

DATA SHEET

ER32/6/25

Planar ER cores and accessories

Supersedes data of September 2004

2008 Sep 01

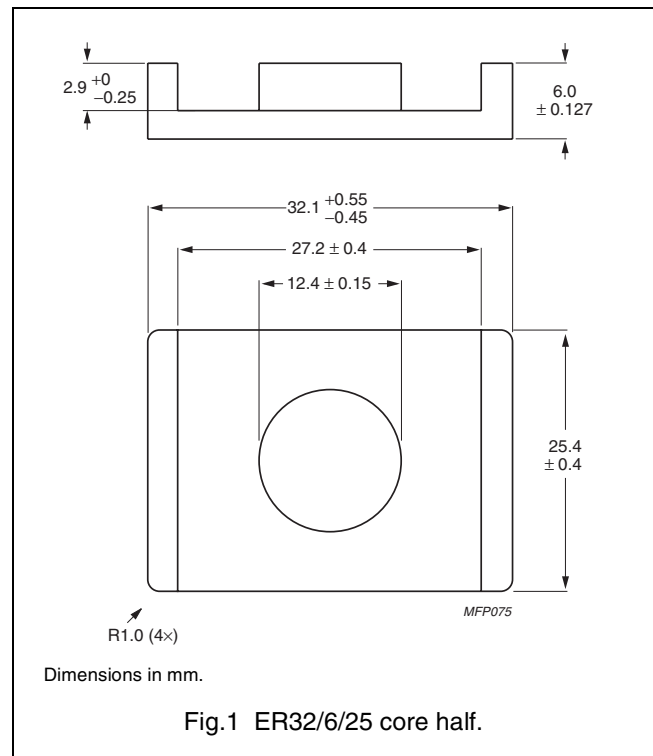
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CORE SETS

Effective core parameters

SYMBOL	PARAMETER	VALUE	UNIT
$\Sigma(l/A)$	core factor (C1)	0.270	mm ⁻¹
V_e	effective volume	5400	mm ³
l_e	effective length	38.2	mm
A_e	effective area	141	mm ²
A_{min}	minimum area	121	mm ²
m	mass of core half	≈ 16	g



Core sets for general purpose transformers and power applications

Clamping force for A_L measurements, 50 ± 20 N.

GRADE	A_L (nH)	μ_e	AIR GAP (μ m)	TYPE NUMBER
3C92 des	$5700 \pm 25 \%$	≈ 1220	≈ 0	ER32/6/25-3C92-S
3C93 des	$6600 \pm 25 \%$	≈ 1420	≈ 0	ER32/6/25-3C93-S
3C95 des	$9640 \pm 25 \%$	≈ 2080	≈ 0	ER32/6/25-3C95-S
3C96 des	$7160 \pm 25 \%$	≈ 1540	≈ 0	ER32/6/25-3C96-S
3F3	$7160 \pm 25 \%$	≈ 1540	≈ 0	ER32/6/25-3F3-S

Properties of core sets under power conditions

GRADE	B (mT) at	CORE LOSS (W) at				
	H = 250 A/m; f = 25 kHz; T = 100 °C	f = 100 kHz; B̂ = 100 mT; T = 100 °C	f = 100 kHz; B̂ = 200 mT; T = 25 °C	f = 100 kHz; B̂ = 200 mT; T = 100 °C	f = 400 kHz; B̂ = 50 mT; T = 100 °C	f = 500 kHz; B̂ = 50 mT; T = 100 °C
3C92	≥ 370	≤ 0.45	—	≤ 3.0	—	—
3C93	≥ 320	≤ 0.45 ⁽¹⁾	—	≤ 3.0 ⁽¹⁾	—	—
3C95	≥ 320	—	≤ 3.5	≤ 3.33	—	—
3C96	≥ 340	≤ 0.3	—	≤ 2.2	—	≤ 1.9
3F3	≥ 300	≤ 0.65	—	—	≤ 1.0	—

1. Measured at 140 °C.

MOUNTING INFORMATION

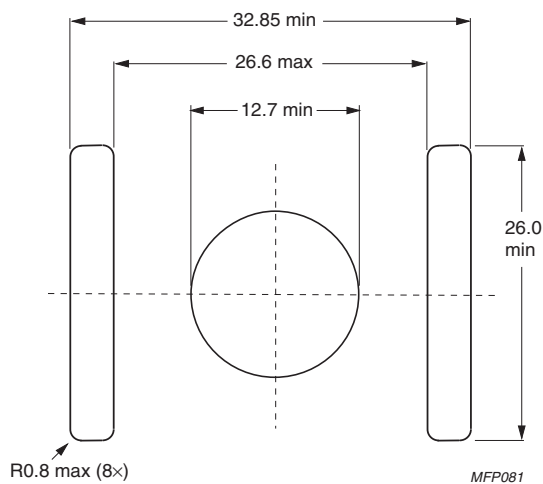


Fig.2 Recommended PCB cut-out for ER32/6/25 cores.

Winding data for ER32/6/25 planar core

WINDING AREA (mm ²)	AVERAGE TRACK LENGTH (mm)	FOOTPRINT AREA (mm ²)
41.1	62.2	828

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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.
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