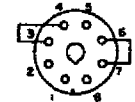


POWER SUPPLY FOR 6 VOLT OPERATION —
MODEL XP-4

NOTE: —
BAND SWITCH SHOWN
ON NO. 1 BAND.

DUMMY PLUG WHICH MUST
BE IN SOCKET "P" FOR
A.C. OPERATION

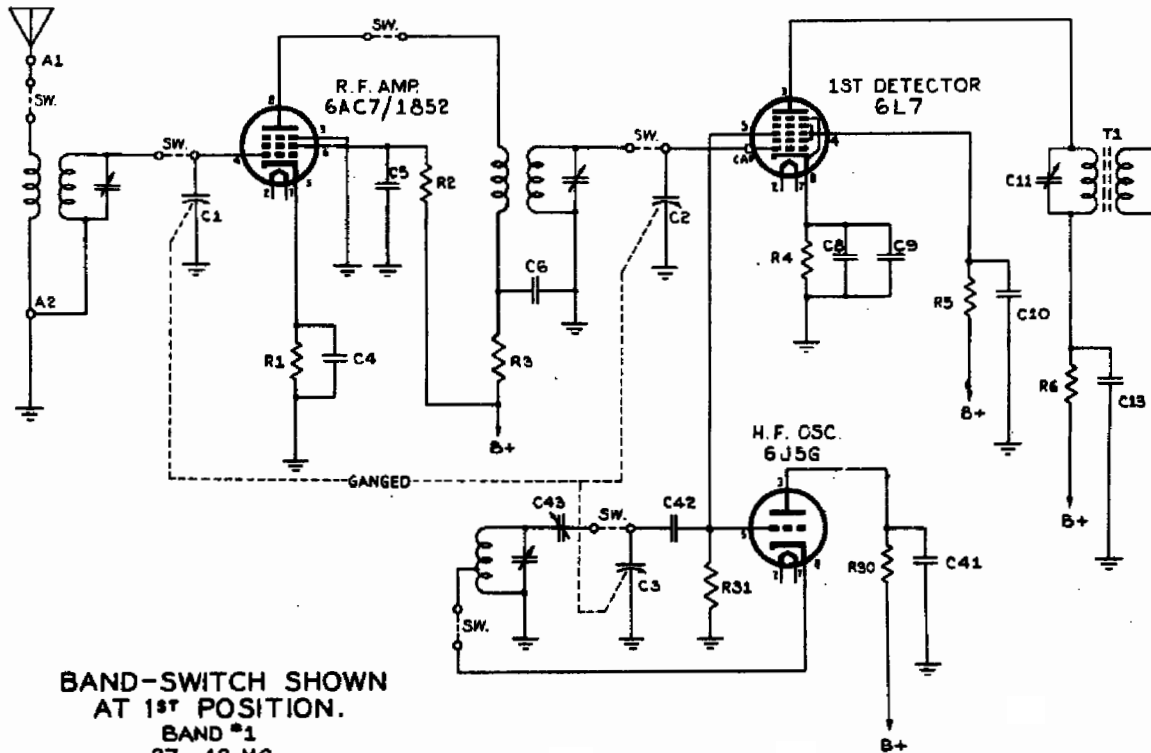


IF PEAK 1600 KC

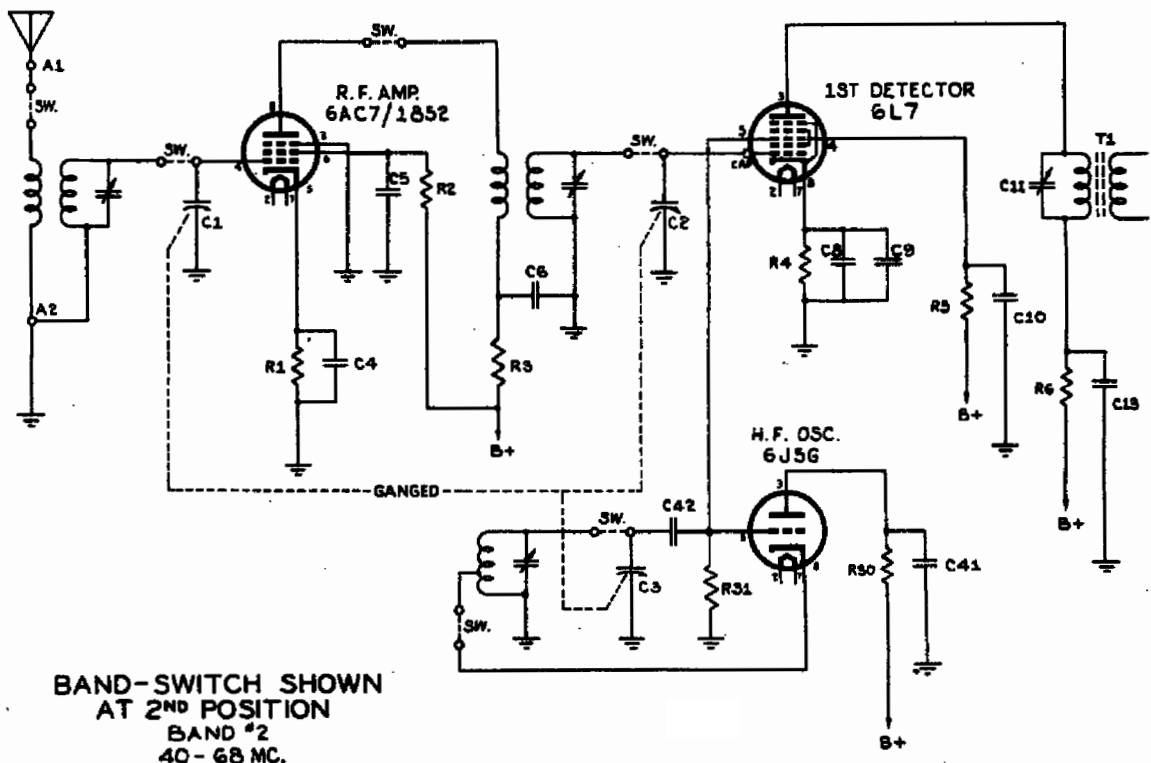
For Parts List, see P.15-56

THE HALLICRAFTERS CO.

MODEL Skyrider 5-10
S21



BAND-SWITCH SHOWN
AT 1ST POSITION.
BAND #1
27 - 42 MC.



BAND-SWITCH SHOWN
AT 2ND POSITION
BAND #2
40 - 68 MC.

ALIGNMENT PROCEDURE FOR SKYRIDER "5-10" Model 521

Intermediate Frequency Alignment

Have the controls set as follows:

- Broad-sharp switch to sharp position.
- A.V.C. - B.F.O. switch in "OFF" position.
- Set R. F. and A. F. gain controls at maximum.
- Set band switch on Band #1.
- Adjust main dial to minimum capacity or #24 on the Vernier scale.
- Remove the 6L7 grid cap - connect the signal generator to this tube, through an .01 mfd condenser.
- Now set the signal generator for 1800 KC output.
- Adjust trimmers on T1, T2, T3 transformer for exact resonance which will be indicated by maximum output.

For adjustment of the Beat Frequency Oscillator turn the knob on the "pitch control" unit until the dot is straight up. Remove modulation from the 1800 KC signal being fed into the I. F. amplifier and then adjust T4 for zero beat.

