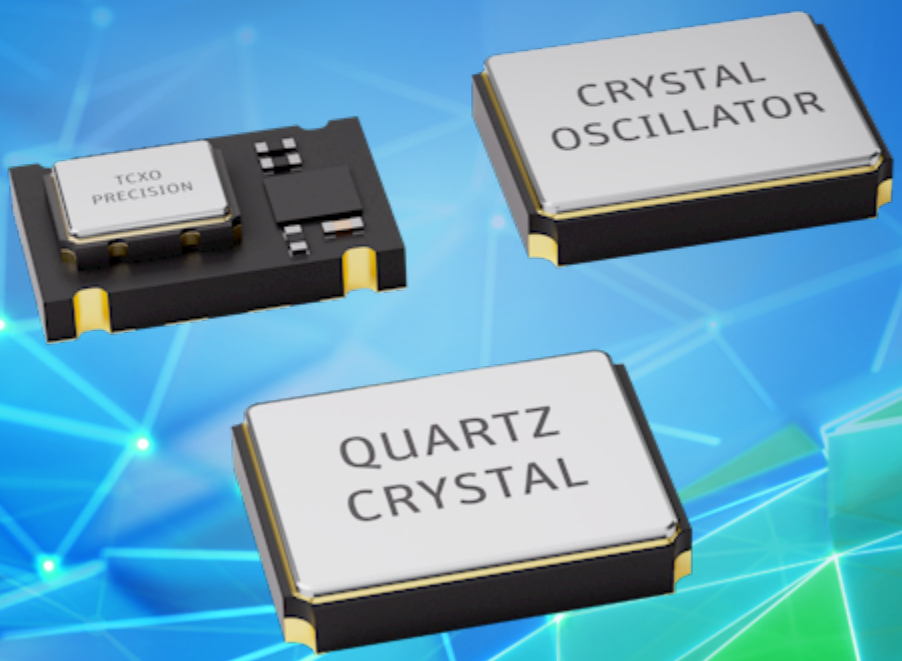
B.C.E. ELECTRONICS

Jauch®
THE PULSE OF PROGRESS

FREQUENCY CONTROL PRODUCTS



- Quartz Crystals
- Crystal Oscillators
- TCXOs
- OCXOs

Your local sales and technical teams will support you in finding the right frequency control product for you. We will offer support from the beginning, allowing you to minimize your development time and cut unnecessary costs.

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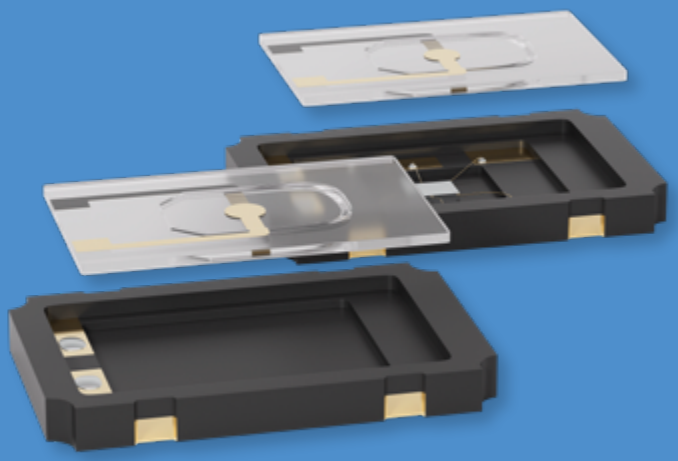
TECHNICAL SUPPORT FROM YOUR LOCAL JAUCH TEAM

- Consultation
- Design-In Support
- Support for application problems
- Oscillator circuit validation

Talk to us about the optimal clock solution as early as the design phase starts. We will help you through the project-specific preselection of suitable components and calculations for special applications.



