535
149	21	QTM 0	PATCH	4	17.75	2.05	13.84	0.17	0.44	1	7.8	1.13	7.6	0.13	0.3	0.43943662
150	22	QTM 0	PATCH	4	14.21	1.18	10.88	0.12	0.12	1	6.53	0.72	7.05	0.1	0.1	0.496129486
151	23	QTM 0	PATCH	4	7.75	0.69	6.05	0.09	0.39	1	2.73	0.41	3.4	0.07	0.26	0.438709677
157	29	QTM 0	PATCH	10	27.28	2.87	20.27	0.41	1.89	1	9.33	1.66	9.76	0.26	1.36	0.357771261
158	30	QTM 0	PATCH	10	27.36	3.14	22.21	0.34	1.13	1	13.51	1.9	13.28	0.29	0.88	0.49378655
159	31	QTM 0	PATCH	10	31.99	1.83	28.02	0.35	0.67	1	16.27	1.02	19.44	0.31	0.54	0.607689903
160	32	QTM 0	PATCH	10	29.2	1.66	24.28	0.29	0.72	1	12.64	1	16.04	0.24	0.46	0.549315068
161	33	QTM 0	PATCH	10	24.03	3.04	19.08	0.23	1.93	1	8.78	1.64	10.09	0.17	1.24	0.419891802
166	38	QTM 0	PATCH	10	28.46	3.38	24.17	0.32	1.71	1	12.39	2.05	13.05	0.26	1.29	0.458538299
167	39	QTM 0	PATCH	10	25.69	2.53	23.23	0.35	0.97	1	13.33	1.4	15.74	0.3	0.75	0.612689763
168	40	QTM 0	PATCH	10	33.98	1.96	29.85	0.39	0.49	1	17.33	1.01	20.03	0.33	0.4	0.589464391
169	41	QTM 0	PATCH	10	24.3	2.37	19.96	0.21	1.75	1	9.29	1.28	13.36	0.16	1.19	0.549794239

N260 QTM 1 low channel(37GHz)

N260 Low channel(37GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	0	QTM 1	PATCH	1	3.23	0.16	0.06	0.38	1.09	1	1.02	0.1	0.04	0.23	0.55	0.315789474
	2	QTM 1	PATCH	1	2.42	0.14	0.04	0.28	0.79	1	0.73	0.1	0.03	0.19	0.36	0.301652893
	4	QTM 1	PATCH	1	2.68	0.13	0.06	0.19	0.91	1	0.86	0.08	0.05	0.14	0.46	0.320895522
	6	QTM 1	PATCH	1	2.55	0.12	0.14	0.1	0.89	1	0.72	0.07	0.11	0.06	0.41	0.282352941
	8	QTM 1	PATCH	1	3.01	0.13	0.21	0.1	0.82	1	0.91	0.08	0.15	0.08	0.42	0.302325581
	10	QTM 1	PATCH	2	5.66	0.23	0.57	0.24	1.65	1	1.86	0.16	0.42	0.18	0.93	0.328621908
	11	QTM 1	PATCH	2	6.3	0.34	0.05	0.32	2.52	1	2.34	0.19	0.04	0.15	1.38	0.371428571
	12	QTM 1	PATCH	2	4.62	0.31	0.51	0.29	1.41	1	1.07	0.21	0.38	0.21	0.64	0.231601732
	13	QTM 1	PATCH	2	4.92	0.37	0.14	1.07	1.7	1	1.11	0.27	0.1	0.68	0.73	0.225609756
	18	QTM 1	PATCH	2	6.31	0.35	0.08	0.8	2.39	1	2	0.2	0.06	0.49	1.17	0.316957211
	19	QTM 1	PATCH	2	5.41	0.31	0.07	0.58	2.3	1	2.12	0.18	0.06	0.31	1.36	0.391866913
	20	QTM 1	PATCH	2	4.18	0.38	0.12	0.76	1.93	1	1.19	0.27	0.09	0.55	0.84	0.284688995
	24	QTM 1	PATCH	5	9.87	0.94	0.52	2.06	4.77	1	2.95	0.7	0.31	1.38	2.09	0.298885512
	25	QTM 1	PATCH	5	13.95	0.85	0.25	0.63	5.69	1	4.88	0.53	0.18	0.38	3.52	0.349820789
	26	QTM 1	PATCH	5	11.59	0.88	0.25	0.73	5.44	1	4.15	0.59	0.19	0.38	3.15	0.358067299
	27	QTM 1	PATCH	5	8.67	0.74	0.95	2.04	3.39	1	3.02	0.48	0.69	1.45	1.58	0.348327566
	28	QTM 1	PATCH	5	9.22	0.76	0.99	2.1	3.11	1	3.34	0.51	0.68	1.44	1.78	0.362255965
	34	QTM 1	PATCH	5	11.97	1	0.53	1.5	5.91	1	3.11	0.62	0.39	0.96	2.99	0.259816207
	35	QTM 1	PATCH	5	13.82	0.8	0.15	0.43	5.3	1	5.71	0.51	0.11	0.27	3.39	0.41316932
	36	QTM 1	PATCH	5	6.55	0.71	1.26	1.93	2.31	1	2.61	0.42	1	1.27	1.46	0.398473282
	37	QTM 1	PATCH	5	9.17	0.67	0.79	1.88	3.11	1	2.83	0.46	0.58	1.27	1.52	0.308615049
	128	QTM 1	PATCH	1	3.51	0.16	0.03	1.01	0.94	1	1.12	0.09	0.02	0.62	0.52	0.319088319
	130	QTM 1	PATCH	1	2.79	0.22	0.03	0.45	1.08	1	0.88	0.13	0.03	0.29	0.51	0.315412186
	132	QTM 1	PATCH	1	2.82	0.23	0.06	0.23	1.16	1	0.84	0.15	0.04	0.12	0.49	0.29787234
	134	QTM 1	PATCH	1	2.49	0.17	0.13	0.12	0.93	1	0.75	0.11	0.09	0.09	0.45	0.301204819
	136	QTM 1	PATCH	1	2.43	0.21	0.1	0.08	1.07	1	0.74	0.12	0.07	0.05	0.57	0.304526749
	138	QTM 1	PATCH	2	5.73	0.31	0.11	2.26	1.2	1	1.82	0.22	0.07	1.36	0.71	0.317626527
	139	QTM 1	PATCH	2	5.57	0.43	0.1	0.11	2.77	1	2.03	0.28	0.07	0.06	1.56	0.364452424
	140	QTM 1	PATCH	2	6.57	0.23	0.09	2.02	1.58	1	2.17	0.16	0.06	1.21	0.78	0.330289193
	141	QTM 1	PATCH	2	4.38	0.43	0.11	1.18	1.6	1	1	0.3	0.08	0.73	0.71	0.228310502
146	QTM 1	PATCH	2	5.1	0.36	0.07	1.42	2.04	1	1.49	0.23	0.05	0.87	1.02	0.292156863	
147	QTM 1	PATCH	2	6.88	0.4	0.06	1.38	2.2	1	2.49	0.24	0.04	0.84	1.2	0.361918605	
148	QTM 1	PATCH	2	4.92	0.48	0.18	0.38	2.27	1	1.79	0.32	0.14	0.19	1.12	0.363821138	
152	QTM 1	PATCH	5	9.49	1.1	0.74	3.25	2.41	1	2.45	0.67	0.44	2.13	1.28	0.258166491	
153	QTM 1	PATCH	5	11.65	1.13	0.31	1.11	5.89	1	4.55	0.83	0.23	0.7	3.03	0.39055794	
154	QTM 1	PATCH	5	13.84	1.51	0.16	1.09	6.67	1	4.45	0.92	0.11	0.66	3.48	0.321531792	
155	QTM 1	PATCH	5	11.11	0.84	0.45	3.3	4.2	1	2.84	0.63	0.36	1.91	2.08	0.255625563	
156	QTM 1	PATCH	5	10.78	1	0.29	3.01	5.71	1	3.32	0.58	0.21	1.75	2.98	0.307977737	

	162	QTM 1	PATCH	5	7.75	1.7	0.47	3.01	4.27	1	3.07	1.27	0.34	1.74	2.08	0.396129032
	163	QTM 1	PATCH	5	14.51	1.08	0.16	0.65	6.96	1	5.45	0.59	0.13	0.38	4.24	0.375603032
	164	QTM 1	PATCH	5	10.84	0.75	0.3	2.22	3.99	1	3.08	0.48	0.23	1.43	2.21	0.284132841
	165	QTM 1	PATCH	5	9.19	0.65	0.34	2.52	3.3	1	2.93	0.39	0.23	1.6	1.81	0.31882481
128	0	QTM 1	PATCH	2	6.83	0.48	0.11	2.24	2.68	1	2.2	0.29	0.09	1.41	1.54	0.322108346
130	2	QTM 1	PATCH	2	5.92	0.4	0.08	1.18	2.59	1	1.84	0.27	0.06	0.77	1.27	0.310810811
132	4	QTM 1	PATCH	2	6.17	0.48	0.11	0.74	2.67	1	1.94	0.32	0.09	0.45	1.33	0.314424635
134	6	QTM 1	PATCH	2	5.4	0.35	0.39	0.23	2.41	1	1.65	0.21	0.3	0.14	1.23	0.305555556
136	8	QTM 1	PATCH	2	6.03	0.44	0.31	0.21	2.02	1	1.66	0.26	0.21	0.15	1.13	0.275290216
138	10	QTM 1	PATCH	4	6.97	0.56	0.84	2.73	2.36	1	2.55	0.41	0.65	1.65	1.34	0.365853659
139	11	QTM 1	PATCH	4	10	0.67	0.19	0.48	4.06	1	3.56	0.41	0.14	0.25	2.14	0.356
140	12	QTM 1	PATCH	4	7.93	0.72	0.68	2.54	2.82	1	2.77	0.47	0.54	1.51	1.35	0.349306431
141	13	QTM 1	PATCH	4	10.41	1.25	0.32	3.59	5.04	1	2.56	0.91	0.25	2.21	2.26	0.245917387
146	18	QTM 1	PATCH	4	13.97	1.14	0.2	4.1	6.8	1	3.79	0.72	0.15	2.49	3.41	0.271295634
147	19	QTM 1	PATCH	4	13.15	1.01	0.17	2.55	5.26	1	5.03	0.63	0.11	1.57	3.16	0.382509506
148	20	QTM 1	PATCH	4	10.88	1.28	0.35	1.96	6.05	1	3.24	0.92	0.26	1.28	2.81	0.297794118
152	24	QTM 1	PATCH	10	23.46	2.38	1.89	9.56	9.96	1	6.38	1.78	1.11	6.01	3.57	0.271952259
153	25	QTM 1	PATCH	10	30.1	2.78	0.77	2.31	14.75	1	10.2	1.82	0.57	1.28	8.81	0.338870432
154	26	QTM 1	PATCH	10	29.89	3.34	0.65	1.88	16.27	1	9.93	2.23	0.5	1.1	9.44	0.332218133
155	27	QTM 1	PATCH	10	23.87	1.84	1.5	9.22	8.31	1	7.06	1.36	1.15	5.8	3.35	0.295768747
156	28	QTM 1	PATCH	10	22.48	1.8	1.64	9.29	9.33	1	7.16	1.28	1.24	5.98	4.58	0.318505338
162	34	QTM 1	PATCH	10	24.88	3.64	1.15	7.86	15.22	1	7.38	2.74	0.84	4.9	6.77	0.296623794
163	35	QTM 1	PATCH	10	33.39	2.67	0.37	1.6	14.91	1	12.55	1.53	0.3	1.08	9.36	0.375861036
164	36	QTM 1	PATCH	10	20.18	1.64	1.91	6.83	7.32	1	7.5	0.96	1.5	4.48	3.89	0.371655104
165	37	QTM 1	PATCH	10	18.89	1.76	1.28	6.48	7.78	1	6.15	1.23	0.96	4.34	3.57	0.325569084

N260 QTM 1 mid channel(38.5GHz)

N260 mid channel(38.5GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	0	QTM 1	PATCH	1	3.41	0.15	0.08	0.57	1.32	1	1	0.09	0.06	0.34	0.68	0.293255132
	2	QTM 1	PATCH	1	2.72	0.16	0.05	0.33	1.04	1	0.81	0.11	0.03	0.21	0.51	0.297794118
	4	QTM 1	PATCH	1	2.68	0.15	0.07	0.2	0.91	1	0.83	0.09	0.05	0.13	0.49	0.309701493
	6	QTM 1	PATCH	1	2.61	0.14	0.17	0.1	1.08	1	0.73	0.08	0.13	0.07	0.54	0.279693487
	8	QTM 1	PATCH	1	2.6	0.13	0.18	0.08	0.93	1	0.83	0.08	0.12	0.06	0.4	0.319230769
	10	QTM 1	PATCH	2	5.43	0.2	0.58	0.21	1.65	1	1.72	0.14	0.4	0.14	0.99	0.316758748
	11	QTM 1	PATCH	2	7.01	0.34	0.08	0.5	3.21	1	2.64	0.21	0.06	0.28	1.83	0.37660485
	12	QTM 1	PATCH	2	4.68	0.3	0.56	0.22	1.61	1	1.12	0.2	0.4	0.14	0.82	0.239316239
	13	QTM 1	PATCH	2	5.28	0.41	0.19	1.22	1.99	1	1.1	0.29	0.14	0.74	0.87	0.208333333
	18	QTM 1	PATCH	2	6.95	0.42	0.12	1.03	3.08	1	2.14	0.24	0.09	0.66	1.53	0.307913669
	19	QTM 1	PATCH	2	5.84	0.31	0.1	0.83	2.75	1	2.32	0.2	0.07	0.47	1.61	0.397260274
	20	QTM 1	PATCH	2	5	0.46	0.14	0.81	2.28	1	1.24	0.31	0.12	0.55	1.02	0.248
	24	QTM 1	PATCH	5	11.18	1.14	0.64	2.15	5.51	1	3.07	0.8	0.43	1.5	2.5	0.274597496
	25	QTM 1	PATCH	5	14.25	0.8	0.29	0.72	5.77	1	5.51	0.49	0.23	0.39	3.5	0.386666667
	26	QTM 1	PATCH	5	10.85	0.79	0.24	0.88	5.66	1	4.32	0.55	0.18	0.46	3.34	0.398156682
	27	QTM 1	PATCH	5	9.62	0.86	0.86	1.96	4.44	1	2.52	0.57	0.47	1.27	2.12	0.261954262
	28	QTM 1	PATCH	5	9	0.79	0.78	1.86	3.7	1	2.6	0.52	0.44	1.3	1.97	0.288888889
	34	QTM 1	PATCH	5	13.2	1.09	0.54	2.16	6.28	1	3.96	0.58	0.38	1.42	3.25	0.3
	35	QTM 1	PATCH	5	14.01	0.96	0.2	0.74	6.76	1	5.24	0.59	0.16	0.53	4.06	0.374018558
	36	QTM 1	PATCH	5	7.2	0.83	1.13	2.25	3.26	1	2.63	0.47	0.87	1.37	1.58	0.365277778
	37	QTM 1	PATCH	5	9.3	0.69	0.84	1.65	3.78	1	3.03	0.44	0.51	1.14	1.84	0.325806452
	128	QTM 1	PATCH	1	3.28	0.18	0.05	0.86	0.95	1	1.11	0.12	0.04	0.48	0.44	0.338414634
	130	QTM 1	PATCH	1	2.87	0.22	0.03	0.54	1.13	1	0.87	0.12	0.02	0.4	0.56	0.303135889
	132	QTM 1	PATCH	1	3.06	0.2	0.04	0.22	1.25	1	1	0.13	0.03	0.14	0.62	0.326797386
	134	QTM 1	PATCH	1	2.4	0.22	0.21	0.13	0.91	1	0.69	0.15	0.17	0.09	0.44	0.2875
	136	QTM 1	PATCH	1	2.41	0.23	0.1	0.08	1.14	1	0.75	0.13	0.06	0.05	0.58	0.31120332
	138	QTM 1	PATCH	2	6.22	0.4	0.09	2.33	1.57	1	1.7	0.31	0.06	1.49	0.9	0.273311897
	139	QTM 1	PATCH	2	5.1	0.59	0.16	0.13	2.77	1	2.03	0.42	0.13	0.08	1.62	0.398039216
140	QTM 1	PATCH	2	6.73	0.34	0.1	1.99	1.7	1	2.09	0.27	0.07	1.23	0.96	0.310549777	
141	QTM 1	PATCH	2	4.6	0.33	0.08	1.2	1.46	1	0.97	0.23	0.06	0.86	0.71	0.210869565	
146	QTM 1	PATCH	2	4.95	0.47	0.06	1.6	2.37	1	1.54	0.26	0.04	1.03	1.21	0.311111111	
147	QTM 1	PATCH	2	6.79	0.3	0.09	1.29	2.24	1	2.43	0.18	0.07	0.73	1.2	0.357879234	
148	QTM 1	PATCH	2	4.3	0.57	0.3	0.42	2.32	1	1.55	0.4	0.23	0.25	1.27	0.360465116	
152	QTM 1	PATCH	5	8.73	1.02	0.68	3.07	2.58	1	2.34	0.65	0.4	2.07	1.76	0.268041237	
153	QTM 1	PATCH	5	11.32	1.49	0.51	1.69	6.9	1	4.44	1.05	0.39	1.08	3.78	0.392226148	
154	QTM 1	PATCH	5	14.6	1.18	0.22	1.25	6.35	1	5.75	0.67	0.16	0.67	3.27	0.393835616	

