

# DATA SHEET

**TC7.6/3.2/4.8**  
Ferrite toroids

Supersedes data of September 2004

2008 Sep 01

**RING CORES (TOROIDS)**

**Effective core parameters**

| SYMBOL        | PARAMETER        | VALUE | UNIT             |
|---------------|------------------|-------|------------------|
| $\Sigma(l/A)$ | core factor (C1) | 1.51  | mm <sup>-1</sup> |
| $V_e$         | effective volume | 148   | mm <sup>3</sup>  |
| $l_e$         | effective length | 15.0  | mm               |
| $A_e$         | effective area   | 9.92  | mm <sup>2</sup>  |
| m             | mass of core     | ≈ 0.7 | g                |

**Coating**

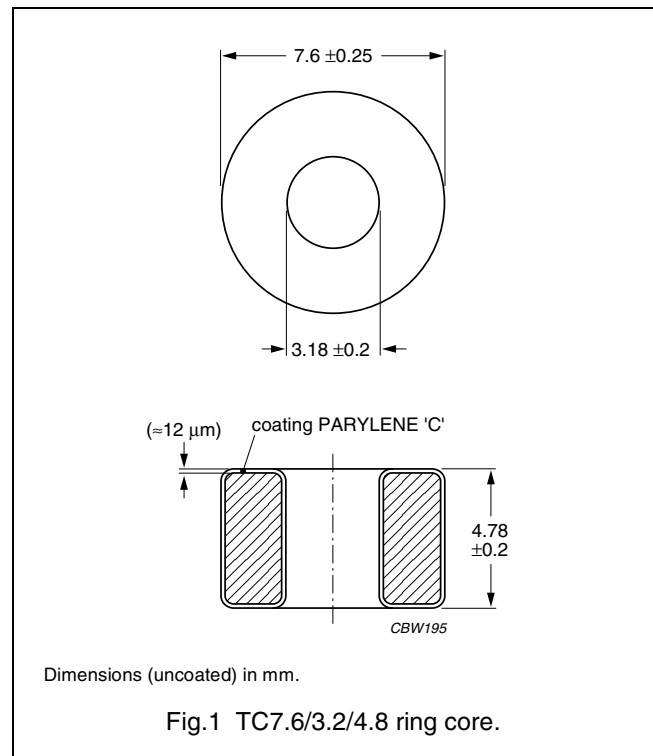
The cores are coated with parylene C, flame retardant in accordance with "UL 94V-2"; UL file number E 194397. The coating is transparent.

Maximum operating temperature is 90 °C.

**Isolation voltage**

DC isolation voltage: 1000 V.

Contacts are applied on the edge of the ring core, which is also the critical point for the winding operation.



**Ring core data**

| GRADE  | $A_L$ (nH) | $\mu_i$ | TYPE NUMBER        |
|--|------------|---------|--------------------|
| 3C90   | 1915 ±25%  | ≈ 2300  | TC7.6/3.2/4.8-3C90 |
| 3E28 <span style="background-color: black; color: white; padding: 0 2px;">des</span> | 3800 ±30%  | ≈ 4000  | TC7.6/3.2/4.8-3E28 |
| 3E6 <span style="background-color: black; color: white; padding: 0 2px;">des</span>  | 8360 ±30%  | ≈ 10000 | TC7.6/3.2/4.8-3E6  |
| 3E8 <span style="background-color: black; color: white; padding: 0 2px;">des</span>  | 12500 ±30% | ≈ 15000 | TC7.6/3.2/4.8-3E8  |




**DATA SHEET STATUS DEFINITIONS**

| DATA SHEET STATUS         | PRODUCT STATUS | DEFINITIONS  |
|---------------------------|----------------|--|
| Preliminary specification | Development    | This data sheet contains preliminary data. Ferroxcube reserves the right to make changes at any time without notice in order to improve design and supply the best possible product.     |
| Product specification     | Production     | This data sheet contains final specifications. Ferroxcube reserves the right to make changes at any time without notice in order to improve design and supply the best possible product. |

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**PRODUCT STATUS DEFINITIONS**

| STATUS           | INDICATION  | DEFINITION   |
|------------------|---|--|
| <b>Prototype</b> |  | These are products that have been made as development samples for the purposes of technical evaluation only. The data for these types is provisional and is subject to change. |
| <b>Design-in</b> |  | These products are recommended for new designs.  |
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