WORLDWIDE UNIQUE SERVICE FOR YOUR DEVELOPER

- Creation of custom specifications for your project
- Increased operational reliability in series production
- Cost-optimized component selection and specification for the entire project life
- Detailed advice and supervision by specialists
- Validation of your circuit using special testing equipment
- Samples for pilot productions or prototypes

QUARTZ CRYSTALS – SMD

QUARTZ CRYSTAL • SMD • CERAMIC/METAL PACKAGE

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	JXS08	32.0 ~ 80.0	-40 °C ~ +85 °C	±10 ppm	±10 ppm	1.0 x 0.8 x 0.3
	JXS10	24.0 ~ 80.0	-40 °C ~ +85 °C	±10 ppm	±10 ppm	1.2 x 1.0 x 0.3
	JXS11	24.0 ~ 80.0	-40 °C ~ +125 °C	±10 ppm	±10 ppm	1.6 x 1.2 x 0.4
	JXS21	16.0 ~ 80.0	-40 °C ~ +125 °C	±10 ppm	±10 ppm	2.0 x 1.6 x 0.5
	JXS22	12.0 ~ 66.0	-40 °C ~ +125 °C	±10 ppm	±10 ppm	2.5 x 2.0 x 0.55
	JXS32	8.0 ~ 54.0 54.0 ~ 125.0 (3rd OT) on request	-40 °C ~ +125 °C	±10 ppm	±10 ppm	3.2 x 2.5 x 0.7
	JXS53	8.0 ~ 125.0	-40 °C ~ +125 °C	±10 ppm	±10 ppm	5.0 x 3.2 x 0.8
	JXS75	6.0 ~ 48.0	-40 °C ~ +125 °C	±10 ppm	±20 ppm	7.0 x 5.0 x 1.3
	JXS75/1	6.0 ~ 30.0	-40 °C ~ +125 °C	±20 ppm	±20 ppm	7.0 x 5.0 x 1.2

QUARTZ CRYSTAL FOR WIRELESS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	JXS10-WA	24.0 ~ 80.0	-40 °C ~ +85 °C	±10 ppm	±10 ppm	1.2 x 1.0 x 0.3
	JXS11-WA	24.0 ~ 80.0	-40 °C ~ +105 °C	±10 ppm	±10 ppm	2.0 x 1.6 x 0.5
	JXS21-WA	16.0 ~ 80.0	-40 °C ~ +105 °C	±10 ppm	±10 ppm	2.0 x 1.6 x 0.5
	JXS22-WA	16.0 ~ 52.0	-40 °C ~ +105 °C	±10 ppm	±10 ppm	2.5 x 2.0 x 0.55
	JXS32-WA	13.56 ~ 52.0	-40 °C ~ +105 °C	±10 ppm	±10 ppm	3.2 x 2.5 x 0.7

QUARTZ CRYSTAL • SMD • METAL PACKAGE/MOLDED BASE

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	SMU2	4.0 ~ 33.0	-40 °C ~ +125 °C	±20 ppm	±20 ppm	11.5 x 4.8 x 3.0
	SMU4	3.2768 ~ 40.0	-40 °C ~ +105 °C	±20 ppm	±20 ppm	11.5 x 4.8 x 4.0
	SMU5	3.2768 ~ 40.0	-40 °C ~ +125 °C	±20 ppm	±20 ppm	13.1 x 5.0 x 5.0

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QUARTZ CRYSTALS – PIN TYPE AND SMD

