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TOKEN

(TCB7T)

Common Mode Choke Coils

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▶ Product Introduction

Introduction (TCB7T)

Features :

- Pair wire coil for high stability.

Applications :

- Double balance mixers, impedance transformers.
- broad-band transformers.

Leaded type common-mode choke coils clean up high speed signals. Token TCB7T series wire-wound common-mode choke coil includes a magnetic core having a winding core portion and a pair of flanges provided at respective ends of the winding core portion, external electrodes provided on the respective flanges, a pair of windings wound around the winding core portion, each end of the pair of the windings being extended and connected to the external electrode.

For designers seeking to suppress common mode noise on high speed differential signal lines, without distortion, Token has announced the TCB7T Series of compact through hole common-mode choke coils. Taking advantage of Token's advanced winding technology and superior ferrite materials, the TCB7T coils are ultra-compact and provide accurate transmission of high-speed differential signals.

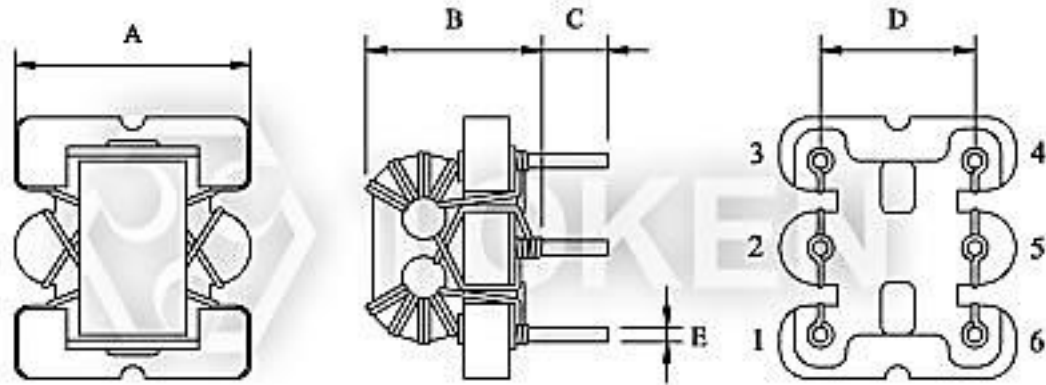
Common mode choke coil circuits are increasingly being used for the effective suppression of common mode noise without distorting the waveform of high-speed signals. The TCB7T wire wound coils measure just $7.2 \times 7.1 \times 4.5$ mm in maximum profile, with a tight ± 0.5 mm dimensional tolerance, making them ideal for today's high speed products, particularly those incorporating double balance mixers, impedance transformers, broad-band transformers applications.

Custom parts are available on request. Token will also produce devices outside these specifications to meet specific customer requirements, contact us with your specific needs. For more information, please link to Token official website "[Through Hole Inductors](#)".

Configurations & Dimensions

Configurations & Dimensions (Unit: mm) (TCB7T)

Type	A(max)	B(max)	C ± 1.0	D ± 0.5	E ± 0.05
TCB7T	7.2	7.1	2.6	4.5	0.5



Leaded Type (TCB7T) Configurations & Dimensions

- Note: Design as Customer's Requested Specifications.

