Declaración de Información Comercial y Técnica - Chile

Información Comercial	
Fecha	2026/07/22
Nombre comercial del equipo	MAG X870E GAMING PLUS MAX WIFI
Fabricante	Micro-Star INT'L CO., LTD.
Importador o representante en Chile	Samual Rojas
Domicilio (en Chile) del fabricante	Nevado de Chillan 19413, Santiago
Correo electrónico de contacto	Samuelrojas@msi.com
Sitio web	https://latam.msi.com/

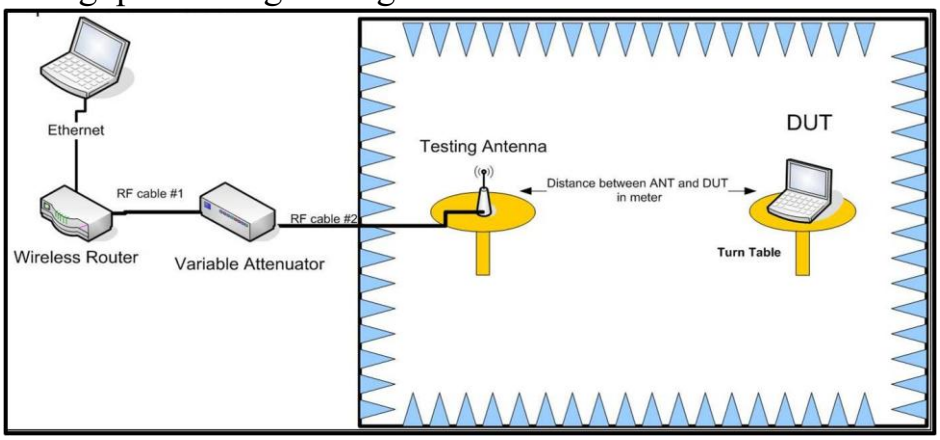
Características técnicas	
Tipo de equipo	Placa Madre
Marca	MSI
Modelo	PRO X870E-P WIFI
Tecnología / Modulación	Bluetooth/Wi-Fi
Bandas de frecuencias	BT/BLE: 2402-2483.5MHz; WLAN 2.4G: 2402-2483.5MHz; WLAN 5G: 5.2G 5150-5350MHz 5.6G 5470-5725MHz 5.8G 5725-5895MHz WLAN 6G: 5925-7125MHz
Ganancia de antena (dBi)	BT/WLAN 2.4G: < 3.18 dBi WLAN 5G: < 4.92 dBi WLAN 6G: 6.2GHz 5925-6425MHz < 4.76 dBi 6.5GHz 6425-6525MHz < 4.29 dBi 6.7GHz 6525-6875MHz < 4.61 dBi 7.0 GHz 6875-7125MHz < 4.09 dBi
Max EIRP	BT/WLAN 2.4G: < 36 dBm WLAN 5G: 5150-5350MHz < 30dBm 5470-5725MHz < 30dBm 5725-5895MHz < 36dBm WLAN 6G: 5945-6425MHz <24dBm

Módulos RF usados	Chip: MT7927 Wi-Fi 7 - 802.11 a/b/g/n/ac/ax /be

	Bluetooth 5.4
Declaración de conformidad	El equipo previamente individualizado cumple con las disposiciones establecidas en la Norma Técnica de Equipos de alcance reducido, aprobada por la resolución exenta N° 1.985, de 2017, de la Subsecretaría de Telecomunicaciones

1. WLAN Throughput Test

1-1 WLAN Throughput Testing Configuration:



Total Attenuation=Air Loss (path loss) + Loss of 2 cables + Attenuator - Testing antenna gain = 75dB

1-2 WLAN Waterfall Throughput Test (Worst channel)

☒(1) 802. 11n 40MHz (2.4 – 2.5GHz)

Throughput (Mbps)

2.4 GHz chamber total path loss valu	63.0 dB
AP Transmit power	30.0 dBm
Access point	Wi-Fi 7 AP RT-BE96U
Access point software version	
Turntable continuous rotation speed	1 RPM