QUARTZ CRYSTAL • PIN TYPE • METAL PACKAGE

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	SS2	4.0 ~ 33.0	-40 °C ~ +125 °C	±20 ppm	±20 ppm	11.3 x 4.7 x 2.5
	SS4	3.2768 ~ 40.0	-40 °C ~ +105 °C	±20 ppm	±20 ppm	11.3 x 4.7 x 2.5
	HC49/U	1.843 ~ 250.0	-40 °C ~ +125 °C	±3 ppm	±3 ppm	10.8 x 4.5 x 13.0
	HC49/U-SMC SMD Gull Wing	1.843 ~ 250.0	-40 °C ~ +125 °C	±3 ppm	±3 ppm	17.5 x 10.8 x 5.3
	MQ1	4.0 ~ 250.0	-40 °C ~ +125 °C	±5 ppm	±3 ppm	7.9 x 3.3 x 8.0
	MQ1-SMC SMD Gull Wing	4.0 ~ 250.0	-40 °C ~ +125 °C	±5 ppm	±3 ppm	11.7 x 7.8 x 3.4
	MQ5	10.0 ~ 250.0	-40 °C ~ +125 °C	±5 ppm	±3 ppm	7.7 x 3.1 x 5.8
	MQ5-SMC SMD Gull Wing	10.0 ~ 250.0	-40 °C ~ +125 °C	±5 ppm	±3 ppm	9.7 x 7.7 x 3.4

TUNING FORK CRYSTAL • SMD

	TYPE	FREQUENCY RANGE in kHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	JTX110	32.7680 kHz	-40 °C ~ +105 °C	±20 ppm	-80 ppm	1.6 x 1.0 x 0.5
	JTX210	32.7680 kHz	-40 °C ~ +125 °C	±20 ppm	-80 ppm	2.0 x 1.2 x 0.6
	JTX310	32.7680 kHz	-40 °C ~ +125 °C	±10 ppm	-80 ppm	3.2 x 1.5 x 0.9
	SMQ32SN	32.7680 kHz	-40 °C ~ +85 °C	±20 ppm	-80 ppm	7.0 x 1.5 x 1.3

TUNING FORK CRYSTAL • PIN TYPE

	TYPE	FREQUENCY RANGE in kHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	MMTF32	32.7680 kHz	-40 °C ~ +85 °C	±10 ppm	-80 ppm	6.0 x 2.0 x 2.0

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QUARTZ CRYSTALS QUALIFIED TO AEC-Q200

QUARTZ CRYSTALS FOR AUTOMOTIVE APPLICATIONS

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	JXS10P4	32.0 ~ 60.0	-40 °C ~ +125 °C	±10 ppm	±15 ppm	1.2 x 1.0 x 0.3
	JXS11P4	24.0 ~ 60.0	-40 °C ~ +125 °C	±10 ppm	±15 ppm	1.6 x 1.2 x 0.4
	JXS21P4	16.0 ~ 60.0	-40 °C ~ +125 °C	±10 ppm	±15 ppm	2.0 x 1.6 x 0.55
	JXS22P4	12.0 ~ 54.0	-40 °C ~ +125 °C	±10 ppm	±15 ppm	2.5 x 2.0 x 0.6
	JXS32P4	8.0 ~ 54.0	-40 °C ~ +150 °C	±10 ppm	±15 ppm	3.2 x 2.5 x 0.7
	SMU2	4.0 ~ 33.0	-40 °C ~ +125 °C	±20 ppm	±30 ppm	11.5 x 4.8 x 3.0
	SMU3	3.276 ~ 33.0 27.0 ~ 60.0 (3rd OT) on request	-40 °C ~ +125 °C	±20 ppm	±20 ppm	11.5 x 4.8 x 4.0
	JTX210	32.7680 kHz	-40 °C ~ +125 °C	±20 ppm	-80 ppm	2.0 x 1.2 x 0.6
	JTX310	32.7680 kHz	-40 °C ~ +125 °C	±10 ppm	-80 ppm	3.2 x 1.5 x 0.9

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CUSTOMIZED QUARTZ CRYSTALS

- Extremely tight frequency stabilities
- Special pulling sensitivities
- Lowest ESR values