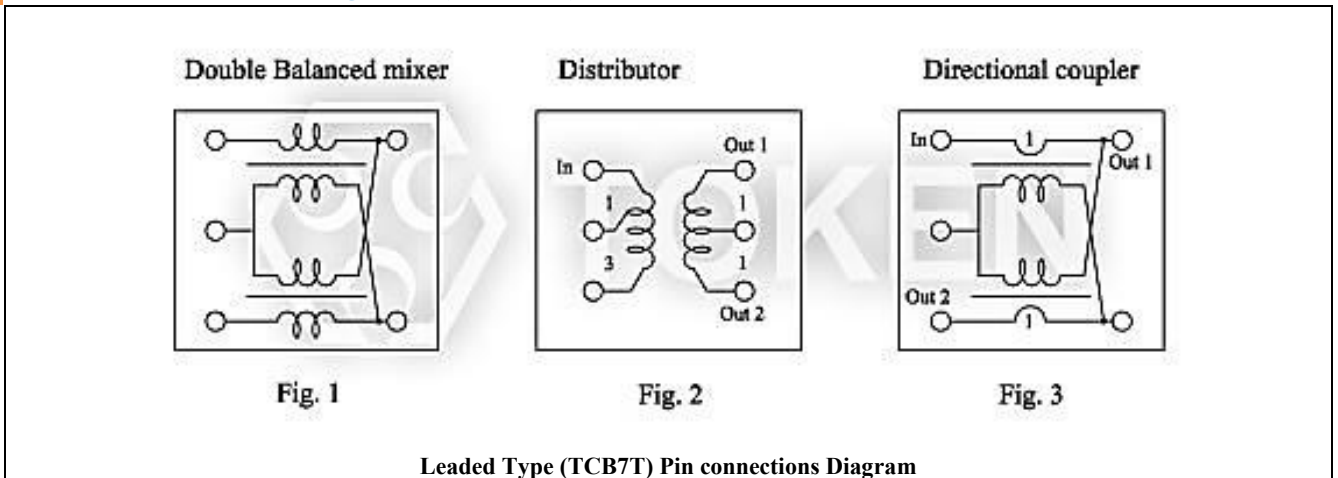
Electrical Characteristics

Electrical Characteristics (TCB7T)

Part Number	Winding Turns	Operating Freq. Ranges (MHz)	Insertion Loss (dB)	Figure
Double balanced mixer				
TCB7T - 456DB1013	1	50 ~ 400	10dB(max)	1
TCB7T - 456DB1014	2	10 ~ 1.0 GHz	6dB(max)	1
TCB7T - 456DB1005	3	8 ~ 800	3.5dB(max)	1
TCB7T - 456DB1006	4	6 ~ 600	2.5dB(max)	1
TCB7T - 456DB1007	5	5 ~ 500	2dB(max)	1
TCB7T - 456DB1009	2	400 ~ 1.3 GHz	4dB(max)	1
Distributor				
TCB7T - 456DS1012	-	20 ~ 600	In to Out-1,2 4.5dB(max)Out-1 to Out-2 (Isolation)10dB(min)	2
Directional coupler				
TCB7T - 456PS1015	4	6 ~ 600	In to Out-1 1.3dB(max) In to Out-2 11dB-14dB	3
TCB7T - 456PS1016	5	6 ~ 600	In to Out-1 0.9dB(max) In to Out-2 13dB-16dB	3
TCB7T - 456PS1011	6	6 ~ 600	In to Out-1 0.8dB(max) In to Out-2 15dB-17dB	3

Pin Connections Diagram

Pin Connections Diagram (TCB7T)



Order Codes

Order Codes (TCB7T)

TCB7T	-	456DB1013	
Part Number		Type	
TCB7T		456DS	Distributor
		456PS	Directional coupler
		456DB	Double balance mixer

► General Information

Leading-Edge Technology

Token Electronics brand passive component specializes in standard and custom solutions offering the latest in state-of-the-art low profile high power density inductor components. Token provides cost-effective, comprehensive solutions that meet the evolving needs of technology-driven markets. In working closely with the industry leaders in chipset and core development, we remain at the forefront of innovation and new technology to deliver the optimal mix of packaging, high efficiency and unbeatable reliability. Our designs utilize high frequency, low core loss materials, new and custom core shapes in combination with innovative construction and packaging to provide designers with the highest performance parts available on the market.

Find Inductor Solutions Faster

Find Your Inductor - wt.moc.nekot@qfr

Only timely and accurate information can help manage the changing needs of your customers. The Token Inductor Finder puts you only a click away from all of the inductor information you need.

Find Your Solution - wt.moc.nekot@qfr

Selecting the correct inductor solution will not only save you time, but it will give you a competitive edge. At Token, we are committed to helping you find the most efficient alternative for your power design. Our inductor and power supply design experts can help you make that selection.

Please forward us:

- A brief description of your particular application's requirements.
- Details of an existing solution that you'd like to replace, enhance or find an alternative.
- Inquiries for feasibility to tailor a power transformer or inductor to your specific application.

We can also help you with any additional technical information you might need relating to any of our products.

Ask Us Today

