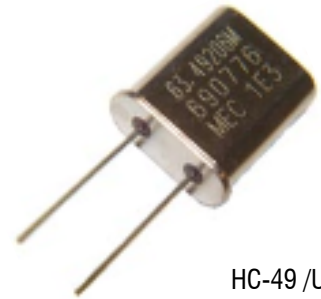




- The **H49/U** and **H50/U** series are the resistance-weld version of the old solder seal types HC-18/U and HC-25/U respectively. They are physically interchangeable.
- No solder or flux involved in the sealing process. Low aging.
- HC-49/U is wire lead type and HC-50/U is plug-in type.
- Two different holder heights to choose from: 13.6mm and 11.2mm.



HC-49 /U

SPECIFICATIONS

	Thru-hole types:			Surface Mount Types:		
Crystal Holder Prefix	<i>H49, H50:</i> Straight wire leads <i>H49T:</i> Straight wire leads			<i>H49MJ:</i> Gull wing with metal jacket <i>49TMJ:</i> Gull wing with metal jacket		
Mode of Oscillation	See E.S.R. table below					
Frequency Tolerance at +25°C	SL-cut: ± 50 ppm ($\pm 0.005\%$) at 25°C; AT-cut: ± 30 ppm ($\pm 0.003\%$) at 25°C Tolerance as tight as ± 3 ppm is also available.					
Frequency Stability	SL-cut: ± 100 ppm ($\pm 0.01\%$) over -10 to +60°C AT-cut: ± 50 ppm ($\pm 0.005\%$) over -10 to +60°C. Stability as tight as ± 3 ppm over 0 to +50°C or ± 7 ppm over -20 to +70°C is also available.					
Shunt Capacitance (Co)	7 pF maximum					
Load Capacitance (CL)	Series (spec. code is “S”) or Parallel (If parallel, please specify CL value, typical CL ranges from 8 to 32 pF)					
Equivalent Series Resistance (E.S.R.)	Frequency	Osc. Mode	E.S.R. max.	Frequency	Osc. Mode	E.S.R. max.
	1.0~1.3	SL cut	5000 Ω	7.01 ~10.0	AT cut funda.	35 Ω
	2.01 ~3.0	AT cut funda.	400 Ω	10.0 ~ 30.0	AT cut funda.	25 Ω
	3.01 ~3.2	AT cut funda.	200 Ω	30.01 ~45.0	AT cut funda.	20 Ω
	3.21 ~3.5	AT cut funda.	150 Ω	24.0 ~100.0	AT cut 3 rd O/T	40 Ω
	3.51 ~3.9	AT cut funda.	120 Ω	80.0 ~160.0	AT cut 5 th O/T	70 Ω
	3.91 ~5.0	AT cut funda.	100 Ω	110.0 ~200.0	AT cut 7 th O/T	120 Ω
5.01~7.0	AT cut funda	50 Ω				
Drive Level	1 mW maximum					
Aging	Less than 2ppm per year max. at +25°C					

MERCURY www.mercury-crystal.com

Taiwan: TEL (886)-2-2695-7099, FAX (886)-2-2695-7473, e-mail: sales-tw@mercury-crystal.com

U.S.A.: TEL (1)-909-466-0427, FAX (1)-909-466-0762, e-mail: sales-us@mercury-crystal.com



Available Options (If required please add the following designator as a suffix to the MEC part number):

"V" = Vinyl sleeve around holder | "K" = 3rd lead at bottom center | "R" = On Reel
 "G" = Ground lead at top center | "I" = Teflon insulator at bottom center

STANDARD FREQUENCIES AND PART NUMBERS (partial list)

Custom spec. welcome. Tighter tolerance available.

<u>MEC Part Number</u>	<u>MEC Specification Code</u>	<u>MEC Part Number</u>	<u>MEC Specification Code</u>
H49-1.000-32P	50/100/-10+60/5000R (SL-cut)	H49-10.245-20P	30/50/-10+70/25R
H49-1.048576-13P	50/100/-10+60/5000R (SL-cut)	H49-11.0592-20P	30/50/-10+70/25R
H49-1.228-13P	50/100/-10+60/5000R (SL-cut)	H49-12.000-20P	30/50/-10+70/25R
H49-1.8432-32P	30/50/-10+70/800R (AT-cut)	H49-12.000393-32P	30/50/-10+70/25R
H49-2.000-20P	30/50/-10+70/800R	H49-12.288-32P	30/50/-10+70/25R
H49-2.097152-20P	30/50/-10+70/500R	H49-14.31818-S	30/50/-10+70/25R
H49-2.4576-32P	30/50/-10+70/300R	H49-14.7456-S	30/50/-10+70/25R
H49-2.516-20P	30/50/-10+70/300R	H49-16.000-S	30/50/-10+70/25R
H49-3.2768-32P	30/50/-10+70/200R	H49-16.000312-32P	30/50/-10+70/25R
H49-3.579545-S	30/50/-10+70/100R	H49-18.432-S	30/50/-10+70/25R
H49-3.579545-18P	30/50/-10+70/100R	H49-19.6608-20P	30/50/-10+70/25R
H49-3.6864-20P	30/50/-10+70/100R	H49-23.04-20P	30/50/-10+70/25R
H49-4.000-S	30/50/-10+70/100R	H49-24.000-S	30/50/-10+70/25R
H49-4.000-20P	30/50/-10+70/100R	H49-24.00014-S	30/50/-10+70/25R
H49-4.194304-12P	30/50/-10+70/100R	H49-24.576-S	30/50/-10+70/25R
H49-4.433619-20P	30/50/-10+70/100R	H49-28.322-32P	30/50/-10+70/25R
H49-4.9152-S	30/50/-10+70/100R	H49-29.4912AF-S	30/50/-10+70/25R (AT-cut funda.)
H49-5.0688-20P	30/50/-10+70/100R	H49-32.000A3-S	30/50/-10+70/40R (AT-cut 3 rd O/T)
H49-6.000-S	30/50/-10+70/50R	H49-352512A3-18P	15/30/-10+70/40R (AT-cut 3 rd O/T)
H49-6.144-30P	30/50/-10+70/50R	H49-40.000A3-S	30/50/-10+70/40R (AT-cut 3 rd O/T)
H49-7.3728-20P	30/50/-10+70/50R	H49-40.032A3-S	30/50/-10+70/40R (AT-cut 3 rd O/T)
H49-8.000-20P	30/50/-10+70/45R	H49-48.000A3-S	30/50/-10+70/40R (AT-cut 3 rd O/T)
H49-8.064-32P	30/50/-10+70/45R	H49-80.00A5-S	30/50/-10+70/60R (AT-cut 5 th O/T)
H49-8.192-S	30/50/-10+70/45R	H49-100.000A5-S	30/50/-10+70/60R (AT-cut 5 th O/T)
H49-9.8304-20P	30/50/-10+70/35R	H49-152.650A7-S	30/50/-10+70/80R (AT-cut 7 th O/T)
H49-10.000-20P	30/50/-10+70/25R		

