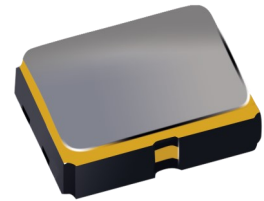


# MINIATURE LOW COST SMD-VCTCXO

## SERIES "VCTXO"

### FEATURES

- + High reliability for low cost
- + Cheapest available SMD-VCTCXO
- + Available in 1.8, 2.6, 2.8, 3.0 and 3.3 VDC (1.7-3.5 VDC)
- + New standard for low cost SMD-VCTCXOs
- + Qualified for automotive applications
- + Extended temperature range to -40/+85°C available

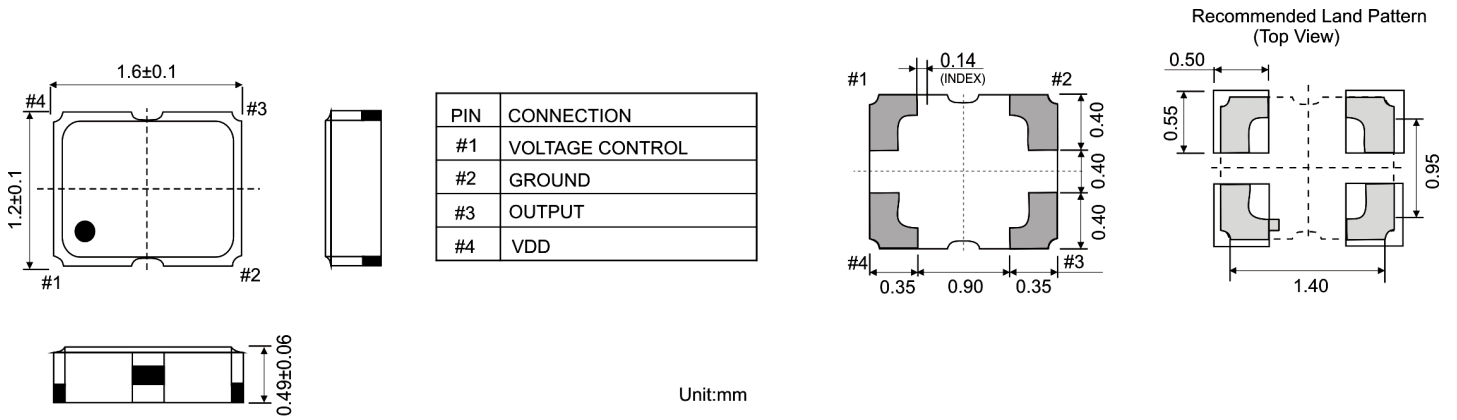


PB FREE / ROHS-2 2011/65/EU COMPLIANT

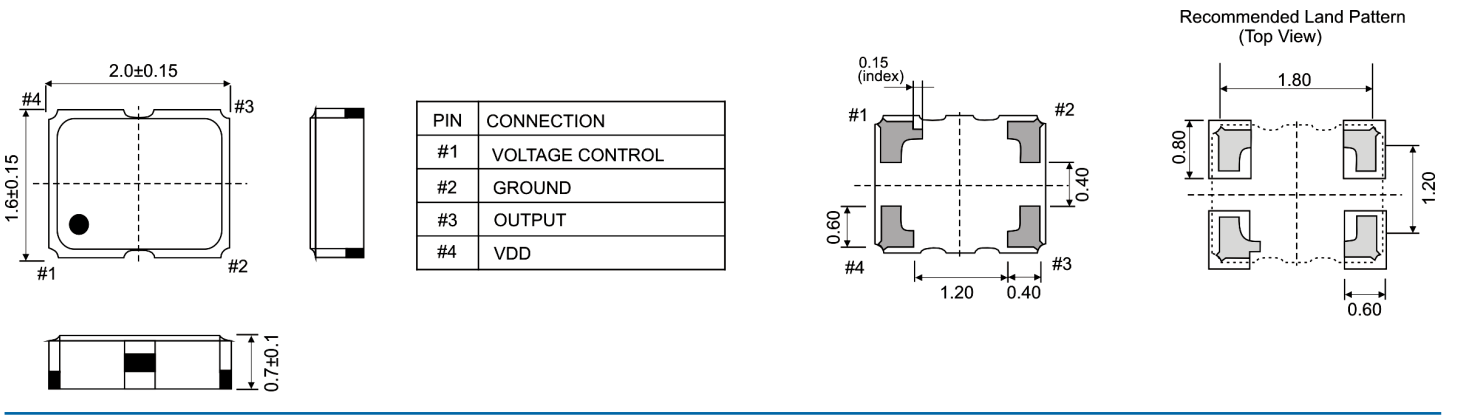
### GENERAL DATA

PARAMETERS		PRODUCT FEATURES AND CONDITIONS		
SMD-OSCILLATOR SERIES		VCTXO		
PACKAGE	VTX01612	1.6 x 1.2 x 0.5 mm <sup>3</sup>		
	VTX02016	2.0 x 1.6 x 0.7 mm <sup>3</sup>		
	VTX02520	2.5 x 2.0 x 0.8 mm <sup>3</sup>		
	VTX03225	3.2 x 2.5 x 0.9 mm <sup>3</sup>		
FREQUENCY RANGE	VTX01612	16.0 ~ 60.0 MHz		
	VTX02016	12.288 ~ 52.0 MHz		
	VTX02520	9.6 ~ 52.0 MHz		
	VTX03225	9.6 ~ 52.0 MHz		
OPERATING TEMPERATURE RANGE		0/+70°C ~ -40/+85°C		
STORAGE TEMPERATURE RANGE		-55/+125°C		
STANDARD FREQUENCY		19.2 / 20 / 25 / 26 / 30 / 32 / 38.4 / 40 / 52 MHz		
