

(2)

~~TOP SECRET~~

FY 1967

Annual Ave.

Band (MHz)	System	Looks/Day System	Total	Full Task	FSW	Full Task Full Sw
125-155	Multigroup	.10	.10	.11	.10	.11
155-165	Multigroup	.10				
	Poppy (7104)	.07				
	Poppy (7105)	.26	.43	4.41	.58	6.48
165-184	Multigroup	.10				
	Poppy (7104)	.07				
	Poppy (7105)	.26	.43	4.41	.58	6.48
184-200	Multigroup	.10				
	Poppy (7104)	.07				
	Poppy (7105)	.26	.43	4.41	.58	6.48
200-230	Multigroup	.10	.17	.11	.10	.11
230-245	Multigroup	.10				
	Poppy (7104)	.07	.17	.99	.20	1.41
245-550	Multigroup	.10	.10	.11	.10	.11
550-650	Multigroup	.10				
	Poppy (7104)	.07				
	Poppy (7105)	.26	.43	4.41	.58	6.48
650-820	Multigroup	.10				
	Poppy (7105)	.26	.36	3.53	.48	5.16
820-920	Multigroup	.10				
	Poppy (7104)	.07				
	Poppy (7105)	.26	.43	4.41	.58	6.48
920-1085	Multigroup	.10				
	Poppy (7104)	.07	.17	.99	.20	1.41
1085-1800	Multigroup	.10				
1800-2000	Multigroup	.10				
	Poppy (7105)	.32	.42	3.97	.57	5.81
2000-2100	Multigroup	.10				
	Poppy (7105)	.32				
	Sampan	1.43	1.85	6.83	3.43	11.61
2100-2500	Poppy (7105)	.32				
	Sampan	1.43	1.75	6.72	3.33	11.50
2500-2580	Sampan	1.43	1.43	2.86	2.86	5.72
2580-2600	Poppy (7105)	.26				
	Sampan	1.43	1.69	6.48	3.24	10.77
2600-2650	Poppy (7105)	.26				
	Sampan	1.43				
	Setter I	.12	1.81	6.60	3.36	10.89
2650-2830	Poppy (7104)	.07				
	Poppy (7105)	.26				
	Sampan	1.43				
	Setter I	.12	1.88	7.48	3.46	12.19

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Band (MHz)	System	Annual Ave. Weeks/Day	Full Task		
			FSW	Full Task	Full Sw
2830-2900	Poppy (7104)	.07			
	Sampan	1.43			
	Setter I	.12	1.62	3.86	3.08 7.14
2900-2930	Sampan	1.43			
	Setter I	.12	1.55	2.98	2.98 5.84
2930-2960	Poppy (7104)	.07			
	Poppy (7105)	.26			
	Sampan	1.43	(1.55)	(2.98)	(2.98) (5.84)
	Setter I	.12	1.88	7.48	3.46 12.19
2960-3090	Poppy (7104)	.07			
	Poppy (7105)	.26			
	Sampan	1.43			
	Setter I	.12	(1.67)	(3.10)	(3.10) (5.96)
	Setter II	.12	2.00	7.60	3.58 12.31
3090-3180	Poppy (7105)	.26			
	Sampan	1.43			
	Setter I	.12	(1.67)	(3.10)	(3.10) (5.96)
	Setter II	.12	1.93	6.52	3.48 11.01
3180-3215	Poppy (7104)	.07			
	Poppy (7105)	.26			
	Sampan	1.43			
	Setter I	.12	(1.67)	(3.10)	(3.10) (5.96)
	Setter II	.12	2.00	7.60	3.58 12.31
3215-3310	Poppy (7104)	.07			
	Poppy (7105)	.26			
	Sampan	1.43	(1.55)	(2.98)	(2.98) (5.84)
	Setter I	.12	1.88	7.48	3.46 12.19
3310-4000	Sampan	1.43	1.43	2.86	2.86 5.72
4000-4850	Tripos I	.82			
	Tripos II	1.30	2.12	4.24	4.24 8.48
4850-4900	Poppy (7104)	.07			
	Tripos I	.82			
	Tripos II	1.30	2.19	5.12	4.34 9.78
4900--930	Poppy (7104)	.07			
	Tripos I	.82			
	Tripos II	1.30			
	Fanion I	.82			
	Fanion II	1.30	(5.01)	(10.12)	(10.12) (20.24)
	Fanion III	.82	5.13	11.00	10.22 21.54