	155	QTM 1	PATCH	5	10.99	0.81	0.29	3.32	3.56	1	2.91	0.57	0.23	2.21	1.38	0.264786169
	156	QTM 1	PATCH	5	9.82	0.9	0.23	3.53	4.85	1	3.2	0.56	0.19	2.54	2.4	0.32586558
	162	QTM 1	PATCH	5	6.99	1.6	0.39	3.12	4.53	1	2.22	1.29	0.31	1.94	2.15	0.317596567
	163	QTM 1	PATCH	5	13.7	1.36	0.2	0.75	7.62	1	5.58	0.78	0.13	0.47	4.42	0.40729927
	164	QTM 1	PATCH	5	11.47	0.7	0.4	2.19	4.18	1	3.07	0.43	0.26	1.37	2.07	0.267654752
	165	QTM 1	PATCH	5	10.06	0.77	0.52	2.31	3.53	1	2.96	0.45	0.33	1.46	1.68	0.294234592
128	0	QTM 1	PATCH	2	7.2	0.52	0.19	2.57	3.16	1	2.52	0.33	0.16	1.49	1.61	0.35
130	2	QTM 1	PATCH	2	6.27	0.44	0.11	1.57	3.08	1	1.96	0.3	0.09	1.11	1.58	0.312599681
132	4	QTM 1	PATCH	2	6.05	0.44	0.15	0.71	2.89	1	2.05	0.25	0.11	0.48	1.58	0.338842975
134	6	QTM 1	PATCH	2	5.45	0.42	0.65	0.23	2.64	1	1.63	0.27	0.51	0.16	1.37	0.299082569
136	8	QTM 1	PATCH	2	5.59	0.45	0.3	0.21	2.24	1	1.81	0.27	0.2	0.16	1.18	0.323792487
138	10	QTM 1	PATCH	4	6.9	0.74	0.73	2.65	2.81	1	2.35	0.55	0.54	1.63	1.33	0.34057971
139	11	QTM 1	PATCH	4	10.01	0.89	0.26	0.76	4.69	1	3.81	0.61	0.19	0.44	2.47	0.380619381
140	12	QTM 1	PATCH	4	7.49	0.78	0.68	2.31	2.76	1	2.58	0.57	0.52	1.45	1.48	0.344459279
141	13	QTM 1	PATCH	4	13.47	1.14	0.3	3.95	5.15	1	2.91	0.81	0.21	2.85	2.45	0.216035635
146	18	QTM 1	PATCH	4	15.81	1.46	0.24	4.88	8.49	1	4.71	0.82	0.19	3.1	4.45	0.297912713
147	19	QTM 1	PATCH	4	14.8	0.88	0.28	3.18	5.65	1	5.68	0.53	0.21	1.83	3.44	0.383783784
148	20	QTM 1	PATCH	4	12.35	1.55	0.5	1.85	7.02	1	3.74	1.08	0.39	1.2	3.63	0.302834008
152	24	QTM 1	PATCH	10	23.6	2.84	2.04	8.99	11.08	1	5.85	2.13	1.41	6.09	4.65	0.258050847
153	25	QTM 1	PATCH	10	31.71	3.34	1.17	3.92	16.31	1	12.09	2.23	0.82	2.35	10.15	0.381267739
154	26	QTM 1	PATCH	10	29.88	2.75	0.71	3.54	15.25	1	11.54	1.59	0.54	1.93	9.25	0.386211513
155	27	QTM 1	PATCH	10	27.19	2.58	1.89	8.72	11.83	1	7.68	1.81	1.16	6.11	5.38	0.282456786
156	28	QTM 1	PATCH	10	23.89	2.29	1.34	9.48	11.87	1	7.58	1.64	0.94	6.99	5.35	0.317287568
162	34	QTM 1	PATCH	10	27.58	3.97	1.63	9.1	16.65	1	8.1	2.89	1.24	5.93	8.72	0.316171139
163	35	QTM 1	PATCH	10	34.41	3.22	0.56	2.51	17.92	1	12.98	1.74	0.4	1.76	11.61	0.377215926
164	36	QTM 1	PATCH	10	23.29	2.28	2.18	7.37	7.51	1	8.38	1.47	1.7	4.38	4.81	0.359811078
165	37	QTM 1	PATCH	10	20.74	1.63	1.65	5.43	7.84	1	6.06	1.06	1.2	3.38	3.78	0.292189007

N260 QTM 1 high channel(40GHz)

N260 high channel(40GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N260	0	QTM 1	PATCH	1	3.33	0.17	0.07	0.67	1.08	1	0.95	0.1	0.05	0.38	0.57	0.285285285
	2	QTM 1	PATCH	1	2.37	0.14	0.06	0.31	0.73	1	0.77	0.09	0.04	0.19	0.36	0.324894515
	4	QTM 1	PATCH	1	3.01	0.19	0.06	0.26	0.97	1	1.06	0.13	0.03	0.19	0.52	0.352159468
	6	QTM 1	PATCH	1	2.11	0.14	0.15	0.1	0.94	1	0.73	0.06	0.11	0.06	0.46	0.345971564
	8	QTM 1	PATCH	1	2.15	0.09	0.15	0.05	0.49	1	0.79	0.06	0.11	0.04	0.25	0.36744186
	10	QTM 1	PATCH	2	4.14	0.21	0.36	0.17	1	1	1.6	0.13	0.25	0.12	0.53	0.38647343
	11	QTM 1	PATCH	2	5.57	0.41	0.11	0.58	2.31	1	2.03	0.24	0.09	0.29	1.3	0.364452424
	12	QTM 1	PATCH	2	4.71	0.32	0.5	0.16	1.48	1	1.16	0.2	0.37	0.1	0.7	0.246284501
	13	QTM 1	PATCH	2	5.32	0.28	0.14	1.28	1.58	1	1.43	0.17	0.11	0.73	0.75	0.268796992
	18	QTM 1	PATCH	2	5.82	0.38	0.11	0.97	2.26	1	2.15	0.22	0.08	0.58	1.14	0.369415808
	19	QTM 1	PATCH	2	5.34	0.34	0.11	1.07	2.25	1	1.81	0.22	0.08	0.56	1.36	0.338951311
	20	QTM 1	PATCH	2	5.56	0.44	0.14	0.87	2.11	1	1.91	0.25	0.09	0.62	1.03	0.34352518
	24	QTM 1	PATCH	5	10.63	0.94	0.52	1.83	5.15	1	3.91	0.48	0.4	1.31	2.38	0.367826905
	25	QTM 1	PATCH	5	11.81	0.85	0.2	1.06	4.6	1	5.23	0.45	0.13	0.62	2.71	0.442845047
	26	QTM 1	PATCH	5	9.09	0.94	0.43	1.09	4.04	1	3.8	0.63	0.34	0.57	2.47	0.418041804
	27	QTM 1	PATCH	5	9.05	0.8	0.9	1.85	3.92	1	2.88	0.45	0.63	1.14	1.65	0.318232044
	28	QTM 1	PATCH	5	8.42	0.68	0.67	2.33	2.65	1	3.04	0.41	0.44	1.5	1.26	0.361045131
	34	QTM 1	PATCH	5	12.25	0.97	0.4	1.64	5.35	1	5.01	0.44	0.25	1.1	3.01	0.408979592
	35	QTM 1	PATCH	5	10.47	1.07	0.16	1.1	4.9	1	4.06	0.6	0.13	0.66	2.88	0.387774594
	36	QTM 1	PATCH	5	7.45	0.83	0.8	2.35	3.14	1	2.82	0.49	0.6	1.48	1.81	0.37852349
	37	QTM 1	PATCH	5	9.67	0.58	0.58	2.2	3.08	1	3.27	0.33	0.42	1.37	1.56	0.338159255
	128	QTM 1	PATCH	1	2.78	0.15	0.05	0.99	0.69	1	0.95	0.1	0.04	0.57	0.31	0.341726619
	130	QTM 1	PATCH	1	2.26	0.19	0.03	0.44	0.86	1	0.76	0.11	0.03	0.3	0.36	0.336283186
	132	QTM 1	PATCH	1	2.73	0.19	0.04	0.2	1.03	1	1.06	0.11	0.03	0.15	0.49	0.388278388
	134	QTM 1	PATCH	1	2.79	0.22	0.19	0.11	0.89	1	0.82	0.14	0.15	0.09	0.41	0.29390681
136	QTM 1	PATCH	1	2.59	0.24	0.12	0.06	1.2	1	0.79	0.15	0.08	0.04	0.53	0.305019305	
138	QTM 1	PATCH	2	5.25	0.37	0.08	2.15	1.29	1	1.6	0.29	0.06	1.37	0.63	0.304761905	
139	QTM 1	PATCH	2	5.36	0.64	0.14	0.1	2.67	1	2.07	0.45	0.12	0.07	1.34	0.38619403	
140	QTM 1	PATCH	2	5.24	0.32	0.1	1.8	1.18	1	1.95	0.26	0.08	1.1	0.71	0.372137405	
141	QTM 1	PATCH	2	4.66	0.32	0.09	0.98	1.58	1	1.08	0.23	0.07	0.71	0.81	0.231759657	
146	QTM 1	PATCH	2	4.67	0.43	0.07	1.75	2.03	1	1.69	0.25	0.06	1.17	0.94	0.361884368	
147	QTM 1	PATCH	2	4.85	0.23	0.11	1.27	1.4	1	2.17	0.17	0.09	0.73	0.72	0.44742268	
148	QTM 1	PATCH	2	4.51	0.38	0.26	0.31	1.77	1	1.86	0.28	0.2	0.18	0.93	0.412416851	
152	QTM 1	PATCH	5	8.05	0.78	0.61	3.01	2.82	1	2.58	0.52	0.36	1.75	1.27	0.320496894	

	153	QTM 1	PATCH	5	9.44	1.33	0.32	1.89	5.46	1	4.29	0.85	0.25	1.37	3.19	0.454449153
	154	QTM 1	PATCH	5	11.77	1.04	0.22	1.25	4.98	1	5.08	0.6	0.16	0.79	2.47	0.431605777
	155	QTM 1	PATCH	5	10.35	0.86	0.45	2.38	4.06	1	3.28	0.63	0.33	1.59	1.76	0.316908213
	156	QTM 1	PATCH	5	10.51	1.12	0.23	2.99	5.34	1	3.79	0.79	0.16	2.21	2.61	0.360608944
	162	QTM 1	PATCH	5	7.37	1.21	0.35	2.48	4.05	1	3.28	0.9	0.25	1.69	1.89	0.44504749
	163	QTM 1	PATCH	5	10.86	1.45	0.31	0.87	5.99	1	4.58	0.86	0.21	0.5	3.27	0.421731123
	164	QTM 1	PATCH	5	10.54	0.77	0.42	2.25	4.02	1	3.37	0.47	0.32	1.32	1.89	0.319734345
	165	QTM 1	PATCH	5	10.04	0.73	0.47	2.56	3.52	1	3.45	0.46	0.35	1.54	1.46	0.343625498
128	0	QTM 1	PATCH	2	7.04	0.57	0.19	2.78	2.81	1	2.87	0.34	0.16	1.53	1.38	0.407670455
130	2	QTM 1	PATCH	2	5.59	0.47	0.14	1.35	2.41	1	2.07	0.28	0.1	0.93	1.15	0.370304114
132	4	QTM 1	PATCH	2	6.48	0.56	0.15	0.82	3.02	1	2.55	0.32	0.1	0.61	1.65	0.393518519
134	6	QTM 1	PATCH	2	5.48	0.45	0.56	0.24	2.56	1	1.83	0.22	0.45	0.19	1.32	0.333941606
136	8	QTM 1	PATCH	2	5.22	0.42	0.35	0.15	2.01	1	1.67	0.27	0.23	0.12	1.02	0.319923372
138	10	QTM 1	PATCH	4	6.75	0.64	0.64	2.71	2.43	1	2.22	0.46	0.45	1.73	1.13	0.328888889
139	11	QTM 1	PATCH	4	8.16	0.94	0.33	0.79	3.62	1	3.05	0.64	0.28	0.45	1.95	0.37377451
140	12	QTM 1	PATCH	4	6.63	0.63	0.76	2.09	2.42	1	2.33	0.45	0.52	1.23	1.16	0.351432881
141	13	QTM 1	PATCH	4	13.03	0.97	0.29	3.19	4.38	1	3.31	0.69	0.21	2.23	2.28	0.254029163
146	18	QTM 1	PATCH	4	14.2	1.47	0.22	4.78	7.23	1	5.39	0.85	0.18	3.1	3.66	0.379577465
147	19	QTM 1	PATCH	4	13.33	0.85	0.32	3.7	4.93	1	5.73	0.51	0.24	2.09	3.08	0.429857464
148	20	QTM 1	PATCH	4	12.23	1.24	0.47	1.65	5.56	1	4.51	0.8	0.3	1.19	3.02	0.368765331
152	24	QTM 1	PATCH	10	22.34	2.64	2.04	8.01	11.6	1	7.57	1.74	1.44	5.48	4.85	0.338854073
153	25	QTM 1	PATCH	10	29.16	3.17	0.72	4.8	15.27	1	13.22	1.76	0.54	3.27	9.44	0.453360768
154	26	QTM 1	PATCH	10	23.6	2.7	0.83	3.37	13.08	1	10.33	1.36	0.66	1.96	7.35	0.437711864
155	27	QTM 1	PATCH	10	23.02	2.4	2.36	7.67	11.17	1	7.62	1.7	1.64	5	4.68	0.331016507
156	28	QTM 1	PATCH	10	24.47	2.45	1.52	9.71	11.41	1	8.51	1.79	1.04	6.91	5.55	0.347772783
162	34	QTM 1	PATCH	10	26.06	3.21	1.11	7.1	14.36	1	10.3	2.06	0.74	5.13	8.02	0.39524175
163	35	QTM 1	PATCH	10	26.45	3.16	0.62	2.82	14.7	1	11.64	1.76	0.48	1.72	8.79	0.440075614
164	36	QTM 1	PATCH	10	24.78	2.15	1.56	6.94	8.53	1	8.47	1.27	1.2	4.23	5.11	0.34180791
165	37	QTM 1	PATCH	10	21.5	1.62	1.34	6.47	6.69	1	7.08	1.06	1.06	4.36	3.56	0.329302326

3.1.2 N261 – Patch Antenna

N261 QTM 0 low channel(27.5GHz)

N261 Low channel(27.5GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	1	QTM 0	PATCH	1	3.03	0.09	2.11	0.03	0.07	1	1.1	0.05	0.9	0.02	0.04	0.363036304
	3	QTM 0	PATCH	1	3.29	0.12	1.79	0.02	0.08	1	1.14	0.07	0.64	0.02	0.06	0.346504559
	5	QTM 0	PATCH	1	3.17	0.08	1.88	0.02	0.09	1	1.1	0.04	0.79	0.02	0.07	0.347003155
	7	QTM 0	PATCH	1	3.23	0.1	2.11	0.03	0.07	1	1.21	0.05	0.96	0.03	0.05	0.374613003
	9	QTM 0	PATCH	1	3.14	0.09	1.94	0.03	0.06	1	1.14	0.06	0.83	0.03	0.04	0.363057325
	14	QTM 0	PATCH	2	6.82	0.28	4.66	0.08	0.07	1	3	0.19	2.26	0.07	0.06	0.439882698
	15	QTM 0	PATCH	2	6.72	0.17	4.47	0.05	0.03	1	3.15	0.08	2.3	0.04	0.02	0.46875
	16	QTM 0	PATCH	2	6.26	0.18	4.46	0.09	0.22	1	2.91	0.09	2.3	0.06	0.16	0.46485623
	17	QTM 0	PATCH	2	4.51	0.28	3.01	0.04	0.23	1	1.36	0.15	1.15	0.03	0.17	0.301552106
	21	QTM 0	PATCH	2	6.75	0.21	4.39	0.06	0.04	1	2.85	0.13	1.98	0.06	0.03	0.422222222
	22	QTM 0	PATCH	2	6.65	0.21	4.64	0.09	0.15	1	3.2	0.1	2.46	0.05	0.1	0.481203008
	23	QTM 0	PATCH	2	5.62	0.3	3.66	0.08	0.26	1	2.14	0.16	1.8	0.05	0.2	0.380782918
	29	QTM 0	PATCH	5	16.53	0.65	10.66	0.18	0.06	1	7.72	0.35	5.53	0.14	0.05	0.467029643
	30	QTM 0	PATCH	5	16.88	0.51	11.81	0.3	0.06	1	9.13	0.3	7.36	0.25	0.04	0.540876777
	31	QTM 0	PATCH	5	16.27	0.52	11.68	0.19	0.18	1	8.74	0.32	7.2	0.12	0.13	0.537185003
	32	QTM 0	PATCH	5	17.33	0.45	11.8	0.19	0.6	1	7.98	0.25	7.06	0.16	0.43	0.460473168
	33	QTM 0	PATCH	5	12.97	0.67	11.25	0.16	1.34	1	5.72	0.37	5.25	0.1	1.05	0.441017733
	38	QTM 0	PATCH	5	17.29	0.58	12.11	0.31	0.04	1	8.85	0.33	7.47	0.25	0.03	0.511856564
	39	QTM 0	PATCH	5	16.37	0.51	11.56	0.23	0.04	1	9.03	0.33	7.21	0.2	0.03	0.551618815
	40	QTM 0	PATCH	5	16.92	0.55	11.72	0.19	0.08	1	8.81	0.33	7.33	0.12	0.07	0.520685579
	41	QTM 0	PATCH	5	16.42	0.42	12.42	0.15	1.46	1	7.35	0.25	6.75	0.1	1.1	0.447624848
	129	QTM 0	PATCH	1	2.82	0.13	2.13	0.03	0.07	1	0.99	0.06	0.84	0.03	0.05	0.35106383
	131	QTM 0	PATCH	1	2.68	0.1	1.95	0.02	0.07	1	0.97	0.06	0.81	0.02	0.06	0.361940299
	133	QTM 0	PATCH	1	3.1	0.11	1.75	0.03	0.13	1	1.12	0.06	0.72	0.02	0.1	0.361290323
	135	QTM 0	PATCH	1	3.43	0.17	1.98	0.03	0.11	1	1.26	0.09	0.81	0.02	0.08	0.367346939
	137	QTM 0	PATCH	1	3.5	0.11	2.13	0.03	0.07	1	1.13	0.06	0.96	0.03	0.06	0.322857143
	142	QTM 0	PATCH	2	5.69	0.2	4.56	0.08	0.09	1	2.07	0.13	1.93	0.07	0.06	0.363796134
	143	QTM 0	PATCH	2	6.64	0.35	5.12	0.06	0.03	1	3.15	0.17	2.58	0.05	0.02	0.47439759
144	QTM 0	PATCH	2	6.2	0.31	4.74	0.07	0.18	1	2.74	0.16	2.46	0.05	0.13	0.441935484	
145	QTM 0	PATCH	2	4.69	0.24	3.45	0.06	0.24	1	1.79	0.14	1.68	0.04	0.18	0.381663113	

