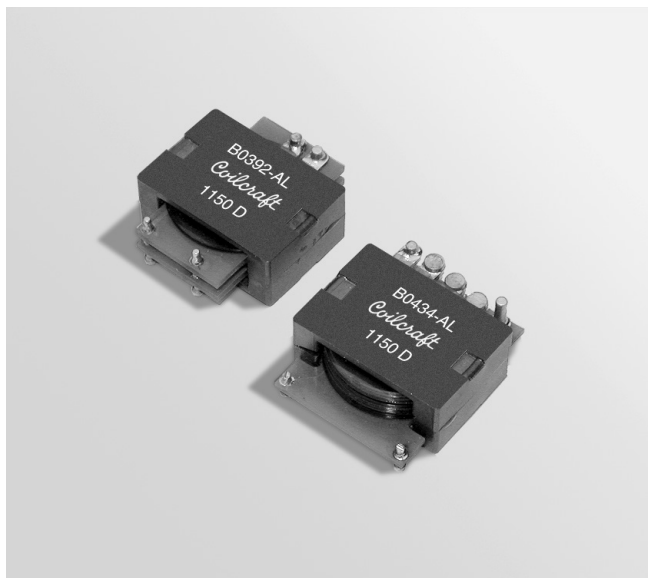




Planar Magnetics

For Texas Instruments
UCC3580



This planar transformer and planar inductor pair is designed specifically for the Texas Instruments UCC3580 family of PWM controllers.

The B0392-AL transformer is engineered for use in single switch, forward topologies operating at 300 kHz. It is ideal for use in high-current telecom power supply applications that require high efficiency in a low-profile package.

The main winding of the B0434-AL inductor serves as an output choke, while the auxiliary winding controls input current to the PWM.

Request free evaluation samples by contacting Coilcraft or visiting www.coilcraft.com.

Transformer

Part number ¹	Output power (W)	Output voltage (V)	Output current (A rms)	Primary inductance ² min (μH)	Leakage inductance ³ max (μH)	DCR max (mOhms)	Pri/sec isolation (Vdc)
B0392-AL_	100	3.3	30.0	65.0	0.22	Primary: 13.5 Secondary: 0.4	1500

1. When ordering, please specify **packaging** code:

B0392-ALD

Packaging: D = 13" machine ready reel. EIA-481 embossed plastic tape (200 parts per full reel).

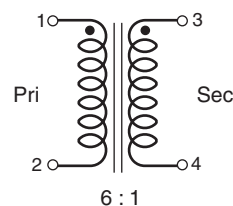
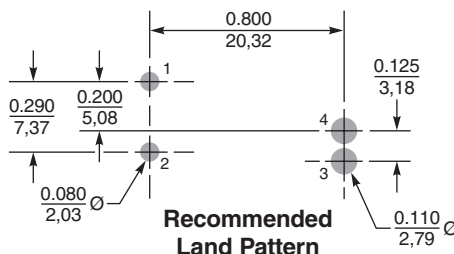
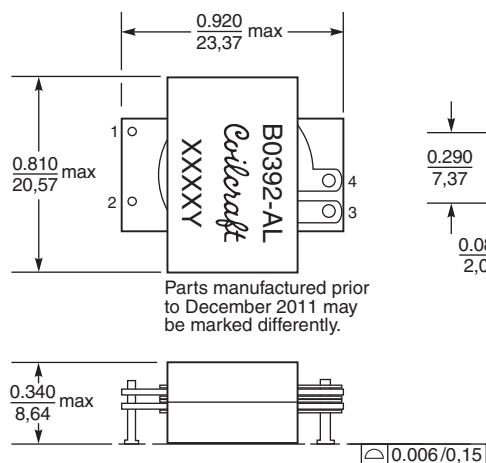
B = Less than full reel. In tape, but not machine ready. To have a leader and trailer added (\$25 charge), use code letter D instead.

2. Inductance measured on an Agilent/HP 4284 between pins 1 and 2 at 250 kHz, 0.1 Vrms, 0 Adc.

3. Leakage inductance measured between pins 1 and 2 at 100 kHz, 0.1 Vrms, 0 Adc with secondary pins shorted.

4. Electrical specifications at 25°C.

Refer to Doc 362 "Soldering Surface Mount Components" before soldering.



Dimensions are in inches
mm



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This product may not be used in medical or high risk applications without prior Coilcraft approval. Specification subject to change without notice. Please check web site for latest information.



Planar Magnetics for Texas Instruments UCC3580

Output Inductor

Part number ¹	Inductance ² @ 0 Adc (μ H)	I rated Adc	DCR max (mOhms)	Isolation ³ (Vdc)	Isat ⁴ (A)	Irms ⁵ (A)
B0434-AL_	2.0 $\pm$ 10%	30	Main: 1.9 Aux: 1450.0	1100	38	36

1. When ordering, please specify **packaging** code:

B0434-ALD

Packaging: D = 13" machine ready reel. EIA-481 embossed plastic tape (200 parts per full reel).

