

The Dynatime DC Series: Subminiature Elapsed Time Indicators

FEATURES

- Rugged Design
- Hermetically Sealed
- Qualified to MIL-M-7793 *
- Low Voltage Models Available

The Electrodynamic Dynatime DC meter was developed to meet the difficult requirements of most military and aerospace applications. They provide a wide range of supply voltage options and are packaged in a hermetically sealed miniature enclosure. This rugged design meets or exceeds an array of tough environmental specifications including shock, vibration, and temperature. In addition, it has been approved to MIL-M-7793. A variety of mounting configurations are available as shown on pages 56 and 57. We also welcome inquiries for special requirements.

* See the Military Cross Reference for more military qualified models.

Mechanical Specifications

Case: Copper Nickel or Brass, with flat black finish. E and F mounts are nickel-plated case with flat black face.

Max. case length: Short version: 1.094 in.; long version: 2.082 in.

Flange: Steel or Brass with flat black face.

Terminals: Solder Hook

Weight: 0.4 ounces without mount. 0.6 ounces maximum with C flange

Numerals: .035" wide, .078" high.

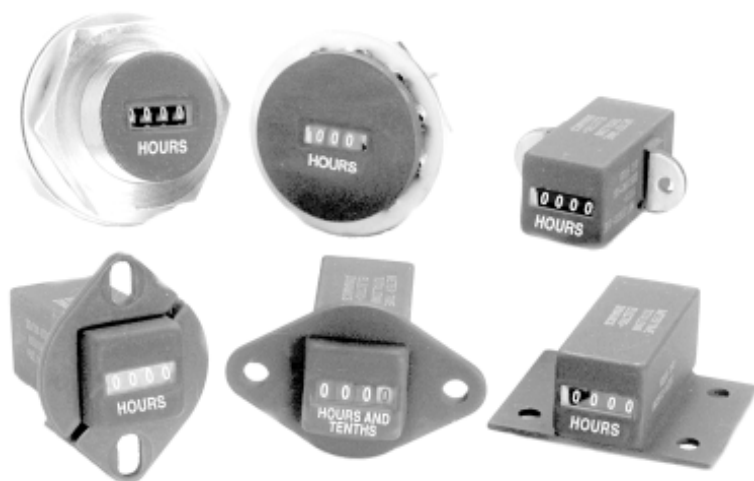
Hour digits are white on black. Tenths are red on white.

Environmental Specifications

Operating Temperature Range: -65 to +125° C

Shock: MIL-STD-202, Method 213, Condition I

Vibration: MIL-STD-202, Method 204, Condition D



Electrical Specifications

Meters meet or exceed applicable requirements of MIL-M-7793 M7793/1,2,5 and MS21341 A & B.

Special ratings and configurations are also available.

Transient Protection: MIL-STD-704A, 80 & 600 V (Models 16 & D16)

Ripple Protection: MIL-STD-704A, para. 5.2.2, 5.2.21 & Fig. 7 (models 16, D16)

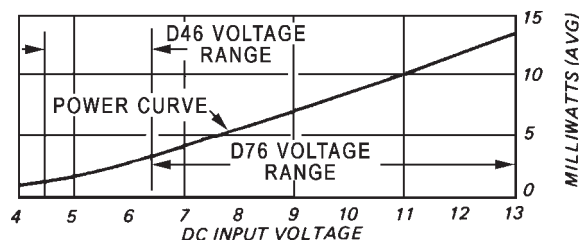
Dielectric: 500 VRS @ 80,000 ft., 600 VRMS @ sea level

Insulation Resistance: MIL-STD-202, Method 302, Condition B

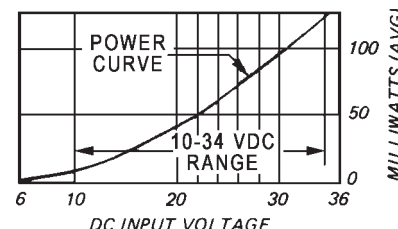
Accuracy: 0.1% over temperature/voltage range

VOLTAGE/POWER CURVES @ 25°C

Models D46 & D76



Models D16 & 16



ORDERING INFORMATION

When ordering, show model number first (D), then nominal voltage, case type, maximum hours (4 or 5 digit), mount type and mount setback desired. If this is a special part, customer's modification number will be added at the end of the ordering number. This order chart lists standard features. Other ratings and configuration are also available. Example: D16-C-8-C-E-136

