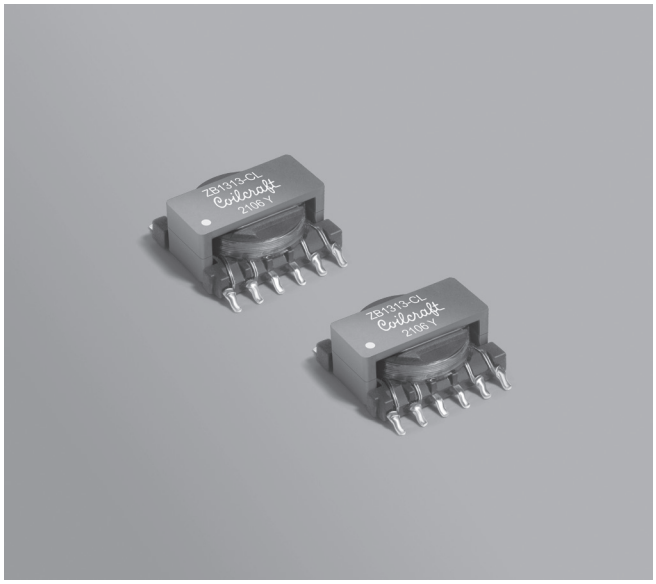
No-Opto Flyback Transformer



- Designed for use with Maxim 60 V No-opto isolated flyback controller MAX17690
- High efficiency, 90.6% in MAXIM reference design circuit
- Operates at 163 kHz with 18 – 38 V input
- 1500 Vrms, one minute isolation (hipot) between primary and secondary

Core material Ferrite

Terminations RoHS tin-silver over tin over nickel over phos bronze. Other terminations available at additional cost.

Weight 2.7 – 3.0 g

Ambient temperature –40°C to +85°C

Max part temperature +125°C

Storage temperature Component: –40°C to +125°C. Tape and reel packaging: –40°C to +80°C

Resistance to soldering heat Max three 40 second reflows at +260°C, parts cooled to room temperature between cycles

Moisture Sensitivity Level (MSL) 1 (unlimited floor life at <30°C / 85% relative humidity)

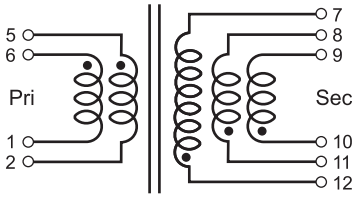
Packaging 400 per 13″ reel Plastic tape: 32 mm wide, 0.4 mm thick, 20 mm pocket spacing, 7.6 mm pocket depth

PCB washing Tested to MIL-STD-202 Method 215 plus an additional aqueous wash. See Doc787_PCB_Washing.pdf.

Part number[1]	Inductance at 0 A[2] ±10% (µH)	Inductance min at [3] 5 A (µH)	DCR max (Ohms) pri	DCR max (Ohms) sec	Leakage inductance max (µH)[4]	Turns ratio[5] pri : sec	Isolation[6] (Vrms)	Power (W)	Output
ZB1313-CLD	10.5	9.45	0.0611	0.0647	0.18	1 : 1.27	1500	16.8	24 V, 0.7 A

1. **Packaging: D** = 13″ machine-ready reel. EIA-481 embossed plastic tape (400 parts per full reel).
2. Inductance is for the primary, measured at 150 kHz, 0.1 Vrms, 0 Adc.
3. Minimum inductance is for the primary, measured at 150 kHz, 0.1 Vrms, 5 Adc.
4. Leakage inductance is for the primary winding with the secondary winding shorted.
5. Turns ratios are with the primary and secondary windings connected in parallel.
6. 1500 Vrms, one minute isolation (hipot) between primary and secondary.
7. Electrical specifications at 25°C.

Refer to Doc 362 “Soldering Surface Mount Components” before soldering.



Connect pin 1 to 2, pin 5 to 6, pin 7 to 8 to 9, and pin 10 to 11 to 12 on PC board.

Coilcraft
www.coilcraft.com

US +1-847-639-6400 sales@coilcraft.com
UK +44-1236-730595 sales@coilcraft-europe.com
Taiwan +886-2-2264 3646 sales@coilcraft.com.tw
China +86-21-6218 8074 sales@coilcraft.com.cn
Singapore + 65-6484 8412 sales@coilcraft.com.sg

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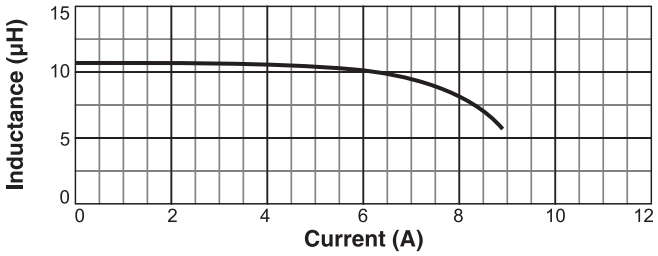
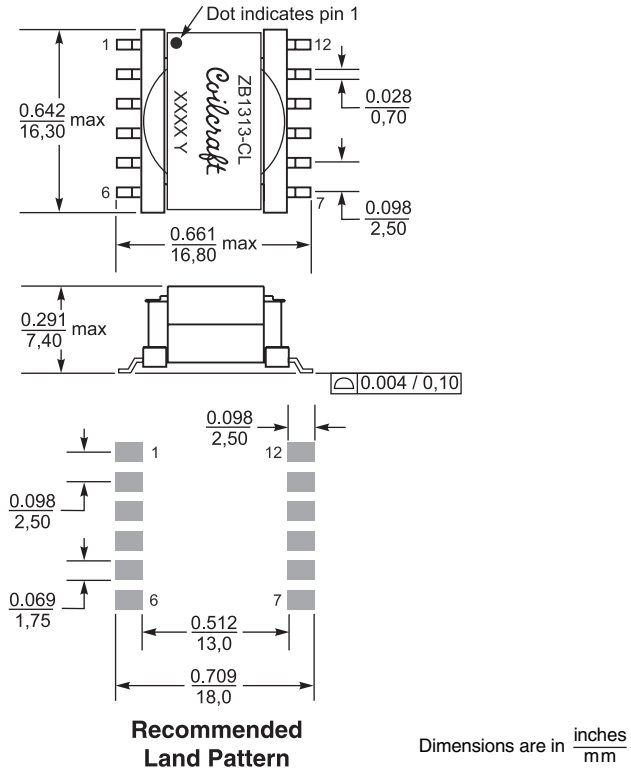
No-Opto Flyback Transformer – ZB1313-CLD

L vs Current





Dimensions are in inches / mm

Coilcraft
www.coilcraft.com

US +1-847-639-6400 sales@coilcraft.com
UK +44-1236-730595 sales@coilcraft-europe.com
Taiwan +886-2-2264 3646 sales@coilcraft.com.tw
China +86-21-6218 8074 sales@coilcraft.com.cn
Singapore + 65-6484 8412 sales@coilcraft.com.sg

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