

TITLE: UZ2400D U-ForceD PVTF
Testing Results

Doc. #: PE-ZB-0A05

Writer: JS Su

Date: 2010/11/02

Category :

- Testing Summary Report
- Ra Report
- EVB Testing Report
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UZ2400D U-forceD PVTF Testing Results Summary

1.0 Test Setup

The test methodology and the test configuration are briefly described as below:

- ✓ Sample: UZ2400D DO version (Package: QFN6x6).
- ✓ Module: U-ForceD
- ✓ Sample Lot: D1H647 (DO version)
- ✓ Test Conditions: 1.8V~3.6V, -40°C~ 85°C

2.0 Test Results

2.1 RSSI

Figure 2.1(1)~(6) show the RSSI results at different voltage and different temperature. There is no abnormal phenomenon on RSSI test.

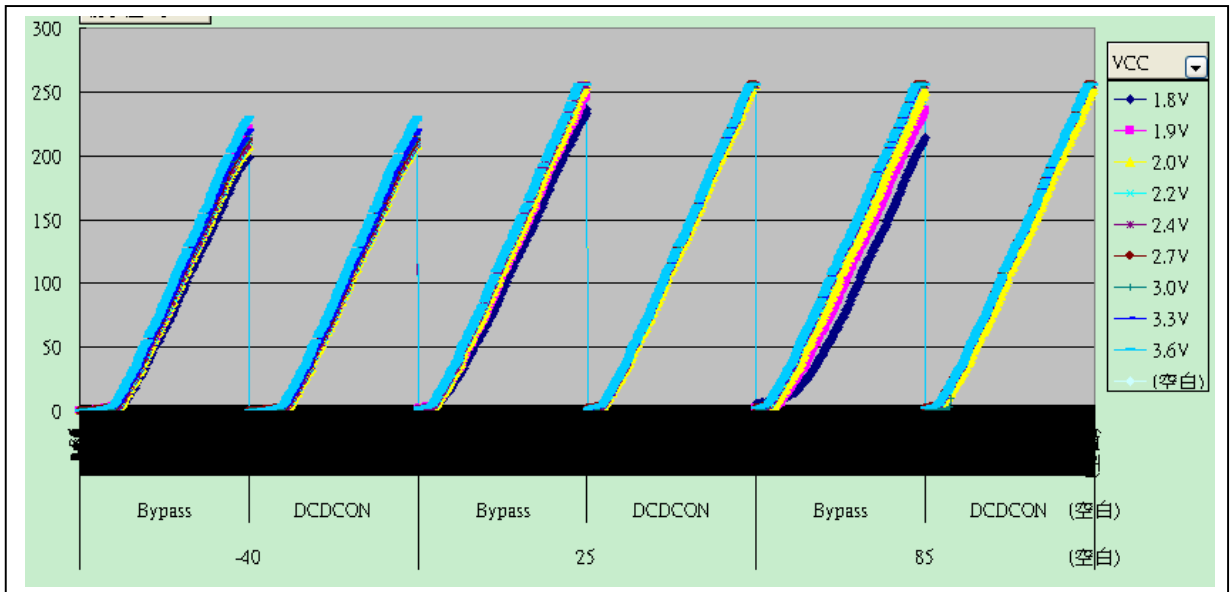


Figure 2.1(1) Sample#1 RSSI results at different voltage and different temperature. (Hardware: DCDCON)

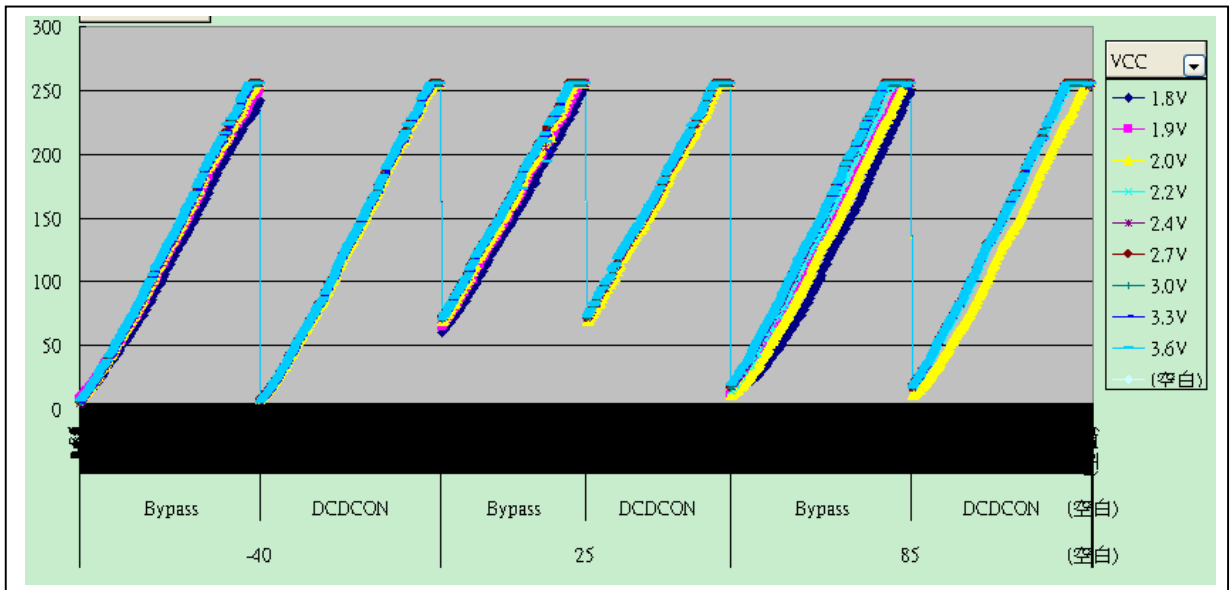


Figure 2.1(2) Sample#2 RSSI results at different voltage and different temperature. (Hardware: DCDCON)

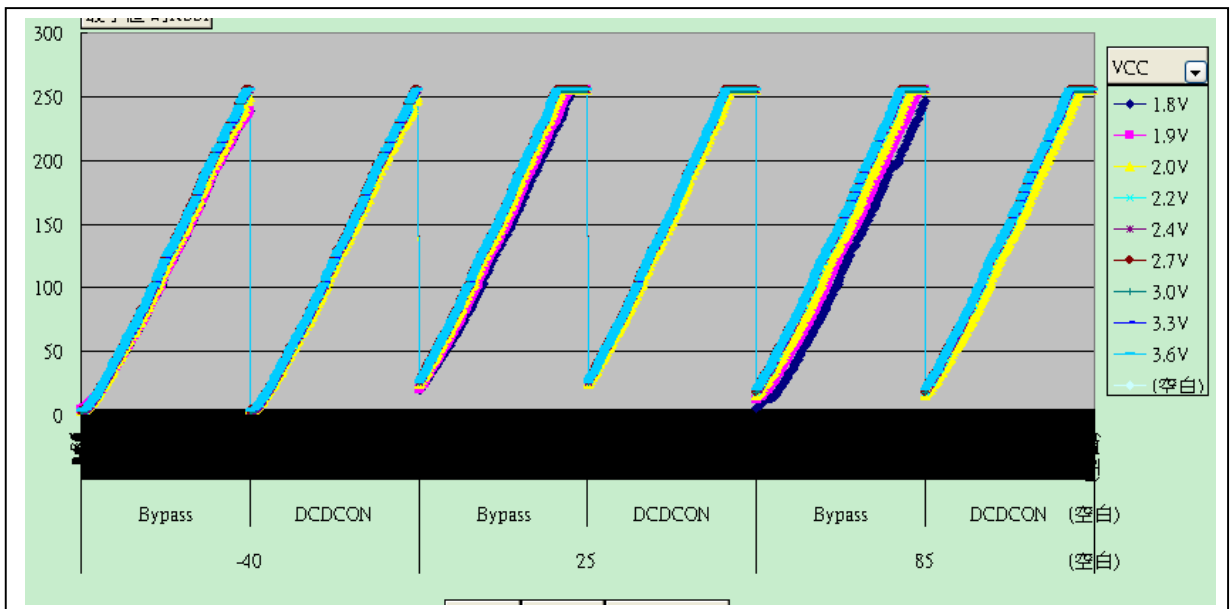


Figure 2.1(3) Sample#3 RSSI results at different voltage and different temperature. (Hardware: DCDCON)