CUSTOMIZED QUARTZ CRYSTALS

	TYPE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY TOLERANCE*	FREQUENCY STABILITY*	L x W x H in mm
	HC49/U	2.4579 ~ 40.0 (fund. AT) 20.0 ~ 105.0 (3rd OT) 50.0 ~ 175.0 (5th OT) 70.0 ~ 250.0 (7th OT)	-40 °C ~ +125 °C	±3 ppm	±3 ppm	10.8 x 4.5 x 13.0
	HC49/U SMC SMD Gull Wing		-40 °C ~ +125 °C	±3 ppm	±3 ppm	17.5 x 10.8 x 5.3
	MQ1	4.0 ~ 40.0 (fund. AT) 20.0 ~ 105.0 (3rd OT) 50.0 ~ 175.0 (5th OT) 70.0 ~ 250.0 (7th OT)	-40 °C ~ +125 °C	±5 ppm	±3 ppm	7.9 x 3.3 x 8.0
	MQ1-SMC SMD Gull Wing		-40 °C ~ +125 °C	±5 ppm	±3 ppm	11.7 x 7.8 x 3.4
	MQ5	10.0 ~ 40.0 (fund. AT) 30.0 ~ 105.0 (3rd OT) 50.0 ~ 175.0 (5th OT) 70.0 ~ 250.0 (7th OT)	-40 °C ~ +125 °C	±5 ppm	±3 ppm	7.7 x 3.1 x 5.8
	MQ5-SMC SMD Gull Wing		-40 °C ~ +125 °C	±5 ppm	±3 ppm	9.7 x 7.7 x 3.4

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QUARTZ CRYSTAL OSCILLATORS SMD

JO11 • OSCILLATOR • HCMOS • SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO11 (1.8 V ~ 3.3 V)	variable supply voltage	5.0 ~ 60.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	1.6 x 1.2 x 0.7

JO21 • OSCILLATOR • HCMOS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO21 (1.8 V ~ 3.3 V)	variable supply voltage	1.0 ~ 50.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.0 x 1.6 x 0.8
	JO21 (3.3 V)	Stop Function	0.5 ~ 80.0	-40 °C ~ +125 °C	±25 ppm	12 pF HCMOS	2.0 x 1.6 x 0.8
	JO21 (2.5 V)	Stop Function	0.5 ~ 80.0	-40 °C ~ +125 °C	±25 ppm	12 pF HCMOS	2.0 x 1.6 x 0.8
	JO21 (1.8 V)	Stop Function	0.5 ~ 80.0	-40 °C ~ +125 °C	±25 ppm	12 pF HCMOS	2.0 x 1.6 x 0.8

JO22 • OSCILLATOR • HCMOS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO22 (1.8 V ~ 3.3 V)	variable supply voltage	1.0 ~ 50.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.9
	JO22 (3.3 V)	Stop Function	0.5 ~ 133.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.9
	JO22 (3.0 V)	Stop Function	0.5 ~ 133.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.9
	JO22 (2.5 V)	Stop Function	0.5 ~ 133.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.9
	JO22 (1.8 V)	Stop Function	0.5 ~ 133.0	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.9
	JO23HT (1.8 V ~ 3.3 V)	High Stability Type	12.0 ~ 52.0	-40 °C ~ +105 °C	±10 ppm	15 pF HCMOS	2.5 x 2.0 x 0.8

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QUARTZ CRYSTAL OSCILLATORS SMD

JO32 • OSCILLATOR • HCMOS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO32 (1.8 V ~ 3.3 V)	variable supply voltage	1.0 ~ 50.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1
	JO32 (3.3 V)	Stop Function	0.75 ~ 170.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1
	JO32 (3.0 V)	Stop Function	0.75 ~ 170.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1
	JO32 (2.8 V)	Stop Function	0.75 ~ 170.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1
	JO32 (2.5 V)	Stop Function	0.75 ~ 170.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1
	JO32 (1.8 V)	Stop Function	0.75 ~ 135.0	-40 °C ~ +125 °C	±25 ppm	15 pF / 30 pF HCMOS	3.2 x 2.5 x 1.1