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	Receive Level (dB) = AP TX - TPL - Att		1	2	3	4	5	6	Channel				Select 1-5 Spec.
Attenuator setting (dB)	Total loss (Chamber + Attenuator)	2.4GHz Receive Level (dBm)	1 SS N RX (20MHz BW)	2 SS N RX (20MHz BW)	2SS N RX (40MHz BW)	1 SS AX RX (40MHz BW)	2 SS AX RX (40MHz BW)	2 SS BE RX (40MHz BW)	1	6	11	RX Result (Mbps)	5 Spec.
21	84	-54	40	80	180	170	345	415	362.5	339.5	357.5	353.2	345
33	96	-66	20	50	110	100	210	250	236.6	244.5	226.8	236.0	210
39	102	-72	15	30	60	55	115	140	156.8	155.5	153.6	155.3	115
42	105	-75	3	15	35	35	70	80	106	100	111	105.7	70

	Receive Level (dB) = AP TX - TPL - Att		1	2	3	4	5	6	Channel				Select 1-5 Spec.
Attenuator setting (dB)	Total loss (Chamber + Attenuator)	2.4GHz Receive Level (dBm)	1 SS N RX (20MHz BW)	2 SS N RX (20MHz BW)	2SS N RX (40MHz BW)	1 SS AX RX (40MHz BW)	2 SS AX RX (40MHz BW)	2 SS BE RX (40MHz BW)	1	6	11	TX Result (Mbps)	5 Spec.
21	84	-54	40	80	180	170	345	415	384.5	365.2	372.6	374.1	345
33	96	-66	20	50	110	100	210	250	265.4	266.8	254.1	262.1	210
39	102	-72	15	30	60	55	115	140	133.5	134.2	133.6	133.8	115
42	105	-75	3	15	35	35	70	80	107	112	105	107.8	70

☒(1) 802. 11AC 80MHz (5.15 – 5.85GHz)

76.0 dB
24.0 dBm
Wi-Fi 7 AP RT-BE96U
1 RPM

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1	2	3	4	5	Channel				Select 1-5 Spec.
1 SS AC RX (80MHz BW) 1	2 SS AC RX (80MHz BW) 2	1SS AX RX (80MHz BW) 3	2 SS AX RX (80MHz BW) 4 1 SS AX RX (160MHz BW) 4	2 SS BE RX (160MHz BW) 5	36	100	149 (160MHz no support)	RX Result (Mbps)	5 Spec.
200	400	550	1105	1325	1855.3	1772.4		1813.8	1325
150	300	415	830	995	1097.1	1021.0		1059.1	995
120	250	345	690	830	846.2	876.5		861.4	830
80	180	290	480	575	580	584		581.5	575

1	2	3	4	5	Channel				Select 1-5 Spec.
1 SS AC RX (80MHz BW) 1	2 SS AC RX (80MHz BW) 2	1SS AX RX (80MHz BW) 3	2 SS AX RX (80MHz BW) 4 1 SS AX RX (160MHz BW) 4	2 SS BE RX (160MHz BW) 5	36	100	149 (160MHz no support)	TX Result (Mbps)	5 Spec.
150	300	415	830	1000	1423.5	1366.6		1395.1	1000
110	220	305	610	730	723.5	821.4		772.5	730
60	130	180	360	435	495.2	568.4		531.8	435
40	90	125	250	300	360	405		382.5	300

☒(1) 802.11 BE 160MHz (5.925 – 7.125GHz)

Throughput (Mbps)

5 GHz chamber total path loss value	83.0 dB
AP Transmit power	24.0 dBm
Access point	Wi-Fi 7 AP RT-BE96U
Access point software version	
Turntable continuous rotation speed	1 RPM