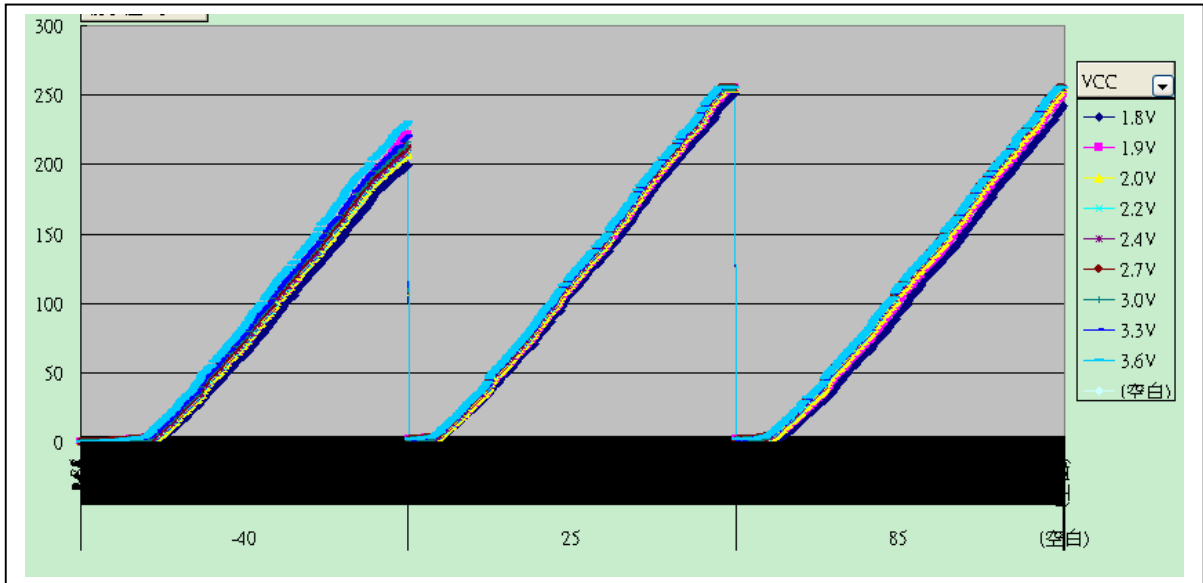


Figure 2.1(4) Sample#4 RSSI results at different voltage and different temperature. (Hardware: DCDC-OFF)

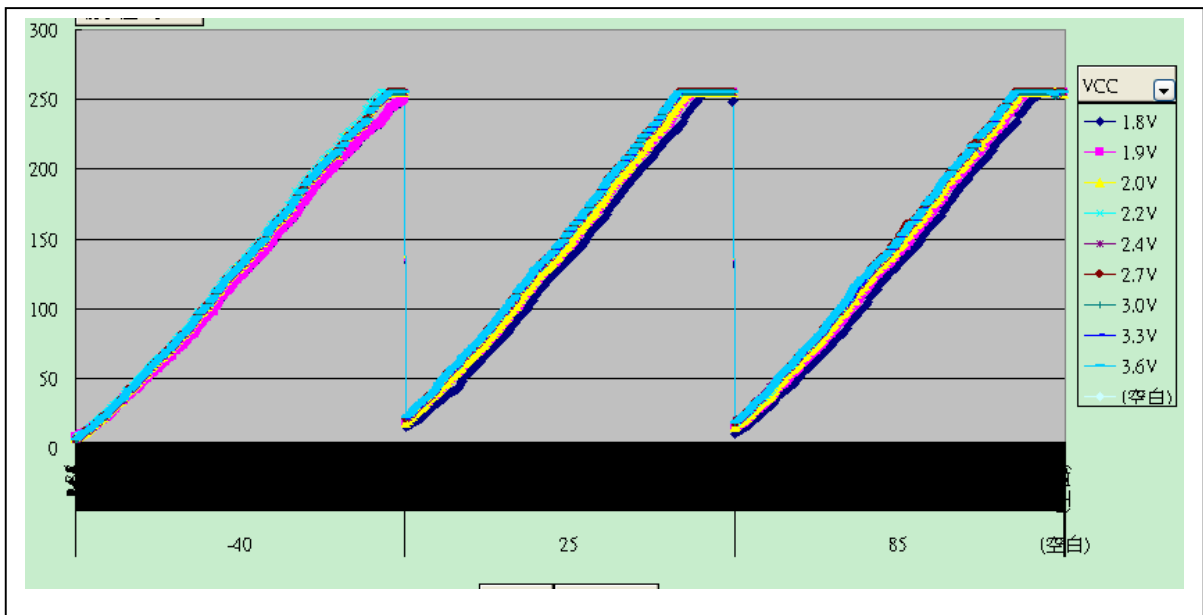


Figure 2.1(5) Sample#5 RSSI results at different voltage and different temperature. (Hardware: DCDC-OFF)

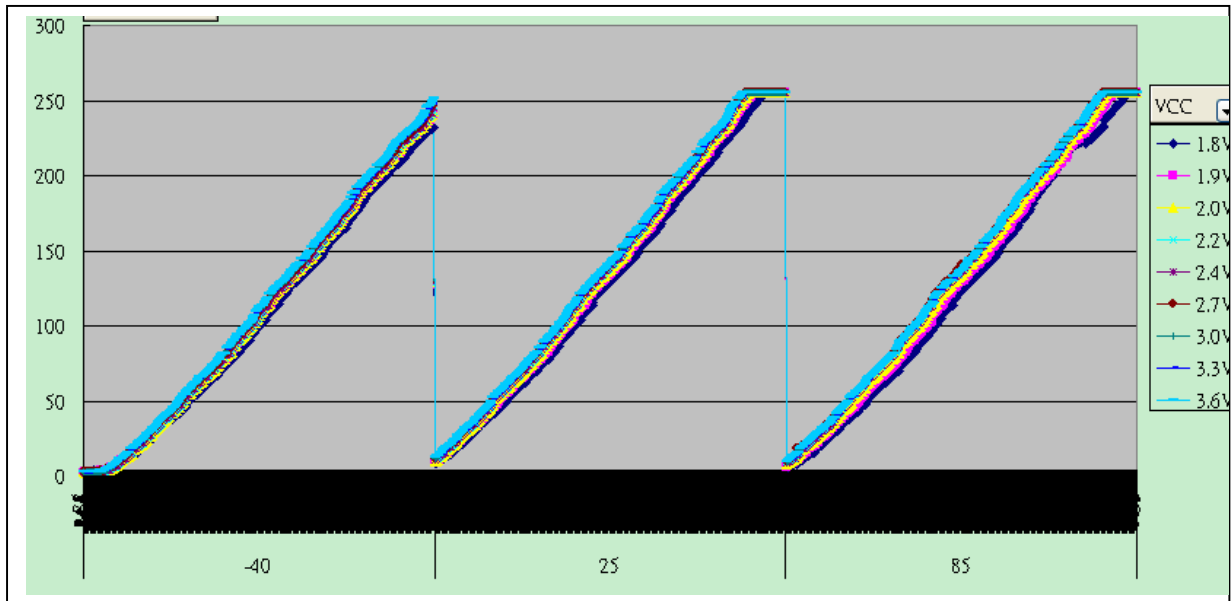


Figure 2.1(6) Sample#6 RSSI results at different voltage and different temperature. (Hardware: DCDC-OFF)

2.2 Rx Sensitivity

Table 2.2(1) shows the worse and the average RX sensitivity testing results. Hardware is DCDC-OFF. The large sensitivity variation resulted from the environment interference as the high/low temperature tests were not performed inside a shielding box on. All the data of Rx sensitivity pass -85 dBm.

Temperature	DCDC	Voltage	Average Sensitivity(dBm)	Worse Sensitivity(dBm)2
-40	DCDCBypass	1.8V	-94.87	-92.92
		2.0V	-95.75	-92.96
		2.2V	-95.84	-92.96
		2.4V	-95.75	-92.96
		2.7V	-95.93	-93.96
		3.0V	-96.00	-93.92
		3.3V	-96.03	-93.83
		3.6V	-96.09	-94.92
	DCDCON	2.0V	-95.59	-93.96
		2.2V	-95.21	-93.92
		2.4V	-94.65	-92.92
2.7V		-94.59	-92.92	

25		3.0V	-94.71	-91.92
		3.3V	-95.09	-93.92
		3.6V	-94.90	-92.92
	DCDCBypass	1.8V	-93.38	-90.97
		2.0V	-95.15	-91.97
		2.2V	-95.67	-93.97
		2.4V	-95.67	-94.47
		2.7V	-95.88	-92.97
		3.0V	-95.67	-92.97
		3.3V	-95.82	-92.97
	3.6V	-95.87	-91.97	
85	DCDCON	2.0V	-95.11	-91.97
		2.2V	-95.61	-92.97
		2.4V	-94.40	-92.84
		2.7V	-94.07	-90.97
		3.0V	-94.36	-92.84
		3.3V	-94.42	-90.97
		3.6V	-94.37	-90.97
	DCDCBypass	1.8V	-87.00	-85.62
		2.0V	-91.86	-90.43
		2.2V	-92.39	-90.82
		2.4V	-92.69	-90.49
		2.7V	-92.53	-91.43
		3.0V	-92.94	-90.49
		3.3V	-92.53	-90.49
		3.6V	-92.49	-90.97
	DCDCON	2.0V	-91.74	-90.43
		2.2V	-92.64	-90.49
		2.4V	-92.63	-90.92
		2.7V	-92.07	-90.49
		3.0V	-92.24	-90.49
	3.3V	-92.35	-90.49	
	3.6V	-92.37	-90.49	

2.3 Tx Power/EVM performance
2.3.1 Power/EVM Performances on DCDC ON

Table 2.3(1) shows the minimum power and average power testing results. Table 2.3(2) shows the maximum EVM and average EVM testing results. The test quantity is 19 pieces.