	149	QTM 0	PATCH	2	6.29	0.28	4.83	0.07	0.04	1	2.72	0.15	2.21	0.06	0.03	0.432432432
	150	QTM 0	PATCH	2	7.09	0.19	4.8	0.05	0.09	1	3.16	0.1	2.44	0.04	0.07	0.445698166
	151	QTM 0	PATCH	2	5.04	0.23	3.75	0.06	0.24	1	1.99	0.13	1.86	0.04	0.18	0.39484127
	157	QTM 0	PATCH	5	17.89	0.4	13.07	0.15	0.09	1	7.98	0.19	7.41	0.12	0.07	0.446059251
	158	QTM 0	PATCH	5	16.34	0.52	11.19	0.27	0.04	1	8.39	0.31	7.01	0.2	0.03	0.513463892
	159	QTM 0	PATCH	5	16.49	0.61	12.16	0.25	0.07	1	9.47	0.39	7.44	0.2	0.06	0.574287447
	160	QTM 0	PATCH	5	16.62	0.79	11.86	0.14	0.72	1	8.02	0.44	7.06	0.12	0.44	0.482551143
	161	QTM 0	PATCH	5	13.27	1.01	8.85	0.14	1.19	1	4.39	0.57	3.59	0.1	0.98	0.330821402
	166	QTM 0	PATCH	5	17.46	0.39	11.79	0.24	0.06	1	8.51	0.24	7.52	0.21	0.04	0.487399771
	167	QTM 0	PATCH	5	16	0.55	11.54	0.28	0.07	1	8.73	0.34	6.95	0.23	0.06	0.545625
	168	QTM 0	PATCH	5	16.92	0.63	12.24	0.19	0.15	1	9.02	0.34	7.51	0.16	0.05	0.533096927
	169	QTM 0	PATCH	5	14.92	0.9	10.1	0.12	0.94	1	5.88	0.5	5.05	0.08	0.78	0.394101877
129	1	QTM 0	PATCH	2	7.9	0.32	5.44	0.09	0.15	1	2.57	0.15	2.46	0.06	0.11	0.325316456
131	3	QTM 0	PATCH	2	7.05	0.3	4.21	0.06	0.19	1	2.31	0.2	1.75	0.04	0.15	0.327659574
133	5	QTM 0	PATCH	2	7.09	0.24	3.95	0.06	0.23	1	2.43	0.13	1.89	0.05	0.19	0.342736248
135	7	QTM 0	PATCH	2	7.36	0.35	4.37	0.09	0.22	1	2.61	0.2	1.95	0.07	0.17	0.354619565
137	9	QTM 0	PATCH	2	7.42	0.27	4.23	0.11	0.16	1	2.63	0.15	1.85	0.09	0.12	0.354447439
142	14	QTM 0	PATCH	4	11.58	0.6	8.43	0.19	0.23	1	4.67	0.34	4.24	0.17	0.18	0.40328152
143	15	QTM 0	PATCH	4	17.25	0.82	11.41	0.16	0.09	1	6.97	0.38	6.46	0.12	0.06	0.404057971
144	16	QTM 0	PATCH	4	15.85	0.75	11.27	0.28	0.42	1	6.97	0.34	6.62	0.18	0.31	0.439747634
145	17	QTM 0	PATCH	4	7.84	0.55	6.27	0.1	0.64	1	3	0.29	3.04	0.08	0.49	0.387755102
149	21	QTM 0	PATCH	4	17.07	0.53	11.15	0.23	0.12	1	6.73	0.3	5.71	0.17	0.09	0.394258934
150	22	QTM 0	PATCH	4	15.8	0.51	10.03	0.18	0.28	1	6.85	0.29	5.93	0.12	0.21	0.433544304
151	23	QTM 0	PATCH	4	12.59	0.73	8.66	0.24	0.57	1	5.03	0.43	5	0.16	0.43	0.399523431
157	29	QTM 0	PATCH	10	41.74	1.13	28.21	0.46	0.2	1	18.31	0.69	15.48	0.35	0.16	0.438667944
158	30	QTM 0	PATCH	10	39	1.57	26.42	0.76	0.14	1	19.04	0.93	17.88	0.63	0.1	0.488205128
159	31	QTM 0	PATCH	10	38.59	1.7	25.76	0.5	0.31	1	18.92	1.12	17.67	0.43	0.24	0.490282457
160	32	QTM 0	PATCH	10	41.41	1.46	29.3	0.52	1.65	1	18.27	0.85	18.33	0.45	1.06	0.442646704
161	33	QTM 0	PATCH	10	31.22	2.44	23.09	0.51	2.6	1	11.79	1.48	10.84	0.34	2.11	0.377642537
166	38	QTM 0	PATCH	10	41.09	1.53	27.57	0.71	0.14	1	18.92	0.95	18.24	0.62	0.1	0.460452665
167	39	QTM 0	PATCH	10	37.7	1.66	25.41	0.73	0.14	1	18.77	1.09	17.21	0.59	0.12	0.497877984
168	40	QTM 0	PATCH	10	41.06	1.66	28	0.54	0.26	1	19.51	0.98	18.99	0.39	0.2	0.475158305
169	41	QTM 0	PATCH	10	37.21	2.02	27.22	0.48	2.76	1	15.46	1.26	14.83	0.29	2.1	0.41547971

N261 QTM 0 mid channel(28GHz)

N261 middle channel(28GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	1	QTM 0	PATCH	1	3.14	0.09	2.17	0.03	0.08	1	1.18	0.05	0.95	0.02	0.05	0.375796178
	3	QTM 0	PATCH	1	3.46	0.11	1.82	0.02	0.08	1	1.22	0.07	0.65	0.02	0.06	0.352601156
	5	QTM 0	PATCH	1	3.17	0.07	1.89	0.02	0.08	1	1.13	0.04	0.79	0.02	0.07	0.356466877
	7	QTM 0	PATCH	1	3.25	0.1	2.19	0.03	0.08	1	1.22	0.05	0.96	0.02	0.06	0.375384615
	9	QTM 0	PATCH	1	3.19	0.08	2.07	0.03	0.07	1	1.14	0.05	0.89	0.03	0.05	0.357366771
	14	QTM 0	PATCH	2	6.88	0.24	4.87	0.09	0.09	1	3.06	0.17	2.42	0.07	0.07	0.444767442
	15	QTM 0	PATCH	2	6.87	0.15	4.54	0.05	0.03	1	3.31	0.08	2.32	0.04	0.02	0.481804949
	16	QTM 0	PATCH	2	6.5	0.17	4.54	0.08	0.24	1	3.16	0.08	2.35	0.05	0.17	0.486153846
	17	QTM 0	PATCH	2	4.84	0.34	3.36	0.05	0.27	1	1.43	0.18	1.22	0.04	0.21	0.295454545
	21	QTM 0	PATCH	2	6.99	0.2	4.5	0.06	0.05	1	3.04	0.13	2.03	0.05	0.04	0.43490701
	22	QTM 0	PATCH	2	6.79	0.19	4.7	0.08	0.17	1	3.39	0.09	2.49	0.05	0.11	0.499263623
	23	QTM 0	PATCH	2	5.98	0.28	3.77	0.07	0.29	1	2.45	0.15	1.88	0.04	0.22	0.409698997
	29	QTM 0	PATCH	5	17.28	0.66	11.27	0.18	0.13	1	8.17	0.36	6.01	0.13	0.1	0.472800926
	30	QTM 0	PATCH	5	16.98	0.5	12.19	0.3	0.07	1	9.36	0.28	7.49	0.25	0.05	0.551236749
	31	QTM 0	PATCH	5	16.38	0.5	12.02	0.23	0.21	1	8.76	0.3	7.22	0.16	0.16	0.534798535
	32	QTM 0	PATCH	5	18.5	0.48	12.27	0.21	0.63	1	8.66	0.27	7.29	0.19	0.43	0.468108108
	33	QTM 0	PATCH	5	14.64	0.67	11.65	0.15	1.51	1	6.54	0.41	5.52	0.1	1.17	0.446721311
	38	QTM 0	PATCH	5	17.63	0.58	12.56	0.31	0.05	1	9.17	0.32	7.71	0.26	0.03	0.520136132
	39	QTM 0	PATCH	5	16.16	0.46	11.76	0.23	0.04	1	9.04	0.3	7.17	0.2	0.04	0.559405941
	40	QTM 0	PATCH	5	16.89	0.56	11.89	0.21	0.1	1	9.01	0.33	7.28	0.14	0.09	0.533451747
41	QTM 0	PATCH	5	18.31	0.45	12.81	0.13	1.6	1	8.12	0.27	7.04	0.12	1.2	0.443473512	
129	QTM 0	PATCH	1	2.9	0.14	2.26	0.03	0.08	1	1.01	0.07	0.94	0.02	0.05	0.348275862	
131	QTM 0	PATCH	1	2.84	0.09	2.06	0.02	0.08	1	0.98	0.06	0.82	0.02	0.06	0.345070423	
133	QTM 0	PATCH	1	3.25	0.12	1.77	0.03	0.14	1	1.18	0.07	0.7	0.02	0.11	0.363076923	
135	QTM 0	PATCH	1	3.7	0.17	2.13	0.03	0.11	1	1.37	0.1	0.82	0.03	0.09	0.37027027	
137	QTM 0	PATCH	1	3.68	0.11	2.16	0.04	0.07	1	1.2	0.06	0.94	0.03	0.06	0.326086957	
142	QTM 0	PATCH	2	6.09	0.2	4.73	0.07	0.12	1	2.21	0.11	2.01	0.07	0.08	0.362889984	

	143	QTM 0	PATCH	2	6.43	0.35	5.23	0.06	0.03	1	3.06	0.18	2.67	0.05	0.03	0.475894246
	144	QTM 0	PATCH	2	6.21	0.34	4.96	0.06	0.19	1	2.75	0.17	2.63	0.04	0.13	0.442834138
	145	QTM 0	PATCH	2	5.06	0.23	3.75	0.05	0.26	1	1.94	0.14	1.84	0.04	0.18	0.383399209
	149	QTM 0	PATCH	2	6.3	0.28	4.95	0.07	0.05	1	2.74	0.15	2.29	0.05	0.04	0.434920635
	150	QTM 0	PATCH	2	7.48	0.19	4.98	0.06	0.12	1	3.35	0.1	2.4	0.05	0.08	0.447860963
	151	QTM 0	PATCH	2	5.31	0.25	4.04	0.06	0.26	1	2.13	0.14	2.03	0.04	0.18	0.401129944
	157	QTM 0	PATCH	5	19.5	0.41	13.91	0.24	0.07	1	8.71	0.2	8.02	0.18	0.06	0.446666667
	158	QTM 0	PATCH	5	16.53	0.47	11.61	0.3	0.04	1	8.79	0.28	7.01	0.23	0.03	0.531760436
	159	QTM 0	PATCH	5	16.48	0.6	12.46	0.29	0.07	1	9.67	0.37	7.4	0.24	0.06	0.586771845
	160	QTM 0	PATCH	5	17.49	0.96	12.35	0.15	0.85	1	8.63	0.53	7.35	0.12	0.49	0.493424814
	161	QTM 0	PATCH	5	14.42	0.97	8.95	0.13	1.17	1	4.9	0.6	3.76	0.1	0.95	0.339805825
	166	QTM 0	PATCH	5	18.02	0.36	12.08	0.27	0.06	1	8.93	0.21	7.67	0.23	0.05	0.495560488
	167	QTM 0	PATCH	5	16.01	0.47	11.83	0.31	0.06	1	8.9	0.28	6.85	0.25	0.05	0.555902561
	168	QTM 0	PATCH	5	17.15	0.72	12.53	0.21	0.18	1	9.28	0.38	7.53	0.16	0.07	0.541107872
	169	QTM 0	PATCH	5	16.01	0.98	10.48	0.12	1.03	1	6.51	0.57	5.4	0.08	0.78	0.406620862
129	1	QTM 0	PATCH	2	7.98	0.33	5.45	0.09	0.17	1	2.69	0.16	2.5	0.06	0.12	0.337092732
131	3	QTM 0	PATCH	2	7.23	0.27	4.17	0.07	0.22	1	2.37	0.19	1.66	0.05	0.17	0.32780083
133	5	QTM 0	PATCH	2	7.09	0.26	3.91	0.07	0.23	1	2.56	0.15	1.78	0.06	0.18	0.361071932
135	7	QTM 0	PATCH	2	7.52	0.38	4.56	0.09	0.24	1	2.73	0.23	1.88	0.08	0.19	0.363031915
137	9	QTM 0	PATCH	2	7.49	0.27	4.42	0.12	0.17	1	2.63	0.15	1.95	0.1	0.14	0.351134846
142	14	QTM 0	PATCH	4	11.85	0.47	8.72	0.2	0.29	1	4.75	0.26	4.66	0.17	0.23	0.400843882
143	15	QTM 0	PATCH	4	16.76	0.86	11.06	0.16	0.08	1	6.99	0.4	6.17	0.13	0.06	0.417064439
144	16	QTM 0	PATCH	4	15.77	0.81	11.14	0.25	0.46	1	7.11	0.39	6.55	0.17	0.33	0.450856056
145	17	QTM 0	PATCH	4	8.72	0.66	6.88	0.15	0.73	1	3.25	0.36	3.32	0.12	0.57	0.380733945
149	21	QTM 0	PATCH	4	17.21	0.57	11.06	0.22	0.14	1	6.88	0.27	5.64	0.17	0.11	0.399767577
150	22	QTM 0	PATCH	4	16.16	0.49	9.98	0.17	0.33	1	6.99	0.27	5.64	0.11	0.24	0.432549505
151	23	QTM 0	PATCH	4	13.23	0.69	8.78	0.21	0.62	1	5.39	0.4	5.11	0.14	0.44	0.407407407
157	29	QTM 0	PATCH	10	44.05	1.2	29.26	0.67	0.27	1	19.78	0.71	16.16	0.51	0.22	0.449035187
158	30	QTM 0	PATCH	10	38.98	1.5	27.06	0.85	0.14	1	20.18	0.87	17.56	0.7	0.11	0.517701385
159	31	QTM 0	PATCH	10	37.8	1.7	25.93	0.55	0.33	1	19.2	1.08	17.05	0.48	0.26	0.507936508
160	32	QTM 0	PATCH	10	43.76	1.82	30.24	0.53	1.98	1	19.77	0.99	19.14	0.48	1.26	0.45178245
161	33	QTM 0	PATCH	10	34.69	2.48	23.74	0.47	2.82	1	13.62	1.57	11.24	0.32	2.23	0.392620352
166	38	QTM 0	PATCH	10	41.86	1.5	28	0.85	0.15	1	20.08	0.93	18.3	0.74	0.09	0.479694219
167	39	QTM 0	PATCH	10	36.32	1.54	25.3	0.78	0.14	1	19.01	0.96	16.27	0.62	0.12	0.523403084
168	40	QTM 0	PATCH	10	40.44	1.84	27.66	0.57	0.29	1	19.95	1.07	18.41	0.42	0.24	0.493323442
169	41	QTM 0	PATCH	10	41.41	2.26	28.42	0.43	3.15	1	17.47	1.42	15.83	0.3	2.36	0.421878773

N261 QTM 0 high channel(28.35GHz)

N261 high channel(28.35GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	1	QTM 0	PATCH	1	3.17	0.09	2.17	0.02	0.08	1	1.21	0.05	0.98	0.02	0.05	0.38170347
	3	QTM 0	PATCH	1	3.5	0.09	1.85	0.02	0.08	1	1.23	0.06	0.67	0.02	0.06	0.351428571
	5	QTM 0	PATCH	1	3.15	0.08	1.9	0.02	0.09	1	1.11	0.04	0.77	0.02	0.07	0.352380952
	7	QTM 0	PATCH	1	3.27	0.09	2.23	0.02	0.08	1	1.19	0.05	0.97	0.02	0.07	0.363914373
	9	QTM 0	PATCH	1	3.27	0.08	2.16	0.04	0.07	1	1.15	0.05	0.92	0.03	0.06	0.351681957
	14	QTM 0	PATCH	2	6.93	0.24	5.06	0.08	0.1	1	3.1	0.16	2.54	0.07	0.08	0.447330447
	15	QTM 0	PATCH	2	6.93	0.15	4.56	0.05	0.03	1	3.32	0.08	2.35	0.04	0.02	0.479076479
	16	QTM 0	PATCH	2	6.61	0.17	4.59	0.07	0.24	1	3.24	0.08	2.37	0.05	0.17	0.490166415
	17	QTM 0	PATCH	2	5.2	0.32	3.47	0.05	0.29	1	1.53	0.18	1.32	0.04	0.24	0.294230769
	21	QTM 0	PATCH	2	7.06	0.18	4.55	0.06	0.07	1	3.08	0.13	2.08	0.05	0.05	0.436260623
	22	QTM 0	PATCH	2	6.85	0.19	4.72	0.07	0.17	1	3.41	0.09	2.5	0.05	0.11	0.497810219
	23	QTM 0	PATCH	2	6.09	0.26	3.86	0.06	0.3	1	2.61	0.14	1.93	0.04	0.21	0.428571429
	29	QTM 0	PATCH	5	17.55	0.69	11.86	0.18	0.22	1	8.55	0.38	6.45	0.13	0.17	0.487179487
	30	QTM 0	PATCH	5	16.86	0.51	12.37	0.3	0.07	1	9.31	0.27	7.51	0.25	0.05	0.552194543
	31	QTM 0	PATCH	5	16.13	0.51	11.95	0.25	0.19	1	8.52	0.29	7.13	0.18	0.15	0.528208308
	32	QTM 0	PATCH	5	18.91	0.48	12.44	0.23	0.6	1	9.02	0.27	7.41	0.21	0.39	0.476996298
	33	QTM 0	PATCH	5	15.82	0.65	11.87	0.13	1.64	1	6.99	0.4	5.71	0.09	1.26	0.441845765
	38	QTM 0	PATCH	5	17.64	0.58	12.73	0.3	0.05	1	9.2	0.32	7.8	0.25	0.04	0.52154195
	39	QTM 0	PATCH	5	15.89	0.46	11.74	0.23	0.04	1	8.78	0.29	7.09	0.19	0.04	0.552548773
	40	QTM 0	PATCH	5	16.65	0.55	11.85	0.22	0.11	1	8.96	0.32	7.16	0.16	0.09	0.538138138
41	QTM 0	PATCH	5	19.04	0.42	12.74	0.13	1.6	1	8.33	0.25	7.12	0.13	1.19	0.4375	
129	QTM 0	PATCH	1	2.9	0.15	2.32	0.03	0.08	1	1	0.07	1.02	0.02	0.05	0.351724138	
131	QTM 0	PATCH	1	2.92	0.09	2.09	0.02	0.09	1	0.97	0.05	0.83	0.02	0.07	0.332191781	
133	QTM 0	PATCH	1	3.3	0.12	1.8	0.03	0.13	1	1.2	0.07	0.69	0.03	0.1	0.363636364	

