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AEROSPACE RECOMMENDED PRACTICE

ARP 881

LAMPS FOR AIRCRAFT LIGHTING

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Revised

1. INTRODUCTION - Until recent years, an SAE recommended practice, prepared by the Lighting Division, approved January 1946, and last revised by the Lighting Committee in January 1955, had appeared in the SAE Handbook. At the request of industry, military, and government, Committee A-20 has now updated and revised this document.
2. PURPOSE AND SCOPE - Lamps shown are those recommended for the service indicated. This list is not intended as a catalog and does not include many types of lamps now in use.
3. DEFINITIONS
 - 3.1 Trade No. - The trade number is recorded with the American Standards Association and is uniform throughout the industry. It completely identifies a lamp and is sufficient identification for ordering.
 - 3.2 Design Volts - "Design volts" shows the voltage at which a lamp is designed for listed average ampere, candlepower, and rated laboratory life characteristics.
 - 3.3 Rated Average Laboratory Life - "Rated average laboratory life" is the average life obtained in closely controlled laboratory life testing of groups of lamps at their design voltage. It is not necessarily the same as service life, where conditions such as shock, vibration, voltage fluctuations, and environment may result in a shorter average attained life.
 - 3.4 Bulb, Base, Filament, and Light Center Length (In.) - Refer to SAE standard, J569 (published in the SAE Handbook).
 - 3.5 FIIN - Federal Item Identification Number.