D - 16 - C - 8 - C - E - 136						
Case Length	Nominal Voltage	Case Type	Maximum Hours 4 Digit/5 digit	Mount Type	Mount Setback	Popular Factory Codes Code Description
D Short	16 = 10 & 34 VDC	B = 4 Digit Rnd	3 = 999.9/N/A	A = no mount	A = Flush	1 Rotated 90° Type C, C7, V, W Mount
(*) Long	46 = 5 VDC	C = 4 Digit Sqr	8 = 9999/9999.9	Others available,	B to Z = See Table A	14 4-40 Clinch Nuts, For Type C Mount
	Other also available	D = 4 Digit Sqr (Side-Read)	9 = N/A/99999	see page 66	Page 66 for "X" Dimension Code desired	16 Tin-plate frnt Mt. & Type C Mount
		G = 5 Digit Rect.				136 Tin plate front mount Type C (M7793/1 & /2), C7, V & W

* Omit "D" for long case

The Dynatime® Elapsed Time Indicators and Event Counters Standard Cases & Mounts

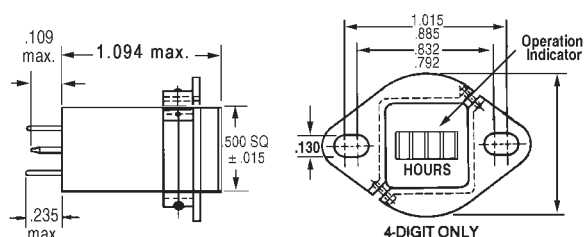


Figure 1. C2 ADJUSTABLE MOUNT

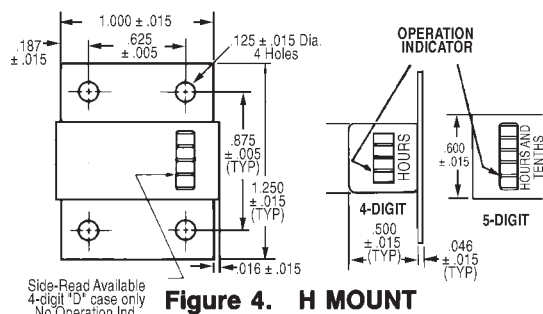


Figure 4. H MOUNT

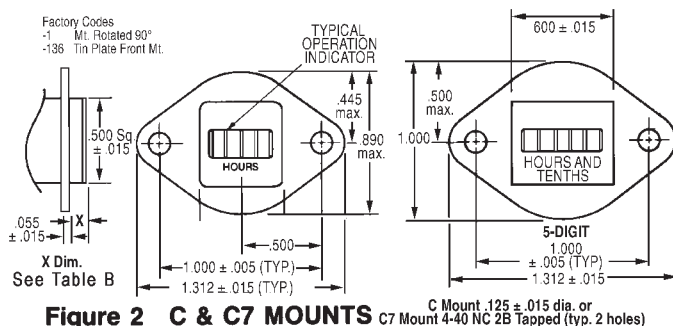


Figure 2 C & C7 MOUNTS C Mount .125 ± .015 dia. or C7 Mount 4-40 NC 2B Tapped (typ. 2 holes)

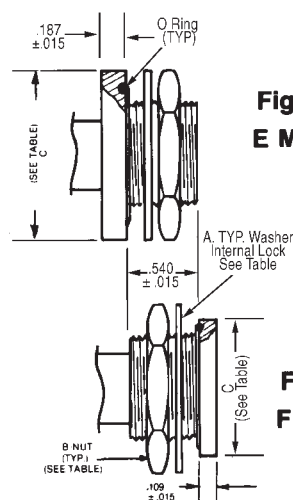


Figure 5. E MOUNT

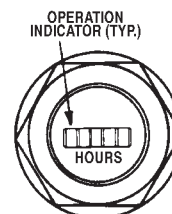


Figure 6. F MOUNT

	A	B	C ± .015
	Max. Dia.	(Nut)	E Mount F Mount
4 Digit	1.250	3/4"-32 UN	1.250 1.000
5 Digit	1.410	7/8"-20 UN	1.375

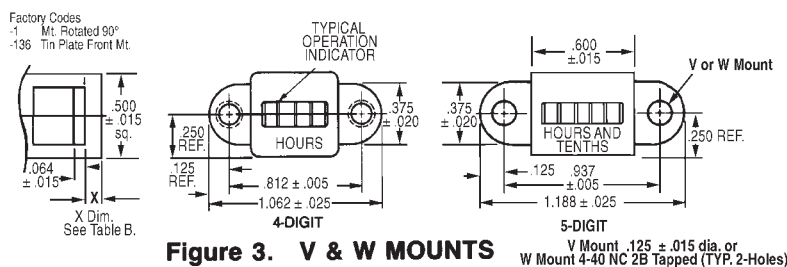


Figure 3. V & W MOUNTS V Mount .125 ± .015 dia. or W Mount 4-40 NC 2B Tapped (TYP. 2-Holes)