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Looks, per day against Missile Control Radars

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Band (MHz)	System	Annual Ave.		Full Task	FSW	Full Task Full Sw
		Looks/Day	Total			
4930-5070	Poppy (7104)	.07				
	Poppy (7105)	.32				
	Tripes I	.82				
	Tripes II	1.30				
	Fanion I	.82				
	Fanion II	1.30	(5.06)	(10.12)	(10.12)	(20.24)
	Fanion III	.80	5.45	14.86	10.69	27.24
5070-5100	Poppy (7104)	.07				
	Tripes I	.82				
	Tripes II	1.30				
	Fanion I	.82				
	Fanion II	1.30	(5.06)	(10.12)	(10.12)	20.24
	Fanion III	.82	5.13	11.00	10.22	21.54
5100-5300	Poppy (7104)	.07				
	Tripes I	.82				
	Tripes II	1.30	(2.94)	(5.88)	(5.88)	(11.76)
	Fanion III	.82	3.01	6.76	5.98	13.06
5300-5350	Poppy (7104)	.07				
	Tripes I	.82				
	Tripes II	1.30	2.17	5.12	4.38	9.78
5350-6500	Tripes I	.82				
	Tripes II	1.30	2.12	4.24	4.24	8.48
6500-6700	Poppy (7105)	.32				
	Tripes I	.82				
	Tripes II	1.30	2.44	8.10	4.71	14.18
6700-7850	Tripes I	.82				
	Tripes II	1.30	2.12	4.24	4.24	8.48
7850-8000	Poppy (7105)	.32				
	Tripes I	.82				
	Tripes II	1.30	2.44	8.10	4.71	14.81
8000-9000	Poppy (7105)	.32				
	Sousea	1.43	1.75	6.72	3.33	11.42
9000-9300	Poppy (7105)	.32				
	Sousea	1.43				
	Xylene	.82	2.57	8.36	4.71	14.70
9300-9500	Poppy (7105)	.32				
	Sousea	1.43	1.75	6.72	3.33	11.42
9500-12000	Sousea	1.43	1.43	2.86	2.86	5.72

~~TOP SECRET~~

AR 2-11
S-11
CONTROL SYSTEM ONLY

~~TOP SECRET~~

(3)

EW (2000 MHz) FY 67

<u>Band (MHz)</u>	<u>(Ann. Ave.) L/Day</u>	<u>Δ MHz</u>	<u>Weighted Average 1.8 Looks per day per M.L.</u>
125-155	.10	30	3.00
155-200	.43	45	19.35
200-230	.10	30	3.00
230-245	.17	15	2.55
245-550	.10	305	30.50
550-650	.43	100	43.00
650-820	.36	170	61.20
820-920	.43	165	43.00
920-1085	.17	165	27.50
1805-1800	.10	715	71.50
1800-2000	.42	200	84.00
11	<u>2.89</u>	<u>1875</u>	<u>288.60</u> = .18
	.25		

$\sqrt{10.2} = 3.19$
 $= 57 \text{ Looks/Day}$

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EW (2000)

~~TOP SECRET~~

			<u>FT</u>	<u>FT/FS</u>	<u>FS</u>
.10	10	80	.11	.11	.10
.17	1	80	.99	1.41	.20
.36	1	70	3.53	5.16	.48
.42	2	00	3.97	5.81	.58
.43	2	45	4.41	6.48	.58
	<u>1875</u>				

11	.1	1.1	
2	1.0	2.0	
2	3.5	7.0	
2	4.0	8.0	
2	4.5	9.0	
<u>19</u>		<u>27.1</u>	= <u>1.42</u> = <u>Full Task</u> 7 days