B = Less than full reel. In tape, but not machine ready. To have a leader and trailer added (\$25 charge), use code letter D instead.

2. Inductance measured on an Agilent/HP 4284 between pins 3 and 4 at 10 kHz, 0.1 Vrms.

3. Isolation measured from pin 1 to pin 3.

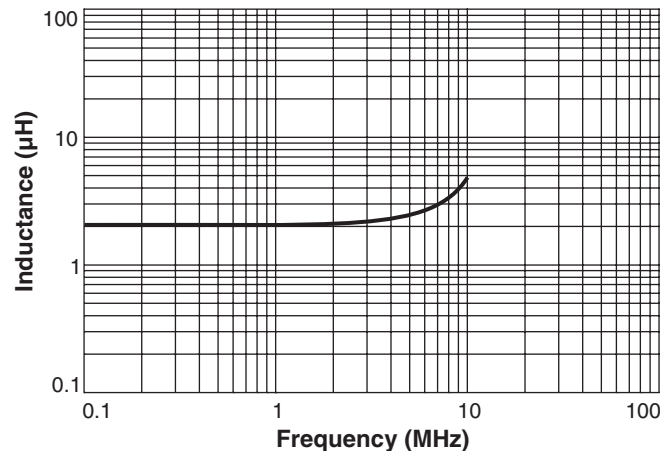
4. DC current at which inductance drops 10% (typ) from its value without current.

5. Current that causes a 40°C rise from 25°C ambient.

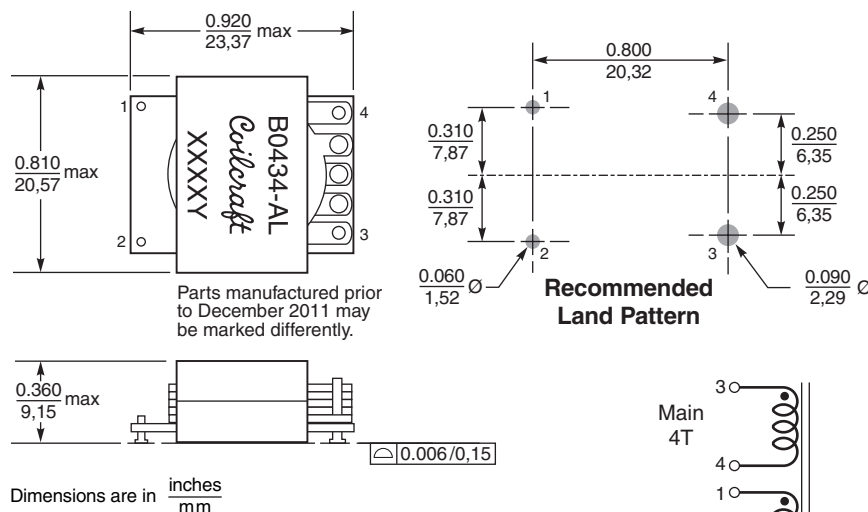
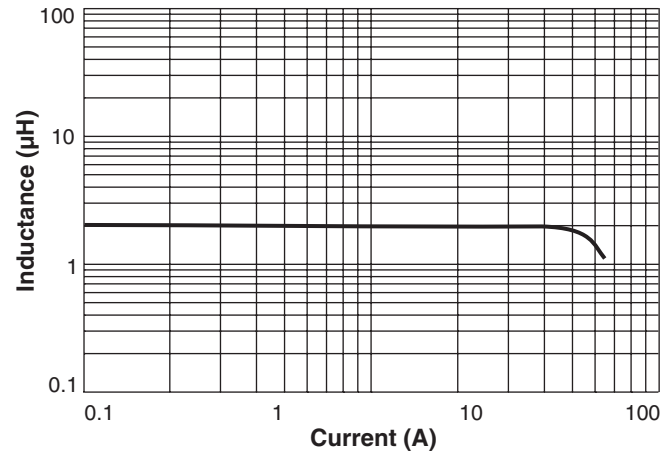
6. Electrical specifications at 25°C.

Refer to Doc 362 "Soldering Surface Mount Components" before soldering.

Typical L vs Frequency



Typical L vs Current



Core material Ferrite

Terminations RoHS Matte-tin over nickel over brass

Weight 11.1 – 11.5 g

Ambient temperature -40°C to +85°C

Storage temperature Component: -40°C to +85°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)

Failures in Time (FIT) 38 per billion hours

Mean Time Between Failures (MTBF)

26,315,789 hours, calculated per Telcordia SR-332

Packaging 200 per 13" reel Plastic tape: 44 mm wide, 0.37 mm thick, 32 mm pocket spacing, 9.4 mm pocket depth

PCB washing Only pure water or alcohol recommended