Table 2.3(1) the minimum power and average power testing results.				
			Data	
Temp	Voltage	channel	Average Power(dBm)	Manimum Power(dBm)
25c	2.0V	2405MHz	-0.32	-0.87
		2445MHz	-1.12	-1.70
		2480MHz	-2.17	-2.89
	2.4V	2405MHz	0.32	-0.32
		2445MHz	-0.45	-1.15
		2480MHz	-1.45	-2.33
	3.0V	2405MHz	0.36	-0.28
		2445MHz	-0.42	-1.10
		2480MHz	-1.41	-2.31
	3.6V	2405MHz	0.38	-0.25
		2445MHz	-0.39	-1.07
		2480MHz	-1.38	-2.26
-40c	2.0V	2405MHz	0.00	-1.09
		2445MHz	-0.46	-1.73
		2480MHz	-0.95	-2.48
	2.4V	2405MHz	0.39	-0.88
		2445MHz	-0.07	-1.50
		2480MHz	-0.52	-2.25
	3.0V	2405MHz	0.43	-0.82
		2445MHz	-0.04	-1.47
		2480MHz	-0.50	-2.23
	3.6V	2405MHz	0.48	-0.77
		2445MHz	0.01	-1.41
		2480MHz	-0.47	-2.14
85C	2.0V	2405MHz	-2.28	-3.25
		2445MHz	-3.35	-4.31
		2480MHz	-4.64	-5.62
	2.4V	2405MHz	-0.65	-1.15
		2445MHz	-1.67	-2.22
		2480MHz	-2.90	-3.43

3.0V	2405MHz	-0.59	-1.10
	2445MHz	-1.60	-2.12
	2480MHz	-2.82	-3.35
3.6V	2405MHz	-0.54	-1.07
	2445MHz	-1.55	-2.07
	2480MHz	-2.77	-3.29

Table 2.3(2) the maximum EVM and average EVM testing results.				
			Data	
Temp	Voltage	channel	Maximum EVM(%)	Average EVM(%)
25c	2.0V	2405MHz	12.01	11.52
		2445MHz	16.31	13.07
		2480MHz	12.30	11.40
	2.4V	2405MHz	24.82	15.17
		2445MHz	34.59	18.72
		2480MHz	21.94	14.45
	3.0V	2405MHz	15.77	12.92
		2445MHz	23.82	16.46
		2480MHz	14.74	12.57
	3.6V	2405MHz	16.14	13.35
		2445MHz	21.66	16.93
		2480MHz	14.95	12.80
-40c	2.0V	2405MHz	15.57	13.67
		2445MHz	17.46	14.09
		2480MHz	15.70	12.81
	2.4V	2405MHz	18.29	14.26
		2445MHz	24.84	17.63
		2480MHz	18.65	14.57
	3.0V	2405MHz	15.40	13.22
		2445MHz	25.00	17.36
		2480MHz	18.41	13.75
	3.6V	2405MHz	14.66	13.08
		2445MHz	24.17	17.17
		2480MHz	18.72	13.70
85C	2.0V	2405MHz	11.57	11.01
		2445MHz	12.24	11.45
		2480MHz	11.07	10.72
	2.4V	2405MHz	16.73	13.86
		2445MHz	20.95	15.49

		2480MHz	16.58	13.17
3.0V		2405MHz	13.38	12.26
		2445MHz	16.43	14.00
		2480MHz	12.89	11.88
		2405MHz	15.17	12.59
3.6V		2445MHz	16.52	14.26
		2480MHz	12.99	12.00
		2405MHz	15.17	12.59

2.3.2 Power/EVM Performances on DCDC Bypass (2.0V~3.6V)

Table 2.3(3) shows the minimum power and average power testing results. Table 2.3(4) shows the maximum EVM and average EVM testing results. The test quantity is 19 pieces.

			Data	
Temp	Voltage	channel	Minimum Power(dBm)	Average Power(dBm)
25C	2.0V	2405MHz	-1.77	-0.92
		2445MHz	-2.79	-1.80
		2480MHz	-4.11	-2.92
	2.4V	2405MHz	-0.06	1.17
		2445MHz	-1.09	0.28
		2480MHz	-2.35	-0.84
	3.0V	2405MHz	0.70	1.93
		2445MHz	-0.31	1.07
		2480MHz	-1.53	-0.02
	3.6V	2405MHz	1.19	2.42
		2445MHz	0.20	1.56
		2480MHz	-0.99	0.49
-40c	2.0V	2405MHz	-0.84	1.08
		2445MHz	-1.36	0.52
		2480MHz	-2.02	-0.16
	2.4V	2405MHz	0.56	2.09
		2445MHz	-0.19	1.55
		2480MHz	-1.05	0.90
	3.0V	2405MHz	1.41	2.78
		2445MHz	0.67	2.21
		2480MHz	-0.15	1.59
	3.6V	2405MHz	1.88	3.28
		2445MHz	1.18	2.68

		2480MHz	0.36	2.06
85C	2.0V	2405MHz	-8.65	-6.26
		2445MHz	-9.91	-7.38
		2480MHz	-11.47	-8.73
	2.4V	2405MHz	-1.31	-0.46
		2445MHz	-2.50	-1.50
		2480MHz	-3.89	-2.76
	3.0V	2405MHz	-0.21	0.84
		2445MHz	-1.36	-0.20
		2480MHz	-2.73	-1.44
	3.6V	2405MHz	0.45	1.46
		2445MHz	-0.71	0.44
		2480MHz	-2.08	-0.79

Table 2.3(4) the maximum EVM and average EVM testing results.				
			Data	
Temp	Voltage	channel	AVG EVM(%)	Maximum EVM(%)
25C	2.0V	2405MHz	12.67	15.03
		2445MHz	12.14	15.44
		2480MHz	11.60	13.49
	2.4V	2405MHz	12.33	13.02
		2445MHz	13.34	16.10
		2480MHz	11.96	14.31
	3.0V	2405MHz	12.90	14.04
		2445MHz	14.97	25.34
		2480MHz	12.40	16.16
	3.6V	2405MHz	13.49	14.52
		2445MHz	15.93	19.48
		2480MHz	13.15	17.94
-40c	2.0V	2405MHz	12.95	14.51
		2445MHz	12.65	13.79
		2480MHz	13.82	17.17
	2.4V	2405MHz	13.01	14.95
		2445MHz	13.45	15.74
		2480MHz	13.09	16.14
	3.0V	2405MHz	12.38	13.26
		2445MHz	15.41	20.07
		2480MHz	12.65	14.20
	3.6V	2405MHz	12.75	14.17

85C	2.0V	2445MHz	19.73	33.41
		2480MHz	13.80	16.21
		2405MHz	19.19	25.40
	2.4V	2445MHz	15.83	17.80
		2480MHz	12.15	13.09
		2405MHz	13.74	15.53
	3.0V	2445MHz	13.69	15.08
		2480MHz	11.65	12.26
		2405MHz	13.04	14.38
	3.6V	2445MHz	14.31	15.67
		2480MHz	12.00	13.06
		2405MHz	13.73	16.06
		2445MHz	15.29	17.06
		2480MHz	12.62	14.23

2.3.3 Power/EVM Performances on DCDC Bypass (1.8V~2.0V)

Table 2.3(5) shows the minimum power and average power testing results. Table 2.3(6) shows the maximum EVM and average EVM testing results. The test quantity is 19 pieces.