	135	QTM 0	PATCH	1	3.81	0.16	2.2	0.03	0.1	1	1.42	0.09	0.84	0.03	0.08	0.372703412
	137	QTM 0	PATCH	1	3.77	0.11	2.18	0.05	0.07	1	1.25	0.06	0.94	0.04	0.05	0.331564987
	142	QTM 0	PATCH	2	6.19	0.2	4.72	0.08	0.13	1	2.3	0.1	2.05	0.06	0.1	0.371567044
	143	QTM 0	PATCH	2	6.29	0.35	5.22	0.06	0.04	1	2.9	0.18	2.74	0.05	0.03	0.461049285
	144	QTM 0	PATCH	2	6.15	0.36	5.07	0.05	0.19	1	2.69	0.19	2.72	0.04	0.13	0.442276423
	145	QTM 0	PATCH	2	5.22	0.25	3.96	0.05	0.27	1	2	0.14	1.94	0.04	0.19	0.383141762
	149	QTM 0	PATCH	2	6.25	0.27	4.93	0.08	0.06	1	2.67	0.15	2.34	0.06	0.04	0.4272
	150	QTM 0	PATCH	2	7.62	0.19	5.07	0.06	0.14	1	3.43	0.11	2.4	0.05	0.09	0.450131234
	151	QTM 0	PATCH	2	5.42	0.28	4.23	0.05	0.26	1	2.16	0.15	2.13	0.03	0.18	0.398523985
	157	QTM 0	PATCH	5	20.23	0.41	14.12	0.31	0.08	1	9.1	0.2	8.17	0.23	0.06	0.44982699
	158	QTM 0	PATCH	5	16.57	0.44	11.82	0.32	0.04	1	8.95	0.26	6.99	0.26	0.03	0.54013277
	159	QTM 0	PATCH	5	16.3	0.63	12.48	0.31	0.07	1	9.46	0.38	7.33	0.27	0.05	0.580368098
	160	QTM 0	PATCH	5	17.8	1.01	12.63	0.14	0.93	1	8.99	0.57	7.53	0.12	0.54	0.50505618
	161	QTM 0	PATCH	5	14.53	0.96	9.03	0.13	1.1	1	5.14	0.57	3.9	0.1	0.91	0.35375086
	166	QTM 0	PATCH	5	18.21	0.35	12.2	0.3	0.08	1	9.19	0.2	7.62	0.25	0.06	0.504667765
	167	QTM 0	PATCH	5	16.01	0.46	11.84	0.34	0.06	1	8.69	0.27	6.78	0.27	0.04	0.542785759
	168	QTM 0	PATCH	5	17.18	0.78	12.78	0.22	0.2	1	9.41	0.41	7.56	0.17	0.09	0.547729919
	169	QTM 0	PATCH	5	16.22	1.03	10.6	0.11	1.1	1	6.83	0.58	5.6	0.09	0.77	0.42108508
129	1	QTM 0	PATCH	2	7.85	0.31	5.36	0.08	0.18	1	2.7	0.15	2.54	0.06	0.12	0.343949045
131	3	QTM 0	PATCH	2	7.19	0.23	4.11	0.08	0.24	1	2.37	0.17	1.65	0.06	0.19	0.329624478
133	5	QTM 0	PATCH	2	7.03	0.28	3.91	0.08	0.26	1	2.58	0.16	1.68	0.07	0.21	0.366998578
135	7	QTM 0	PATCH	2	7.56	0.37	4.68	0.09	0.23	1	2.8	0.22	1.93	0.08	0.18	0.37037037
137	9	QTM 0	PATCH	2	7.58	0.27	4.58	0.14	0.17	1	2.65	0.15	2.01	0.12	0.13	0.349604222
142	14	QTM 0	PATCH	4	11.8	0.42	8.84	0.21	0.34	1	4.9	0.25	4.83	0.17	0.26	0.415254237
143	15	QTM 0	PATCH	4	16.46	0.86	10.77	0.16	0.09	1	6.79	0.4	6.02	0.13	0.07	0.412515188
144	16	QTM 0	PATCH	4	15.71	0.83	11.05	0.22	0.46	1	7.08	0.41	6.5	0.14	0.31	0.450668364
145	17	QTM 0	PATCH	4	9.11	0.6	7.08	0.17	0.77	1	3.29	0.36	3.43	0.13	0.6	0.37650933
149	21	QTM 0	PATCH	4	17.04	0.56	10.85	0.22	0.17	1	6.8	0.29	5.61	0.18	0.13	0.399061033
150	22	QTM 0	PATCH	4	16.21	0.5	9.99	0.16	0.35	1	6.95	0.27	5.49	0.12	0.24	0.428747687
151	23	QTM 0	PATCH	4	13.33	0.6	8.95	0.18	0.65	1	5.61	0.35	5.19	0.12	0.45	0.420855214
157	29	QTM 0	PATCH	10	44.68	1.25	29.83	0.81	0.33	1	20.61	0.72	16.4	0.62	0.26	0.461280215
158	30	QTM 0	PATCH	10	38.59	1.48	27.13	0.91	0.15	1	20.45	0.84	17.12	0.76	0.12	0.529930034
159	31	QTM 0	PATCH	10	36.69	1.77	25.46	0.61	0.3	1	18.73	1.09	16.49	0.53	0.24	0.510493322
160	32	QTM 0	PATCH	10	44.32	1.91	30.31	0.55	2.06	1	20.47	1.04	19.41	0.5	1.32	0.461868231
161	33	QTM 0	PATCH	10	36.39	2.51	24.19	0.43	3	1	14.63	1.54	11.51	0.3	2.31	0.402033526
166	38	QTM 0	PATCH	10	41.74	1.48	28.03	0.95	0.15	1	20.59	0.89	17.97	0.82	0.1	0.493291806
167	39	QTM 0	PATCH	10	35.47	1.57	24.91	0.81	0.14	1	18.6	0.95	15.62	0.65	0.11	0.524386806
168	40	QTM 0	PATCH	10	39.54	1.97	27.21	0.56	0.32	1	19.93	1.13	17.85	0.44	0.24	0.504046535
169	41	QTM 0	PATCH	10	42.66	2.26	28.38	0.4	3.27	1	18.28	1.4	16.2	0.31	2.41	0.428504454

N261 QTM 1 low channel(27.5GHz)

N261 Low channel(27.5GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	0	QTM 1	PATCH	1	3.31	0.09	0.07	0.38	0.58	1	0.97	0.04	0.05	0.18	0.36	0.29305136
	2	QTM 1	PATCH	1	3.2	0.1	0.16	0.23	0.54	1	0.97	0.06	0.1	0.14	0.26	0.303125
	4	QTM 1	PATCH	1	3.19	0.12	0.12	0.21	0.61	1	1.05	0.07	0.07	0.14	0.27	0.329153605
	6	QTM 1	PATCH	1	2.88	0.17	0.05	0.21	0.81	1	0.84	0.1	0.04	0.13	0.33	0.291666667
	8	QTM 1	PATCH	1	2.63	0.12	0.06	0.15	0.74	1	0.78	0.08	0.04	0.11	0.3	0.296577947
	10	QTM 1	PATCH	2	4.8	0.23	0.16	0.34	1.35	1	1.31	0.11	0.12	0.23	0.81	0.272916667
	11	QTM 1	PATCH	2	6.16	0.24	0.18	0.3	1.42	1	2.64	0.14	0.11	0.12	0.69	0.428571429
	12	QTM 1	PATCH	2	6.45	0.24	0.11	0.78	1.58	1	2.55	0.14	0.07	0.48	0.81	0.395348837
	13	QTM 1	PATCH	2	4.85	0.2	0.23	0.49	1.27	1	1.45	0.11	0.15	0.31	0.72	0.298969072
	18	QTM 1	PATCH	2	6.78	0.27	0.39	0.14	1.76	1	2.59	0.18	0.23	0.09	0.75	0.3820059
	19	QTM 1	PATCH	2	6.92	0.27	0.05	0.47	1.73	1	3.12	0.17	0.04	0.25	0.87	0.450867052
	20	QTM 1	PATCH	2	6.03	0.29	0.09	0.47	1.89	1	1.95	0.2	0.07	0.33	0.75	0.323383085
	24	QTM 1	PATCH	5	13.07	0.88	1.3	0.88	4.73	1	4.58	0.4	0.87	0.58	2.81	0.350420811
	25	QTM 1	PATCH	5	14.58	0.75	0.48	0.63	4.7	1	7.34	0.49	0.28	0.45	2.64	0.503429355
	26	QTM 1	PATCH	5	14.82	1.1	0.09	0.37	5.03	1	7.3	0.66	0.07	0.24	3.17	0.492577598
	27	QTM 1	PATCH	5	15.72	0.7	0.23	3.83	5.28	1	6.65	0.4	0.17	2.35	3.14	0.42302799
	28	QTM 1	PATCH	5	11.54	0.51	0.64	2.58	1.92	1	3.36	0.32	0.47	1.89	1.11	0.291161179
	34	QTM 1	PATCH	5	13.31	0.72	1.22	0.85	4.81	1	6.08	0.4	0.76	0.55	2.34	0.456799399
35	QTM 1	PATCH	5	13.6	0.85	0.16	0.6	4.71	1	6.97	0.59	0.12	0.3	2.91	0.5125	
36	QTM 1	PATCH	5	15.41	0.94	0.1	1.9	5.44	1	6.77	0.58	0.07	0.72	3.3	0.439325114	

	37	QTM 1	PATCH	5	12.77	0.41	0.42	3.09	3.22	1	4.39	0.25	0.3	1.89	1.89	0.343774471
	128	QTM 1	PATCH	1	3.03	0.12	0.05	0.52	0.51	1	0.95	0.07	0.04	0.28	0.23	0.313531353
	130	QTM 1	PATCH	1	3.21	0.14	0.06	0.24	0.79	1	1.15	0.09	0.05	0.13	0.39	0.358255452
	132	QTM 1	PATCH	1	3.23	0.1	0.09	0.21	0.71	1	0.99	0.07	0.07	0.11	0.34	0.306501548
	134	QTM 1	PATCH	1	3.42	0.16	0.09	0.37	0.71	1	1.05	0.11	0.06	0.25	0.37	0.307017544
	136	QTM 1	PATCH	1	2.61	0.13	0.1	0.16	0.8	1	0.8	0.1	0.07	0.11	0.45	0.30651341
	138	QTM 1	PATCH	2	5.64	0.32	0.18	0.61	1.51	1	1.65	0.23	0.13	0.3	0.67	0.292553191
	139	QTM 1	PATCH	2	7.87	0.4	0.12	0.19	2.33	1	3	0.29	0.08	0.11	1.05	0.381194409
	140	QTM 1	PATCH	2	6.02	0.26	0.07	1.13	1.5	1	2.75	0.14	0.05	0.68	0.69	0.456810631
	141	QTM 1	PATCH	2	4.4	0.14	0.24	0.55	1.15	1	1.28	0.09	0.18	0.32	0.62	0.290909091
	146	QTM 1	PATCH	2	5.93	0.35	0.36	0.36	1.93	1	1.92	0.23	0.22	0.23	1.19	0.323777403
	147	QTM 1	PATCH	2	5.86	0.39	0.09	0.52	1.83	1	2.5	0.27	0.07	0.32	0.89	0.42662116
	148	QTM 1	PATCH	2	4.78	0.14	0.13	1.26	0.96	1	2	0.08	0.09	0.71	0.56	0.418410042
	152	QTM 1	PATCH	5	13.18	0.5	1.26	1.55	2.98	1	3.3	0.28	0.98	0.82	1.8	0.250379363
	153	QTM 1	PATCH	5	18.02	1.42	0.46	0.39	7.5	1	7.07	1.03	0.25	0.23	4.41	0.392341842
	154	QTM 1	PATCH	5	15.63	0.99	0.12	0.43	5.4	1	7.86	0.71	0.1	0.23	3.27	0.502879079
	155	QTM 1	PATCH	5	13.4	0.54	0.3	4.49	4.45	1	7.51	0.3	0.22	2.61	2.32	0.560447761
	156	QTM 1	PATCH	5	9.54	0.36	0.76	2.35	3.41	1	2.99	0.26	0.57	1.58	1.89	0.313417191
	162	QTM 1	PATCH	5	17.13	0.92	0.85	0.78	6.07	1	5.77	0.64	0.54	0.5	3.49	0.33683596
	163	QTM 1	PATCH	5	16.04	1.3	0.15	0.57	5.85	1	7.67	0.97	0.13	0.34	3.26	0.478179551
	164	QTM 1	PATCH	5	16.42	0.76	0.19	2.37	5.65	1	8.65	0.4	0.14	0.84	4.05	0.52679659
	165	QTM 1	PATCH	5	11.5	0.39	0.31	3.59	3.45	1	4.82	0.21	0.22	2.2	2	0.419130435
128	0	QTM 1	PATCH	2	6.67	0.33	0.21	1.11	1.15	1	2.35	0.16	0.16	0.53	0.68	0.352323838
130	2	QTM 1	PATCH	2	6.93	0.32	0.26	0.55	1.68	1	2.51	0.22	0.19	0.31	0.91	0.362193362
132	4	QTM 1	PATCH	2	6.89	0.31	0.27	0.54	1.42	1	2.44	0.21	0.2	0.34	0.78	0.35413643
134	6	QTM 1	PATCH	2	6.7	0.34	0.15	0.72	1.72	1	2.1	0.24	0.11	0.52	0.78	0.313432836
136	8	QTM 1	PATCH	2	7.18	0.33	0.18	0.46	1.88	1	1.99	0.26	0.14	0.35	0.82	0.277158774
138	10	QTM 1	PATCH	4	9.56	0.73	0.37	1.21	2.99	1	2.83	0.5	0.28	0.69	1.76	0.296025105
139	11	QTM 1	PATCH	4	15.2	0.84	0.35	0.72	4.1	1	6.57	0.58	0.23	0.37	2.23	0.432236842
140	12	QTM 1	PATCH	4	12.98	0.81	0.29	2.06	3.62	1	5.39	0.44	0.2	1.18	1.8	0.415254237
141	13	QTM 1	PATCH	4	9.87	0.43	0.64	1.45	2.48	1	3.07	0.26	0.49	0.91	1.37	0.311043566
146	18	QTM 1	PATCH	4	12.8	0.91	1	0.71	4.37	1	4.64	0.66	0.66	0.47	2.33	0.3625
147	19	QTM 1	PATCH	4	12.98	0.97	0.2	1.26	3.79	1	5.97	0.67	0.15	0.75	1.75	0.459938367
148	20	QTM 1	PATCH	4	10.38	0.49	0.27	2.36	2.76	1	3.49	0.28	0.2	1.34	1.43	0.336223507
152	24	QTM 1	PATCH	10	36.59	1.29	3.21	3.13	9.35	1	12.37	0.59	2.26	2.1	5.84	0.338070511
153	25	QTM 1	PATCH	10	34.49	2.92	1.11	1.41	13.22	1	15.82	2.23	0.56	0.92	7.79	0.458683676
154	26	QTM 1	PATCH	10	34.46	3.16	0.31	1.01	11.71	1	18.47	2.19	0.24	0.57	7.85	0.535983749
155	27	QTM 1	PATCH	10	32.04	1.41	0.67	8.13	10.21	1	16.14	0.83	0.48	4.93	6.38	0.503745318
156	28	QTM 1	PATCH	10	26.74	1.14	1.69	8.56	5.7	1	9.65	0.82	1.32	6.17	3.32	0.360882573
162	34	QTM 1	PATCH	10	34.27	1.83	2.37	2.59	13.06	1	13.8	1.16	1.64	1.78	7.7	0.402684564
163	35	QTM 1	PATCH	10	32.82	3.36	0.46	1.43	11.91	1	17.19	2.6	0.34	0.74	7.03	0.523765996
164	36	QTM 1	PATCH	10	35.14	2.35	0.49	4.5	12.11	1	17.74	1.35	0.36	1.68	7.69	0.504837792
165	37	QTM 1	PATCH	10	30.8	1.12	1.13	8.33	7.53	1	12.43	0.67	0.8	5.56	4.96	0.403571429

N261 QTM 1 mid channel(28GHz)

N261 mid channel(28GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	0	QTM 1	PATCH	1	3.47	0.11	0.08	0.47	0.59	1	1.11	0.06	0.06	0.21	0.38	0.319884726
	2	QTM 1	PATCH	1	3.34	0.08	0.18	0.31	0.48	1	1.11	0.05	0.12	0.19	0.28	0.332335329
	4	QTM 1	PATCH	1	3.38	0.11	0.13	0.24	0.59	1	1.11	0.07	0.08	0.16	0.3	0.328402367
	6	QTM 1	PATCH	1	2.98	0.22	0.06	0.21	0.88	1	0.86	0.13	0.05	0.13	0.4	0.288590604
	8	QTM 1	PATCH	1	2.42	0.12	0.09	0.17	0.78	1	0.77	0.07	0.06	0.13	0.33	0.318181818
	10	QTM 1	PATCH	2	4.91	0.25	0.22	0.38	1.47	1	1.34	0.12	0.15	0.25	0.86	0.272912424
	11	QTM 1	PATCH	2	6.41	0.24	0.19	0.3	1.41	1	2.97	0.14	0.11	0.12	0.7	0.463338534
	12	QTM 1	PATCH	2	6.79	0.21	0.13	0.92	1.57	1	2.88	0.12	0.1	0.59	0.85	0.424153166
	13	QTM 1	PATCH	2	4.97	0.22	0.24	0.46	1.43	1	1.47	0.13	0.16	0.31	0.76	0.295774648
	18	QTM 1	PATCH	2	7.08	0.24	0.38	0.16	1.62	1	2.76	0.17	0.24	0.11	0.8	0.389830508
	19	QTM 1	PATCH	2	7.19	0.2	0.05	0.52	1.63	1	3.39	0.12	0.04	0.3	0.91	0.471488178
	20	QTM 1	PATCH	2	5.7	0.32	0.11	0.5	1.83	1	1.91	0.2	0.08	0.32	0.83	0.335087719
	24	QTM 1	PATCH	5	13.78	0.78	1.45	0.88	4.48	1	5.01	0.37	1	0.57	2.54	0.363570392
	25	QTM 1	PATCH	5	14.66	0.78	0.56	0.64	4.51	1	7.42	0.49	0.32	0.44	2.55	0.506139154
26	QTM 1	PATCH	5	15.43	1.06	0.08	0.33	5.24	1	7.88	0.66	0.07	0.22	3.41	0.510693454	
27	QTM 1	PATCH	5	15.63	0.76	0.27	4.29	5.14	1	7.04	0.43	0.21	2.75	3.32	0.450415867	