JO53 • OSCILLATOR • HCMOS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO53 (3.3 V)	Stop Function	0.5 ~ 160.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	5.0 x 3.2 x 1.4
	JO53 (2.5 V)	Stop Function	0.5 ~ 160.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	5.0 x 3.2 x 1.4
	JO53 (1.8 V)	Stop Function	0.5 ~ 160.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	5.0 x 3.2 x 1.4
	JO53 (5.0 V) Stop	Stop Function	1.0 ~ 170.0	-40 °C ~ +85 °C	±20 ppm	15 pF / 30 pF 50 pF HCMOS	5.0 x 3.2 x 1.4

JO75 • OSCILLATOR • HCMOS • SMD • CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO75 (3.3 V)	Stop Function	1.0 ~ 170.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	7.0 x 5.0 x 1.8
	JO75 (2.5 V)	Stop Function	0.5 ~ 160.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	7.0 x 5.0 x 1.8
	JO75 (1.8 V)	Stop Function	0.5 ~ 160.0	-40 °C ~ +125 °C	±20 ppm	15 pF / 30 pF HCMOS	7.0 x 5.0 x 1.8
	JO75 (5.0 V) Stop	Stop Function	1.0 ~ 170.0	-40 °C ~ 85 °C	±20 ppm	15 pF / 30 pF 50 pF HCMOS	7.0 x 5.0 x 1.4

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QUARTZ CRYSTAL OSCILLATORS SMD

JV - VCXO - HCMOS - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JV32 (3.3 V)	VCXO	1.25 ~ 55.0	-40 °C ~ +85 °C	±25 ppm	15 pF HCMOS	3.2 x 2.5 x 1.0
	JV54 (3.3 V)	VCXO	1.0 ~ 125.0	-40 °C ~ +85 °C	±25 ppm	15 pF HCMOS	5.0 x 3.2 x 1.2
	JV75 (3.3 V)	VCXO	1.0 ~ 125.0	-40 °C ~ +85 °C	±25 ppm	15 pF HCMOS	7.0 x 5.0 x 1.9

TUNING FORK OSCILLATOR - 32.768 kHz - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in kHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JO22 32.768 kHz	AT-cut	32.768 kHz	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	2.5 x 2.0 x 0.8
	JRO32 (1.2 V ~5.0 V)	uses tuning Fork Crystal	32.768 kHz	-40 °C ~ +105 °C	±25 ppm	15 pF HCMOS	3.2 x 2.5 x 1.0
	JO32 32.768 kHz	AT-cut	32.768 kHz	-40 °C ~ +125 °C	±25 ppm	15 pF HCMOS	3.2 x 2.5 x 1.0

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(VOLTAGE CONTROLLED) TEMPERATURE COMPENSATED CRYSTAL OSCILLATORS

(VC)TCXO - CLIPPED SINE - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JT11S(V)	VCTCXO or TCXO	13.0 ~ 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	1.6 x 1.2 x 0.55
	JT11LE (1.2 ~ 1.8V)	Low Voltage TCXO	13.0 ~ 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	1.6 x 1.2 x 0.55
	JT11G	TCXO for GPS	26.0 / 38.40 / 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	1.6 x 1.2 x 0.55
	JT11GLE (1.2 ~ 1.8V)	Low Voltage TCXO for GPS	26.0 / 38.40 / 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	1.6 x 1.2 x 0.55
	JT21S(V)	VCTCXO or TCXO	13.0 ~ 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.0 x 1.6 x 0.8
	JT21ETE	TCXO and Standby Function	12.0 ~ 52.0	-40 °C ~ +105 °C	±2.0 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.0 x 1.6 x 0.8
	JT21LE (1.2 ~1.8V)	Low Voltage TCXO	13.0 ~ 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.0 x 1.6 x 0.8
	JT21G	TCXO for GPS	26.0 ~ 38.40	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.0 x 1.6 x 0.7
	JT21GLE (1.2 ~ 1.8V)	Low Voltage TCXO for GPS	26.0 / 38.40 / 52.0	-40 °C ~ +85 °C	±0.5 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.0 x 1.6 x 0.7
	JT22S(V)	VCTCXO or TCXO	10.0 ~ 52.0	-40 °C ~ +85 °C	±1 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	2.5 x 2.0 x 0.95
	JT33(V)	VCTCXO or TCXO	10.0 ~ 52.0	-40 °C ~ +85 °C	±1 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	3.2 x 2.5 x 1.0
	JT53L(V)	VCTCXO or TCXO	10.0 ~ 52.0	-40 °C ~ +85 °C	±1 ppm	10 KΩ // 10 pF › 0.8 Vpp (clipped sine)	5.0 x 3.2 x 1.05