			Data	
Temp	Voltage	channel	Minimum Power(dBm)	Average Power(dBm)
25c	1.8V	2405MHz	-2.3	-1.4
		2445MHz	-3.3	-2.3
		2480MHz	-4.5	-3.4
	2.0V	2405MHz	-0.7	0.2
		2445MHz	-1.7	-0.6
		2480MHz	-2.8	-1.7
-40c	1.8V	2405MHz	-1.5	-0.6
		2445MHz	-2.1	-1.1
		2480MHz	-2.8	-1.7
	2.0V	2405MHz	-0.2	0.4
		2445MHz	-0.8	-0.1
		2480MHz	-1.3	-0.5
85C	1.8V	2405MHz	-11.1	-6.8
		2445MHz	-12.2	-8.0
		2480MHz	-13.6	-9.3

	2.0V	2405MHz	-3.5	-2.3
		2445MHz	-4.7	-3.4
		2480MHz	-6.1	-4.7

Table 2.3(6) The maximum EVM and average EVM testing results.				
			Data	
Temp	Voltage	channel	Maximum EVM(%)	Average EVM(%)
25c	1.8V	2405MHz	11.6	11.0
		2445MHz	12.9	11.8
		2480MHz	11.5	10.7
	2.0V	2405MHz	16.0	13.0
		2445MHz	21.4	16.4
		2480MHz	14.6	12.5
-40c	1.8V	2405MHz	12.8	11.6
		2445MHz	14.4	12.7
		2480MHz	11.7	11.1
	2.0V	2405MHz	13.2	12.2
		2445MHz	24.1	18.0
		2480MHz	17.3	14.9
85C	1.8V	2405MHz	11.2	10.6
		2445MHz	11.2	10.7
		2480MHz	11.0	10.4
	2.0V	2405MHz	13.0	11.6
		2445MHz	13.6	12.3
		2480MHz	12.0	11.1

2.4 Current

2.4.1 Sleep Current

Table 2.4(1) show the power down current measurement at different voltage and different temperature. Table 2.4(2) show the power down current measurement at different voltage and different temperature. Table 2.4(3) show the standby sleep current measurement results. Table 2.4(4) shows the halt mode (1M) current measurement results. Table 2.4(5) shows the halt mode (2M) current measurement results. Table 2.4(6) shows the halt mode (4M) current measurement results. Table 2.4(7) shows the halt mode (8M) current measurement results. Table 2.4(8) shows the halt mode (16M) current measurement results. Table 2.4(9) shows the halt mode (32M)

current measurement results.

Table 2.4(1) the power down current measurement results				
Temperature	Voltage	Min. Power down Current (uA)	Avg. Power Down Current (uA)	Max. Power Down Current (uA)
-40	2.0V	-0.03	-0.01	0.03
	2.1V	-0.03	0.01	0.05
	2.2V	-0.07	-0.02	0.05
	2.3V	-0.05	-0.01	0.03
	2.4V	-0.10	-0.04	0.02
	2.5V	-0.06	-0.01	0.02
	2.6V	-0.11	-0.03	0.02
	2.7V	-0.07	0.00	0.05
	2.8V	-0.13	-0.03	0.03
	2.9V	-0.07	-0.02	0.07
	3.0V	-0.04	-0.01	0.02
	3.1V	-0.10	-0.03	0.06
	3.2V	-0.16	-0.03	0.04
	3.3V	-0.06	-0.02	0.05
	3.4V	-0.09	0.01	0.10
	3.5V	-0.06	-0.04	0.00
3.6V	-0.01	0.02	0.10	
25	1.8V	-0.06	0.02	0.09
	1.9V	-0.02	0.02	0.04
	2.0V	-0.03	0.03	0.09
	2.1V	-0.01	0.03	0.07
	2.2V	-0.03	0.06	0.15
	2.3V	0.06	0.09	0.12
	2.4V	-0.08	0.04	0.12
	2.5V	0.01	0.06	0.11
	2.6V	-0.14	0.05	0.12
	2.7V	-0.07	0.05	0.12
	2.8V	-0.02	0.07	0.16
	2.9V	0.01	0.08	0.15
	3.0V	-0.05	0.03	0.09
	3.1V	0.02	0.10	0.18
3.2V	-0.06	0.05	0.13	
3.3V	0.06	0.11	0.25	

	3.4V	0.02	0.09	0.20
	3.5V	-0.04	0.06	0.12
	3.6V	-0.04	0.05	0.12
85	1.8V	0.58	0.76	1.03
	1.9V	0.69	0.82	1.07
	2.0V	0.56	0.81	1.12
	2.1V	0.60	0.90	1.11
	2.2V	0.70	0.98	1.22
	2.3V	0.75	1.02	1.24
	2.4V	0.62	0.97	1.22
	2.5V	0.61	0.92	1.13
	2.6V	0.72	0.97	1.20
	2.7V	0.76	1.04	1.33
	2.8V	0.89	1.08	1.33
	2.9V	0.64	0.99	1.31
	3.0V	0.70	0.95	1.21
	3.1V	0.72	0.99	1.25
	3.2V	0.74	1.04	1.34
	3.3V	0.85	1.13	1.42
	3.4V	0.74	1.01	1.31
	3.5V	0.75	1.02	1.27
3.6V	0.72	1.06	1.33	

Table 2.4(2) the deep sleep current measurement results.				
Temperature	Voltage	Min. Sleep Current (uA)	Avg. Sleep Current (uA)	Max. Sleep Current (uA)
-40	2.0V	0.14	0.26	0.45
	2.1V	0.23	0.36	0.51
	2.2V	0.48	0.68	0.90
	2.3V	0.05	0.71	1.47
	2.4V	0.08	0.57	2.57
	2.5V	0.10	0.20	0.34
	2.6V	0.13	0.26	0.47
	2.7V	0.28	0.37	0.50
	2.8V	0.03	0.25	0.66
	2.9V	0.14	0.22	0.39
	3.0V	0.10	0.26	0.44
	3.1V	0.24	0.36	0.50

	3.2V	0.39	0.50	0.68
	3.3V	0.06	0.35	0.95
	3.4V	0.11	0.41	1.43
	3.5V	0.18	0.34	0.47
	3.6V	0.26	0.45	0.69
25	1.8V	2.84	3.41	4.05
	1.9V	3.13	3.62	4.21
	2.0V	3.35	4.16	4.73
	2.1V	3.69	4.50	5.14
	2.2V	4.28	5.15	5.78
	2.3V	5.27	6.18	6.89
	2.4V	2.92	4.47	8.41
	2.5V	3.08	3.86	4.51
	2.6V	3.39	4.10	4.70
	2.7V	3.64	4.45	5.06
	2.8V	4.08	4.56	5.19
	2.9V	3.06	4.23	6.07
	3.0V	3.29	4.01	4.71
	3.1V	3.52	4.26	5.05
	3.2V	3.99	4.67	5.37
	3.3V	4.47	5.04	5.70
	3.4V	3.25	4.37	6.17
	3.5V	3.42	4.18	4.82
3.6V	3.74	4.51	5.23	
85	1.8V	36.68	47.00	63.22
	1.9V	39.20	48.77	64.73
	2.0V	38.88	51.02	67.12
	2.1V	43.15	55.90	69.10
	2.2V	46.36	58.92	71.81
	2.3V	49.78	62.51	75.80
	2.4V	39.31	52.32	67.23
	2.5V	41.27	51.37	62.42
	2.6V	42.91	53.33	65.07
	2.7V	44.57	55.41	67.65
	2.8V	46.27	54.72	61.58
	2.9V	41.43	53.40	63.74
	3.0V	42.46	53.67	65.75
	3.1V	43.97	55.47	68.11
3.2V	45.23	57.17	70.19	

	3.3V	47.16	59.12	72.62
	3.4V	41.80	54.02	64.49
	3.5V	42.87	54.08	66.24
	3.6V	44.18	55.64	68.32

Table 2.4(3) the standby sleep current measurement results.

Temperature	Voltage	Min. Standby Current (uA)	Avg. Standby Current (uA)	Max. Standby Current (uA)
-40	2.0V	1.04	1.15	1.47
	2.1V	1.06	1.30	1.66
	2.2V	1.37	1.61	1.89
	2.3V	0.88	1.20	2.18
	2.4V	0.83	0.99	1.25
	2.5V	0.89	1.09	1.48
	2.6V	0.91	1.22	1.65
	2.7V	0.98	1.18	1.46
	2.8V	1.04	1.20	1.48
	2.9V	0.90	1.18	1.52
	3.0V	1.02	1.26	1.55
	3.1V	1.18	1.40	1.82
	3.2V	1.33	1.54	1.71
	3.3V	1.11	1.31	1.70
	3.4V	1.03	1.26	1.62
	3.5V	1.12	1.37	1.87
3.6V	1.33	1.57	1.93	
25	1.8V	3.70	4.29	4.92
	1.9V	4.08	4.57	5.13
	2.0V	4.26	5.16	5.85
	2.1V	4.60	5.48	6.19
	2.2V	5.30	6.16	6.96
	2.3V	4.80	6.30	7.65
	2.4V	3.76	4.55	5.27
	2.5V	3.95	4.75	5.47
	2.6V	4.28	5.11	5.81
	2.7V	4.78	5.51	6.24
	2.8V	3.83	4.88	5.89
	2.9V	4.13	4.84	5.55
3.0V	4.32	5.11	5.89	

	3.1V	4.72	5.42	6.12
	3.2V	5.12	5.83	6.56
	3.3V	4.06	5.14	6.27
	3.4V	4.24	5.03	5.77
	3.5V	4.56	5.32	6.13
	3.6V	4.83	5.64	6.39
85	1.8V	37.51	47.96	64.33
	1.9V	40.12	49.79	65.91
	2.0V	39.90	52.09	68.37
	2.1V	44.26	57.07	70.46
	2.2V	47.56	60.16	73.17
	2.3V	51.02	57.54	64.05
	2.4V	40.36	50.55	61.11
	2.5V	42.28	52.49	63.59
	2.6V	44.13	54.53	66.37
	2.7V	45.92	56.70	68.87
	2.8V	41.36	52.80	62.84
	2.9V	42.56	53.32	65.06
	3.0V	43.67	54.96	67.12
	3.1V	45.20	56.77	69.50
	3.2V	46.50	58.52	71.66
	3.3V	41.78	53.73	64.13
	3.4V	42.94	53.97	65.98
	3.5V	44.13	55.46	67.77
3.6V	45.49	57.03	69.84	

Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.20	1.36	1.52
	2.1V	1.36	1.55	1.85
	2.2V	1.39	1.59	1.88
	2.3V	1.43	1.62	1.91
	2.4V	1.47	1.66	1.94
	2.5V	1.53	1.71	1.98
	2.6V	1.65	1.81	2.05
	2.7V	1.75	1.92	2.17
	2.8V	1.85	2.04	2.29
	2.9V	1.98	2.19	2.45

	3.0V	2.18	2.36	2.56
	3.1V	2.32	2.51	2.79
	3.2V	2.41	2.64	2.92
	3.3V	2.57	2.81	3.11
	3.4V	2.80	3.02	3.34
	3.5V	2.91	3.15	3.47
	3.6V	3.24	3.38	3.56
	1.8V	1.02	1.05	1.07
	1.9V	1.04	1.08	1.11
	2.0V	1.06	1.11	1.15
	2.1V	1.08	1.13	1.18
	2.2V	1.11	1.15	1.20
	2.3V	1.14	1.18	1.22
	2.4V	1.17	1.21	1.25
	2.5V	1.22	1.27	1.29
	2.6V	1.29	1.35	1.38
25	2.7V	1.37	1.44	1.49
	2.8V	1.47	1.53	1.58
	2.9V	1.59	1.65	1.71
	3.0V	1.70	1.79	1.84
	3.1V	1.82	1.91	1.98
	3.2V	1.95	2.03	2.12
	3.3V	2.09	2.18	2.27
	3.4V	2.23	2.33	2.42
	3.5V	2.37	2.48	2.63
	3.6V	2.53	2.66	2.80
85	1.8V	1.15	1.18	1.20
	1.9V	1.19	1.23	1.25
	2.0V	1.21	1.25	1.28
	2.1V	1.25	1.30	1.35
	2.2V	1.28	1.40	1.58
	2.3V	1.31	1.40	1.64
	2.4V	1.35	1.40	1.44
	2.5V	1.40	1.45	1.49
	2.6V	1.47	1.65	1.94
	2.7V	1.53	1.59	1.64
	2.8V	1.59	1.75	2.19
	2.9V	1.68	1.94	2.32
	3.0V	1.87	1.91	1.96

	3.1V	1.98	2.09	2.41
	3.2V	1.99	2.10	2.15
	3.3V	2.11	2.22	2.29
	3.4V	2.34	2.48	2.91
	3.5V	2.52	2.64	2.95
	3.6V	2.65	2.69	2.74

Table 2.4(5) the halt mode (2M) current measurement results				
Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.08	1.31	1.49
	2.1V	1.40	1.56	1.88
	2.2V	1.43	1.62	1.92
	2.3V	1.47	1.66	1.95
	2.4V	1.50	1.70	1.98
	2.5V	1.57	1.75	2.02
	2.6V	1.69	1.85	2.09
	2.7V	1.79	1.96	2.21
	2.8V	1.89	2.08	2.33
	2.9V	2.03	2.23	2.49
	3.0V	2.23	2.40	2.61
	3.1V	2.37	2.56	2.84
	3.2V	2.46	2.69	2.98
	3.3V	2.62	2.86	3.16
	3.4V	2.85	3.07	3.39
	3.5V	2.97	3.20	3.53
3.6V	3.30	3.43	3.62	
25	1.8V	1.05	1.08	1.10
	1.9V	1.07	1.11	1.14
	2.0V	1.09	1.14	1.19
	2.1V	1.12	1.16	1.21
	2.2V	1.14	1.19	1.23
	2.3V	1.17	1.22	1.26
	2.4V	1.21	1.25	1.29
	2.5V	1.26	1.31	1.33
	2.6V	1.33	1.39	1.42
	2.7V	1.41	1.48	1.53
2.8V	1.51	1.58	1.63	

	2.9V	1.63	1.70	1.76
	3.0V	1.75	1.84	1.89
	3.1V	1.87	1.96	2.03
	3.2V	2.00	2.08	2.17
	3.3V	2.15	2.23	2.32
	3.4V	2.28	2.38	2.48
	3.5V	2.42	2.54	2.69
	3.6V	2.58	2.72	2.86
85	1.8V	1.18	1.20	1.22
	1.9V	1.23	1.26	1.28
	2.0V	1.25	1.28	1.32
	2.1V	1.28	1.33	1.38
	2.2V	1.31	1.44	1.62
	2.3V	1.35	1.44	1.68
	2.4V	1.39	1.44	1.48
	2.5V	1.44	1.49	1.53
	2.6V	1.51	1.69	1.98
	2.7V	1.58	1.64	1.68
	2.8V	1.64	1.80	2.24
	2.9V	1.73	1.99	2.37
	3.0V	1.91	1.96	2.01
	3.1V	2.03	2.14	2.46
	3.2V	2.04	2.15	2.20
	3.3V	2.16	2.27	2.34
	3.4V	2.39	2.53	2.97
3.5V	2.57	2.70	3.00	
3.6V	2.71	2.75	2.79	

Table 2.4(6) the halt mode (4M) current measurement results

Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.14	1.27	1.55
	2.1V	1.26	1.57	1.94
	2.2V	1.39	1.63	1.98
	2.3V	1.52	1.70	2.01
	2.4V	1.57	1.76	2.05
	2.5V	1.64	1.82	2.10
	2.6V	1.76	1.92	2.16

	2.7V	1.86	2.04	2.29
	2.8V	1.96	2.16	2.41
	2.9V	2.11	2.32	2.58
	3.0V	2.32	2.49	2.69
	3.1V	2.45	2.65	2.93
	3.2V	2.54	2.78	3.07
	3.3V	2.71	2.96	3.26
	3.4V	2.95	3.17	3.49
	3.5V	3.07	3.30	3.63
	3.6V	3.39	3.54	3.73
25	1.8V	1.11	1.13	1.15
	1.9V	1.13	1.17	1.20
	2.0V	1.15	1.20	1.25
	2.1V	1.18	1.22	1.27
	2.2V	1.21	1.25	1.30
	2.3V	1.24	1.29	1.33
	2.4V	1.28	1.33	1.37
	2.5V	1.33	1.38	1.41
	2.6V	1.41	1.47	1.50
	2.7V	1.50	1.56	1.61
	2.8V	1.60	1.66	1.71
	2.9V	1.72	1.79	1.84
	3.0V	1.84	1.93	1.98
	3.1V	1.97	2.05	2.12
	3.2V	2.10	2.18	2.27
	3.3V	2.25	2.33	2.42
3.4V	2.39	2.49	2.58	
3.5V	2.53	2.64	2.79	
3.6V	2.69	2.82	2.97	
85	1.8V	1.24	1.26	1.28
	1.9V	1.29	1.32	1.33
	2.0V	1.31	1.35	1.38
	2.1V	1.35	1.40	1.45
	2.2V	1.38	1.51	1.68
	2.3V	1.42	1.51	1.75
	2.4V	1.46	1.51	1.56
	2.5V	1.52	1.57	1.60
	2.6V	1.59	1.77	2.06
2.7V	1.66	1.72	1.76	

	2.8V	1.73	1.88	2.32
	2.9V	1.82	2.08	2.46
	3.0V	2.01	2.05	2.10
	3.1V	2.13	2.23	2.55
	3.2V	2.14	2.25	2.30
	3.3V	2.26	2.37	2.44
	3.4V	2.50	2.64	3.07
	3.5V	2.68	2.80	3.11
	3.6V	2.82	2.86	2.90

Table 2.4(7) the halt mode (8M) current measurement results				
Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.26	1.35	1.66
	2.1V	1.33	1.64	2.06
	2.2V	1.40	1.69	2.10
	2.3V	1.48	1.75	2.14
	2.4V	1.55	1.81	2.18
	2.5V	1.63	1.88	2.23
	2.6V	1.76	2.01	2.30
	2.7V	1.89	2.14	2.44
	2.8V	2.00	2.27	2.57
	2.9V	2.15	2.44	2.73
	3.0V	2.38	2.62	2.86
	3.1V	2.51	2.79	3.10
	3.2V	2.59	2.92	3.24
	3.3V	2.77	3.10	3.43
	3.4V	3.01	3.32	3.67
	3.5V	3.18	3.46	3.81
3.6V	3.46	3.70	3.92	
25	1.8V	1.21	1.24	1.26
	1.9V	1.25	1.28	1.31
	2.0V	1.27	1.32	1.36
	2.1V	1.31	1.35	1.40
	2.2V	1.34	1.38	1.43
	2.3V	1.38	1.42	1.47
	2.4V	1.42	1.47	1.51
	2.5V	1.48	1.53	1.55