R. F. Alignment

Replace the 0.1 mfd condenser in series with the generator to the receiver with a 400 ohm resistor. Connect the generator to the A1 terminal on the antenna terminal strip to be found on the rear apron of the chassis. Leave the jumper connected between A2 and G. There is only one pad adjustment on the "5-10" receiver and that is for the low frequency end of Band #1. This pad is adjusted from the top of the chassis.

Band #1

Place the band switch on Band #1. Set the generator and tuning dial to 38 mc and adjust pad C43 for maximum signal. Reset tuning dial and generator to 40 mc and set oscillator trimmer CA. Now recheck pad C43 and trimmer CA until no change in frequency calibration is noted. When this is accomplished adjust trimmers CB, CC for maximum gain. When making these latter adjustments it is advisable to "rock" the tuning control slightly until the point of exact resonance and maximum output is obtained.

Band #2

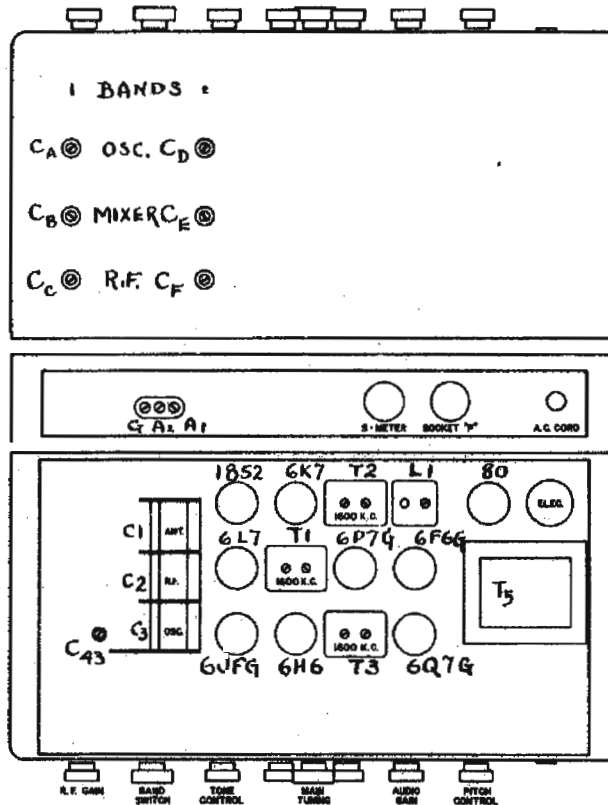
Set signal generator and tuning dial to 60 mc and adjust oscillator trimmer CD to signal. Then adjust CE, CF for maximum gain, slightly rocking the tuning gang while making the adjustment.