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(VOLTAGE CONTROLLED) TEMPERATURE COMPENSATED CRYSTAL OSCILLATORS

TCXO - HCMOS - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JT21CT	TCXO	13.0 ~ 52.0	-40 °C ~ +105 °C	±2.0 ppm	15 pF HCMOS	2.0 x 1.6 x 0.7
	JT22CT	TCXO	13.0 ~ 52.0	-40 °C ~ +105 °C	±2.0 ppm	15 pF HCMOS	2.5 x 2.0 x 0.8
	JT32CT	TCXO	10.0 ~ 52.0	-40 °C ~ +105 °C	±2.0 ppm	15 pF HCMOS	3.2 x 2.5 x 1.0

(VC)TCXO PRECISION - HCMOS - SMD

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JTP53HC(V)	TCXO Precision	9.6 ~ 50.0	-40 °C ~ +105 °C	±0.05 ppm	15 pF HCMOS	5.0 x 3.2 x 1.7
	JTS53HC(V)	Stratum 3 compliant (VC)TCXO	9.6 ~ 50.0	-40 °C ~ +105 °C	±0.05 ppm	15 pF HCMOS	5.0 x 3.2 x 1.7
	JTP75HC(V)	TCXO Precision	9.6 ~ 50.0	-40 °C ~ +105 °C	±0.05 ppm	15 pF HCMOS	7.0 x 5.0 x 2.2
	JTS75HC(V)	Stratum 3 compliant (VC)TCXO	9.6 ~ 50.0	-40 °C ~ +105 °C	±0.05 ppm	15 pF HCMOS	7.0 x 5.0 x 2.2

(VC)TCXO PRECISION - CLIPPED SINE - SMD

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JTP32CS(V)	TCXO Precision	9.6 ~ 50.0	-40 °C ~ +85 °C	±0.28 ppm	10 KΩ // 10 pF › 0.6 Vpp (clipped sine)	3.2 x 2.5 x 0.9
	JTS32CS(V)	Stratum 3 compliant (VC)TCXO	9.6 ~ 50.0	-40 °C ~ +85 °C	±0.28 ppm	10 KΩ // 10 pF › 0.6 Vpp (clipped sine)	3.2 x 2.5 x 0.9

OCXO - OSCILLATOR - SINE OR HCMOS

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JOX254	VCOCXO or OCXO	10.0 ~ 100.0	-40 °C ~ +85 °C	±0.5 ppb ~ ±50 ppb	Sine or HCMOS	25.4 x 25.4 x 13

* Please note: best frequency stability is not always available in max. temperature range.
Full data can be found online. All specifications are subject to change without notice.

XO HCSL - LVDS - LVPECL

OSCILLATOR PECL - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JOE21 Low Jitter	LVPECL XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	50 Ω at VREF = 0.5V (VDC = 2.5 V) 50 Ω at VREF = 1.3 V (VDC = 3.3 V)	2.0 x 1.6 x 0.75
	JOE22 Low Jitter	LVPECL XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	50 Ω at VREF = 0.5V (VDC = 2.5 V) 50 Ω at VREF = 1.3 V (VDC = 3.3 V)	2.5 x 2.0 x 0.95
	JOE32 Low Jitter	LVPECL XO	65.0 ~ 190.0	-40 °C ~ +125 °C	±25 ppm	50 Ω at VREF = 0.5V (VDC = 2.5 V) 50 Ω at VREF = 1.3 V (VDC = 3.3 V)	3.2 x 2.5 x 0.95
	JOE75 MESA	LVPECL XO	170.0 ~ 320.0	-40 °C ~ +85 °C	±25 ppm	50 Ω at VDC ~ 2.0 V	7.0 x 5.0 x 1.4
	JOE75 3OT	LVPECL XO	65.0 ~ 200.0	-40 °C ~ +85 °C	±25 ppm	50 Ω at VDC ~ 2.0 V	7.0 x 5.0 x 1.5

