

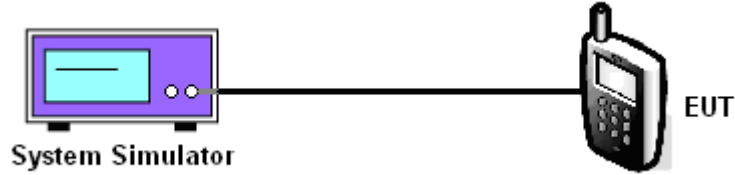
Appendix F. FCC 3G SAR Measurement Procedures

Conducted Output Power:

The EUT was tested according to the requirements of the FCC 3G procedures and the 3.1.2.3.4.

A detailed analysis of the output power verification is provided as the table below:

Function Type	Reverse Traffic Channel	Test Mode	Radio Configuration		Service Option	Data Rates (kbps)	Power Control	Low Ch	Mid. Ch	High Ch
			Forward Traffic Channel (Fwd)	Reverse Traffic Channel (Rvs)				1013	384	777
CDMA2000 Cellular	FCH	1	1	1	55	Full	All Up	24.04	23.86	23.95
		3	3	3	55	Full	All Up	23.93	23.68	23.82
	FCH+SCH	3	3	3	32	FCH:Full,SCH 9.6	All Up	23.92	23.74	23.99

CDMA2000 Setup Configuration:

Setup Configuration

1. The EUT was connected to System Simulator, Agilent 8960. Refer to the drawing of Setup Configuration.
2. The RF path losses were compensated into the measurements.
3. A call was established between EUT and System Simulator with following setting:
 - a. For 1xRTT, set the Radio Configuration and the Service Option
 - b. For 1xEV-DO, set the Protocol Release and Data Rate
 - c. Set the Power Control to All Up Bits
4. The transmitted maximum output power was recorded.

Call Setup Screen									
Call Control		Active Cell Operating Mode					Call Parm		
<div>Close Menu</div>		<div>Mobile Station Information</div> <div> ESN (Hex): ESN (Dec): MCC: MNC: NSIN: Slot Class: Slot Cycle Index: ---- Protocol Revision: </div>					<div>Cell Power</div> <div>-86.00</div> <div>dBm/1.23 MHz</div>		
							<div>Cell Band</div> <div>US PCS</div>		
							<div>Channel</div> <div>1175</div>		
							<div>Protocol Rev</div> <div>6 (IS-2000-0)</div>		
							<div>Radio Config</div> <div>(Fud1, Rvs1)</div>		
							<div>S055 (Loopback)</div>		
							<div>FCH Service Option Setup</div>		
							<div>Value</div>		
							<div>S055 (Loopback)</div>		
							<div>S09 (Loopback)</div>		
					<div>S01 (Voice)</div>				
					<div>S02 (Loopback)</div>				
					<div>S03 (Voice)</div>				
					<div>S06 (SMS)</div>				
					<div>S055 (Loopback)</div>				
					<div>S068 (Voice)</div>				
		<div>Active Cell</div> <div>Idle</div>			<div>Sys Type: IS-2000</div>				
		<div>IntRef</div> <div>Offset</div>						<div>1 of 4</div>	

1xRTT setting for Radio Configuration 1 with Service Option 55

Call Setup Screen									
Call Control	Active Cell Operating Mode						Call Params		
Close Menu	Mobile Station Information ESN (Hex): ESN (Dec): MCC: MNC: MSIN: Slot Class: Slot Cycle Index: ---- Protocol Revision:						Cell Power -86.00 dBm/1.23 MHz Cell Band US PCS Channel 1175		
	FCH Service Option Setup						Value		
	Service Option for Fud3, Rvs3						S055 (Loopback)		
	Service Option for S01 (Voice)						S09 (Loopback)		
	Service Option for S02 (Loopback)						S055 (Loopback)		
	Service Option for S03 (Voice)						S055 (Loopback)		
	Service Option for S06 (SRS)						S055 (Loopback)		
	S055 (Loopback)								
	S032 (+ F-SCH)								
							Protocol Rev 6 (IS-2000-0)		
						Radio Config (Fud3, Rvs3) S055 (Loopback)			
						FCH Service Option Setup			
Active Cell						Sys Type: IS-2000			
Idle									
IntRef Offset									
						1 of 4			