	2.6V	1.56	1.62	1.65
	2.7V	1.66	1.72	1.77
	2.8V	1.77	1.83	1.88
	2.9V	1.89	1.96	2.02
	3.0V	2.02	2.10	2.16
	3.1V	2.15	2.24	2.31
	3.2V	2.29	2.37	2.46
	3.3V	2.44	2.53	2.62
	3.4V	2.59	2.69	2.78
	3.5V	2.74	2.85	3.00
	3.6V	2.91	3.04	3.18
85	1.8V	1.35	1.37	1.39
	1.9V	1.40	1.43	1.45
	2.0V	1.43	1.47	1.50
	2.1V	1.47	1.53	1.57
	2.2V	1.51	1.64	1.82
	2.3V	1.56	1.65	1.89
	2.4V	1.61	1.66	1.70
	2.5V	1.67	1.72	1.76
	2.6V	1.75	1.93	2.22
	2.7V	1.83	1.88	1.92
	2.8V	1.90	2.05	2.49
	2.9V	2.00	2.25	2.63
	3.0V	2.19	2.24	2.28
	3.1V	2.32	2.42	2.74
	3.2V	2.34	2.45	2.50
	3.3V	2.46	2.58	2.64
3.4V	2.71	2.85	3.28	
3.5V	2.90	3.02	3.33	
3.6V	3.04	3.08	3.12	

Table 2.4(8) the halt mode (16M) current measurement results.				
Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.34	1.54	1.90
	2.1V	1.58	1.81	2.24
	2.2V	1.63	1.84	2.20
	2.3V	1.68	1.90	2.22

	2.4V	1.74	1.96	2.29
	2.5V	1.82	2.04	2.34
	2.6V	1.96	2.16	2.43
	2.7V	2.08	2.29	2.56
	2.8V	2.20	2.43	2.70
	2.9V	2.36	2.60	2.86
	3.0V	2.60	2.79	2.99
	3.1V	2.73	2.96	3.22
	3.2V	2.84	3.10	3.37
	3.3V	3.02	3.29	3.56
	3.4V	3.28	3.52	3.78
	3.5V	3.46	3.66	3.91
	3.6V	3.76	3.90	4.12
	1.8V	1.44	1.46	1.48
	1.9V	1.48	1.52	1.55
	2.0V	1.52	1.56	1.61
	2.1V	1.57	1.61	1.65
	2.2V	1.62	1.66	1.70
	2.3V	1.67	1.71	1.75
	2.4V	1.72	1.76	1.80
	2.5V	1.79	1.83	1.86
	2.6V	1.88	1.94	1.97
25	2.7V	1.99	2.05	2.10
	2.8V	2.11	2.17	2.22
	2.9V	2.25	2.31	2.37
	3.0V	2.39	2.47	2.52
	3.1V	2.53	2.61	2.68
	3.2V	2.68	2.75	2.84
	3.3V	2.84	2.92	3.02
	3.4V	3.00	3.10	3.19
	3.5V	3.17	3.27	3.42
	3.6V	3.35	3.47	3.62
85	1.8V	1.58	1.60	1.61
	1.9V	1.64	1.67	1.69
	2.0V	1.68	1.72	1.75
	2.1V	1.74	1.79	1.84
	2.2V	1.79	1.92	2.09
	2.3V	1.85	1.94	2.18
	2.4V	1.91	1.96	2.00

	2.5V	1.98	2.03	2.07
	2.6V	2.07	2.25	2.54
	2.7V	2.16	2.22	2.26
	2.8V	2.25	2.40	2.83
	2.9V	2.36	2.61	2.99
	3.0V	2.56	2.61	2.65
	3.1V	2.70	2.81	3.13
	3.2V	2.74	2.84	2.89
	3.3V	2.87	2.99	3.05
	3.4V	3.13	3.27	3.71
	3.5V	3.33	3.45	3.76
	3.6V	3.49	3.52	3.56

Table 2.4(9) the halt mode (32M) current measurement results

Temperature	Voltage	Min. Current (mA)	Avg. Current (mA)	Max. Current (mA)
-40	2.0V	1.88	2.02	2.37
	2.1V	2.03	2.15	2.35
	2.2V	2.09	2.20	2.34
	2.3V	2.17	2.28	2.41
	2.4V	2.25	2.36	2.49
	2.5V	2.34	2.45	2.58
	2.6V	2.47	2.59	2.72
	2.7V	2.61	2.74	2.88
	2.8V	2.77	2.90	3.05
	2.9V	2.96	3.09	3.24
	3.0V	3.14	3.30	3.44
	3.1V	3.35	3.50	3.64
	3.2V	3.53	3.66	3.85
	3.3V	3.75	3.88	4.01
	3.4V	3.96	4.13	4.28
	3.5V	4.07	4.29	4.42
3.6V	4.38	4.57	4.74	
25	1.8V	1.88	1.90	1.92
	1.9V	1.95	1.98	2.01
	2.0V	2.01	2.05	2.09
	2.1V	2.08	2.12	2.16
	2.2V	2.16	2.19	2.23

	2.3V	2.23	2.26	2.31
	2.4V	2.31	2.34	2.38
	2.5V	2.40	2.44	2.47
	2.6V	2.51	2.56	2.60
	2.7V	2.64	2.69	2.74
	2.8V	2.78	2.83	2.89
	2.9V	2.94	3.00	3.06
	3.0V	3.10	3.18	3.24
	3.1V	3.27	3.35	3.42
	3.2V	3.45	3.51	3.61
	3.3V	3.63	3.71	3.81
	3.4V	3.81	3.91	4.00
	3.5V	4.00	4.10	4.26
	3.6V	4.21	4.33	4.48
85	1.8V	2.03	2.04	2.06
	1.9V	2.12	2.14	2.16
	2.0V	2.18	2.21	2.25
	2.1V	2.26	2.31	2.36
	2.2V	2.34	2.46	2.64
	2.3V	2.42	2.51	2.76
	2.4V	2.51	2.56	2.60
	2.5V	2.60	2.65	2.69
	2.6V	2.71	2.89	3.17
	2.7V	2.83	2.88	2.91
	2.8V	2.94	3.09	3.51
	2.9V	3.07	3.32	3.69
	3.0V	3.30	3.34	3.37
	3.1V	3.46	3.56	3.89
	3.2V	3.52	3.63	3.68
	3.3V	3.69	3.79	3.86
	3.4V	3.96	4.10	4.54
3.5V	4.18	4.31	4.62	
3.6V	4.36	4.41	4.45	

2.4.2 Rx Current

Table 2.4(10) shows the Rx current testing results.

Table 2.4(10) Rx current testing results					
temp	DCDC	Voltage	Min.Rx (mA)	Avg.Rx (mA)	Max.Rx (mA)
25c	DCDCOFF	2.0V	18.72	19.28	19.71
		2.2V	19.60	20.37	20.92
		2.4V	19.75	20.73	21.50
		2.7V	19.84	20.80	21.58
		3.0V	19.88	20.85	21.60
		3.3V	19.92	20.91	21.66
		3.6V	19.95	20.95	21.70
	DCDCON	2.0V	18.84	19.39	19.81
		2.2V	19.73	20.47	21.01
		2.4V	18.85	19.90	21.13
		2.7V	16.90	18.00	19.25
		3.0V	15.62	16.43	17.44
		3.3V	14.54	15.50	16.31
		3.6V	13.64	14.52	15.40
85C	DCDCOFF	2.0V	19.59	20.41	20.82
		2.2V	21.04	21.93	22.49
		2.4V	21.65	22.66	23.47
		2.7V	21.68	22.73	23.61
		3.0V	22.27	22.96	23.66
		3.3V	22.26	22.96	23.72
		3.6V	22.22	22.93	23.70
	DCDCON	2.0V	19.62	20.53	20.94
		2.2V	21.07	22.06	22.63
		2.4V	21.63	22.39	23.34
		2.7V	19.67	20.85	21.78
		3.0V	17.95	19.33	21.83
		3.3V	16.81	18.37	21.87
		3.6V	15.86	17.59	21.86
n40C	DCDCOFF	2.0V	17.15	17.69	18.07
		2.2V	17.85	18.54	19.03
		2.4V	17.92	18.70	19.29
		2.7V	17.97	18.77	19.35
		3.0V	18.03	18.83	19.41
		3.3V	18.09	18.91	19.46

		3.6V	0.00	15.79	19.53
	DCDCON	2.0V	17.28	17.75	18.14
		2.2V	17.74	18.54	19.13
		2.4V	16.51	17.83	18.98
		2.7V	14.70	16.01	16.94
		3.0V	13.47	14.49	15.51
		3.3V	12.57	13.52	14.58
		3.6V	11.84	12.75	13.84

2.4.3 Tx Current

Table 2.4(11) shows the Tx current testing results. The Tx current of DO version with DO register is higher than DM version register on DCDC OFF/Bypass. Moreover, The Tx current of DO version with DO register is lower than DM version register on DCDC ON.