11	.1	1.1	
2	1.4	2.8	
2	5.2	10.4	
2	5.8	11.6	Full Task
2	6.5	13.0	Full Swath
<u>19</u>		<u>38.9</u>	= <u>2.05</u> = 5 days

11	.1	1.10
2	.2	.40
2	.5	1.00
2	.57	1.14
2	.58	1.16
<u>19</u>		<u>4.80</u>

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ITF/FC

~~TOP SECRET~~

		<u>ET</u>	<u>FS</u>	<u>FT/FS</u>
50	1.81	6.60	3.36	10.89
80	1.88	7.48	3.46	12.19
70	1.62	3.86	3.08	7.14
30	1.55	2.98	2.98	5.84
30	1.88	7.48	3.46	12.19
130	2.00	7.60	3.58	12.31
40	1.93	6.52	3.48	11.01
35	2.00	7.60	3.58	12.31
95	1.88	7.48	3.46	12.19
690	1.43	2.86	2.86	5.72
850	2.12	4.24	4.24	8.48
50	2.19	5.12	4.34	9.78
2230		69.82	41.88	131.05

(1.86)

= 18 days

(5.81)

= 6 days

(3.50)

= 10 days

(10.9)

= 3 days

(33.5 hours)

~~1.86~~

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TOP SECRET			<u>F.</u>	<u>FS</u>	<u>FT/FS</u>
2910-2930	30	1.55	2.98	2.98	5.84
2930-2960	30	1.55	2.98	2.98	5.84
2960-3090	130	1.67	3.10	3.10	5.96
3090-3180	90	1.67	3.10	3.10	5.96
3180-3215	35	1.67	3.10	3.10	5.96
3215-3310	95	1.55	2.98	2.98	5.84

155	1.55	2.98	2.98	5.84
255	<u>1.67</u>	<u>3.10</u>	<u>3.10</u>	<u>5.96</u>
	<u>3.22</u>	<u>6.08</u>	<u>6.08</u>	<u>11.80</u>
	<u>1.61</u>	<u>3.04</u>	<u>3.04</u>	<u>5.90</u>

4950-4930	30	5.06	10.12	10.12	20.24
4930-5070	140	5.06	10.12	10.12	20.24
5070-5100	30	<u>5.06</u>	<u>10.12</u>	<u>10.12</u>	<u>20.24</u>
5100-5300	200	<u>2.94</u>	<u>5.88</u>	<u>5.88</u>	<u>11.76</u>
		<u>8.00</u>	<u>16.00</u>	<u>16.00</u>	<u>32.00</u>
		<u>4.00</u>	<u>8.00</u>	<u>8.00</u>	<u>16.00</u>

TOP SECRET	TOP SECRET	TOP SECRET	TOP SECRET
<u>5.61</u>	<u>11.04</u>	<u>11.04</u>	<u>27.40</u>
2.81	5.52	5.52	27.4
avg = 1070	542	542	274

~~TOP SECRET~~

EW (2000-3310 MHz)

~~TOP SECRET~~

		<u>Power</u>	<u>Gain</u>	<u>FT</u>	<u>FS</u>	<u>FT/FS</u>
100	1.85	80	1.43	2.86	2.86	5.72
400	1.5	30	1.55	2.98	2.98	5.84
50	1.43	70	1.62	3.56	3.08	7.14
20	1.69	20	1.69	6.48	3.24	10.77
50	1.81	400	1.75	6.72	3.33	11.50
50	1.88	50	1.81	6.60	3.36	10.59
70	1.62	100	1.85	6.83	3.43	11.61
30	1.55	205	1.88	7.48	3.46	12.19
30	1.83	90	1.93	6.52	3.48	11.01
170	1.96	130	1.96	7.60	3.58	12.31
40	1.93	35	2.00	7.60	3.58	12.31
35	2.00	11	19.77	65.53	1136.38	111.29
45	1.88					

$\frac{1.88}{1.85} = 6 \text{ days}$
 $\frac{5.84}{5.72} = 2 \text{ days}$
 $\frac{3.31}{3.33} = 3 \text{ days}$
 $\frac{10.1}{10.77} = 1 \text{ day}$

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