SUPPLY VOLTAGE (VDD)		+1.8V / +2.6V / +2.8V / +3.0V / +3.3V		
CURRENT CONSUMPTION		+1.5mA max.(f≤26 MHz)/+2.0mA max.(26<f≤52 MHz)/+2.5mA max.(f≤60 MHz)		
OUTPUT LEVEL		0.8 Vp-p min. (f≤52 MHz) [Clipped Sinewave / DC-coupled]		
OUTPUT LOAD		10kΩ // 10pF		
FREQUENCY STABILITY	INITIAL TOLERANCE	± 1.5 ppm max. (after 2 reflows)		
	VS. TEMPERATURE	±1.0ppm, ± 2.5ppm max. /-30~+85°C ±1.0ppm, ± 2.5 ppm max. / -40~+85°C Other parameters are available on request		
	VS. SUPPLY VOLTAGE	± 0.2 ppm max. (VDD±5%)		
	VS. LOAD VARIATION	± 0.2 ppm max. (10kΩ // 10pF±10%)		
	VS. AGING	±1.0 ppm max. / year (ref. +25°C)		
Start-up Time		2.0 ms max.		
Phase Noise		[f ≤ 26MHz]	[26<f≤40MHz]	[40MHz<f≤52MHz]
Offset 100Hz		-115dBc/Hz	110dBc/Hz	105dBc/Hz
Offset 1kHz		-135dBc/Hz	135dBc/Hz	130dBc/Hz
Offset 10kHz		-150dBc/Hz	150dBc/Hz	145dBc/Hz
Offset 100kHz		-155dBc/Hz	155dBc/Hz	150dBc/Hz
DELIVERY FORM		Tape and Reel / 2.000 pcs. per reel, other quantities are available on request		
<b>OTHER PARAMETERS ARE AVAILABLE ON REQUEST / CREATE HERE YOUR SPECIFICATION</b>				