temp	DCDC	Voltage	Min.Tx (mA)	Avg.Tx (mA)	Max.Tx (mA)
25c	DCDCOFF	2.0V	21.83	22.64	23.40
		2.2V	22.83	23.86	24.78
		2.4V	23.24	24.47	25.54
		2.7V	23.76	24.99	26.10
		3.0V	24.19	25.44	26.55
		3.3V	24.60	25.86	26.97
		3.6V	24.96	26.25	27.38
	DCDCON	2.0V	20.77	21.58	22.32
		2.2V	21.55	22.55	23.42
		2.4V	20.84	22.13	23.64
		2.7V	18.56	19.95	21.53
		3.0V	17.04	18.12	19.43
		3.3V	15.87	16.95	18.05
		3.6V	14.84	15.90	17.01
85C	DCDCOFF	2.0V	19.59	23.27	24.52
		2.2V	21.04	25.37	26.97
		2.4V	21.64	26.52	28.42
		2.7V	21.68	27.06	29.23
		3.0V	27.98	28.77	29.78
		3.3V	28.44	29.18	30.24

	DCDCON	3.6V	28.58	29.46	30.61
		2.0V	19.62	23.12	24.37
		2.2V	21.07	24.62	26.00
		2.4V	21.71	25.20	27.01
		2.7V	21.76	23.25	24.53
		3.0V	20.51	21.55	22.31
		3.3V	19.09	20.33	21.87
		3.6V	17.93	19.38	21.86
n40C	DCDCOFF	2.0V	18.43	19.49	20.83
		2.2V	19.23	20.34	21.79
		2.4V	19.61	20.74	22.24
		2.7V	20.20	21.25	22.73
		3.0V	20.69	21.72	23.15
		3.3V	21.15	22.16	23.56
		3.6V	21.62	22.61	23.97
	DCDCON	2.0V	17.59	18.50	19.67
		2.2V	18.18	19.17	20.55
		2.4V	16.98	18.47	20.10
		2.7V	15.22	16.49	18.31
		3.0V	13.82	14.98	16.65
		3.3V	12.84	13.97	15.62
		3.6V	12.04	13.16	14.78

2.5 Adjacent channel rejection

Table 2.5(1) shows the minimum and average adjacent channel rejection testing results on DCDC ON/DCDC Bypass. Test quantity is 3 pieces. Some variation may be resulted from the environment interference as the high/low temperature tests were not performed inside a shielding box on.

			Data (Unit: dB)	
Temp	DCDC	VCC	Minimum ACR(+5M)	Average ACR (+5M)
25C	DCDCOFF	1.8V	22	23.3
		1.9V	23	24.0
		2.0V	23	24.1
		2.2V	23	24.2

		2.4V	23	24.2
		2.7V	23	23.9
		3.0V	23	24.0
		3.6V	23	24.0
	DCDCON	2.0V	23	24.2
		2.4V	23	24.6
		2.7V	23	24.3
		3.0V	23	24.1
		3.3V	22	24.0
		3.6V	23	23.9
-40C	DCDCOFF	1.8V	20	22.3
		1.9V	20	22.3
		2.0V	20	22.7
		2.2V	20	22.7
		2.4V	20	22.6
		2.7V	20	22.7
		3.0V	20	22.9
		3.6V	20	22.7
	DCDCON	2.0V	20	22.8
		2.4V	20	22.8
		2.7V	20	22.9
		3.0V	20	22.8
		3.3V	20	23.0
		3.6V	19	22.7
85C	DCDCOFF	1.8V	22	23.3
		1.9V	23	24.0
		2.0V	23	24.2
		2.2V	23	24.4
		2.4V	23	24.6
		2.7V	23	24.3
		3.0V	23	24.2
		3.6V	23	24.4
	DCDCON	2.0V	23	24.4
		2.4V	23	24.8
		2.7V	23	24.7
		3.0V	23	24.2
		3.3V	23	24.2
		3.6V	23	24.4

2.6 Alternate-channel rejection

Table 2.6(1) shows the minimum and average alternate channel rejection testing results on DCDC ON/DCDC Bypass. Test quantity is 3 pieces. Some variation may be resulted from the environment interference as the high/low temperature tests were not performed inside a shielding box on.

Table 2.6(1) The minimum and average alternate channel rejection testing results				
			Data (Unit: dB)	
Temp	DCDC	VCC	Minimum ACR(+10M)	Average ACR(+10M)
25C	DCDCOFF	1.8V	41	43.0
		1.9V	42	43.3
		2.0V	41	42.3
		2.2V	40	41.7
		2.4V	40	41.7
		2.7V	41	42.0
		3.0V	41	42.0
		3.3V	41	41.5
		3.6V	41	42.3
	DCDCON	2.0V	41	42.3
		2.4V	40	41.3
		2.7V	41	41.7
		3.0V	40	41.3
		3.3V	40	41.3
		3.6V	40	41.7
		-40C	DCDCOFF	1.8V
1.9V	34			36.7
2.0V	33			35.2
2.2V	33			35.3
2.4V	33			35.3
2.7V	34			35.7
3.0V	33			35.3
3.3V	36			36.0
3.6V	34			36.0
DCDCON	2.0V		33	35.3
	2.4V		33	35.3
	2.7V		33	35.0
	3.0V		33	35.3

		3.3V	33	35.3
		3.6V	34	35.7
85C	DCDCOFF	1.8V	42	43.7
		1.9V	45	45.7
		2.0V	45	45.7
		2.2V	45	45.3
		2.4V	45	45.3
		2.7V	45	45.3
		3.0V	45	45.0
		3.3V	46	46.0
		3.6V	46	46.0
	DCDCON	2.0V	46	46.0
		2.4V	45	45.3
		2.7V	45	45.0
		3.0V	45	45.0
		3.3V	45	45.0
		3.6V	45	45.3

2.7 Channel rejection

Table 2.7(1) shows the minimum and average channel rejection testing results (+/- 15 MHz) on DCDC ON/DCDC Bypass. Test quantity is 3 pieces. Some variation may be resulted from the environment interference as the high/low temperature tests were not performed inside a shielding box on.

			Data (Unit: dB)	
Temp	DCDC	VCC	Minimum ACR(+15M)	Average ACR(+15M)
25C	DCDCOFF	1.8V	48	48.7
		1.9V	45	46.7
		2.0V	44	45.3
		2.2V	44	45.0
		2.4V	43	44.3
		2.7V	43	44.3
		3.0V	43	44.3
		3.3V	44	44.0
		3.6V	44	44.7

	DCDCON	2.0V	44	45.3
		2.4V	44	45.0
		2.7V	44	44.3
		3.0V	44	44.7
		3.3V	44	44.7
		3.6V	44	45.0
		-40C	DCDCOFF	1.8V
1.9V	38			39.3
2.0V	36			37.6
2.2V	37			38.7
2.4V	37			38.7
2.7V	37			38.7
3.0V	36			38.3
3.3V	39			39.0
3.6V	37		38.7	
DCDCON	2.0V		36	37.7
	2.4V		37	38.0
	2.7V		36	38.0
	3.0V		36	38.3
	3.3V		37	38.7
	3.6V	37	38.7	
85C	DCDCOFF	1.8V	49	50.7
		1.9V	49	50.3
		2.0V	49	49.3
		2.2V	49	49.7
		2.4V	45	46.0
		2.7V	45	45.7
		3.0V	45	45.3
		3.3V	45	45.3
	3.6V	45	45.3	
	DCDCON	2.0V	49	49.3
		2.4V	49	49.0
		2.7V	49	49.0
		3.0V	49	49.0
		3.3V	49	49.3
3.6V		48	48.7	

2.8 co-channel rejection

Table 2.8(1) shows the minimum and average co-channel rejection testing results on DCDC ON/DCDC Bypass. Test quantity is 3 pieces.

Table 2.8(1) The minimum and average co-channel rejection testing results				
			Data (Unit: dB)	
Temp	DCDC	VCC	Minimum co-channel rejection	Average co-channel rejection
25C	DCDCOFF	1.8V	-6	-5.0
		1.9V	-5	-5.0
		2.0V	-5	-4.7
		2.2V	-6	-5.3
		2.4V	-5	-5.0
		2.7V	-7	-5.0
		3.0V	-5	-5.0
		3.3V	-6	-5.5
	3.6V	-5	-4.7	
	DCDCON	2.0V	-4	-4.0
		2.4V	-8	-6.0
		2.7V	-8	-5.7
		3.0V	-5	-4.3
		3.3V	-5	-4.7
3.6V		-7	-5.7	
-40C	DCDCOFF	1.8V	-7	-5.7
		1.9V	-6	-5.3
		2.0V	-7	-5.2
		2.2V	-5	-4.3
		2.4V	-5	-4.3
		2.7V	-4	-4.0
		3.0V	-5	-4.3
		3.3V	-5	-5.0
	3.6V	-5	-4.3	
	DCDCON	2.0V	-5	-4.9
		2.4V	-6	-4.9
		2.7V	-7	-5.7
		3.0V	-6	-5.2
		3.3V	-4	-4.1
3.6V		-5	-4.7	
85C	DCDCOFF	1.8V	-6	-5.1

		1.9V	-6	-5.3
		2.0V	-6	-5.0
		2.2V	-4	-4.2
		2.4V	-6	-5.1
		2.7V	-5	-4.8
		3.0V	-6	-4.7
		3.3V	-4	-4.2
		3.6V	-6	-5.0
	DCDCON	2.0V	-5	-2.5
		2.4V	-6	-4.9
		2.7V	-5	-4.5
		3.0V	-4	-4.2
		3.3V	-6	-4.6
		3.6V	-5	-4.8

2.9 Spur and 2nd harmonic

Table 2.9(1) and (2) show the 32 MHz spur testing results on DCDC ON/bypass mode at dBm unit and dBc unit respectively. Table 2.9(3) and (4) show the 32 MHz spur testing results on DCDC ON/bypass mode at dBm unit and dBc unit respectively.