There is no pad on Band #2.

NOTE: Should the noise picked up by the receiver interfere seriously with the alignment, increase the signal generator output and reduce the R. F. gain. The noise limiter may also be left on during alignment.

The SKYRIDER "5-10" draws 74 watts at 117 volts 60 cycle A.C.

- Band 1 - 27 MC to 42 MC
- Band 2 - 40 MC to 68 MC
- 1852 - R. F. Amplifier
- 6L7 - First Detector
- 6J5 - High Frequency Oscillator
- 6K7 - 1st I. F. Amplifier
- 6P7G - 2nd I. F. Amplifier, B.F.O.
- 6Q7G - 2nd Detector, A.V.C., 1st Stage of Audio
- 6F6G - Audio Output tube
- 80 - Rectifier



NO.	OHMS	WATTAGE	PARTS NO.	NO.	CAPACITY	TYPE	VOLTAGE	PARTS NO.
R1	180	1/3	22-011	C8	.02 mfd.	mica		40-013
2	100,000	1/3	20-093	9	.05 "	"	200	41-004
3	1,000	1/3	20-033	10	.05 "	"	400	41-005
4	800	1/3	22-125	11	Tuning Condenser in I.F. Transformer			
5	30,000	1	22-075	12	"	"	"	"
6	2,500	1/3	22-044	13	.01 mfd.	"	400	41-001
7	100,000	1/3	20-093	14	.01 "	"	200	41-000
8	500	1/3	22-026	15	.05 "	"	400	41-005
9	10,000	R.F. Gain Control	25-029	16	.01 "	"	400	41-001
10	2,500	1/3	22-044	17	Tuning Condenser in I.F. Transformer			
11	100,000	1/3	20-093	18	"	"	"	"
12	500	1/3	24-040	19	.01 mfd.	"	400	41-001
13	50,000	1/3	20-084	20	.25 "	"	400	
14	50,000	1/2	22-082	21	.01 "	"	200	41-000
15	1,000	1/3	20-033	22	.01 "	"	400	41-001
16	20,000	1/3	22-071	23	.00025 "	mica		40-024
17	1,000,000	1/3	20-018	24	Pad	"		
18	500,000	Tone Control	25-018	25	.00025 "	air		48-021
19	100,000	1/3	20-093	26	.01 "	"	400	41-001
20	100,000	1/3	20-093	27	Tuning Condenser in I.F. Transformer			
21	250,000	1/3	20-099	28	"	"	"	"
22	300	1/3	20-021	29	.02 mfd.	"	400	41-002
23	500,000	A.F. Gain Control	25-031	30	.0001 "	mica		40-003
24	25,000	1	20-073	31	.02 "	"	400	41-002
25	20,000	1	20-070	32	.0001 "	mica		40-003
26	150	1/3	22-011	33	.05 "	"	200	41-004
27	100,000	1/3	20-093	34	.1 "	"	200	41-008
28	500	1/3	24-040	35	.0001 "	mica		40-003
29	500,000	1/3	22-101	36	.01 "	"	400	41-001
30	10,000	1	20-061	37	.01 "	"	600	45-002
31	50,000	1/3	20-084	38	.01 "	"	600	45-002
32	5,000	2		39	20. "	"	25	42-025
				40	.05 "	"	400	41-005
				41	.002 "	mica		40-013
				42	.0001 "	"		40-003
				43	.400 mmfd.	Pad		44-037
				44	10. "	mfd.	450	
				45	10. "	"	450	42-024
				46	10. "	"	450	
				47	.01 "	"	600	45-002
				81	A.V.C. - B.F.O. On-Off Switch			
				82	Automatic Noise Limiter and I.F. Expander Switch			
				83	A.C. On-Off Switch on Tone Control			
				84	Stand By SPST			
				85	Meter Switch on R.F. Gain Control			

CONDENSER PARTS LIST - SKYRIDER 5-10 Model S21

NO.	CAPACITY	TYPE	VOLTAGE	PARTS NO.
C1		main		
2	80 mmfd per section	tuning		48-033
3		gang		
4	.005 mfd.	mica		
5	.002 "	"		40-013
6	.01 "	"	400	41-001
7	.01 "	"	600	45-002