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SERVICE	DESIGN VOLTS	TRADE NO.	AMPS OR WATTS	MEAN SPHERICAL CANDLE-POWER	BULB	BASE	FLA-MENT	LIGHT CTR LGTH IN.	MAX OVER-ALL LGTH (IN.)	AMP ^(a) AT DSGN (VOLTS)	RATED AVG. LAB LIFE (HR)	APPROX. WEIGHT (LB)	FIN 6240	MILITARY STANDARD
Landing	13.0	4509 ^(b)	100 W		PAR-36	Scr. Term.	C-6		2-3/4	7.69	25	0.52	237-7867	MS25243-4509
	13.0	4537 ^(b)	100 W		PAR-46	Scr. Term.	C-6		3-1/8	7.69	25	0.92		
	13.0	4313 ^(b)	250 W		PAR-86	Scr. Term.	C-6		2-3/4	19.23	25	0.52		
	13.0	4522 ^(b)	250 W		PAR-46	Scr. Term.	C-2		3-1/8	19.23	25	0.92	155-7920	MS25241-4522
	28.0	4553 ^(b)	250 W		PAR-46	Scr. Term.	CC-8		3-1/8	8.92	25	0.92	725-4683	MS25241-4553
	28.0	4559 ^(b)	600 W		PAR-64	Scr. Term.	CC-8		3-3/4	21.41	25	2.00	283-9598	MS25242-4559
	28.0	4556 ^{(b)(c)}	1000 W		PAR-64	Scr. Term.	CC-8		3-3/4	36.70	25	2.00	725-2274	MS25242-4556
	28.0	4581 ^{(b)(c)}	450 W		PAR-46	Scr. Term.	CC-8		3-1/8	16.08	10	0.92	557-3065	MS25241-4581
Taxing	28.0	4550 ^(d)	250 W		PAR-56	Scr. Term.	CC-6		4-1/2	8.92	25	1.45	583-3818	
	28.0	4551 ^(d)	250 W		PAR-46	Scr. Term.	CC-6		3-3/4	8.92	25	0.92	583-3334	
	28.0	4570 ^(d)	150 W		PAR-46	Scr. Term.	CC-6		3-3/4	5.36	300	0.92	132-5328	
Navigation	6.0	1680	4.1 A	32	S-8	S. C. Bay.	C-6	1-1/4	2	4.1	300	0.021	870-7778	MS35478-1680
	6.0	4614 ^(d)	100 W		PAR-36	Scr. Term.	C-6		2-3/4	16.87	300	0.52		
	6.2	1105	5.72 A	50	R. P. -11	S. C. Bay.	C-2V	1-1/4	2-1/4	5.72	125	0.022		
	6.2	1163 ^(d)	40 W		GG-12	S. C. Index	C-6		2-1/2	6.45	300	0.025		MS24513-1163
	6.2	600 ^(d)	26 W		GG-10	S. C. Index	C-2R		2-3/16	4.19	300	0.019		MS25309-600
	12.8	93	1.04 A	15	S-8	S. C. Bay.	C-2R	1-1/8	2	1.04	500	0.021	014-2455	
	12.8	1777	1.52 A	26 ⁽ⁱ⁾	S-8	S. C. Bay.	C-2R	1-1/8	2	1.52	400	0.021		
	14.0	7512-12 ^(d)	26 W		GG-10	S. C. Index	C-2R		2-3/16	2.0	300	0.019		
	14.0	4174-12 ^(d)	40 W		GG-12	S. C. Index	C-6		2-1/2	3.08	300	0.025		
	28	7512 ^(d)	26 W		GG-10	S. C. Index	CC-6		2-3/16	.93	300	0.019	504-2090	MS25309-7512
	28	4174	40 W		GG-12	S. C. Index	CC-6		2-1/2	1.43	300	0.025	519-0854	MS24513-4174
	28	1683	1.02 A	32	S-8	S. C. Bay.	2C-6	1-1/4	2	1.02	500	0.021	044-6914	MS35478-1683
	6.2	1687 ^(d)	40 W		GG-12	S. C. Index	C-6		2-1/2	6.45	150	0.025	870-0799	MS25398-1687
	14	7079B-12 ^(e)	40 W		GG-12	S. C. Index	C-6		2-1/2	3.08	150	0.025		
	28	7079 ^(d)	40 W		GG-12	Scr. Term.	CC-6		2-1/2	1.43	150	0.025	789-2260	MS25338-7079
	28	4594 ^(b)	100 W		PAR-36	S. C. Term.	CC-6		2-3/4	3.57	300	0.52	295-2118	MS25243-4594
	28	4613 ^{(b)(j)}	100 W		PAR-36	S. C. Term.	CC-6		2-3/4	3.57	300	0.52		
Wing Inspect.	28	4502 ^(b)	50 W		PAR-36	S. C. Term.	CC-6		2-3/4	1.78	400	0.52	196-4518	MS25243-4502
Interior	12.8	1141	1.44 A	21	S-8	S. C. Bay.	C-6	1-1/4	2	1.44	500	0.021	155-7799	MS25478-1141
	13.0	77	.37 A	3	G-5	S. C. Bay.	C-2V	11/16	1-3/8	.37	1000	0.012	155-7954	
	13.0	89	.58 A	6	G-6	S. C. Bay.	C-2R	3/4	1-7/16	.58	750	0.012	143-3159	MS15570-5
	13.0	1383 ^(d)	20 W		R-12	S. C. Bay.	C-8		2-5/8	1.54	300	0.026	539-9659	MS35480-1
	28	301	.17 A	3	G-5	S. C. Bay.	C-2F	11/16	1-3/8	.17	500	0.012	155-7947	MS25238-301