OSCILLATOR LVDS - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JOD21 Low Jitter	LVDS XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	100 Ω differential › 0.35 Vp-p typ. / 0.25 Vp-p min.	2.0 x 1.6 x 0.75
	JOD22 Low Jitter	LVDS XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	100 Ω differential › 0.35 Vp-p typ. / 0.25 Vp-p min.	2.5 x 2.0 x 0.95
	JOD32	LVDS XO	13.5 ~ 200.0	-40 °C ~ +125 °C	±25 ppm	100 Ω differential › 0.33 Vp-p typ. / 0.25 Vp-p min.	3.2 x 2.5 x 0.95
	JOD75 3OT	LVDS XO	65.0 ~ 200.0	-40 °C ~ +85 °C	±25 ppm	100 Ω differential › 0.33 Vp-p typ. / 0.25 Vp-p min.	7.0 x 5.0 x 1.5
	JOD75 MESA	LVDS XO	170.0 ~ 320.0	-40 °C ~ +85 °C	±25 ppm	100 Ω differential › 0.33 Vp-p typ. / 0.25 Vp-p min.	7.0 x 5.0 x 1.4

OSCILLATOR HCSL - SMD - CERAMIC/METAL PACKAGE

	TYPE	FEATURE	FREQUENCY RANGE in MHz	TEMPERATURE RANGE (max.)*	FREQUENCY STABILITY*	OUTPUT AND LOAD	L x W x H in mm
	JOH21 Low Jitter	HCSL XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	50 Ω to GND at each output ›0.55 Vp-p (3.3 V) / 0.65 Vp-p (2.5 V)	2.0 x 1.6 x 0.75
	JOH22 Low Jitter	HCSL XO	100.0 ~ 160.0	-40 °C ~ +125 °C	±25 ppm	50 Ω to GND at each output ›0.55 Vp-p (3.3 V) / 0.65 Vp-p (2.5 V)	2.5 x 2.0 x 0.95
	JOH32	HCSL XO	13.5 ~ 200.0	-40 °C ~ +125 °C	±25 ppm	50 Ω to GND at each output ›0.65 Vp-p (3.3 V) / 0.6 Vp-p (2.5 V)	3.2 x 2.5 x 0.95

* Please note: best frequency stability is not always available in max. temperature range.
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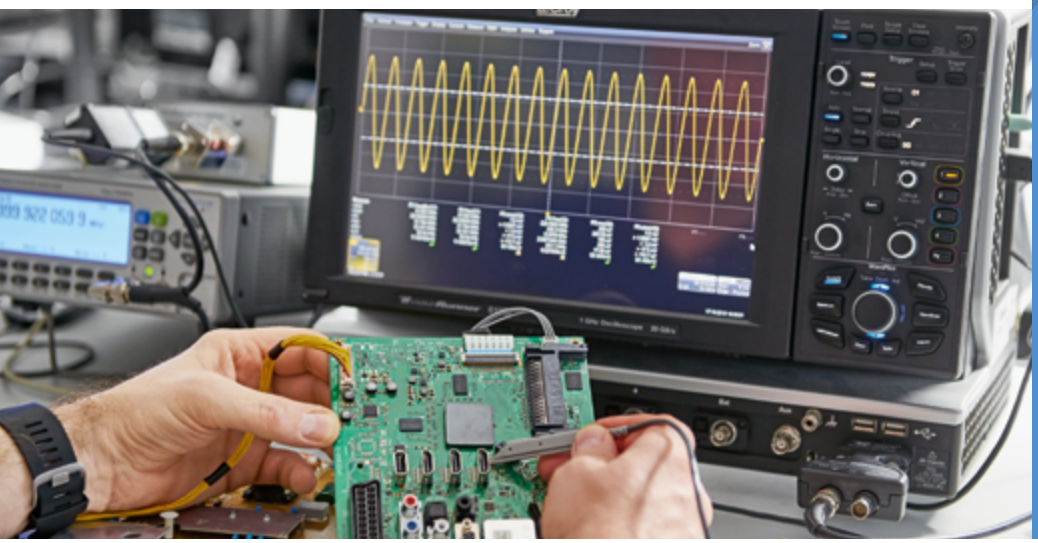
From frequency control products for standard applications to highly stable, shock-resistant components – Jauch products operate reliably in your applications. We ensure this with our quality assurance, which starts even before production does.

