



actual size

SMD Quartz Crystal · JXG53P2

- 2 pad version, 5.0 x 3.2 mm
- glass sealed ceramic package
- extended temperature ranges available
- high mechanical reliability type available



RoHS compliant



Pb free



REACH
compliant



Conflict
mineral free

GENERAL DATA

TYPE	JXG53P2
frequency range	8.0 ~ 50.0 MHz (fund. AT-cut)
frequency tolerance at 25 °C	±30 ppm, ±50 ppm
load capacitance C_L	12 pF standard (option: 8 pF ~ 30 pF / series)
shunt capacitance C_0	< 7 pF max.
storage temperature	-40 °C ~ +125 °C
drive level max.	100 µW (10 µW recommended)
aging	< ±3 ppm first year

TABLE 1: FREQUENCY STABILITY VS. TEMPERATURE

		±30 ppm	±50 ppm	±100 ppm
-20 °C ~ +70 °C	STD.	●	○	○
-40 °C ~ +85 °C	T1	○	●	○
-40 °C ~ +105 °C	T2		○	○
-40 °C ~ +125 °C	T3			○

● standard ○ available

ESR (SERIES RESISTANCE RS)

frequency in MHz	vibration mode	ESR max. in Ω	ESR typ. in Ω
8.0 ~ 8.999	fund. - AT	150	80
9.0 ~ 9.999	fund. - AT	120	60
10.0 ~ 11.999	fund. - AT	60	30
12.0 ~ 15.999	fund. - AT	50	25
16.0 ~ 21.999	fund. - AT	40	20
22.0 ~ 24.999	fund. - AT	35	15
25.0 ~ 50.000	fund. - AT	30	15

MARKING

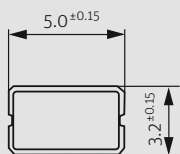
frequency with load capacitance code
company code / date code / internal code

date code: A ~ M: Jan. - Dec.

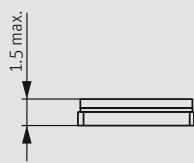
2: 2022 3: 2023 4: 2024 5: 2025 6: 2026 7: 2027

Jan.	Febr.	Mar.	Apr.	May	June
A	B	C	D	E	F
July	Aug.	Sept.	Oct.	Nov.	Dec.
G	H	J	K	L	M

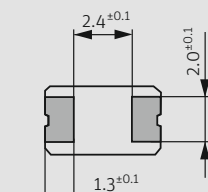
DIMENSIONS



top view



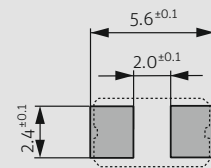
side view



bottom view



crystal connection



pad layout

in mm

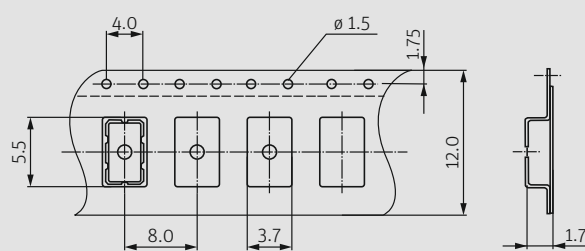
ORDER INFORMATION

Q	frequency	type	load capacitance	tolerance at 25 °C	stability vs. temp. range	option
Quartz	8.0 ~ 60.0 MHz	JXG53P2	12 pF standard 10 pF ~ 30 pF S for series	30 = ±30 ppm 50 = ±50 ppm	30 = ±30 ppm 50 = ±50 ppm 100 = ±100 ppm	blank = -20 °C ~ +70 °C T1 = -40 °C ~ +85 °C T2 = -40 °C ~ +105 °C T3 = -40 °C ~ +125 °C FU = for fundamental frequencies ≥ 20 MHz

Example: Q 28.0-JXG53P2-12-30/30-FU-LF (Suffix LF = RoHS compliant / Pb free pins or pads)

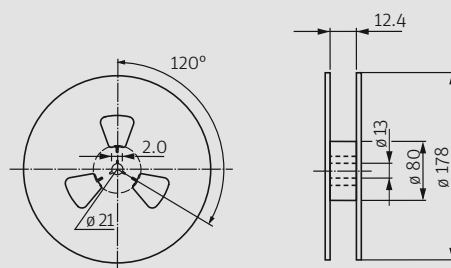
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TAPING SPECIFICATION



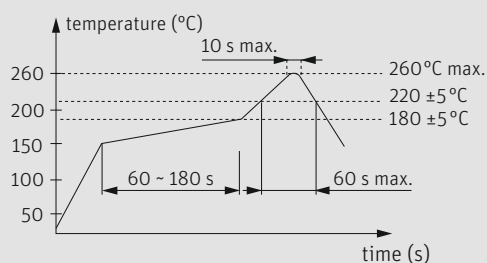
1000 pcs per reel

Feeding



in mm

REFLOW SOLDERING PROFILE



note: parts are also suitable for soldering systems with lead (Pb) content

LOAD CAPACITANCE CODES

8 pF: k	14 pF: x	22 pF: g	series: s
9 pF: n	15 pF: j	24 pF: d	
10 pF: h	16 pF: b	25 pF: r	
11 pF: l	17 pF: t	27 pF: w	
12 pF: a	18 pF: f	30 pF: .	
13 pF: v	20 pF: c		

example 12.0 MHz / 12 pF: 12a00