

# Thru-Hole Crystal Oscillator



## Full Size Crystal Oscillator

## 6MF Series Crystal Oscillator

### Features

- All metal welded package.
- High precision characteristic covering up to wide frequency range from 0.25MHz up to 180MHz.
- 5V / 3.3V operating voltage.
- CMOS output.
- 3-state function.
- 14-Pin DIP (Full size).
- Applications: Telecommunications, Mobile communications, Avionics, Test equipments, Electronic instruments, etc.
- Low phase noise and jitter.
- RoHS Compliant / Pb-Free.

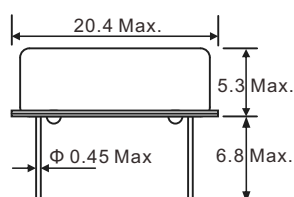
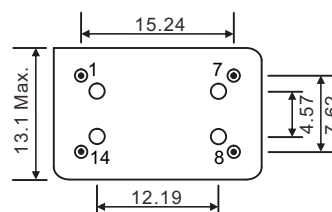
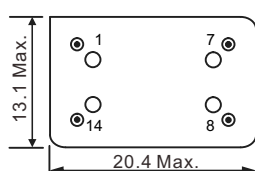


### Electrical Specifications

Item /Type		6M (6M Thru-Hole Crystal Oscillator)	
Output Type		CMOS	
Output Load		15pF	15pF, 50pF
Oscillation Mode		Fundamental / 3rd Overtone	
Supply Voltage		3.3V	5.0V
Frequency Range		0.25 ~ 180 MHz	
Overall Frequency stability*		±10ppm, ±20ppm, ±25ppm, ±50ppm, ±100ppm	
Operating Temperature Range		-20~+70°C, -40~+85°C, or specify	
Storage Temperature Range		-55~+125°C	
Rise(Tr) / Fall(Tf) Time(AT 0.1Vdd~0.9Vdd)		5ns Max.	
Input Current	0.25MHz~9.999MHz	15mA Max.	10mA Max.
	10.00MHz~23.999MHz	15mA Max.	10mA Max.
	24.00MHz~49.999MHz	30mA Max.	20mA Max.
	50.00MHz~79.999MHz	40mA Max.	20mA Max.
	80.00MHz~180.000MHz	50mA Max.	30mA Max.
Symmetry(AT ½ Vdd)		40~60%	
Start-up Time		10ms Max.	

### Dimensions

Units:mm



**PAD Function:**  
 1: Control Voltage  
 7: GND  
 8: Out  
 14: Vdd (5V/3.3V)