JAUCH QUALITY MANAGEMENT

To maintain the consistently high quality of our products and services, we continuously implement measures to safeguard and improve our effectiveness and efficiency. These include internal audits of system, process and procedure workflows as well as audits of our production partners and suppliers.

In addition, important key figures are regularly determined in order to keep a constant eye on quality and make targeted decisions.



JAUCH QUALITY ASSURANCE

- ISO 9001:2015, ISO 14001 certification and IATF 16949 for automotive applications
- Internal & external audit procedure
- Key figure determination
- Components qualification
- Determining the reliability figures of specific components
- Product verification according to RoHS and REACH
- Components inspection
- Incoming and outgoing goods inspection
- Calibration

SUSTAINABLY SUCCESSFUL

EcoVadis conducts sustainability ratings worldwide in accordance with international sustainability standards. In January 2026, the Jauch Group received the EcoVadis Silver Medal for its sustainability performance. This globally recognized rating evaluates companies in four key areas: environment, labor and human rights, ethics, and sustainable procurement. This is the second consecutive year that Jauch has received this award. With this recognition, Jauch placing it in the top 15% of all participating companies. This confirms our commitment to a responsible and sustainable future.

Sustainability is important to us and is deeply rooted in our corporate DNA. For us, acting sustainably is more than an obligation – it's an opportunity and a promise for a better future. That's why we combine economic success with a respectful approach to all relevant resources and stakeholders. We are already setting the course for tomorrow – for ourselves, our company, and the environment.

As a globally operating company, we recognise that our actions have a worldwide impact. Therefore, we take responsibility across the entire supply chain and consistently align our business with sustainable principles.

SUSTAINABILITY AT JAUCH

IT'S AN OPPORTUNITY AND A PROMISE FOR A BETTER FUTURE

For us, sustainability means combining economic success with responsibility for people and the planet, contributing to long-lasting, viable systems. Through a comprehensive double materiality analysis, we worked closely with our key stakeholders – including employees, suppliers, customers, and investors – to identify the most important sustainability issues for Jauch.

The result is a set of key focus topics that form the core of our sustainability strategy. These priorities cover the areas of environment, social, and governance, and shape our goals and actions in sustainability management.

CUSTOMIZED TRANSPORT AND LOGISTICS SOLUTIONS

Our staff are specially trained in the shipment of dangerous goods and are IA-TA-certified.

We know how to get batteries to their destination quickly and safely. Because we stress the highest quality and safety standards even in shipping, ensuring that our products reach you in time.

- SAP R/3 controlled paternoster warehouse
- Our “known consignor” status guarantees fast and secure shipping
- Transport safety through compliance with the internationally accepted UN38.3 standard
- Support for our customers on adherence to legally mandatory transportation, storage and handling regulations

STAY INFORMED

Jauch provides the impulse for progress in battery technology through a wide variety of media or channels. Follow us and you will always be informed about the latest news on technologies, new regulations, services, seminars and products.

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Jauch
THE PULSE OF PROGRESS

04.2026

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