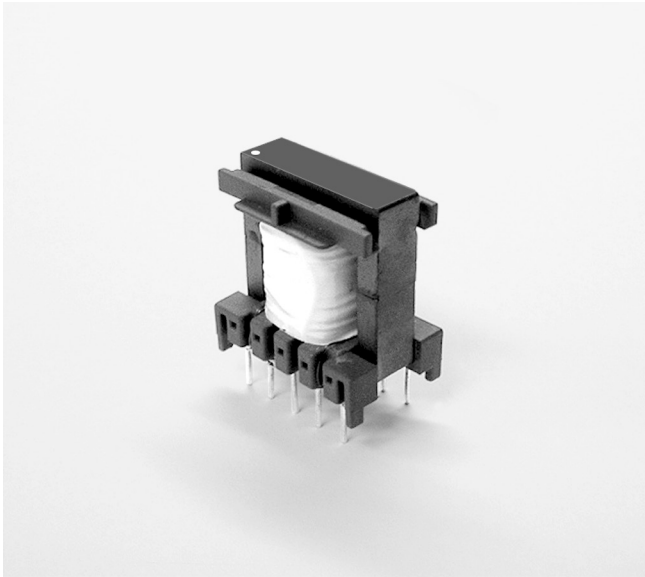




# Flyback Transformer

For Microchip Technology's  
Isolated AC LED driver



- Developed specifically for Microchip Technology's Isolated AC LED driver to operate with PIC16HV785 CMOS Microcontroller and MCP1402 Gate Driver
- Universal ac input; 20 V, 0.7 A output; Operates at 125 kHz
- 3000 Vrms, one minute isolation from the primary and bias to the secondary winding
- Bias winding supplies 12 V to power the microprocessor

**Core material** Ferrite

**Terminations** RoHS tin-silver over tin over copper clad steel. Other terminations available at additional cost.

**Weight** 11.7 g

**Ambient temperature** -40°C to +85°C

**Storage temperature** Component: -40°C to +85°C.

Tray packaging: -40°C to +80°C

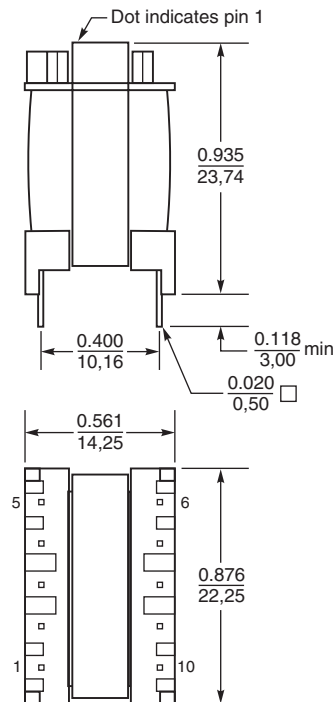
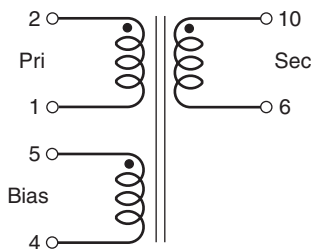
**Moisture Sensitivity Level (MSL)** 1 (unlimited floor life at <30°C / 85% relative humidity)

**Packaging** 117 parts per tray

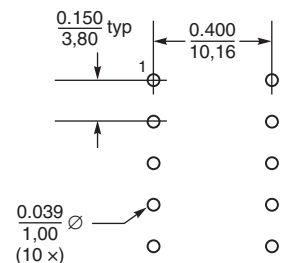
**PCB washing** Only pure water or alcohol recommended

Part number	Power (W)	Inductance at 0 A <sup>1</sup> ±10% (µH)	Inductance at Ipk <sup>2</sup> min (µH)	DCR max (Ohms)			Leakage inductance <sup>3</sup> max (µH)	Turns ratio		Ipk <sup>2</sup> (A)	Output <sup>4</sup>
				pri	sec	bias		pri : sec	pri : bias		
GA3172-AL	14	500	450	0.675	0.245	0.325	8.25	1:0.214	1:0.131	0.78	20 V, 0.7 A

1. Inductance measured at 125 kHz, 0.1 Vrms, 0 Adc.
  2. Peak primary current drawn at minimum input voltage.
  3. Leakage inductance is for the primary and is measured with the secondary shorted.
  4. Output is for the secondary. Bias winding output is 12 V.
  5. Electrical specifications at 25°C.
- Refer to Doc 362 "Soldering Surface Mount Components" before soldering.



### Recommended PC Board Layout



Dimensions are in  $\frac{\text{inches}}{\text{mm}}$