Round Cases & Mounts (for ETI only)

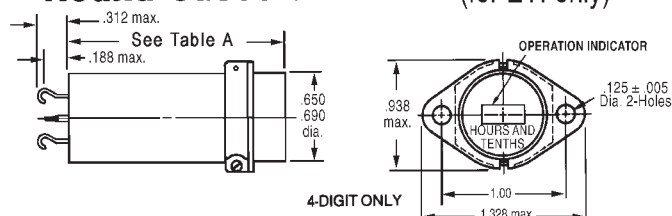


Figure 7. C2 ADJUSTABLE MOUNT

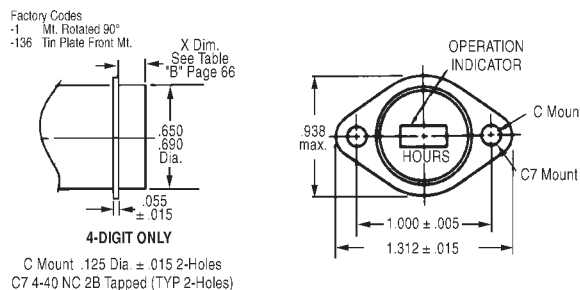
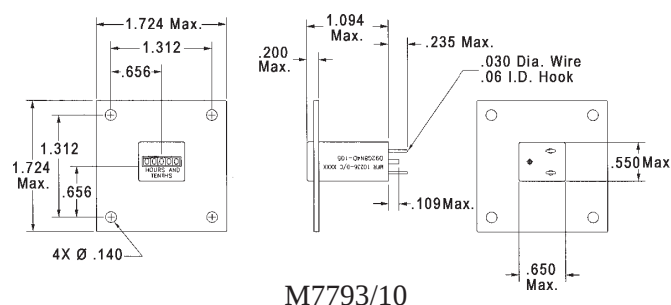
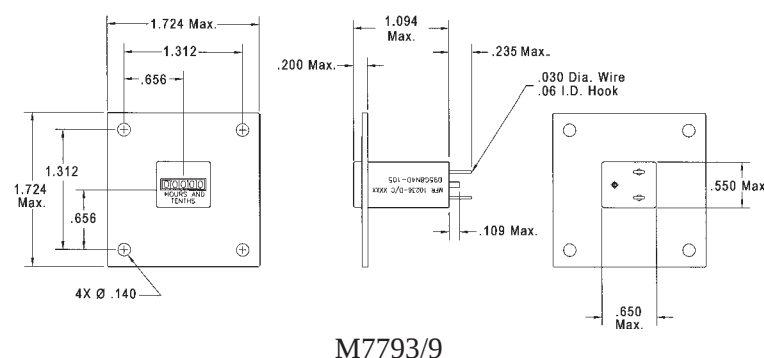
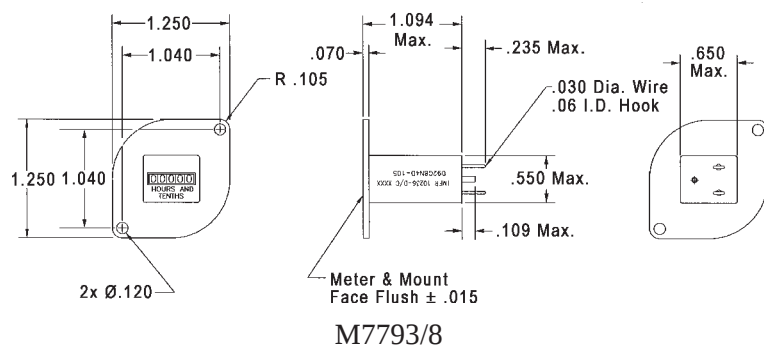