Temp	DCDC	VCC	Min. Spur (dBm)	Avg. Spur (dBm)	Max. Spur (dBm)
25c	DCDCOFF	1.8V	-58.5	-59.4	-60.8
		2.0V	-50.8	-55.1	-59.1
		2.2V	-48.6	-50.5	-53.1
		2.4V	-47.4	-49.4	-52.1
		3.0V	-46.3	-48.7	-51.7
		3.6V	-46.9	-49.0	-52.1
	DCDCON	2.0V	-56.2	-58.1	-59.7
		2.4V	-54.8	-56.8	-59.0
		3.0V	-54.5	-56.8	-59.1
		3.6V	-54.7	-56.6	-58.8
-40c	DCDCOFF	1.8V	-57.3	-58.3	-59.2
		2.0V	-49.2	-53.9	-59.1
		2.2V	-47.3	-49.4	-51.7
		2.4V	-46.6	-48.4	-50.7
		3.0V	-46.4	-48.3	-50.8

		3.6V	-46.7	-48.7	-51.2
	DCDCON	2.0V	-55.5	-57.5	-58.9
		2.4V	-54.0	-56.4	-58.9
		3.0V	-54.0	-56.5	-58.8
		3.6V	-53.8	-56.2	-58.9
85c	DCDCOFF	1.8V	-60.4	-62.7	-64.6
		2.0V	-56.6	-59.2	-62.0
		2.2V	-50.6	-53.3	-56.5
		2.4V	-48.6	-51.7	-55.4
		3.0V	-46.4	-50.2	-54.2
		3.6V	-47.2	-50.0	-52.9
	DCDCON	2.0V	-57.8	-59.7	-62.1
		2.4V	-53.3	-56.9	-59.9
		3.0V	-53.4	-56.9	-60.2
		3.6V	-53.8	-56.7	-59.6

Table 2.9(2) the 32M spur testing results. (Unit: dBc)

Temp	DCDC	VCC	Min. Spur (dBc)	Avg. Spur (dBc)	Max. Spur (dBc)
25c	DCDCOFF	1.8V	-51.42	-52.13	-53.06
		2.0V	-43.86	-48.59	-52.21
		2.2V	-42.84	-44.88	-46.59
		2.4V	-41.76	-44.07	-46.39
		3.0V	-42.47	-44.25	-46.71
		3.6V	-42.96	-44.96	-46.90
	DCDCON	2.0V	-50.82	-51.53	-52.28
		2.4V	-49.70	-50.84	-52.39
		3.0V	-50.14	-50.85	-52.06
		3.6V	-49.87	-50.70	-52.05
-40c	DCDCOFF	1.8V	-49.84	-52.00	-53.11
		2.0V	-42.73	-48.35	-52.63
		2.2V	-41.07	-44.42	-46.48
		2.4V	-41.07	-43.69	-46.31
		3.0V	-41.10	-44.16	-47.05
		3.6V	-42.74	-45.07	-48.12
	DCDCON	2.0V	-50.30	-51.32	-53.35
		2.4V	-49.54	-50.82	-52.52
		3.0V	-49.80	-50.94	-52.13

		3.6V	-49.51	-50.54	-51.73
85c	DCDCOFF	1.8V	-48.57	-49.02	-49.67
		2.0V	-44.81	-47.82	-51.01
		2.2V	-42.75	-44.29	-46.02
		2.4V	-41.38	-43.30	-44.95
		3.0V	-41.00	-42.89	-45.31
		3.6V	-41.86	-43.39	-45.34
	DCDCON	2.0V	-48.80	-49.84	-50.91
		2.4V	-47.09	-48.70	-50.00
		3.0V	-46.87	-48.50	-49.80
		3.6V	-47.53	-48.43	-49.41

Table 2.9(3) the 2nd homonic testing results. (Unit: dBm)

Temp	DCDC	VCC	Min. Spur (dBm)	Avg. Spur (dBm)	Max. Spur (dBm)
25c	DCDCOFF	1.8V	-63.02	-56.80	-51.20
		2.0V	-63.40	-56.01	-49.37
		2.2V	-61.92	-55.49	-49.96
		2.4V	-62.23	-54.92	-49.12
		3.0V	-61.16	-54.62	-49.14
		3.6V	-61.56	-54.57	-48.87
	DCDCON	2.0V	-63.24	-56.65	-50.71
		2.4V	-63.04	-56.58	-50.12
		3.0V	-63.07	-56.60	-50.31
		3.6V	-62.97	-56.60	-50.27
-40c	DCDCOFF	1.8V	-61.92	-55.50	-49.58
		2.0V	-62.07	-54.46	-46.43
		2.2V	-60.23	-53.62	-47.79
		2.4V	-59.79	-52.64	-45.08
		3.0V	-59.49	-52.52	-45.83
		3.6V	-59.39	-52.46	-46.65
	DCDCON	2.0V	-62.17	-54.88	-48.87
		2.4V	-62.16	-55.27	-48.95
		3.0V	-62.03	-55.19	-49.09
		3.6V	-62.24	-55.27	-49.39
85c	DCDCOFF	1.8V	-64.75	-59.36	-54.67
		2.0V	-65.00	-58.39	-52.46
		2.2V	-63.89	-57.50	-52.01

		2.4V	-63.35	-57.13	-52.06
		3.0V	-63.47	-56.87	-51.20
		3.6V	-62.97	-56.57	-51.45
	DCDCON	2.0V	-64.44	-58.60	-53.06
		2.4V	-64.11	-58.25	-52.52
		3.0V	-64.05	-58.30	-52.93
		3.6V	-64.11	-58.18	-52.92

Table 2.9(4) the 2nd homonic testing results. (Unit: dBc)

Temp	DCDC	VCC	Min. Spur (dBc)	Avg. Spur (dBc)	Max. Spur (dBc)
25c	DCDCOFF	1.8V	-56.83	-49.51	-44.24
		2.0V	-58.77	-49.54	-42.50
		2.2V	-57.08	-49.83	-44.50
		2.4V	-56.45	-49.64	-44.87
		3.0V	-57.31	-50.15	-45.80
		3.6V	-57.81	-50.53	-45.27
	DCDCON	2.0V	-57.57	-50.12	-44.83
		2.4V	-57.63	-50.64	-45.13
		3.0V	-57.91	-50.60	-44.49
		3.6V	-57.82	-50.65	-44.88
-40c	DCDCOFF	1.8V	-56.80	-49.19	-44.44
		2.0V	-58.13	-48.86	-42.51
		2.2V	-55.84	-48.60	-43.77
		2.4V	-55.71	-47.94	-42.66
		3.0V	-55.72	-48.38	-43.75
		3.6V	-56.03	-48.84	-44.40
	DCDCON	2.0V	-57.37	-48.70	-43.72
		2.4V	-56.81	-49.72	-44.39
		3.0V	-57.42	-49.66	-44.82
		3.6V	-57.39	-49.63	-44.97
85c	DCDCOFF	1.8V	-52.34	-45.70	-40.70
		2.0V	-56.41	-47.02	-38.48
		2.2V	-54.62	-48.49	-43.09
		2.4V	-55.85	-48.77	-44.20
		3.0V	-57.11	-49.58	-44.28
		3.6V	-57.78	-49.92	-45.33
	DCDCON	2.0V	-55.75	-48.75	-43.56

	2.4V	-57.07	-50.03	-44.35
	3.0V	-56.83	-49.89	-44.56
	3.6V	-57.27	-49.94	-44.96

3.0 Summary

From above characteristic test results, we can summarize as follows:

- (1) The power is around -5 dBm to -11 dBm at 1.8V, 85°C.
- (2) Other items are normal for those tests.
- (3) The average of adjacent channel rejection is about 24dB. High/ Low temperature will be effect a little.
- (4) The average of Co-channel rejection is about -5dB. Temperature effect is not clear.
- (5) The typical power is about 0 dBm (DCDCON) and typical sensitivity is about -95 dBm.