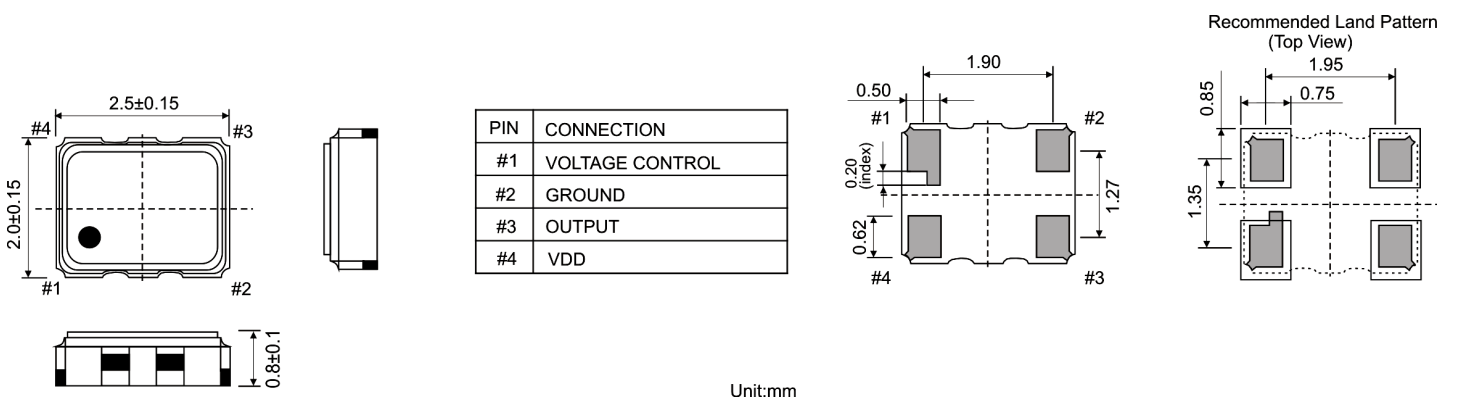
## OUTLINE DRAWING OF VTX01612



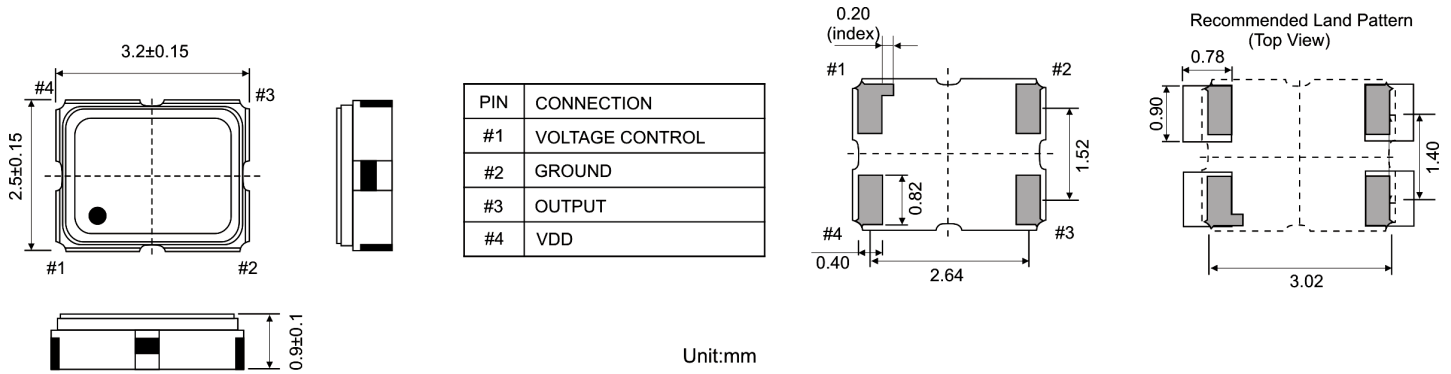
## OUTLINE DRAWING OF VTX02016



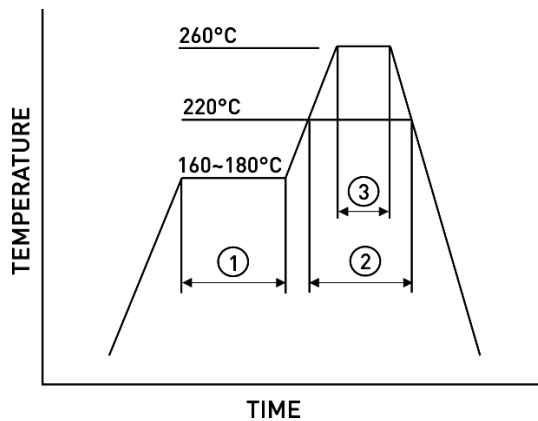
## OUTLINE DRAWING OF VTX02520