	28	QTM 1	PATCH	5	11.39	0.5	0.72	2.78	2.22	1	3.85	0.31	0.52	1.85	1.24	0.338015803
	34	QTM 1	PATCH	5	14.11	0.75	1.32	0.96	4.85	1	6.39	0.42	0.86	0.59	2.27	0.452870305
	35	QTM 1	PATCH	5	14.15	0.86	0.14	0.64	4.73	1	7.29	0.58	0.09	0.3	2.98	0.515194346
	36	QTM 1	PATCH	5	15.61	0.93	0.13	1.82	5.03	1	7.01	0.58	0.1	0.76	3.13	0.449071108
	37	QTM 1	PATCH	5	12.53	0.45	0.5	3.55	3.52	1	5	0.25	0.37	2.21	2.12	0.399042298
	128	QTM 1	PATCH	1	3.02	0.13	0.05	0.44	0.56	1	0.95	0.08	0.04	0.24	0.23	0.314569536
	130	QTM 1	PATCH	1	3.04	0.12	0.07	0.26	0.72	1	1.13	0.08	0.05	0.14	0.38	0.371710526
	132	QTM 1	PATCH	1	3.17	0.08	0.1	0.25	0.66	1	1.04	0.05	0.08	0.14	0.32	0.32807571
	134	QTM 1	PATCH	1	3.56	0.14	0.08	0.4	0.69	1	1.14	0.1	0.05	0.27	0.35	0.320224719
	136	QTM 1	PATCH	1	2.73	0.12	0.1	0.17	0.85	1	0.89	0.09	0.07	0.11	0.48	0.326007326
	138	QTM 1	PATCH	2	5.46	0.28	0.19	0.63	1.41	1	1.74	0.21	0.15	0.34	0.62	0.318681319
	139	QTM 1	PATCH	2	7.56	0.34	0.12	0.24	2.11	1	3.06	0.25	0.08	0.17	1.08	0.404761905
	140	QTM 1	PATCH	2	6	0.3	0.07	0.97	1.58	1	2.83	0.18	0.06	0.6	0.72	0.471666667
	141	QTM 1	PATCH	2	4.31	0.13	0.25	0.66	1.24	1	1.34	0.08	0.19	0.37	0.64	0.310904872
	146	QTM 1	PATCH	2	6.18	0.34	0.34	0.4	1.98	1	2.09	0.24	0.2	0.24	1.18	0.338187702
	147	QTM 1	PATCH	2	6.14	0.31	0.09	0.6	1.8	1	2.74	0.21	0.07	0.37	0.85	0.446254072
	148	QTM 1	PATCH	2	4.74	0.16	0.15	1.13	1.01	1	1.87	0.08	0.11	0.59	0.57	0.394514768
	152	QTM 1	PATCH	5	13.36	0.37	1.09	1.68	3.07	1	3.18	0.22	0.86	1.07	1.84	0.238023952
	153	QTM 1	PATCH	5	18.37	1.18	0.52	0.45	7.17	1	7.59	0.89	0.28	0.23	4.01	0.413173653
	154	QTM 1	PATCH	5	15.62	0.94	0.15	0.48	5.45	1	8.35	0.67	0.11	0.3	3.54	0.534571063
	155	QTM 1	PATCH	5	14.21	0.57	0.32	4.7	4.53	1	7.9	0.31	0.23	2.76	2.66	0.555946517
	156	QTM 1	PATCH	5	8.89	0.33	0.7	2.49	3.54	1	2.59	0.25	0.53	1.28	1.99	0.291338583
	162	QTM 1	PATCH	5	17.52	0.75	0.87	0.93	6.16	1	6.06	0.52	0.5	0.51	3.37	0.345890411
	163	QTM 1	PATCH	5	15.64	1.29	0.12	0.51	5.77	1	7.99	0.98	0.1	0.28	3.34	0.510869565
	164	QTM 1	PATCH	5	16.21	0.74	0.22	2.42	5.42	1	8.6	0.42	0.15	0.8	3.89	0.530536706
	165	QTM 1	PATCH	5	11.93	0.38	0.3	3.52	3.55	1	4.83	0.21	0.2	2.27	2.06	0.404861693
128	0	QTM 1	PATCH	2	6.85	0.4	0.24	1.2	1.27	1	2.45	0.22	0.19	0.57	0.75	0.357664234
130	2	QTM 1	PATCH	2	6.87	0.28	0.29	0.66	1.46	1	2.55	0.19	0.22	0.36	0.86	0.371179039
132	4	QTM 1	PATCH	2	7.02	0.26	0.28	0.66	1.27	1	2.53	0.2	0.19	0.39	0.71	0.36039886
134	6	QTM 1	PATCH	2	6.9	0.34	0.14	0.71	1.74	1	2.3	0.23	0.11	0.51	0.83	0.333333333
136	8	QTM 1	PATCH	2	6.94	0.32	0.2	0.49	1.92	1	2.14	0.22	0.15	0.35	1.01	0.308357349
138	10	QTM 1	PATCH	4	9.6	0.65	0.42	1.2	3.25	1	2.95	0.47	0.32	0.7	1.77	0.307291667
139	11	QTM 1	PATCH	4	15.21	0.77	0.37	0.82	3.67	1	6.82	0.55	0.25	0.5	2.17	0.448389218
140	12	QTM 1	PATCH	4	13.14	0.83	0.27	2.2	3.46	1	5.85	0.45	0.19	1.25	1.95	0.445205479
141	13	QTM 1	PATCH	4	9.82	0.42	0.63	1.44	2.49	1	2.71	0.25	0.48	0.86	1.42	0.275967413
146	18	QTM 1	PATCH	4	13.3	0.86	1	0.71	4.51	1	5.16	0.64	0.65	0.49	2.3	0.387969925
147	19	QTM 1	PATCH	4	13.63	0.77	0.2	1.36	3.65	1	6.54	0.52	0.15	0.83	1.59	0.479823918
148	20	QTM 1	PATCH	4	10.21	0.56	0.34	2.25	2.67	1	3.21	0.33	0.26	1.19	1.25	0.314397649
152	24	QTM 1	PATCH	10	37.37	1.26	3.4	3.75	9.19	1	12.41	0.54	2.4	2.53	5.71	0.33208456
153	25	QTM 1	PATCH	10	35.01	2.56	1.38	1.38	12.96	1	17.01	2.03	0.65	0.87	7.33	0.485861183
154	26	QTM 1	PATCH	10	34.39	2.96	0.38	1.28	11.87	1	18.99	2.06	0.3	0.78	8.14	0.552195406
155	27	QTM 1	PATCH	10	33.5	1.53	0.89	9.1	10.58	1	17.05	0.87	0.62	5.57	6.62	0.508955224
156	28	QTM 1	PATCH	10	23.65	1.11	1.67	7.45	6.86	1	9.18	0.79	1.3	5.49	3.91	0.388160677
162	34	QTM 1	PATCH	10	34.24	1.87	2.45	2.72	13.71	1	14.59	1.07	1.69	1.78	7.6	0.426109813
163	35	QTM 1	PATCH	10	32.69	3.29	0.38	1.49	11.46	1	17.45	2.6	0.27	0.8	7.19	0.533802386
164	36	QTM 1	PATCH	10	35.38	2.27	0.51	4.37	11.58	1	18.16	1.32	0.34	1.61	7.68	0.513284341
165	37	QTM 1	PATCH	10	30.38	1.11	1.2	8.1	8.22	1	13.23	0.68	0.84	5.1	5.37	0.435483871

N261 QTM 1 high channel(28.35GHz)

N261 high channel(28.35GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N261	0	QTM 1	PATCH	1	3.57	0.12	0.07	0.53	0.58	1	1.19	0.07	0.06	0.25	0.36	0.333333333
	2	QTM 1	PATCH	1	3.33	0.09	0.17	0.35	0.48	1	1.18	0.05	0.12	0.22	0.29	0.354354354
	4	QTM 1	PATCH	1	3.44	0.1	0.15	0.24	0.59	1	1.17	0.06	0.08	0.17	0.33	0.340116279
	6	QTM 1	PATCH	1	3.05	0.21	0.06	0.22	0.88	1	0.85	0.13	0.05	0.13	0.44	0.278688525
	8	QTM 1	PATCH	1	2.29	0.13	0.1	0.18	0.8	1	0.79	0.07	0.07	0.14	0.36	0.344978166
	10	QTM 1	PATCH	2	4.89	0.24	0.25	0.42	1.52	1	1.43	0.12	0.18	0.3	0.87	0.292433538
	11	QTM 1	PATCH	2	6.56	0.25	0.16	0.3	1.43	1	3.18	0.15	0.1	0.11	0.73	0.484756098
	12	QTM 1	PATCH	2	6.83	0.19	0.14	0.97	1.59	1	2.97	0.1	0.11	0.64	0.91	0.434846266
	13	QTM 1	PATCH	2	4.87	0.2	0.23	0.49	1.37	1	1.51	0.12	0.16	0.29	0.7	0.310061602
	18	QTM 1	PATCH	2	7.13	0.23	0.4	0.23	1.57	1	2.91	0.16	0.23	0.16	0.87	0.408134642
	19	QTM 1	PATCH	2	7.23	0.16	0.05	0.52	1.61	1	3.52	0.09	0.04	0.31	0.93	0.486860304
	20	QTM 1	PATCH	2	5.49	0.32	0.13	0.5	1.74	1	1.89	0.21	0.1	0.34	0.86	0.344262295
	24	QTM 1	PATCH	5	13.38	0.69	1.41	1.28	4.15	1	5.09	0.35	0.98	0.71	2.25	0.380418535

	25	QTM 1	PATCH	5	14.69	0.84	0.53	0.62	4.57	1	7.43	0.5	0.3	0.4	2.74	0.505786249
	26	QTM 1	PATCH	5	15.71	1.04	0.09	0.4	5.36	1	8.16	0.67	0.07	0.28	3.5	0.519414386
	27	QTM 1	PATCH	5	15.25	0.74	0.3	4.24	4.71	1	6.92	0.43	0.24	2.78	3.08	0.453770492
	28	QTM 1	PATCH	5	11.22	0.45	0.73	3.04	2.4	1	4	0.28	0.55	1.84	1.37	0.356506239
	34	QTM 1	PATCH	5	14.28	0.81	1.31	1.05	4.75	1	6.46	0.41	0.88	0.63	2.22	0.452380952
	35	QTM 1	PATCH	5	14.53	0.83	0.15	0.65	4.78	1	7.63	0.57	0.11	0.33	2.98	0.52512044
	36	QTM 1	PATCH	5	16	0.97	0.15	1.83	5.04	1	7.3	0.63	0.12	0.77	3.26	0.45625
	37	QTM 1	PATCH	5	12.22	0.45	0.61	3.77	3.46	1	5.03	0.24	0.45	2.28	2.15	0.411620295
	128	QTM 1	PATCH	1	3.11	0.14	0.05	0.43	0.62	1	1.02	0.09	0.04	0.24	0.23	0.327974277
	130	QTM 1	PATCH	1	2.98	0.12	0.07	0.28	0.74	1	1.08	0.08	0.05	0.15	0.38	0.362416107
	132	QTM 1	PATCH	1	3.08	0.07	0.09	0.28	0.64	1	1.05	0.05	0.07	0.18	0.31	0.340909091
	134	QTM 1	PATCH	1	3.55	0.11	0.07	0.39	0.68	1	1.14	0.07	0.04	0.26	0.36	0.321126761
	136	QTM 1	PATCH	1	2.75	0.12	0.1	0.17	0.87	1	0.93	0.09	0.08	0.11	0.49	0.338181818
	138	QTM 1	PATCH	2	5.66	0.31	0.19	0.62	1.55	1	1.83	0.24	0.15	0.35	0.63	0.323321555
	139	QTM 1	PATCH	2	7.39	0.34	0.12	0.23	2.06	1	3	0.24	0.09	0.17	1.04	0.405953992
	140	QTM 1	PATCH	2	5.95	0.32	0.07	1.04	1.64	1	2.88	0.18	0.05	0.65	0.78	0.484033613
	141	QTM 1	PATCH	2	4.31	0.13	0.26	0.75	1.17	1	1.48	0.08	0.2	0.49	0.61	0.343387471
	146	QTM 1	PATCH	2	6.25	0.31	0.32	0.43	1.99	1	2.18	0.21	0.21	0.24	1.15	0.3488
	147	QTM 1	PATCH	2	6.14	0.25	0.09	0.62	1.71	1	2.84	0.16	0.07	0.41	0.82	0.462540717
	148	QTM 1	PATCH	2	4.88	0.17	0.14	1.16	1.03	1	1.96	0.08	0.11	0.64	0.56	0.401639344
	152	QTM 1	PATCH	5	13.3	0.37	1.02	1.64	3.08	1	3.09	0.24	0.77	1.12	1.77	0.232330827
	153	QTM 1	PATCH	5	18.51	1.08	0.54	0.41	7.22	1	7.67	0.82	0.26	0.2	3.9	0.41437061
	154	QTM 1	PATCH	5	15.18	0.92	0.16	0.53	5.29	1	8.3	0.65	0.12	0.33	3.49	0.546772069
	155	QTM 1	PATCH	5	14.74	0.53	0.28	4.98	4.45	1	8.26	0.32	0.21	3.06	2.78	0.560379919
	156	QTM 1	PATCH	5	8.75	0.32	0.74	2.47	3.35	1	2.67	0.22	0.55	1.27	1.86	0.305142857
	162	QTM 1	PATCH	5	17.41	0.76	0.94	0.9	6.22	1	6.12	0.52	0.52	0.48	3.36	0.351522114
	163	QTM 1	PATCH	5	15.66	1.2	0.15	0.47	5.82	1	8	0.92	0.13	0.25	3.45	0.510855683
	164	QTM 1	PATCH	5	15.89	0.74	0.23	2.43	5.26	1	8.45	0.42	0.15	0.83	3.69	0.531780994
	165	QTM 1	PATCH	5	12.35	0.39	0.36	4.06	3.19	1	5.28	0.2	0.24	2.76	1.76	0.427530364
128	0	QTM 1	PATCH	2	7.04	0.46	0.23	1.23	1.5	1	2.53	0.27	0.18	0.6	0.78	0.359375
130	2	QTM 1	PATCH	2	6.77	0.28	0.28	0.76	1.41	1	2.52	0.18	0.22	0.43	0.84	0.372230428
132	4	QTM 1	PATCH	2	7.07	0.23	0.27	0.7	1.3	1	2.59	0.18	0.18	0.43	0.71	0.366336634
134	6	QTM 1	PATCH	2	6.89	0.32	0.16	0.72	1.77	1	2.29	0.2	0.12	0.52	0.86	0.332365747
136	8	QTM 1	PATCH	2	6.69	0.34	0.24	0.52	2.07	1	2.2	0.22	0.18	0.36	1.13	0.328849028
138	10	QTM 1	PATCH	4	10.02	0.68	0.46	1.22	3.67	1	3.23	0.5	0.35	0.72	1.84	0.322355289
139	11	QTM 1	PATCH	4	15.02	0.82	0.36	0.75	3.57	1	6.94	0.6	0.24	0.49	2.11	0.462050599
140	12	QTM 1	PATCH	4	13.31	0.79	0.29	2.26	3.46	1	5.99	0.42	0.2	1.29	2	0.450037566
141	13	QTM 1	PATCH	4	9.88	0.39	0.64	1.52	2.47	1	2.67	0.27	0.47	0.96	1.39	0.270242915
146	18	QTM 1	PATCH	4	13.28	0.73	0.97	0.73	4.26	1	5.29	0.53	0.63	0.54	2.12	0.398343373
147	19	QTM 1	PATCH	4	13.66	0.63	0.2	1.36	3.46	1	6.85	0.41	0.15	0.85	1.66	0.501464129
148	20	QTM 1	PATCH	4	10.2	0.59	0.39	2.27	2.54	1	3.22	0.36	0.29	1.34	1.34	0.315686275
152	24	QTM 1	PATCH	10	35.79	1.07	3.38	4.19	8.02	1	11.97	0.62	2.36	2.86	4.95	0.334450964
153	25	QTM 1	PATCH	10	35.31	2.45	1.36	1.24	13.42	1	17.19	1.97	0.63	0.74	7.13	0.486830926
154	26	QTM 1	PATCH	10	33.77	2.86	0.39	1.34	11.65	1	19.04	2.02	0.3	0.85	7.97	0.563814036
155	27	QTM 1	PATCH	10	33.41	1.47	0.94	9.55	10.27	1	17.15	0.87	0.69	6.03	6.28	0.513319365
156	28	QTM 1	PATCH	10	22.32	1.05	1.67	7.4	7.04	1	9.35	0.67	1.31	5.2	4.06	0.41890681
162	34	QTM 1	PATCH	10	33.59	1.93	2.55	2.74	13.56	1	15.16	1.11	1.71	1.73	7.26	0.451324799
163	35	QTM 1	PATCH	10	32.73	3.03	0.4	1.39	11.43	1	17.51	2.44	0.27	0.77	7.46	0.534983196
164	36	QTM 1	PATCH	10	35.54	2.26	0.48	4.39	11.75	1	18.46	1.36	0.34	1.72	7.9	0.519414744
165	37	QTM 1	PATCH	10	29.16	1.07	1.23	8.89	7.83	1	13.56	0.63	0.88	5.96	5.07	0.465020576

3.1.3 N257 – Patch Antenna

N257 QTM 0 low channel(26.5GHz)

N257 Low channel(26.55GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N257	1	QTM 0	PATCH	1	2.84	0.1	2.04	0.03	0.05	1	0.97	0.05	0.84	0.02	0.04	0.341549296
	3	QTM 0	PATCH	1	3.03	0.11	1.8	0.03	0.07	1	1.05	0.06	0.68	0.02	0.05	0.346534653
	5	QTM 0	PATCH	1	2.99	0.08	1.88	0.02	0.1	1	1.02	0.04	0.77	0.02	0.08	0.341137124
	7	QTM 0	PATCH	1	3.29	0.12	2.12	0.03	0.08	1	1.19	0.06	0.95	0.03	0.06	0.361702128
	9	QTM 0	PATCH	1	3.28	0.15	1.91	0.04	0.06	1	1.16	0.09	0.77	0.03	0.04	0.353658537
	14	QTM 0	PATCH	2	6.87	0.42	4.44	0.1	0.07	1	3.04	0.25	2.09	0.09	0.05	0.442503639
	15	QTM 0	PATCH	2	6.46	0.17	4.49	0.06	0.03	1	2.87	0.08	2.32	0.04	0.02	0.444272446
	16	QTM 0	PATCH	2	5.79	0.17	4.41	0.12	0.18	1	2.56	0.08	2.28	0.07	0.13	0.442141623
	17	QTM 0	PATCH	2	4.67	0.4	3	0.04	0.24	1	1.48	0.2	1.29	0.04	0.17	0.316916488
	21	QTM 0	PATCH	2	6.32	0.19	4.3	0.07	0.05	1	2.59	0.11	1.92	0.06	0.04	0.409810127