	28	303	.30 A	6	G-6	S. C. Bay.	C-2F	3/4	1-7/16	.30	500	0.012	155-7948	MS15570-6
	28	1309	.52 A	15	B-6	S. C. Bay.	C-2R	1-1/16	1-3/4	.52	300	0.016		
	28	305	.51 A	15	S-8	S. C. Bay.	C-2V	1-1/8	2	.51	300	0.021	155-7791	MS35478-303
	28	1691	.61 A	15	S-8	S. C. Bay.	2C-2R	1-1/8	2	.61	1000	0.021	295-2668	MS35478-169
	28	305IF ^(e)	.51 A	15	S-8IF	S. C. Bay.	C-2V		2	.51	300	0.021	295-1680	
	28	1691IF ^(e)	.61 A	15	S-8IF	S. C. Bay.	2C-2R		2	.61	1000	0.021		
	28	307	.67 A	21	S-8	S. C. Bay.	C-2V	1-1/8	2	.67	300	0.021	155-7784	MS35478-307
	28	307IF ^(e)	.67 A	21	S-8IF	S. C. Bay.	C-2V		2	.67	300	0.021	122-0264	
	28	307SB ^(f)	.67 A		S-8	S. C. Bay.	C-2V	1-1/8	2	.67	300	0.021	155-7787	MS35478-307SB
	28	1665	.80 A	21	S-8	S. C. Bay.	C-2V	1-1/8	2	.80	1000	0.021		
	28	1665IF ^(e)	.80 A	21	S-8IF	S. C. Bay.	C-2V		2	.80	1000	0.021		
	28	311	1.29 A	50	S-11	S. C. Bay.	C-2V	1-1/4	2-3/8	1.29	300	0.022	155-7924	MS25235-311
	28	311SB ^(f)	1.29 A		S-11	S. C. Bay.	C-2V	1-1/4	2-3/8	1.29	300	0.022	155-7966	MS25235-SB311
	28	1385 ^(d)	20 W		R-12	S. C. Bay.	CC-8		2-5/8	.71	300	0.026	186-0276	MS35480-2
	28	B115-24 ^(d)	20 W		GG-12	S. C. Index	CC-6		2-1/2	.71	300	0.025		
	(g)	5004 ^(g)	4 W		T-5	Min. Pinless			6			0.045		
	(g)	5008 ^(g)	8 W		T-5	Min. Pinless			12			0.075		
	(g)	5013 ^(g)	13 W		T-5	Min. Pinless			21			0.125		
	(g)	5108 ^(g)	8 W		T-5	Min. Bipin			12			0.075		
	(g)	5113 ^(g)	13 W		T-5	Min. Bipin			21			0.125		
	(g)	54276	25 W		T-6	Single Pin			42			0.37		
Indicator	5.0	680	.06 A	.032	T-1	Wire Term.	C-2R		1/4	.06	Indef Long.	.0004	878-1965	MS24367-680
	5.0	682	.06 A	.029	T-1	Sub-mid fl.	C-2R	3/16	3/8	.06	Indef Long.	.0006	879-4980	MS24515-682
	5.0	683	.06 A	.053	T-1	Wire Term.	C-2R		1/4	.06	Indef Long.	.0004		MS24367-683
	5.0	685	.06 A	.048	T-1	Sub-mid fl.	C-2R	3/16	3/8	.06	Indef Long.	.0006	752-2581	MS24515-685
	5.0	715	.115 A	.147	T-1	Wire Term.	C-2R		1/4	.115	Indef Long.	.0004		MS24367-715
	5.0	718	.115 A	.132	T-1	Sub-mid fl.	C-2R	3/16	3/8	.115	Indef Long.	.0006		MS24515-718
OR Instrument	6	316	.7 A	3.4 ⁽ⁱ⁾	T-3-1/4	Min. Bay.	C-2R	5/8	1-3/16	.7	500	0.006		MS25231-316
	6	328	.2 A	.34 ^(h)	T-1-3/4	Mid. Flange	C-6	3/8	5/8	.2	1000	0.0012	155-7857	MS25237-328
	13	77	.37 A	3	G-5	S. C. Bay.	C-2V	11/16	1-3/8	.37	1000	0.012	155-7954	
	13	89	.58 A	6	G-6	S. C. Bay.	C-2R	3/4	1-7/16	.58	750	0.012	143-3159	MS15570-5
	13	1816	.33 A	3 ⁽ⁱ⁾	T-3-1/4	Min. Bay.	C-2V	5/8	1-3/16	.33	1000	0.006	155-7949	
	14	330	.08 A	0.5 ⁽ⁱ⁾	T-1-3/4	Mid. Flange	C-2F	3/8	5/8	.08	750	0.0012	196-4491	
	28	301	.17 A	3	G-5	S. C. Bay.	C-2F	11/16	1-3/8	.17	500	0.012	155-7947	MS25238-301
	28	303	.30 A	6	G-6	S. C. Bay.	C-2F	3/4	1-7/16	.30	500	0.012	155-7948	MS15570-6
	28	313	.17 A	3.5 ⁽ⁱ⁾	T-3-1/4	Min. Bay.	C-2F	5/8	1-3/16	.17	500	0.006	155-8714	MS25231-313
	28	1864	.17 A	3.0 ⁽ⁱ⁾	T-3-1/4	Min. Bay.	C-2F	5/8	1-3/16	.17	1500	0.006	765-8443	
	28	327	.04 A	.34	T-1-3/4	Mid. Fl.	C-2F	3/8	5/8	.04	1000	0.0012	155-7836	MS25237-327
	28	1495	.30 A	6	T-4-1/2	Min. Bay.	C-2F	5/8	1-3/8	.30	500	0.006	299-4742	MS25069-1495