## OUTLINE DRAWING OF VTX03225

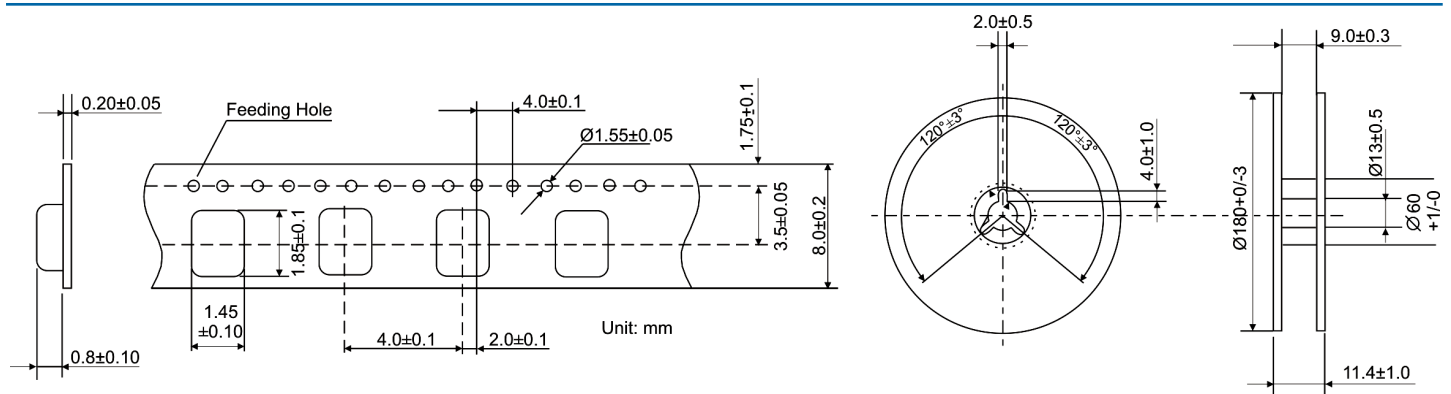


## REFLOW SOLDER PROFILE

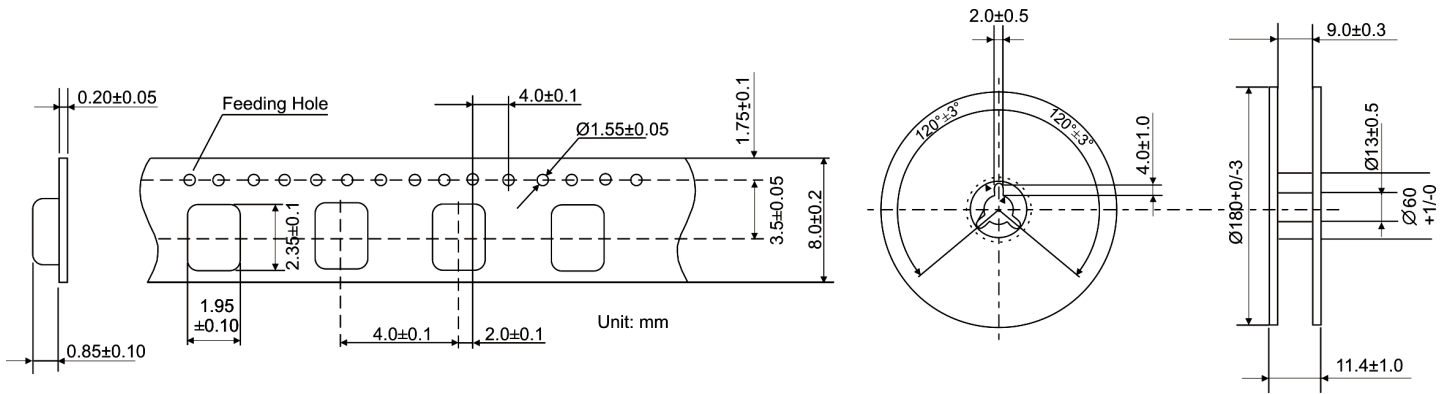


①	Preheat	160~180°C	120sec.
②	Primary heat	220°C	60sec.
③	Peak	260°C	10sec. max.