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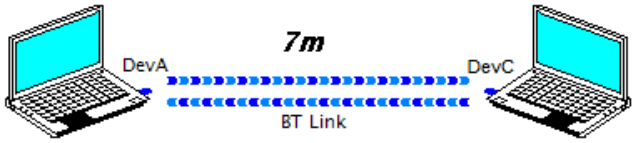
Receive Level (dB) = AP TX - TPL - Att		1	2	3	4	Channel			Select 1-5 Spec.
Total loss (Chamber + Attenuator)	2.4GHz Receive Level (dBm)	2 SS AX RX (80MHz BW) 1 1 SS AX RX (160MHz BW) 1	2 SS AX RX (160MHz BW) 2	2SS BE RX (160MHz BW) 3	2 SS BE RX (320MHz BW) 4	37 37-2(320MHz)	117 117-2(320MHz)	RX Result (Mbps)	2 Spec.
62	-38	610	1,250	1,495	2990	3369.5	3256.5	3313.0	1250
84	-60	450	900	1,075	2150	2436.5	2263.5	2350.0	900
90	-66	160	350	415	835	1862.3	1841.2	1851.8	350
99	-75	100	200	230	460	826	814	820.2	200
105	-81	50	100	120	240	433.2	440.1	436.7	100

Receive Level (dB) = AP TX - TPL - Att		1	2	3	4	Channel			Select 1-5 Spec.
Total loss (Chamber + Attenuator)	2.4GHz Receive Level (dBm)	2 SS AX RX (80MHz BW) 1 1 SS AX RX (160MHz BW) 1	2 SS AX TX (160MHz BW) 2	2SS BE TX (80MHz BW) 3	2 SS BE TX (320MHz BW) 4	37 37-2(320MHz)	117 117-2(320MHz)	TX Result (Mbps)	2 Spec.
62	-37	400	800	1,495	2990	2268.6	2563.7	2416.1	800
84	-60	170	350	1,075	2150	1666.9	1688.5	1677.7	350
90	-66	70	160	415	835	1047.1	966.6	1006.8	160
99	-75	40	80	230	460	484	445.6	464.6	80
105	-81	20	50	120	240	285.6	255.6	270.6	50

2. Bluetooth Throughput Test

2-1 Bluetooth Throughput Testing Configuration:

A. Test tool: IxChariot v5.40 or later
B. BT use PAN profile link
C. Distance between 2 DUT : 7m
D. Pass criteria > 0.3 Mbps
E. Open space test



PS: No barriers between the two DUT

2-2 Bluetooth Throughput Test Result

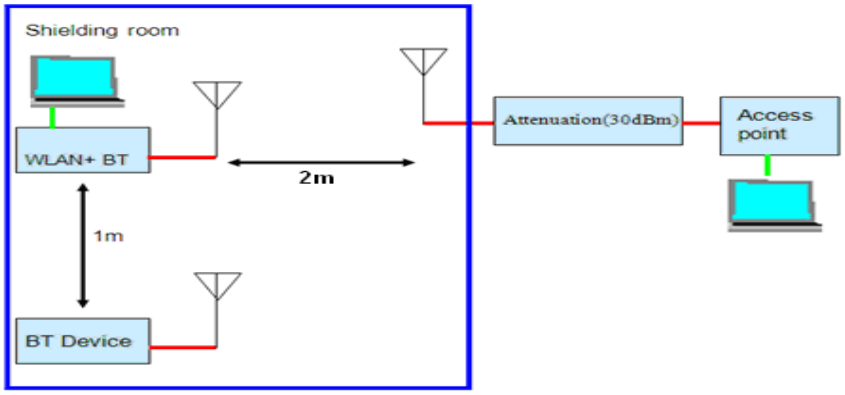
BT Profile	Degree	UL Throughput (Mbps)	DL Throughput (Mbps)	Criteria
PAN				>0.3Mbps
PAN				
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3. WLAN & BT Coexistence Test

3-1 WLAN & BT Coexistence Testing Configuration:

1. Antenna isolation > 15 dB (recommended > 20 dB)
2. Combo module (BT+WLAN) antenna isolation > 20 dB
3. In the shielding room test



3-2 WLAN & BT Coexistence Test Result: (Wi-Fi Lab 1)