	22	QTM 0	PATCH	2	6.31	0.2	4.64	0.11	0.13	1	2.86	0.1	2.49	0.06	0.09	0.453248811
	23	QTM 0	PATCH	2	5.03	0.3	3.58	0.09	0.22	1	1.84	0.16	1.75	0.06	0.16	0.365805169
	29	QTM 0	PATCH	5	15.06	0.71	9.88	0.19	0.11	1	7.59	0.37	4.91	0.14	0.08	0.503984064
	30	QTM 0	PATCH	5	16.64	0.51	11.5	0.29	0.05	1	8.84	0.31	7.13	0.23	0.04	0.53125
	31	QTM 0	PATCH	5	16.38	0.54	11.41	0.16	0.19	1	8.39	0.32	7.17	0.12	0.14	0.512210012
	32	QTM 0	PATCH	5	16.31	0.53	11.99	0.22	0.68	1	7.93	0.26	7.14	0.14	0.47	0.486204782
	33	QTM 0	PATCH	5	10.9	0.79	10.44	0.16	1.19	1	4.69	0.44	5.03	0.09	0.91	0.46146789
	38	QTM 0	PATCH	5	16.14	0.58	11.15	0.32	0.06	1	8.27	0.34	6.77	0.29	0.05	0.512391574
	39	QTM 0	PATCH	5	16.6	0.54	11.4	0.24	0.06	1	8.84	0.33	7.11	0.19	0.04	0.53253012
	40	QTM 0	PATCH	5	16.83	0.57	11.8	0.15	0.14	1	8.53	0.33	7.42	0.12	0.12	0.506833036
	41	QTM 0	PATCH	5	14.23	0.5	12.12	0.19	1.41	1	6.86	0.32	6.71	0.11	1.02	0.482080112
	129	QTM 0	PATCH	1	2.76	0.08	1.95	0.04	0.06	1	1.02	0.05	0.73	0.02	0.05	0.369565217
	131	QTM 0	PATCH	1	2.58	0.09	1.81	0.02	0.07	1	0.94	0.05	0.8	0.02	0.06	0.364341085
	133	QTM 0	PATCH	1	2.91	0.09	1.77	0.02	0.11	1	1.01	0.05	0.74	0.02	0.09	0.347079038
	135	QTM 0	PATCH	1	3.2	0.1	1.98	0.02	0.08	1	1.15	0.06	0.83	0.02	0.07	0.359375
	137	QTM 0	PATCH	1	3.21	0.09	2.11	0.03	0.06	1	1.06	0.05	0.97	0.02	0.05	0.330218069
	142	QTM 0	PATCH	2	5.18	0.21	4.22	0.06	0.06	1	2.05	0.14	1.74	0.05	0.05	0.395752896
	143	QTM 0	PATCH	2	7.03	0.27	4.86	0.07	0.05	1	3.15	0.15	2.41	0.06	0.04	0.448079659
	144	QTM 0	PATCH	2	6.34	0.23	4.61	0.07	0.19	1	2.78	0.13	2.31	0.05	0.16	0.438485804
	145	QTM 0	PATCH	2	4.46	0.22	3.34	0.06	0.24	1	1.79	0.12	1.58	0.04	0.2	0.401345291
	149	QTM 0	PATCH	2	6.37	0.21	4.54	0.07	0.02	1	2.7	0.11	2.09	0.06	0.02	0.423861852
	150	QTM 0	PATCH	2	6.57	0.16	4.56	0.05	0.07	1	2.99	0.08	2.49	0.04	0.05	0.455098935
	151	QTM 0	PATCH	2	4.9	0.19	3.65	0.06	0.24	1	2.01	0.11	1.75	0.04	0.2	0.410204082
	157	QTM 0	PATCH	5	15.49	0.39	12.13	0.11	0.05	1	7.28	0.17	6.72	0.08	0.04	0.469980633
	158	QTM 0	PATCH	5	15.92	0.47	11	0.23	0.07	1	7.97	0.29	7.05	0.19	0.06	0.500628141
	159	QTM 0	PATCH	5	16.6	0.5	12	0.19	0.1	1	8.83	0.33	7.59	0.14	0.08	0.531927711
	160	QTM 0	PATCH	5	16.62	0.54	12.07	0.11	0.72	1	8.08	0.29	6.91	0.08	0.48	0.486161252
	161	QTM 0	PATCH	5	12.31	0.88	9.38	0.13	1.32	1	4.33	0.45	3.77	0.09	1.11	0.351746548
	166	QTM 0	PATCH	5	16.11	0.33	11.65	0.19	0.06	1	8.31	0.2	7.15	0.16	0.03	0.515828678
	167	QTM 0	PATCH	5	15.81	0.57	11.02	0.21	0.08	1	7.81	0.36	6.98	0.16	0.06	0.493991145
	168	QTM 0	PATCH	5	16.95	0.44	12.27	0.15	0.13	1	8.86	0.24	7.58	0.12	0.05	0.522713864
	169	QTM 0	PATCH	5	14.41	0.7	10.43	0.12	1.05	1	5.83	0.35	4.92	0.07	0.92	0.404580153
129	1	QTM 0	PATCH	2	7.53	0.25	5.4	0.11	0.13	1	2.43	0.15	2.39	0.07	0.1	0.322709163
131	3	QTM 0	PATCH	2	6.77	0.28	4.33	0.07	0.18	1	2.24	0.17	2.06	0.05	0.14	0.330871492
133	5	QTM 0	PATCH	2	7.03	0.19	4.28	0.05	0.24	1	2.32	0.1	2.02	0.04	0.2	0.330014225
135	7	QTM 0	PATCH	2	7.68	0.28	4.66	0.06	0.18	1	2.69	0.16	2.13	0.05	0.14	0.350260417
137	9	QTM 0	PATCH	2	7.57	0.33	4.57	0.08	0.12	1	2.51	0.19	2.14	0.07	0.09	0.331571995
142	14	QTM 0	PATCH	4	11.34	0.83	8.17	0.2	0.18	1	5.29	0.48	3.87	0.17	0.15	0.4664903
143	15	QTM 0	PATCH	4	17.93	0.69	12.31	0.2	0.12	1	7.05	0.32	7	0.13	0.07	0.393195761
144	16	QTM 0	PATCH	4	15.75	0.56	11.8	0.35	0.43	1	6.8	0.31	6.88	0.22	0.35	0.436825397
145	17	QTM 0	PATCH	4	7.89	0.63	5.73	0.13	0.61	1	3.05	0.31	2.85	0.09	0.48	0.386565272
149	21	QTM 0	PATCH	4	16.72	0.47	11.35	0.2	0.09	1	6.82	0.26	5.77	0.15	0.07	0.407894737
150	22	QTM 0	PATCH	4	15.15	0.46	10.37	0.21	0.26	1	6.6	0.24	6.38	0.13	0.17	0.435643564
151	23	QTM 0	PATCH	4	11.61	0.7	8.96	0.29	0.58	1	4.91	0.4	5.05	0.18	0.47	0.434969854
157	29	QTM 0	PATCH	10	36.61	1.18	27.7	0.39	0.21	1	17.87	0.64	14.76	0.27	0.17	0.488118001
158	30	QTM 0	PATCH	10	37.89	1.49	26.1	0.61	0.2	1	17.84	0.88	17.92	0.51	0.17	0.472948007
159	31	QTM 0	PATCH	10	39.95	1.53	27.53	0.44	0.35	1	18.37	0.95	19.54	0.35	0.27	0.489111389
160	32	QTM 0	PATCH	10	40.98	1.05	30.5	0.56	1.62	1	19.52	0.69	18.3	0.36	1.12	0.476329917
161	33	QTM 0	PATCH	10	27.63	2.44	23.71	0.54	2.66	1	11.61	1.34	11.76	0.33	2.14	0.425624321
166	38	QTM 0	PATCH	10	37.74	1.38	26.95	0.55	0.19	1	18.18	0.84	17.22	0.46	0.13	0.481717011
167	39	QTM 0	PATCH	10	38.53	1.67	26.27	0.64	0.17	1	17.86	1.07	18.5	0.57	0.13	0.480145341
168	40	QTM 0	PATCH	10	40.98	1.2	29.09	0.47	0.27	1	19.48	0.69	19.56	0.34	0.22	0.477306003
169	41	QTM 0	PATCH	10	34.9	1.8	28.53	0.54	2.9	1	16.18	1.09	15.57	0.32	2.19	0.463610315

N257 QTM 0 mid channel(28GHz)

N257 middle channel(28GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N257	1	QTM 0	PATCH	1	3.14	0.09	2.17	0.03	0.08	1	1.18	0.05	0.95	0.02	0.05	0.375796178
	3	QTM 0	PATCH	1	3.46	0.11	1.82	0.02	0.08	1	1.22	0.07	0.65	0.02	0.06	0.352601156
	5	QTM 0	PATCH	1	3.17	0.07	1.89	0.02	0.08	1	1.13	0.04	0.79	0.02	0.07	0.356466877
	7	QTM 0	PATCH	1	3.25	0.1	2.19	0.03	0.08	1	1.22	0.05	0.96	0.02	0.06	0.375384615
	9	QTM 0	PATCH	1	3.19	0.08	2.07	0.03	0.07	1	1.14	0.05	0.89	0.03	0.05	0.357366771
	14	QTM 0	PATCH	2	6.88	0.24	4.87	0.09	0.09	1	3.06	0.17	2.42	0.07	0.07	0.444767442
	15	QTM 0	PATCH	2	6.87	0.15	4.54	0.05	0.03	1	3.31	0.08	2.32	0.04	0.02	0.481804949

	16	QTM 0	PATCH	2	6.5	0.17	4.54	0.08	0.24	1	3.16	0.08	2.35	0.05	0.17	0.486153846
	17	QTM 0	PATCH	2	4.84	0.34	3.36	0.05	0.27	1	1.43	0.18	1.22	0.04	0.21	0.295454545
	21	QTM 0	PATCH	2	6.99	0.2	4.5	0.06	0.05	1	3.04	0.13	2.03	0.05	0.04	0.43490701
	22	QTM 0	PATCH	2	6.79	0.19	4.7	0.08	0.17	1	3.39	0.09	2.49	0.05	0.11	0.499263623
	23	QTM 0	PATCH	2	5.98	0.28	3.77	0.07	0.29	1	2.45	0.15	1.88	0.04	0.22	0.409698997
	29	QTM 0	PATCH	5	17.28	0.66	11.27	0.18	0.13	1	8.17	0.36	6.01	0.13	0.1	0.472800926
	30	QTM 0	PATCH	5	16.98	0.5	12.19	0.3	0.07	1	9.36	0.28	7.49	0.25	0.05	0.551236749
	31	QTM 0	PATCH	5	16.38	0.5	12.02	0.23	0.21	1	8.76	0.3	7.22	0.16	0.16	0.534798535
	32	QTM 0	PATCH	5	18.5	0.48	12.27	0.21	0.63	1	8.66	0.27	7.29	0.19	0.43	0.468108108
	33	QTM 0	PATCH	5	14.64	0.67	11.65	0.15	1.51	1	6.54	0.41	5.52	0.1	1.17	0.446721311
	38	QTM 0	PATCH	5	17.63	0.58	12.56	0.31	0.05	1	9.17	0.32	7.71	0.26	0.03	0.520136132
	39	QTM 0	PATCH	5	16.16	0.46	11.76	0.23	0.04	1	9.04	0.3	7.17	0.2	0.04	0.559405941
	40	QTM 0	PATCH	5	16.89	0.56	11.89	0.21	0.1	1	9.01	0.33	7.28	0.14	0.09	0.533451747
	41	QTM 0	PATCH	5	18.31	0.45	12.81	0.13	1.6	1	8.12	0.27	7.04	0.12	1.2	0.443473512
	129	QTM 0	PATCH	1	2.9	0.14	2.26	0.03	0.08	1	1.01	0.07	0.94	0.02	0.05	0.348275862
	131	QTM 0	PATCH	1	2.84	0.09	2.06	0.02	0.08	1	0.98	0.06	0.82	0.02	0.06	0.345070423
	133	QTM 0	PATCH	1	3.25	0.12	1.77	0.03	0.14	1	1.18	0.07	0.7	0.02	0.11	0.363076923
	135	QTM 0	PATCH	1	3.7	0.17	2.13	0.03	0.11	1	1.37	0.1	0.82	0.03	0.09	0.37027027
	137	QTM 0	PATCH	1	3.68	0.11	2.16	0.04	0.07	1	1.2	0.06	0.94	0.03	0.06	0.326086957
	142	QTM 0	PATCH	2	6.09	0.2	4.73	0.07	0.12	1	2.21	0.11	2.01	0.07	0.08	0.362889984
	143	QTM 0	PATCH	2	6.43	0.35	5.23	0.06	0.03	1	3.06	0.18	2.67	0.05	0.03	0.475894246
	144	QTM 0	PATCH	2	6.21	0.34	4.96	0.06	0.19	1	2.75	0.17	2.63	0.04	0.13	0.442834138
	145	QTM 0	PATCH	2	5.06	0.23	3.75	0.05	0.26	1	1.94	0.14	1.84	0.04	0.18	0.383399209
	149	QTM 0	PATCH	2	6.3	0.28	4.95	0.07	0.05	1	2.74	0.15	2.29	0.05	0.04	0.434920635
	150	QTM 0	PATCH	2	7.48	0.19	4.98	0.06	0.12	1	3.35	0.1	2.4	0.05	0.08	0.447860963
	151	QTM 0	PATCH	2	5.31	0.25	4.04	0.06	0.26	1	2.13	0.14	2.03	0.04	0.18	0.401129944
	157	QTM 0	PATCH	5	19.5	0.41	13.91	0.24	0.07	1	8.71	0.2	8.02	0.18	0.06	0.446666667
	158	QTM 0	PATCH	5	16.53	0.47	11.61	0.3	0.04	1	8.79	0.28	7.01	0.23	0.03	0.531760436
	159	QTM 0	PATCH	5	16.48	0.6	12.46	0.29	0.07	1	9.67	0.37	7.4	0.24	0.06	0.586771845
	160	QTM 0	PATCH	5	17.49	0.96	12.35	0.15	0.85	1	8.63	0.53	7.35	0.12	0.49	0.493424814
	161	QTM 0	PATCH	5	14.42	0.97	8.95	0.13	1.17	1	4.9	0.6	3.76	0.1	0.95	0.339805825
	166	QTM 0	PATCH	5	18.02	0.36	12.08	0.27	0.06	1	8.93	0.21	7.67	0.23	0.05	0.495560488
	167	QTM 0	PATCH	5	16.01	0.47	11.83	0.31	0.06	1	8.9	0.28	6.85	0.25	0.05	0.555902561
	168	QTM 0	PATCH	5	17.15	0.72	12.53	0.21	0.18	1	9.28	0.38	7.53	0.16	0.07	0.541107872
	169	QTM 0	PATCH	5	16.01	0.98	10.48	0.12	1.03	1	6.51	0.57	5.4	0.08	0.78	0.406620862
129	1	QTM 0	PATCH	2	7.98	0.33	5.45	0.09	0.17	1	2.69	0.16	2.5	0.06	0.12	0.337092732
131	3	QTM 0	PATCH	2	7.23	0.27	4.17	0.07	0.22	1	2.37	0.19	1.66	0.05	0.17	0.32780083
133	5	QTM 0	PATCH	2	7.09	0.26	3.91	0.07	0.23	1	2.56	0.15	1.78	0.06	0.18	0.361071932
135	7	QTM 0	PATCH	2	7.52	0.38	4.56	0.09	0.24	1	2.73	0.23	1.88	0.08	0.19	0.363031915
137	9	QTM 0	PATCH	2	7.49	0.27	4.42	0.12	0.17	1	2.63	0.15	1.95	0.1	0.14	0.351134846
142	14	QTM 0	PATCH	4	11.85	0.47	8.72	0.2	0.29	1	4.75	0.26	4.66	0.17	0.23	0.400843882
143	15	QTM 0	PATCH	4	16.76	0.86	11.06	0.16	0.08	1	6.99	0.4	6.17	0.13	0.06	0.417064439
144	16	QTM 0	PATCH	4	15.77	0.81	11.14	0.25	0.46	1	7.11	0.39	6.55	0.17	0.33	0.450856056
145	17	QTM 0	PATCH	4	8.72	0.66	6.88	0.15	0.73	1	3.25	0.36	3.32	0.12	0.57	0.380733945
149	21	QTM 0	PATCH	4	17.21	0.57	11.06	0.22	0.14	1	6.88	0.27	5.64	0.17	0.11	0.399767577
150	22	QTM 0	PATCH	4	16.16	0.49	9.98	0.17	0.33	1	6.99	0.27	5.64	0.11	0.24	0.432549505
151	23	QTM 0	PATCH	4	13.23	0.69	8.78	0.21	0.62	1	5.39	0.4	5.11	0.14	0.44	0.407407407
157	29	QTM 0	PATCH	10	44.05	1.2	29.26	0.67	0.27	1	19.78	0.71	16.16	0.51	0.22	0.449035187
158	30	QTM 0	PATCH	10	38.98	1.5	27.06	0.85	0.14	1	20.18	0.87	17.56	0.7	0.11	0.517701385
159	31	QTM 0	PATCH	10	37.8	1.7	25.93	0.55	0.33	1	19.2	1.08	17.05	0.48	0.26	0.507936508
160	32	QTM 0	PATCH	10	43.76	1.82	30.24	0.53	1.98	1	19.77	0.99	19.14	0.48	1.26	0.45178245
161	33	QTM 0	PATCH	10	34.69	2.48	23.74	0.47	2.82	1	13.62	1.57	11.24	0.32	2.23	0.392620352
166	38	QTM 0	PATCH	10	41.86	1.5	28	0.85	0.15	1	20.08	0.93	18.3	0.74	0.09	0.479694219
167	39	QTM 0	PATCH	10	36.32	1.54	25.3	0.78	0.14	1	19.01	0.96	16.27	0.62	0.12	0.523403084
168	40	QTM 0	PATCH	10	40.44	1.84	27.66	0.57	0.29	1	19.95	1.07	18.41	0.42	0.24	0.493323442
169	41	QTM 0	PATCH	10	41.41	2.26	28.42	0.43	3.15	1	17.47	1.42	15.83	0.3	2.36	0.421878773

N257 QTM 0 high channel(29.45GHz)

N257 high channel(29.45GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N257	1	QTM 0	PATCH	1	2.34	0.06	1.49	0.02	0.08	1	0.87	0.03	0.69	0.02	0.06	0.371794872
	3	QTM 0	PATCH	1	2.62	0.07	1.38	0.02	0.1	1	0.83	0.04	0.55	0.02	0.07	0.316793893
	5	QTM 0	PATCH	1	2.13	0.05	1.39	0.01	0.07	1	0.68	0.03	0.57	0.01	0.06	0.319248826
	7	QTM 0	PATCH	1	2.3	0.08	1.63	0.01	0.05	1	0.74	0.04	0.71	0.01	0.04	0.32173913
	9	QTM 0	PATCH	1	2.27	0.08	1.58	0.03	0.04	1	0.76	0.04	0.71	0.03	0.03	0.334801762