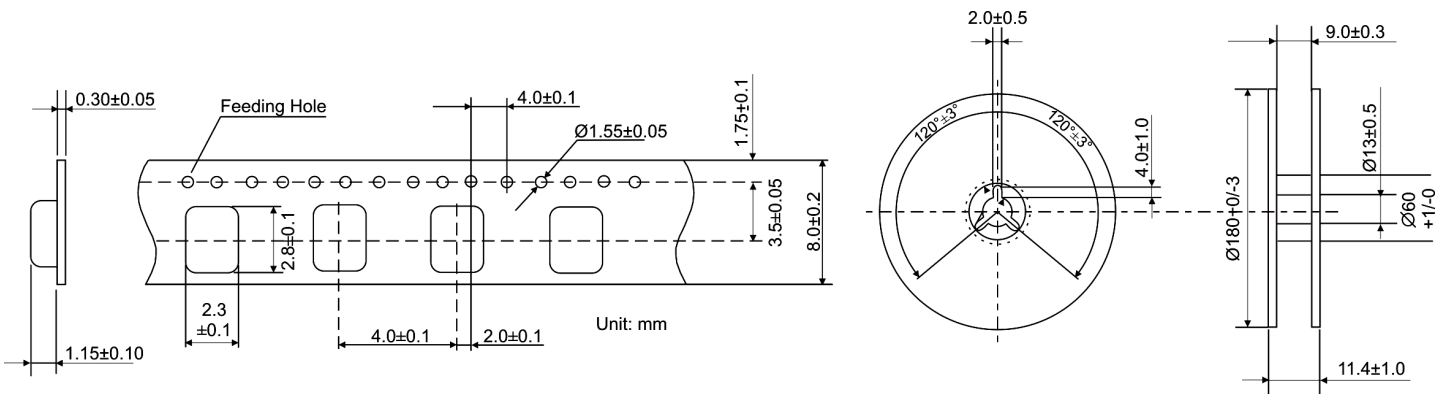
## REEL SPECIFICATION OF VTX01612



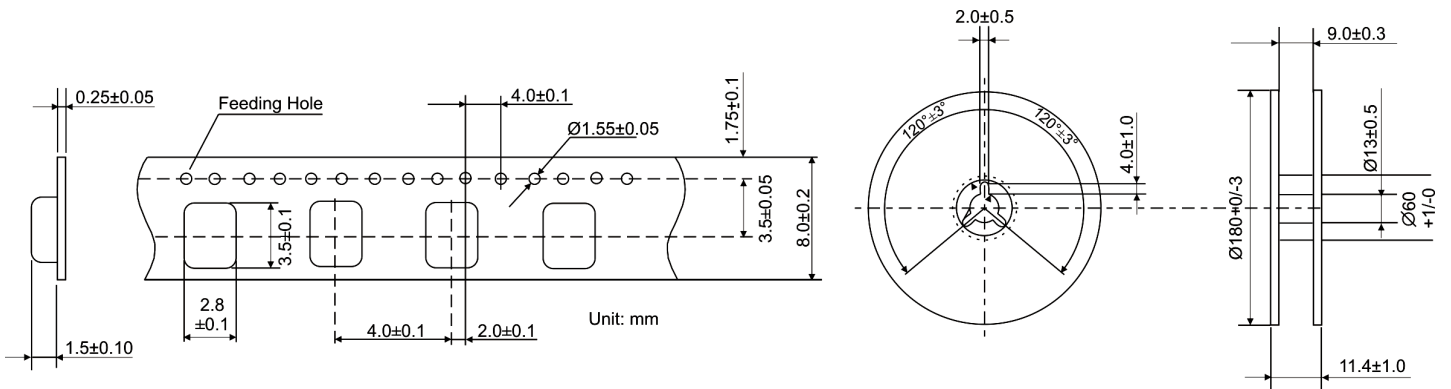
## REEL SPECIFICATION OF VTX02016



## REEL SPECIFICATION OF VTX02520

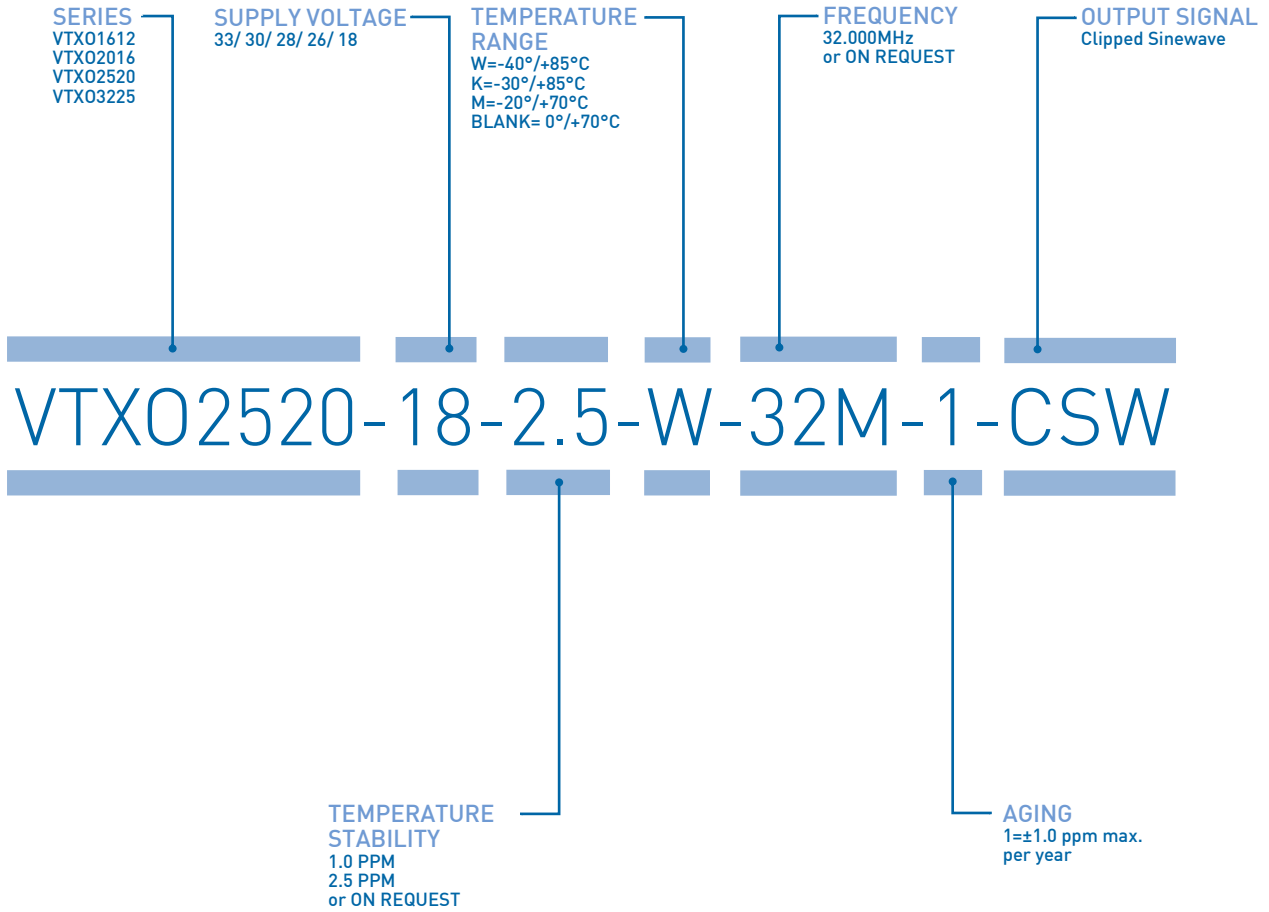


## REEL SPECIFICATION OF VTX03225





## ORDERING INFORMATION



EXAMPLE: VTX02520-18-2.5-W-32M-1-CSW  
 PLEASE INDICATE YOUR REQUIRED PARAMETERS



## PREMIUM QUALITY BY PETERMANN-TECHNIK



OUR COMPANY IS CERTIFIED ACCORDING TO ISO 9001:2015 IN OCTOBER 2016 BY THE DMSZ CERTIFIKATION GMBH.

THIS IS FOR YOU TO ENSURE THAT THE PRINCIPLES OF QUALITY MANAGEMENT ARE FULLY IMPLEMENTED IN OUR QUALITY MANAGEMENT SYSTEM AND QUALITY CONTROL METHODS ALSO DOMINATE OUR QUALITY STANDARDS.