

POWER SUPPLY LOAD TEST

MAKE: MOTOROLA **MODEL:** TPN1154A **DATE:** 11-Jun-11

CONT. RATING: UNK **INT. RATING:** UNK **SERIAL:** NONE

AC MAINS FUSE: 5A FB **REMARKS:** SEE NOTES 1-5 BELOW

LOAD AMPS	OUTPUT VOLTS	OUTPUT WATTS	AC INPUT VOLTS	AC INPUT AMPS	AC INPUT WATTS	AC INPUT VA	AC INPUT PF	OVERALL EFFICIENCY
0.0	14.91	0.0	122.8	0.18	12	22	0.54	0%
1.0	14.85	14.9	122.9	0.46	38	57	0.67	39%
2.0	14.81	29.6	122.9	0.76	64	93	0.69	46%
3.0	14.77	44.3	122.8	1.04	90	128	0.70	49%
4.0	14.72	58.9	122.6	1.32	116	162	0.72	51%
5.0	14.68	73.4	122.5	1.57	141	192	0.73	52%
6.0	14.64	87.8	122.5	1.83	166	224	0.74	53%
7.0	14.60	102.2	122.4	2.07	191	253	0.75	54%
8.0	14.56	116.5	122.4	2.31	216	283	0.76	54%
9.0	14.53	130.8	122.4	2.54	241	311	0.78	54%
10.0	14.49	144.9	122.2	2.77	265	338	0.78	55%
11.0	14.45	159.0	122.2	2.99	290	365	0.79	55%
12.0	14.41	172.9	122.1	3.22	314	393	0.80	55%
13.0	14.36	186.7	122.0	3.43	339	418	0.81	55%
14.0	14.32	200.5	122.0	3.66	363	447	0.81	55%
15.0	14.28	214.2	122.0	3.86	386	471	0.82	55%
16.0	14.23	227.7	121.8	4.07	410	496	0.83	56%
17.0	14.18	241.1	121.7	4.26	434	518	0.84	56%
18.0	14.13	254.3	121.6	4.46	457	542	0.84	56%
19.0	14.04	266.8	121.5	4.65	481	565	0.85	55%
20.0	13.91	278.2	121.5	4.86	503	590	0.85	55%
21.0	13.69	287.5	121.4	5.05	527	613	0.86	55%

NOTE 1: THIS SUPPLY SHOULD NOT BE LOADED ABOVE 20 AMPS, DUE TO THE MAINS FUSE RATING- BUT SEE NOTE 2.

NOTE 2: LOADS ABOVE 16.7 AMPS WILL EXCEED THE POWER RATING OF THE EMITTER RESISTORS R12 AND R13.

NOTE 3: THE TPN1154A WAS USED AS A BASE/CONTROL POWER SUPPLY FOR THE HIGH-POWER MCX-100 RADIO.

NOTE 4: THE TPN1154A IS PHYSICALLY AND ELECTRICALLY IDENTICAL TO THE HPN3000A POWER SUPPLY.

NOTE 5: THE OUTPUT VOLTAGE CAN BE REDUCED TO 13.8 VDC BY ADDING A 5.6k RESISTOR ACROSS R7.