	14	QTM 0	PATCH	2	4.78	0.23	3.8	0.06	0.09	1	2.1	0.12	1.95	0.05	0.07	0.439330544
	15	QTM 0	PATCH	2	4.59	0.16	3.03	0.05	0.02	1	2.18	0.09	1.66	0.04	0.02	0.474945534
	16	QTM 0	PATCH	2	5.18	0.16	3.43	0.04	0.25	1	2.45	0.07	1.67	0.04	0.18	0.472972973
	17	QTM 0	PATCH	2	4.05	0.17	2.36	0.04	0.16	1	1.15	0.09	1.03	0.04	0.14	0.283950617
	21	QTM 0	PATCH	2	4.7	0.13	2.93	0.04	0.09	1	2.08	0.08	1.41	0.04	0.07	0.442553191
	22	QTM 0	PATCH	2	4.94	0.18	3.29	0.04	0.15	1	2.39	0.07	1.73	0.03	0.11	0.483805668
	23	QTM 0	PATCH	2	5.18	0.17	3.31	0.04	0.34	1	2.22	0.09	1.52	0.03	0.24	0.428571429
	29	QTM 0	PATCH	5	11.54	0.55	8.65	0.12	0.36	1	6.18	0.28	5	0.1	0.29	0.535528596
	30	QTM 0	PATCH	5	11.1	0.53	8.72	0.23	0.06	1	5.98	0.28	5.25	0.19	0.04	0.538738739
	31	QTM 0	PATCH	5	10.4	0.44	7.91	0.14	0.12	1	4.87	0.29	5.07	0.1	0.09	0.4875
	32	QTM 0	PATCH	5	13.33	0.31	8.67	0.16	0.46	1	6.52	0.15	5.23	0.15	0.26	0.489122281
	33	QTM 0	PATCH	5	13.12	0.39	8.53	0.09	1.4	1	5.58	0.19	4.27	0.08	1.11	0.425304878
	38	QTM 0	PATCH	5	11.99	0.5	9.33	0.2	0.07	1	6.36	0.25	5.56	0.17	0.05	0.530442035
	39	QTM 0	PATCH	5	10.25	0.5	7.92	0.15	0.03	1	5.17	0.31	5	0.13	0.03	0.504390244
	40	QTM 0	PATCH	5	10.83	0.36	8.04	0.15	0.09	1	5.38	0.21	5.06	0.12	0.06	0.496768236
	41	QTM 0	PATCH	5	14.77	0.21	9.09	0.11	1.18	1	6.42	0.13	5.08	0.07	0.87	0.434664861
	129	QTM 0	PATCH	1	1.82	0.12	1.77	0.01	0.07	1	0.62	0.06	0.85	0.01	0.06	0.467032967
	131	QTM 0	PATCH	1	2.07	0.06	1.4	0.02	0.07	1	0.68	0.03	0.61	0.02	0.05	0.328502415
	133	QTM 0	PATCH	1	2.52	0.14	1.45	0.04	0.07	1	0.89	0.08	0.55	0.03	0.06	0.353174603
	135	QTM 0	PATCH	1	2.85	0.15	1.6	0.03	0.05	1	1.06	0.09	0.61	0.03	0.03	0.371929825
	137	QTM 0	PATCH	1	2.94	0.09	1.73	0.05	0.03	1	0.96	0.05	0.76	0.04	0.02	0.326530612
	142	QTM 0	PATCH	2	3.58	0.15	2.78	0.05	0.17	1	1.39	0.08	1.34	0.04	0.13	0.388268156
	143	QTM 0	PATCH	2	4.07	0.2	3.54	0.03	0.02	1	1.68	0.12	2.07	0.02	0.02	0.508599509
	144	QTM 0	PATCH	2	4.24	0.26	3.73	0.03	0.13	1	1.71	0.15	2.07	0.02	0.09	0.488207547
	145	QTM 0	PATCH	2	3.81	0.22	3.25	0.03	0.22	1	1.38	0.12	1.55	0.02	0.17	0.406824147
	149	QTM 0	PATCH	2	3.82	0.17	3.19	0.04	0.07	1	1.55	0.09	1.71	0.03	0.05	0.447643979
	150	QTM 0	PATCH	2	5.74	0.19	3.86	0.05	0.13	1	2.47	0.1	1.83	0.05	0.09	0.430313589
	151	QTM 0	PATCH	2	3.92	0.24	3.39	0.03	0.2	1	1.47	0.13	1.68	0.02	0.16	0.428571429
	157	QTM 0	PATCH	5	14.83	0.29	9.78	0.4	0.08	1	6.7	0.17	5.48	0.31	0.06	0.451786918
	158	QTM 0	PATCH	5	11.9	0.31	8.39	0.34	0.06	1	5.95	0.18	4.97	0.28	0.04	0.5
	159	QTM 0	PATCH	5	11.22	0.62	8.8	0.23	0.07	1	6.1	0.37	5.26	0.21	0.04	0.543672014
	160	QTM 0	PATCH	5	12.78	0.91	9.65	0.09	0.78	1	6.69	0.48	5.66	0.07	0.48	0.523474178
	161	QTM 0	PATCH	5	10.01	0.97	6.54	0.12	0.89	1	4.04	0.5	2.99	0.11	0.7	0.403596404
	166	QTM 0	PATCH	5	13.39	0.26	8.75	0.29	0.08	1	6.63	0.15	5.15	0.25	0.07	0.495145631
	167	QTM 0	PATCH	5	11.27	0.44	8.22	0.29	0.04	1	5.58	0.27	4.89	0.23	0.03	0.495119787
	168	QTM 0	PATCH	5	12.26	0.75	9.89	0.13	0.17	1	6.82	0.42	5.74	0.11	0.1	0.556280587
	169	QTM 0	PATCH	5	11.35	0.96	7.7	0.1	0.96	1	5.19	0.47	4.2	0.09	0.65	0.457268722
129	1	QTM 0	PATCH	2	4.58	0.26	3.49	0.05	0.17	1	1.7	0.14	1.7	0.04	0.11	0.371179039
131	3	QTM 0	PATCH	2	4.99	0.18	3.22	0.05	0.23	1	1.72	0.1	1.35	0.04	0.18	0.344689379
133	5	QTM 0	PATCH	2	5.19	0.24	3.29	0.08	0.19	1	1.9	0.13	1.27	0.07	0.14	0.366088632
135	7	QTM 0	PATCH	2	5.73	0.22	3.85	0.06	0.12	1	2.1	0.13	1.63	0.05	0.1	0.366492147
137	9	QTM 0	PATCH	2	5.86	0.23	3.98	0.15	0.08	1	2.15	0.12	1.87	0.12	0.07	0.366894198
142	14	QTM 0	PATCH	4	7.41	0.3	5.81	0.15	0.45	1	3.15	0.19	3.18	0.12	0.35	0.429149798
143	15	QTM 0	PATCH	4	9.26	0.61	7.22	0.1	0.05	1	4.04	0.34	4.63	0.08	0.04	0.5
144	16	QTM 0	PATCH	4	10.94	0.62	7.52	0.1	0.41	1	4.79	0.32	4.11	0.06	0.28	0.437842779
145	17	QTM 0	PATCH	4	6.97	0.41	4.92	0.14	0.57	1	2.37	0.19	2.57	0.11	0.44	0.368723099
149	21	QTM 0	PATCH	4	9.08	0.49	6.67	0.14	0.23	1	4.02	0.3	3.55	0.11	0.17	0.442731278
150	22	QTM 0	PATCH	4	11.88	0.46	7.54	0.1	0.39	1	4.77	0.23	3.64	0.09	0.28	0.401515152
151	23	QTM 0	PATCH	4	10.31	0.44	7.08	0.08	0.61	1	4.3	0.26	3.7	0.07	0.42	0.417070805
157	29	QTM 0	PATCH	10	29.87	0.95	19.95	0.89	0.55	1	15	0.5	11.64	0.72	0.42	0.502176096
158	30	QTM 0	PATCH	10	24.96	1.28	18.99	0.9	0.13	1	13.95	0.74	10.92	0.78	0.1	0.558894231
159	31	QTM 0	PATCH	10	22.16	1.87	19.09	0.52	0.21	1	11.75	1.17	11.32	0.44	0.15	0.530234657
160	32	QTM 0	PATCH	10	30.18	1.72	19.72	0.35	1.66	1	13.98	0.95	12.23	0.3	1.11	0.463220676
161	33	QTM 0	PATCH	10	27.18	1.88	17.34	0.3	2.82	1	11.65	1.03	8.05	0.26	2.18	0.428623988
166	38	QTM 0	PATCH	10	28.14	1.1	19.72	0.85	0.24	1	15.25	0.6	11.51	0.72	0.18	0.541933191
167	39	QTM 0	PATCH	10	22.22	1.61	18.41	0.67	0.1	1	12.01	1.03	11.07	0.58	0.08	0.54050405
168	40	QTM 0	PATCH	10	24.18	1.86	19.29	0.32	0.37	1	12.82	1.06	10.96	0.27	0.24	0.53019024
169	41	QTM 0	PATCH	10	31.02	1.64	19.06	0.25	2.54	1	13.3	0.96	10.64	0.19	1.9	0.428755642

N257 QTM 1 low channel(26.5GHz)

N257 Low channel(27.5GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N257	0	QTM 1	PATCH	1	3.12	0.08	0.08	0.43	0.52	1	1.02	0.05	0.06	0.23	0.29	0.326923077
	2	QTM 1	PATCH	1	3.03	0.11	0.13	0.29	0.45	1	0.94	0.07	0.07	0.19	0.24	0.310231023
	4	QTM 1	PATCH	1	3.08	0.11	0.08	0.22	0.61	1	0.91	0.07	0.06	0.14	0.27	0.295454545

	6	QTM 1	PATCH	1	2.87	0.15	0.06	0.23	0.77	1	0.81	0.08	0.04	0.12	0.38	0.282229965
	8	QTM 1	PATCH	1	2.77	0.13	0.06	0.14	0.63	1	0.9	0.08	0.04	0.1	0.28	0.324909747
	10	QTM 1	PATCH	2	4.19	0.26	0.19	0.35	1.24	1	1.51	0.16	0.14	0.22	0.7	0.360381862
	11	QTM 1	PATCH	2	6.18	0.19	0.12	0.31	1.2	1	2.65	0.11	0.08	0.14	0.68	0.428802589
	12	QTM 1	PATCH	2	6.18	0.2	0.11	0.75	1.42	1	2.43	0.11	0.07	0.44	0.85	0.393203883
	13	QTM 1	PATCH	2	4.85	0.19	0.2	0.69	1.04	1	1.47	0.09	0.15	0.37	0.55	0.303092784
	18	QTM 1	PATCH	2	6.63	0.25	0.3	0.23	1.63	1	2.49	0.18	0.17	0.15	0.66	0.375565611
	19	QTM 1	PATCH	2	6.78	0.25	0.05	0.51	1.61	1	2.8	0.14	0.03	0.28	0.89	0.412979351
	20	QTM 1	PATCH	2	6.43	0.24	0.07	0.48	1.63	1	2.1	0.16	0.05	0.3	0.73	0.32659409
	24	QTM 1	PATCH	5	11.3	0.88	0.96	1.8	4.39	1	3.95	0.44	0.58	1.08	2.59	0.349557522
	25	QTM 1	PATCH	5	14.71	0.92	0.42	0.61	5.15	1	7.59	0.63	0.24	0.38	2.85	0.515975527
	26	QTM 1	PATCH	5	14.85	0.94	0.14	0.61	4.67	1	6.76	0.55	0.1	0.37	3.27	0.455218855
	27	QTM 1	PATCH	5	15.35	0.51	0.18	3.11	4.32	1	6.48	0.33	0.14	1.88	2.35	0.422149837
	28	QTM 1	PATCH	5	11.46	0.41	0.56	3.35	1.64	1	3.6	0.25	0.38	2.18	0.85	0.314136126
	34	QTM 1	PATCH	5	12.34	0.82	1.04	0.93	4.53	1	5.63	0.47	0.59	0.59	2.32	0.45623987
	35	QTM 1	PATCH	5	13.81	1.04	0.16	0.39	4.71	1	6.93	0.67	0.14	0.25	2.98	0.501810282
	36	QTM 1	PATCH	5	15.8	0.82	0.17	2.04	5.12	1	7.65	0.53	0.11	0.71	3.39	0.484177215
	37	QTM 1	PATCH	5	12.72	0.25	0.36	3.14	2.51	1	4.65	0.16	0.24	1.97	1.43	0.365566038
	128	QTM 1	PATCH	1	3.09	0.17	0.05	0.65	0.65	1	1.09	0.11	0.04	0.33	0.29	0.352750809
	130	QTM 1	PATCH	1	3.58	0.14	0.06	0.29	0.91	1	1.16	0.1	0.05	0.15	0.47	0.324022346
	132	QTM 1	PATCH	1	3.11	0.13	0.08	0.22	0.72	1	0.88	0.08	0.06	0.13	0.34	0.282958199
	134	QTM 1	PATCH	1	3.21	0.11	0.09	0.29	0.56	1	0.87	0.08	0.07	0.18	0.29	0.271028037
	136	QTM 1	PATCH	1	2.49	0.12	0.12	0.17	0.7	1	0.66	0.08	0.09	0.11	0.36	0.265060241
	138	QTM 1	PATCH	2	5.83	0.37	0.15	0.7	1.82	1	1.69	0.26	0.13	0.41	0.81	0.289879931
	139	QTM 1	PATCH	2	8.31	0.46	0.14	0.18	2.63	1	3.01	0.3	0.09	0.09	1.25	0.3622142
	140	QTM 1	PATCH	2	6.48	0.31	0.05	1.57	1.78	1	2.79	0.17	0.04	0.81	0.86	0.430555556
	141	QTM 1	PATCH	2	4.28	0.12	0.23	0.64	1.06	1	1.22	0.07	0.17	0.41	0.61	0.285046729
	146	QTM 1	PATCH	2	5.54	0.25	0.29	0.41	1.66	1	1.87	0.17	0.2	0.24	0.92	0.337545126
	147	QTM 1	PATCH	2	5.7	0.33	0.1	0.44	1.46	1	2.19	0.22	0.08	0.22	0.74	0.384210526
	148	QTM 1	PATCH	2	5.18	0.19	0.11	1.6	1.25	1	2.38	0.11	0.08	0.85	0.75	0.459459459
	152	QTM 1	PATCH	5	11.86	0.5	1.2	1.61	2.63	1	3.45	0.27	0.91	1	1.68	0.290893761
	153	QTM 1	PATCH	5	17.42	1.31	0.35	0.52	7.47	1	7.04	0.88	0.26	0.28	4.49	0.40413318
	154	QTM 1	PATCH	5	16.56	0.99	0.16	0.63	5.49	1	7.65	0.64	0.09	0.32	3.5	0.461956522
	155	QTM 1	PATCH	5	13.4	0.54	0.21	5.03	4.29	1	7.33	0.27	0.16	2.47	2.21	0.547014925
	156	QTM 1	PATCH	5	10.52	0.34	0.87	2.7	3	1	3.32	0.21	0.63	1.58	1.77	0.315589354
	162	QTM 1	PATCH	5	15.19	0.81	0.61	0.7	5.5	1	5.25	0.49	0.44	0.41	3.27	0.34562212
	163	QTM 1	PATCH	5	16.89	1.4	0.21	0.6	6.34	1	6.99	1.01	0.17	0.34	3.4	0.413854352
	164	QTM 1	PATCH	5	15.82	0.78	0.21	2.47	5.58	1	8.2	0.44	0.13	0.79	3.64	0.518331226
	165	QTM 1	PATCH	5	11.62	0.41	0.26	4.02	3.26	1	5.29	0.25	0.19	2.39	1.93	0.45524957
128	0	QTM 1	PATCH	2	6.74	0.38	0.21	1.33	1.35	1	2.35	0.24	0.17	0.7	0.78	0.348664688
130	2	QTM 1	PATCH	2	7.27	0.28	0.28	0.8	1.66	1	2.4	0.18	0.18	0.44	0.88	0.330123796
132	4	QTM 1	PATCH	2	6.77	0.35	0.25	0.54	1.75	1	2.23	0.24	0.19	0.34	0.82	0.329394387
134	6	QTM 1	PATCH	2	6.36	0.32	0.18	0.72	1.62	1	1.86	0.21	0.15	0.44	0.82	0.29245283
136	8	QTM 1	PATCH	2	7.22	0.39	0.2	0.51	1.84	1	1.92	0.28	0.14	0.36	0.92	0.265927978
138	10	QTM 1	PATCH	4	9.76	0.82	0.5	1.3	3.19	1	3.34	0.6	0.42	0.77	1.72	0.342213115
139	11	QTM 1	PATCH	4	15.51	0.9	0.37	0.59	4.41	1	6.29	0.6	0.25	0.33	2.34	0.40554481
140	12	QTM 1	PATCH	4	13.49	0.73	0.22	2.53	3.73	1	5.37	0.38	0.15	1.34	2.16	0.398072646
141	13	QTM 1	PATCH	4	10.22	0.37	0.74	1.95	2.03	1	3.31	0.2	0.56	1.12	1.28	0.323874755
146	18	QTM 1	PATCH	4	12.49	0.73	0.82	0.73	3.53	1	4.37	0.5	0.55	0.47	1.65	0.349879904
147	19	QTM 1	PATCH	4	12.74	0.73	0.19	1.19	2.97	1	5.7	0.47	0.15	0.79	1.59	0.447409733
148	20	QTM 1	PATCH	4	11.35	0.49	0.21	2.93	2.97	1	4.29	0.29	0.16	1.66	1.86	0.377973568
152	24	QTM 1	PATCH	10	32.73	1.63	3.28	3.72	9.39	1	11.84	0.86	2.22	2.15	5.54	0.361747632
153	25	QTM 1	PATCH	10	35.55	2.98	0.89	1.35	14.33	1	15.14	2.28	0.65	0.8	8.38	0.425879044
154	26	QTM 1	PATCH	10	35.01	2.81	0.47	1.62	11.42	1	17.62	1.9	0.28	0.68	7.39	0.503284776
155	27	QTM 1	PATCH	10	33.75	1.22	0.42	9.61	10.47	1	16.92	0.78	0.32	5.63	7.07	0.501333333
156	28	QTM 1	PATCH	10	28.14	0.9	1.78	10.02	4.92	1	10.93	0.56	1.35	6.42	2.79	0.388415068
162	34	QTM 1	PATCH	10	33.98	1.93	2.36	2.28	11.95	1	13.34	1.28	1.54	1.48	7.19	0.392583873
163	35	QTM 1	PATCH	10	33.05	3.79	0.55	0.99	12.32	1	16.01	2.71	0.44	0.62	6.76	0.484417549
164	36	QTM 1	PATCH	10	32.97	2	0.65	4.92	11.65	1	17.47	1.17	0.41	1.67	7.99	0.529875645
165	37	QTM 1	PATCH	10	31.87	0.9	0.74	11.25	7.19	1	14.59	0.59	0.52	6.83	4.8	0.457797302

N257 QTM 1 mid channel(28GHz)

N257 mid channel(28GHz)					4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm					Ratio
BAND	Beam ID	Ant module	Ant type	Num of feed	relative phase worst PD for MIMO					Front 2mm/worst surface 2mm	relative phase worst PD for MIMO					worst surface 10mm/worst surface 2mm
					Front	Back	Left	Right	Top		Front	Back	Left	Right	Top	
N257	0	QTM 1	PATCH	1	3.47	0.11	0.08	0.47	0.59	1	1.11	0.06	0.06	0.21	0.38	0.319884726