Figure 8. C & C7 MOUNTS

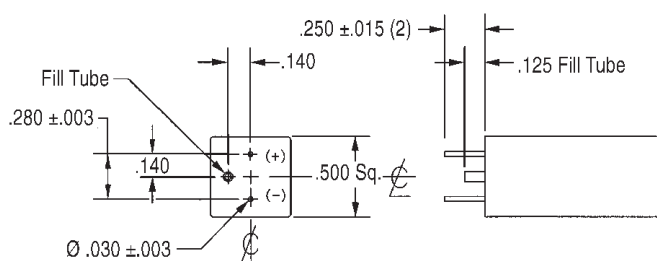
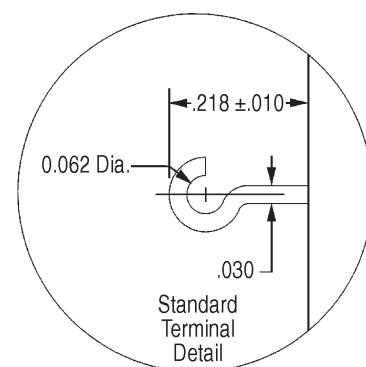
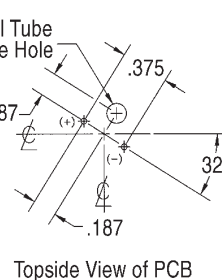
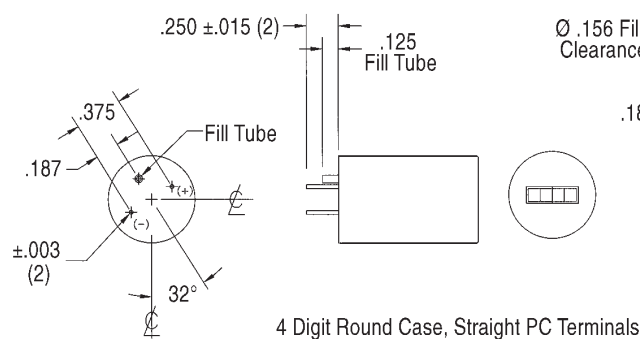
The Dynatime®

Elapsed Time Indicators and Event Counters

Standard Cases & Mounts



Standard and Straight Pin Headers



ELAPSED TIME INDICATORS
EVENTS COUNTERS

Dynatime® MIL™ Series:**Military Elapsed Time Indicator Guide****Table A
Specifications**

Nominal Voltage	Case Length Max. Inches	Electrodynamics Model Number	Fig. No.	Military Number
12 & 28 VDC	1.094 Short	D16C8C*-16	2	MS21341A-XX
		D16C8C2	1	M7793/1-001
		D16C8A	—	M7793/1-002
		D16C8C*-136	2	M7793/1-XXX
		D16C8C2	4	M7793/2-001
		D16C8A	—	M7793/2-002
	D16C8C*-136	2	M7793/2-XXX	
	2.082	16B8C2	4	M7793/5-001
	2.062	16C8C2	1	M7793/5-002
		16C8B-16	2	MS21341B-XX
115 VAC 60 Hz	1.094 Short	D92C8C2	1	M7793/3-001
		D92C8A	—	M7793/3-002
		D92C8C*-136	2	M7793/3-XXX
		D92B8C2	4	M7793/4-001
		D92B8A	—	M7793/4-002
		D92B8C*-136	5	M7793/4-XXX
115 VAC 400 Hz	1.760 (Also 1.094)	D95B8C2 or 95B8C2	4	M7793/6-001
			4	M7793/6-001
	1.094 Short	D95C8C2 or 95C8C2	1	M7793/6-002
			1	M7793/6-002
		C7*-16	2	MS27651-XXA
		C7*-1-16	2	MS27651-XXB
		D95C8 C*-16	2	MS27651-XXC
		or C*1-16	2	MS27651-XXD
		95C8 W*-16	3	MS27651-XXE
		W*-1-16	3	MS27651-XXF
		V*-16	3	MS27651-XXG
		V*-1-16	3	MS27651-XXH
		Example: 95C8CE-16 = MS27651-05C		
		Replace D95 or 95	Replace MS27651	
		above with D25 or 25	above with MS27650	
		Example: 25C8CE-16 = MS27650-05C		
26 VAC 400 Hz				

**Table B
Mount Setback Data**

M7793/1 to /4 Dash No.	MS21341, 27650, 27651 Dash No.	Setback ± .015 In.	"X" Dim. Code
-003	-01	Flush	A
-004	-02	.031	B
-005	-03	.062	C
-006	-04	.094	D
-007	-05	.125	E
-008	-06	.156	F
-009	-07	.188	G
-010	-08	.219	H
-011	-09	.250	I
-012	-10	.281	J
-013	-11	.321	K
-014	-12	.344	L
-015	-13	.375	M
-016	-14	.406	N
-017	-15	.438	O
-018	-16	.469	P
-019	-17	.500	R
-020	-18	.531	S
-021	-19	.562	T
-022	-20	.594	T-8
-023	-21	.625	U
-024	-22	.656	U-8
-025	-23	.688	V
-026	-24	.719	V-8
-027	-25	.750	W
-028	-26	.781	W-8
		.813	X
		.875	Y
		.938	Z

Notes: 1. All meter readouts are to 9999 Hours, maximum.
 2. See Table B to select desired "X" Dim. (* in model no.) and corresponding military dash no. (xx & xxx).
 3. "-136" in model no. denotes tin-plated mount face; "-16" is same plus USAF testing; "-1" is mount rotated 90°.