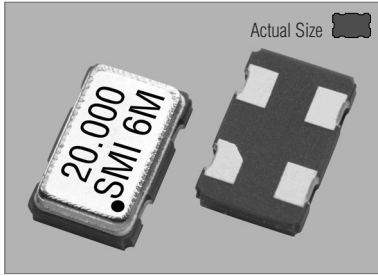
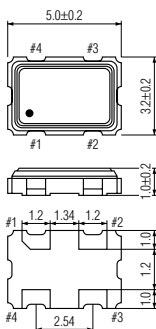


99SMOM



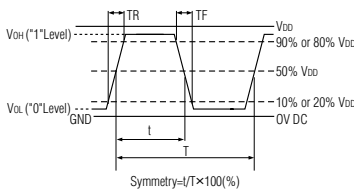
99SMOM



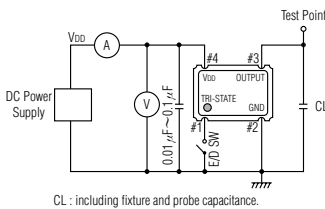
PIN	CONNECTION
1	"L" OPEN or "H"
2	GND
3	Z OUTPUT
4	V _{DD}

Z : high impedance

OUTPUT WAVEFORM

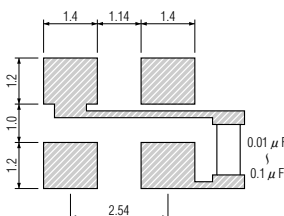


TEST CIRCUIT



CL : including fixture and probe capacitance.

SOLDERING PATTERN



STANDARD SPECIFICATIONS

Item	Specifications			
Generic part number	99SMOM ^{※1}			
Frequency range	2.5 MHz to 55.0 MHz	2.5 MHz to 125.0 MHz	1.0 MHz to 125.0 MHz	
Frequency stability (-10°C to +70°C)	99SMOM(A) : ±100 ppm 99SMOM(B) : ±50 ppm 99SMOM(C) : ±30 ppm 99SMOM(D) : ±25 ppm			
over all conditions				
Operating Conditions				
Operating temperature	-10°C to +70°C (standard) -40°C to +85°C (W)			
Input voltage (VDD)	+1.8V ±5%	+2.5V ±5%	+3.3V ±10%	+5V ±10%
Stand-by control voltage (Pin#1)	V _{IH} : 70%V _{DD} min. V _{IL} : 20%V _{DD} max. ^{※2}			V _{IH} : +2V min. V _{IL} : +0.8V max. ^{※2}
Absolute Max. Ratings				
Supply voltage	-0.5V to +7.0V DC			
Storage temperature	-55°C to +125°C			
Input current (Pin#1=Open or V _{IH})	2.0 mA max.	24 mA max.	60 mA max.	50 mA max.
Stand-by current ^{※2} (Pin#1=V _{IL})	3 μA max.	10 μA max.	10 μA max.	50 μA max.
Output (-40°C to +85°C)				
Symmetry	40% to 60% at 50%V _{DD} level			
Rise and fall times	6 ns max. 10%V _{DD} to 90%V _{DD}	4 ns max. 20%V _{DD} to 80%V _{DD}	5 ns max.(10%V _{DD} to 90%V _{DD})2.5 / 1.0 MHz to 70 MHz 3 ns max.(20%V _{DD} to 80%V _{DD})70 MHz to 125 MHz	
"0" level (V _{OL})	10%V _{DD} max.	20%V _{DD} max.	10%V _{DD} max.(2.5 / 1.0 MHz to 70 MHz) 20%V _{DD} max.(70 MHz to 125 MHz)	
"1" level (V _{OH})	90%V _{DD} min.	80%V _{DD} min.	90%V _{DD} min.(2.5 / 1.0 MHz to 70 MHz) 80%V _{DD} min.(70 MHz to 125 MHz)	
Load	5 pF max. (CMOS)		15 pF max. (CMOS)	
Disable delay time	100 ns max.			
Enable delay time	10 ms max.			
Startup time	10 ms max.			
Aging(non operating)	±5 ppm max. at +25°C ±3°C for first year			
Reflow condition	+250°C ±10°C for 10 seconds +170°C ±10°C for 1 to 2 minutes (preheating)			

(※1) Final exact part number to be determined with frequency, frequency stability, operating temperature and input voltage.

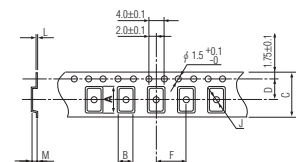
e.g. 99SMOM(2.5VC) 20.000 MHz.

(※2) Internal crystal oscillation to be halted (Pin #1=V_{IL}).

PACKAGE DATA

Item	Package	99SMOM
Lid		Metal
Base		Ceramic
Sealing		Seam
Terminal		Tungsten (metalized)
Terminal plating		Gold / Nickel (surface) / (under)
RoHS		Compliant (Pb-free)

TAPE SPECIFICATIONS



A	B	C	D	F	J	L	M	Reel Dia.	Qty/Reel
5.4	3.5	12.0	5.5	8.0	1.5	0.3	1.4	178	1000pcs