	2	QTM 1	PATCH	1	3.34	0.08	0.18	0.31	0.48	1	1.11	0.05	0.12	0.19	0.28	0.332335329
	4	QTM 1	PATCH	1	3.38	0.11	0.13	0.24	0.59	1	1.11	0.07	0.08	0.16	0.3	0.328402367
	6	QTM 1	PATCH	1	2.98	0.22	0.06	0.21	0.88	1	0.86	0.13	0.05	0.13	0.4	0.288590604
	8	QTM 1	PATCH	1	2.42	0.12	0.09	0.17	0.78	1	0.77	0.07	0.06	0.13	0.33	0.318181818
	10	QTM 1	PATCH	2	4.91	0.25	0.22	0.38	1.47	1	1.34	0.12	0.15	0.25	0.86	0.272912424
	11	QTM 1	PATCH	2	6.41	0.24	0.19	0.3	1.41	1	2.97	0.14	0.11	0.12	0.7	0.463338534
	12	QTM 1	PATCH	2	6.79	0.21	0.13	0.92	1.57	1	2.88	0.12	0.1	0.59	0.85	0.424153166
	13	QTM 1	PATCH	2	4.97	0.22	0.24	0.46	1.43	1	1.47	0.13	0.16	0.31	0.76	0.295774648
	18	QTM 1	PATCH	2	7.08	0.24	0.38	0.16	1.62	1	2.76	0.17	0.24	0.11	0.8	0.389830508
	19	QTM 1	PATCH	2	7.19	0.2	0.05	0.52	1.63	1	3.39	0.12	0.04	0.3	0.91	0.471488178
	20	QTM 1	PATCH	2	5.7	0.32	0.11	0.5	1.83	1	1.91	0.2	0.08	0.32	0.83	0.335087719
	24	QTM 1	PATCH	5	13.78	0.78	1.45	0.88	4.48	1	5.01	0.37	1	0.57	2.54	0.363570392
	25	QTM 1	PATCH	5	14.66	0.78	0.56	0.64	4.51	1	7.42	0.49	0.32	0.44	2.55	0.506139154
	26	QTM 1	PATCH	5	15.43	1.06	0.08	0.33	5.24	1	7.88	0.66	0.07	0.22	3.41	0.510693454
	27	QTM 1	PATCH	5	15.63	0.76	0.27	4.29	5.14	1	7.04	0.43	0.21	2.75	3.32	0.450415867
	28	QTM 1	PATCH	5	11.39	0.5	0.72	2.78	2.22	1	3.85	0.31	0.52	1.85	1.24	0.338015803
	34	QTM 1	PATCH	5	14.11	0.75	1.32	0.96	4.85	1	6.39	0.42	0.86	0.59	2.27	0.452870305
	35	QTM 1	PATCH	5	14.15	0.86	0.14	0.64	4.73	1	7.29	0.58	0.09	0.3	2.98	0.515194346
	36	QTM 1	PATCH	5	15.61	0.93	0.13	1.82	5.03	1	7.01	0.58	0.1	0.76	3.13	0.449071108
	37	QTM 1	PATCH	5	12.53	0.45	0.5	3.55	3.52	1	5	0.25	0.37	2.21	2.12	0.399042298
	128	QTM 1	PATCH	1	3.02	0.13	0.05	0.44	0.56	1	0.95	0.08	0.04	0.24	0.23	0.314569536
	130	QTM 1	PATCH	1	3.04	0.12	0.07	0.26	0.72	1	1.13	0.08	0.05	0.14	0.38	0.371710526
	132	QTM 1	PATCH	1	3.17	0.08	0.1	0.25	0.66	1	1.04	0.05	0.08	0.14	0.32	0.32807571
	134	QTM 1	PATCH	1	3.56	0.14	0.08	0.4	0.69	1	1.14	0.1	0.05	0.27	0.35	0.320224719
	136	QTM 1	PATCH	1	2.73	0.12	0.1	0.17	0.85	1	0.89	0.09	0.07	0.11	0.48	0.326007326
	138	QTM 1	PATCH	2	5.46	0.28	0.19	0.63	1.41	1	1.74	0.21	0.15	0.34	0.62	0.318681319
	139	QTM 1	PATCH	2	7.56	0.34	0.12	0.24	2.11	1	3.06	0.25	0.08	0.17	1.08	0.404761905
	140	QTM 1	PATCH	2	6	0.3	0.07	0.97	1.58	1	2.83	0.18	0.06	0.6	0.72	0.471666667
	141	QTM 1	PATCH	2	4.31	0.13	0.25	0.66	1.24	1	1.34	0.08	0.19	0.37	0.64	0.310904872
	146	QTM 1	PATCH	2	6.18	0.34	0.34	0.4	1.98	1	2.09	0.24	0.2	0.24	1.18	0.338187702
	147	QTM 1	PATCH	2	6.14	0.31	0.09	0.6	1.8	1	2.74	0.21	0.07	0.37	0.85	0.446254072
	148	QTM 1	PATCH	2	4.74	0.16	0.15	1.13	1.01	1	1.87	0.08	0.11	0.59	0.57	0.394514768
	152	QTM 1	PATCH	5	13.36	0.37	1.09	1.68	3.07	1	3.18	0.22	0.86	1.07	1.84	0.238023952
	153	QTM 1	PATCH	5	18.37	1.18	0.52	0.45	7.17	1	7.59	0.89	0.28	0.23	4.01	0.413173653
	154	QTM 1	PATCH	5	15.62	0.94	0.15	0.48	5.45	1	8.35	0.67	0.11	0.3	3.54	0.534571063
	155	QTM 1	PATCH	5	14.21	0.57	0.32	4.7	4.53	1	7.9	0.31	0.23	2.76	2.66	0.555946517
	156	QTM 1	PATCH	5	8.89	0.33	0.7	2.49	3.54	1	2.59	0.25	0.53	1.28	1.99	0.291338583
	162	QTM 1	PATCH	5	17.52	0.75	0.87	0.93	6.16	1	6.06	0.52	0.5	0.51	3.37	0.345890411
	163	QTM 1	PATCH	5	15.64	1.29	0.12	0.51	5.77	1	7.99	0.98	0.1	0.28	3.34	0.510869565
	164	QTM 1	PATCH	5	16.21	0.74	0.22	2.42	5.42	1	8.6	0.42	0.15	0.8	3.89	0.530536706
	165	QTM 1	PATCH	5	11.93	0.38	0.3	3.52	3.55	1	4.83	0.21	0.2	2.27	2.06	0.404861693
128	0	QTM 1	PATCH	2	6.85	0.4	0.24	1.2	1.27	1	2.45	0.22	0.19	0.57	0.75	0.357664234
130	2	QTM 1	PATCH	2	6.87	0.28	0.29	0.66	1.46	1	2.55	0.19	0.22	0.36	0.86	0.371179039
132	4	QTM 1	PATCH	2	7.02	0.26	0.28	0.66	1.27	1	2.53	0.2	0.19	0.39	0.71	0.36039886
134	6	QTM 1	PATCH	2	6.9	0.34	0.14	0.71	1.74	1	2.3	0.23	0.11	0.51	0.83	0.333333333
136	8	QTM 1	PATCH	2	6.94	0.32	0.2	0.49	1.92	1	2.14	0.22	0.15	0.35	1.01	0.308357349
138	10	QTM 1	PATCH	4	9.6	0.65	0.42	1.2	3.25	1	2.95	0.47	0.32	0.7	1.77	0.307291667
139	11	QTM 1	PATCH	4	15.21	0.77	0.37	0.82	3.67	1	6.82	0.55	0.25	0.5	2.17	0.448389218
140	12	QTM 1	PATCH	4	13.14	0.83	0.27	2.2	3.46	1	5.85	0.45	0.19	1.25	1.95	0.445205479
141	13	QTM 1	PATCH	4	9.82	0.42	0.63	1.44	2.49	1	2.71	0.25	0.48	0.86	1.42	0.275967413
146	18	QTM 1	PATCH	4	13.3	0.86	1	0.71	4.51	1	5.16	0.64	0.65	0.49	2.3	0.387969925
147	19	QTM 1	PATCH	4	13.63	0.77	0.2	1.36	3.65	1	6.54	0.52	0.15	0.83	1.59	0.479823918
148	20	QTM 1	PATCH	4	10.21	0.56	0.34	2.25	2.67	1	3.21	0.33	0.26	1.19	1.25	0.314397649
152	24	QTM 1	PATCH	10	37.37	1.26	3.4	3.75	9.19	1	12.41	0.54	2.4	2.53	5.71	0.33208456
153	25	QTM 1	PATCH	10	35.01	2.56	1.38	1.38	12.96	1	17.01	2.03	0.65	0.87	7.33	0.485861183
154	26	QTM 1	PATCH	10	34.39	2.96	0.38	1.28	11.87	1	18.99	2.06	0.3	0.78	8.14	0.552195406
155	27	QTM 1	PATCH	10	33.5	1.53	0.89	9.1	10.58	1	17.05	0.87	0.62	5.57	6.62	0.508955224
156	28	QTM 1	PATCH	10	23.65	1.11	1.67	7.45	6.86	1	9.18	0.79	1.3	5.49	3.91	0.388160677
162	34	QTM 1	PATCH	10	34.24	1.87	2.45	2.72	13.71	1	14.59	1.07	1.69	1.78	7.6	0.426109813
163	35	QTM 1	PATCH	10	32.69	3.29	0.38	1.49	11.46	1	17.45	2.6	0.27	0.8	7.19	0.533802386
164	36	QTM 1	PATCH	10	35.38	2.27	0.51	4.37	11.58	1	18.16	1.32	0.34	1.61	7.68	0.513284341
165	37	QTM 1	PATCH	10	30.38	1.11	1.2	8.1	8.22	1	13.23	0.68	0.84	5.1	5.37	0.435483871

N257 QTM 1 high channel(29.45GHz)

N257 high channel(29.45GHz)				4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm				Ratio	4cm2 PD(W/m2) at 2mm evaluation surfaces @6dBm				Ratio
BAND	Beam ID	Ant module	Ant type	relative phase worst PD for MIMO					relative phase worst PD for MIMO				

				Num of feed	Front	Back	Left	Right	Top	Front 2mm/worst surface 2mm	Front	Back	Left	Right	Top	worst surface 10mm/worst surface 2mm
	0	QTM 1	PATCH	1	2.81	0.05	0.04	0.47	0.38	1	0.99	0.03	0.02	0.26	0.23	0.352313167
	2	QTM 1	PATCH	1	2.52	0.08	0.07	0.32	0.39	1	0.98	0.05	0.05	0.21	0.22	0.388888889
	4	QTM 1	PATCH	1	2.63	0.06	0.07	0.17	0.43	1	1	0.03	0.04	0.12	0.26	0.380228137
	6	QTM 1	PATCH	1	2.26	0.1	0.03	0.15	0.63	1	0.69	0.06	0.03	0.12	0.35	0.305309735
	8	QTM 1	PATCH	1	1.72	0.12	0.09	0.11	0.75	1	0.56	0.07	0.06	0.09	0.44	0.325581395
	10	QTM 1	PATCH	2	3.41	0.17	0.19	0.35	1.52	1	1.11	0.09	0.13	0.27	0.94	0.325513196
	11	QTM 1	PATCH	2	5.11	0.14	0.1	0.22	0.93	1	2.68	0.09	0.06	0.09	0.55	0.52446184
	12	QTM 1	PATCH	2	5.64	0.14	0.08	0.72	1.19	1	2.52	0.09	0.07	0.48	0.72	0.446808511
	13	QTM 1	PATCH	2	3.36	0.14	0.16	0.28	0.92	1	0.97	0.08	0.08	0.18	0.49	0.288690476
	18	QTM 1	PATCH	2	5.12	0.21	0.22	0.21	1.14	1	2.33	0.11	0.12	0.16	0.69	0.455078125
	19	QTM 1	PATCH	2	5.79	0.11	0.05	0.35	1.07	1	2.92	0.07	0.04	0.22	0.61	0.504317789
	20	QTM 1	PATCH	2	4.19	0.2	0.14	0.29	1.24	1	1.58	0.13	0.1	0.26	0.71	0.377088305
	24	QTM 1	PATCH	5	8.08	0.52	0.71	1.28	3.11	1	3.16	0.29	0.43	0.81	1.68	0.391089109
	25	QTM 1	PATCH	5	11.28	0.68	0.25	0.76	3.95	1	5.38	0.39	0.15	0.46	2.43	0.476950355
	26	QTM 1	PATCH	5	11.62	0.62	0.08	0.29	3.56	1	6.54	0.42	0.06	0.15	2.36	0.562822719
	27	QTM 1	PATCH	5	13.13	0.48	0.35	3.14	3.89	1	5.73	0.3	0.26	2.17	2.42	0.436405179
	28	QTM 1	PATCH	5	8.22	0.34	0.37	2.2	1.88	1	2.56	0.19	0.26	1.41	1.12	0.311435523
	34	QTM 1	PATCH	5	9.8	0.77	0.66	1.08	3.55	1	4.52	0.4	0.42	0.68	1.82	0.46122449
	35	QTM 1	PATCH	5	11.19	0.46	0.14	0.4	3.69	1	6.12	0.3	0.09	0.2	2.44	0.54691689
	36	QTM 1	PATCH	5	12.8	0.66	0.16	1.41	3.69	1	6.41	0.48	0.12	0.51	2.59	0.50078125
	37	QTM 1	PATCH	5	9.73	0.27	0.41	2.7	2.46	1	3.79	0.15	0.29	1.8	1.53	0.389516958
	128	QTM 1	PATCH	1	2.29	0.1	0.05	0.26	0.59	1	0.82	0.07	0.03	0.14	0.28	0.358078603
	130	QTM 1	PATCH	1	2.12	0.06	0.04	0.15	0.5	1	0.72	0.04	0.03	0.08	0.27	0.339622642
	132	QTM 1	PATCH	1	2.06	0.07	0.05	0.21	0.52	1	0.69	0.04	0.04	0.13	0.24	0.334951456
	134	QTM 1	PATCH	1	2.69	0.1	0.05	0.3	0.43	1	0.83	0.05	0.04	0.19	0.26	0.308550186
	136	QTM 1	PATCH	1	1.99	0.1	0.08	0.1	0.62	1	0.66	0.06	0.06	0.07	0.38	0.331658291
	138	QTM 1	PATCH	2	4.66	0.18	0.13	0.43	1.06	1	1.81	0.14	0.1	0.22	0.57	0.388412017
	139	QTM 1	PATCH	2	4.68	0.19	0.08	0.14	1.43	1	1.95	0.12	0.05	0.08	0.73	0.416666667
	140	QTM 1	PATCH	2	3.86	0.23	0.07	0.52	1.49	1	1.86	0.13	0.05	0.34	0.78	0.481865285
	141	QTM 1	PATCH	2	3.52	0.12	0.14	0.48	1.05	1	1.07	0.07	0.11	0.31	0.55	0.303977273
	146	QTM 1	PATCH	2	4.92	0.22	0.21	0.3	1.38	1	1.7	0.14	0.15	0.18	0.75	0.345528455
N257	147	QTM 1	PATCH	2	3.96	0.15	0.08	0.38	1.13	1	1.85	0.09	0.06	0.24	0.63	0.467171717
	148	QTM 1	PATCH	2	3.62	0.14	0.13	0.63	0.88	1	1.37	0.07	0.1	0.38	0.47	0.378453039
	152	QTM 1	PATCH	5	11.24	0.26	0.84	1.09	2.37	1	3.29	0.17	0.66	0.69	1.32	0.292704626
	153	QTM 1	PATCH	5	13.11	0.7	0.25	0.29	5.01	1	5.57	0.57	0.17	0.14	2.98	0.424866514
	154	QTM 1	PATCH	5	9.49	0.58	0.1	0.33	3.81	1	5.34	0.39	0.08	0.18	2.38	0.562697576
	155	QTM 1	PATCH	5	9.47	0.34	0.21	2.88	3.64	1	5.08	0.22	0.16	1.82	1.99	0.536430834
	156	QTM 1	PATCH	5	5.89	0.29	0.46	1.79	2.58	1	1.81	0.2	0.36	1.08	1.48	0.307300509
	162	QTM 1	PATCH	5	13.45	0.65	0.75	0.62	4.23	1	5.2	0.45	0.43	0.32	2.45	0.3866171
	163	QTM 1	PATCH	5	10.13	0.65	0.15	0.28	4.12	1	4.94	0.47	0.12	0.16	2.44	0.487660415
	164	QTM 1	PATCH	5	10.34	0.46	0.16	1.52	3.89	1	5.38	0.27	0.11	0.64	2.35	0.520309478
	165	QTM 1	PATCH	5	7.48	0.2	0.17	2.31	2.48	1	3.24	0.12	0.12	1.76	1.38	0.43315508
128	0	QTM 1	PATCH	2	5.79	0.24	0.13	1.02	1	1	2.12	0.15	0.09	0.5	0.51	0.366148532
130	2	QTM 1	PATCH	2	5.24	0.17	0.17	0.58	1.04	1	1.92	0.11	0.12	0.35	0.58	0.366412214
132	4	QTM 1	PATCH	2	5.42	0.17	0.16	0.56	1.16	1	2.14	0.11	0.1	0.35	0.66	0.394833948
134	6	QTM 1	PATCH	2	5.64	0.21	0.14	0.49	1.4	1	1.92	0.14	0.11	0.34	0.71	0.340425532
136	8	QTM 1	PATCH	2	4.12	0.29	0.22	0.29	2.06	1	1.54	0.16	0.17	0.22	1.29	0.373786408
138	10	QTM 1	PATCH	4	7.52	0.37	0.37	0.78	2.73	1	3.03	0.26	0.28	0.47	1.65	0.402925532
139	11	QTM 1	PATCH	4	10.29	0.38	0.26	0.44	2.79	1	5.14	0.28	0.15	0.27	1.61	0.499514091
140	12	QTM 1	PATCH	4	10	0.47	0.21	1.46	2.97	1	4.85	0.27	0.15	0.88	1.68	0.485
141	13	QTM 1	PATCH	4	7.93	0.28	0.37	0.97	1.91	1	2.24	0.18	0.26	0.63	0.99	0.282471627
146	18	QTM 1	PATCH	4	9.83	0.56	0.55	0.62	3.05	1	4.22	0.35	0.36	0.41	1.65	0.429298067
147	19	QTM 1	PATCH	4	10.05	0.33	0.2	0.89	2.09	1	4.97	0.21	0.13	0.52	1.14	0.494527363
148	20	QTM 1	PATCH	4	7.29	0.37	0.27	1.1	2.2	1	2.59	0.22	0.21	0.76	1.23	0.355281207
152	24	QTM 1	PATCH	10	20.85	1.03	2.64	3.3	7.13	1	8.89	0.63	1.78	2.32	4.03	0.426378897
153	25	QTM 1	PATCH	10	28.38	1.54	0.65	1.38	11.62	1	12.9	1.16	0.45	0.76	6.69	0.454545455
154	26	QTM 1	PATCH	10	24.36	1.43	0.25	0.69	8.95	1	14.15	1.01	0.2	0.38	5.98	0.580870279
155	27	QTM 1	PATCH	10	25.81	0.96	0.62	6.6	8.45	1	12.52	0.6	0.44	4.01	5.21	0.485083301
156	28	QTM 1	PATCH	10	15.6	0.86	1.17	5.69	6.1	1	5	0.53	0.91	3.7	3.69	0.320512821
162	34	QTM 1	PATCH	10	25.96	1.56	1.94	2.12	10.73	1	11.9	1.09	1.21	1.25	5.72	0.458397535
163	35	QTM 1	PATCH	10	24.14	1.38	0.32	0.8	10.15	1	12.73	1.01	0.26	0.4	6.68	0.527340514
164	36	QTM 1	PATCH	10	27.56	1.41	0.4	3.75	9.26	1	14.18	0.91	0.32	1.32	6.37	0.514513788
165	37	QTM 1	PATCH	10	19.01	0.72	0.75	5.99	6.17	1	8.06	0.43	0.54	3.83	3.9	0.423987375