☐11n 20M		☐11n 40M		Spec.			
Att. (dB)	**Receive Level**	CH1		20M		40M	
		WLAN Throughput (Mbps)		1 X 1	2 X 2	1 X 1	2 X 2
66	-38	TX	127.4	28	41	42	59
		RX	94.1				
76	-48	TX	90.1	18	26	33	47
		RX	63.2				
86	-58	TX	88.6	11	16	13	24
		RX	55.6				

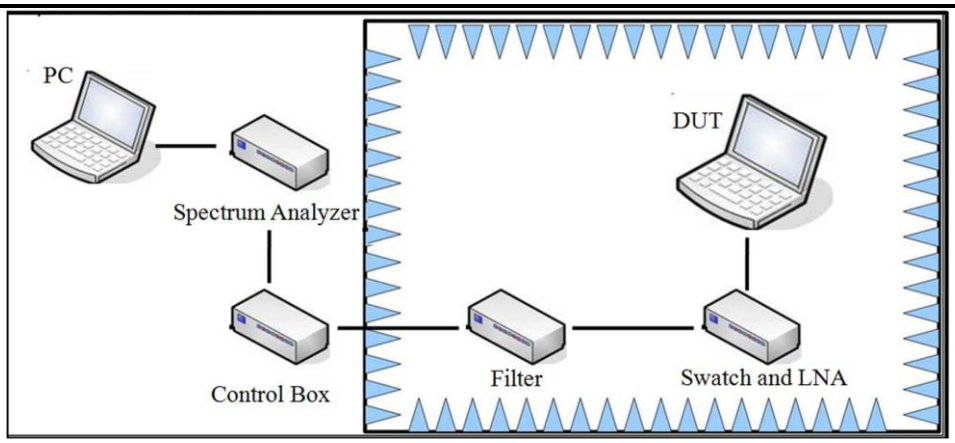
96	-68	TX	X	0	0	0	0
		RX	X				
101	-73	TX	X	0	0	0	0
		RX	X				

Att. (dB)	Receive Level	CH6		Spec.			
		WLAN Throughput (Mbps)		1 X 1	2 X 2	1 X 1	2 X 2
66	-38	TX	133.6	31	43	41	61
		RX	109.6				
76	-48	TX	113.1	19	27	32	43
		RX	80.5				
86	-58	TX	90.6	11	17	12	27
		RX	56.4				
96	-68	TX	X	0	0	0	0
		RX	X				
101	-73	TX	X	0	0	0	0
		RX	X				

Att. (dB)	Receive Level	CH11		Spec.			
		WLAN Throughput (Mbps)		1 X 1	2 X 2	1 X 1	2 X 2
66	-38	TX	135.4	32	43	39	57
		RX	114.6				
76	-48	TX	100.7	18	23	28	41
		RX	86.5				
86	-58	TX	66.6	11	14	13	27
		RX	30.5				
96	-68	TX	X	0	0	0	0
		RX	X				
101	-73	TX	X	0	0	0	0
		RX	X				

4. Platform Noise Test

4-1 Platform Noise Testing Configuration: With Burn-in Test



4-2 Platform Noise Test Result:

WLAN(2.4G): Start(2.4GHz) ~ Stop(2.5GHz) for Main Antenna	
☐MAX : -97dB / -87dB (Board Band/ Narrow Band)	☒Average : -107dB / -97dB (Board Band/ Narrow Band)

WLAN(5G): Start(5.1GHz) ~ Stop(5.8GHz) for Main Antenna	
☐MAX : -97dB / -87dB (Board Band/ Narrow Band)	☒Average : -107dB / -97dB (Board Band/ Narrow Band)

WLAN(6E): Start(5.925GHz) ~ Stop(7.125GHz) for Main Antenna	
☐MAX : -97dB / -87dB (Board Band/ Narrow Band)	☒Average : -107dB / -97dB (Board Band/ Narrow Band)

WLAN(6E) : Start(5.925GHz) ~ Stop(7.125GHz) for Aux	
☐MAX : -97dB / -87dB (Board / Narrow)	☒Average : -107dB / -97dB (Board / Narrow)