1xRTT setting for Radio Configuration 3 with Service Option 55

Call Setup Screen									
Call Control	Active Cell Operating Mode						Call Params		
Close Menu	Mobile Station Information ESN (Hex): ESN (Dec): MCC: MNC: MSIN: Slot Class: Slot Cycle Index: ---- Protocol Revision:						Cell Power -86.00 dBm/1.23 MHz Cell Band US PCS Channel 1175		
	FCH Service Option Setup						Value		
	Service Option for Fud3, Rvs3						S055 (Loopback)		
	Service Option for S02 (Loopback)						S09 (Loopback)		
	Service Option for S03 (Voice)						S032 (+ SCH)		
	Service Option for S06 (SRS)						S055 (Loopback)		
	S055 (Loopback)						S055 (Loopback)		
	S032 (+ F-SCH)								
	S032 (+ SCH)								
							Protocol Rev 6 (IS-2000-0)		
						Radio Config (Fud3, Rvs3) S032 (+ SCH)			
						FCH Service Option Setup			
Active Cell						Sys Type: IS-2000			
Idle									
IntRef Offset									
						1 of 4			

1xRTT setting for Radio Configuration 3 with Service Option 32

Call Setup Screen									
Call Control		Active Cell Operating Mode					Call Params		
Operating Mode		Access Terminal Information (AT Reported) Session Seed: Hardware ID Type (Hex): Hardware ID (Hex): Hardware ID (Decimal):					Rvs Power Ctrl		
Active Cell							Rvs Power Ctrl	Active bits	
		Access Terminal Information (AN Assigned) UATI 024: ---- UATI Color Code: ---- NAC Index: ----					Pur Ctrl Step	1.0 dB	
Start Data Connection							Call Drop Timer	On	
		Protocol Release Session App: 0 (1xEV-DO) Test Applica: A (1xEV-DO-A) Limited TAP: B (1xEV-DO-B) AT Directed: DRC Value Fi: ACK Channel:					Call Limit Mode	Off	
Close Session							Protocol Rel	0 (1xEV-DO)	
		Active Cell Idle					Sys Type: IS-856		
Handoff Setup									
AT Max Power	23 dBm/1.23MHz								
1 of 3		IntRef	Offset	PLSub0	RTAP	2 of 3			

1xEV-DO setting for Protocol Release (Rev.0 or Rev.A)

Call Setup Screen									
Call Control		Active Cell Operating Mode					Call Params		
Operating Mode		Access Terminal Information (AT Reported) Session Seed: Hardware ID Type (Hex): Hardware ID (Hex): Hardware ID (Decimal):					Cell Power	-86.00	
Active Cell							Cell Power	dBm/1.23 MHz	
		Access Terminal Information (AN Assigned) UATI 024: ---- UATI Color Code: ---- NAC Index: ----					Cell Band	US PCS	
Start Data Connection							Channel	1175	
		RTAP Rate Session App: 9.6 kbps Test Applica: 19.2 kbps Limited TAP: 38.4 kbps AT Directed: 76.8 kbps DRC Value Fi: 153.6 kbps ACK Channel:					Application Config		
Close Session							FTAP Rate	307.2 kbps (2 Slot, QPSK)	
		Active Cell Idle					Sys Type: IS-856		
Handoff Setup									
AT Max Power	23 dBm/1.23MHz						RTAP Rate		9.6 kbps
1 of 3		IntRef	Offset	PLSub0	RTAP	1 of 3			

1xEV-DO setting for RTAP data rate (9.6 or 38.4 or 153.6 kbps)



Call Setup Screen						
Call Control	Active Cell Operating Mode				Call Params	
Operating Mode	Access Terminal Information (AT Reported)				Cell Power	
Active Cell					-86.00	
	Session Seed:				dBm/1.23 MHz	
	Hardware ID Type (Hex):				Cell Band	
	Hardware ID (Hex):				US PCS	
	Hardware ID (Decimal):				Channel	
	Access Terminal Information (AN Assigned)				1175	
Start Data Connection	UATI 024: ----					
	UATI Color Code: ----				Application Config	
	MAC Index: ----				F-Traffic Format	
Close Session	Application Configuration				4 (1024,2,128)	
	Session App: R-Data Packet Size				(307.2k, QPSK)	
	Enhanced Te: 128				R-Data Pkt Size	
	AT Directed: 256				128	
	DRC Value Fi: 512				bits	
Handoff Setup	ACK Channel: 768					
	ACK Channel: 1024					
AT Max Power	Reverse Data: 1536					
23 dBm/1.23MHz	Expected En: 1536					
	Active Cell		Sys Type: IS-856			
	Idle					
1 of 3	IntRef	Offset	PLSub0	RETAP	1 of 3	

1xEV-DO setting for RETAP data rate (128 or 2048 or 12288 kbps)

Reference:

- [1] SAR Measurement Procedures for 3G Devices CDMA 2000/Ev-Do/WCDMA/HSDPA, June 2006
Laboratory Division Office of Engineering and Technology Federal Communications Commission
- [2] 3.1.2.3.4 Maximum RF Output Power 3GPP2 C.S0033-0 Version 2.0, Date: 12 December 2003
Recommended Minimum Performance Standards for cdma2000 High Rate Packet Data Access Terminal