HC-50 /U



HC-49 /T



49TMJ

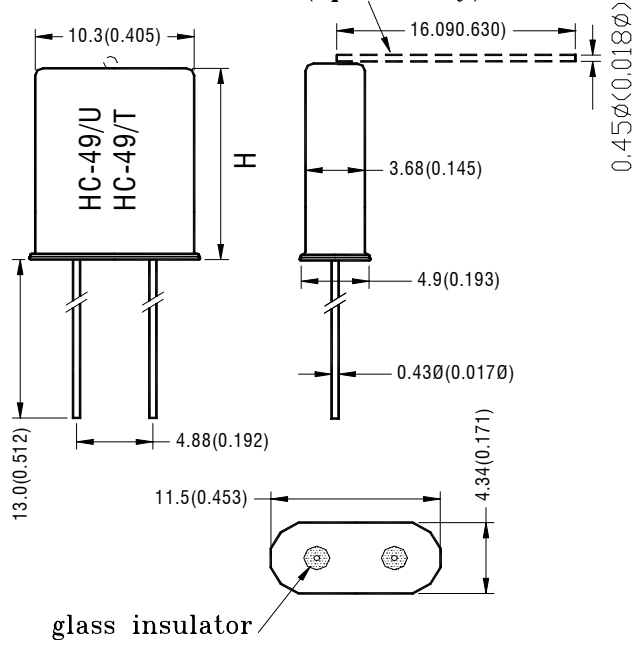




Package: HC-49/U, HC-49/T

wire leads

Spot welded 3rd lead
(option only)

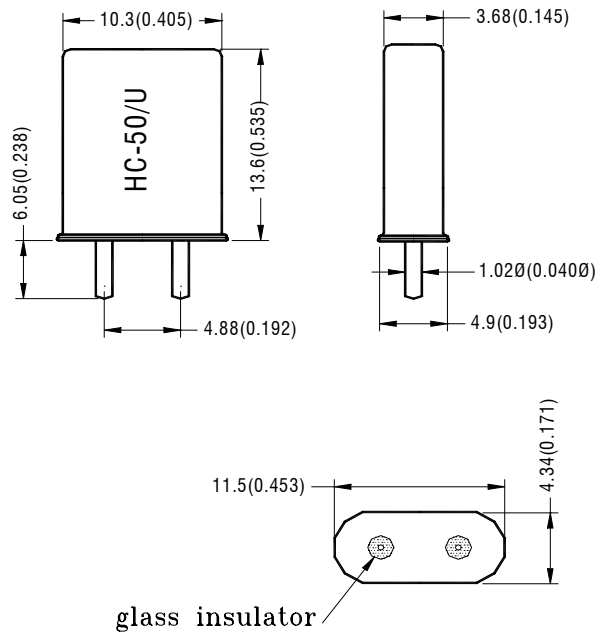


HC-49/U: H=13.6(0.535)
HC-49/T: H=11.2(0.441)

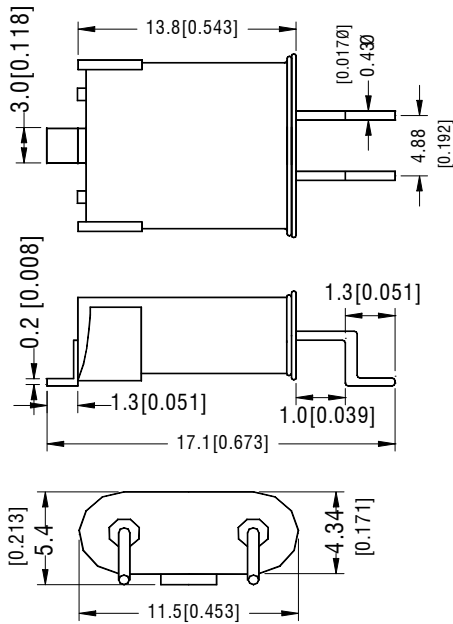
Package: HC-50/U

Unit: mm [inches]

plug leads



Package: H49MJ



Package: 49TMJ

