

SPECIFICATIONS

All Specifications Typical @ Tpcb = +25°C, Nominal Line and Full Load Unless Otherwise Noted.

INPUT SPECIFICATIONS

Input Voltage Range..... 24 to 32Vdc
 Nominal Input Voltage..... 28Vdc
 Under Voltage Lock-Out..... 23Vdc, typ.
 Shut-Down Input Current 2.0mA, typ.
 Short Circuit Input Current..... 40mA, typ.
 Input Filter Low E.S.R. Capacitors
 Enable Reference to -Vin
 On Control..... ≥ +2.4Vdc or Open Circuit
 Off control..... ≤ 0.8Vdc
 Reverse Voltage Protection..... Internal Shunt Diode
 (External Input Fuse Recommended)

OUTPUT SPECIFICATIONS

Main Constant Current Output :
 Voltage..... 2.0V to 4.0V, max.
 Current 0 to 40A, max.
 Start-Up Current Ramp 2.3A/Sec., typ.
 Regulation (25A to 40A Iout) ±0.2%, max.
 Current Adjustment (I-Trim)* 22A to 42A, max
 Noise 0.6A rms, typ.
 Temperature Coefficient..... ±0.03%/°C, max.
 Over-Current Protection..... 45A, typ.
 Short Circuit Protection Hiccup Mode, Indefinite

Current Monitor, IM(+) to IM(-) :

Transfer Function 0.64mV/A
 Accuracy ±1.0%, typ.

Auxiliary Voltage Output :

Voltage..... 5V±1.0%, max.
 Current 0 to 1.2A, max.
 Over-Voltage Protection..... 5.9V, max.
 Temperature Coefficient..... ±0.02%/°C, max.

GENERAL SPECIFICATIONS

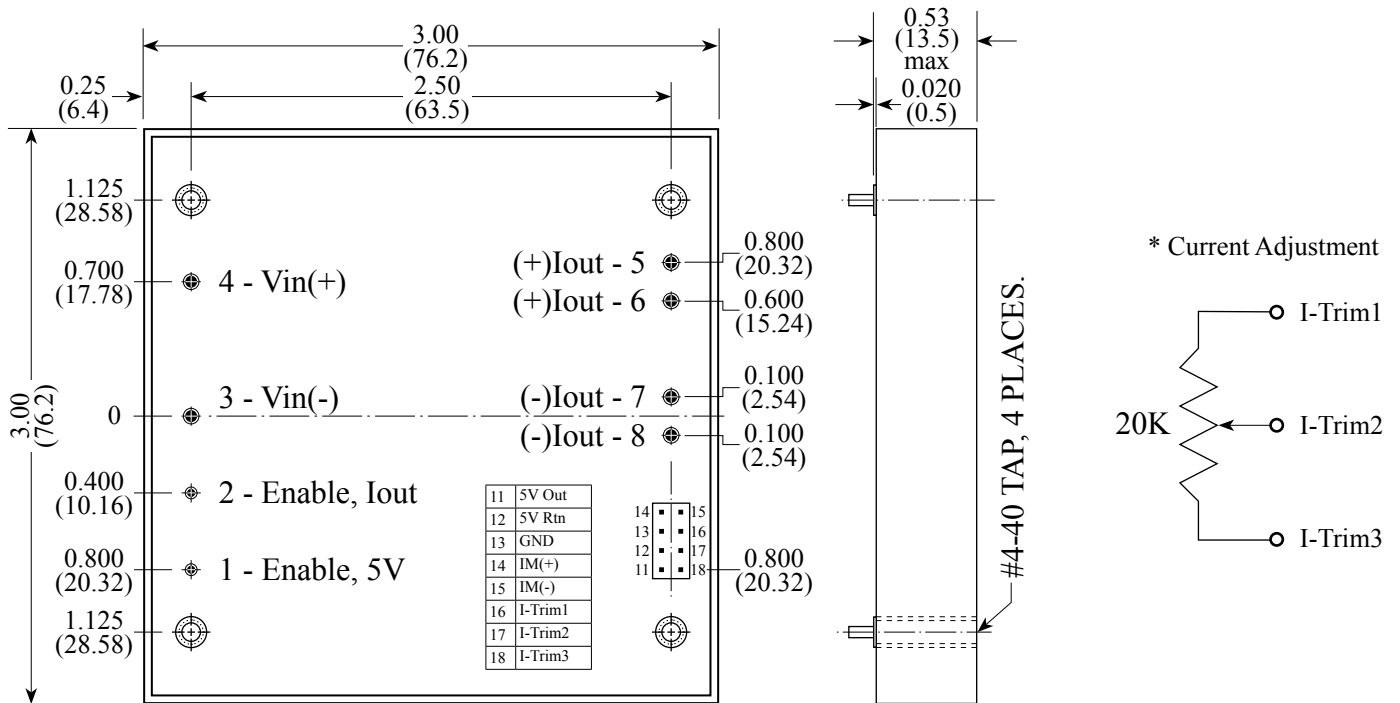
Efficiency, Full Load @ 28Vin 88%, min.
 Isolation Voltage, Input to Output..... 1500Vdc, min.
 Switching Frequency 300KHz, typ.

ENVIRONMENTAL SPECIFICATIONS

Thermal Impedance, Free Convection..... 10°C/Watt Diss.
 Operating Case Temperature Range -40°C to +100°C
 Storage Temperature Range -55°C to +125°C
 Humidity, Non-Condensing 20-95% R.H.
 Over Temperature Shut-Down..... +105°C, typ.
 Over Temperature Recovery +95°C, typ.

PHYSICAL SPECIFICATIONS

Dimensions See Drawing
 Weight 165 g.(5.8 Oz.)



			Unless Otherwise Specified Dimension are in Inches (mm)	ACON, INC. 22 Bristol Drive, S. Easton, MA 02375 Tel: (508)230-8022 ; Fax: (508)230-2371 Web: www.aconinc.com ; E-Mail: sales@aconinc.com	
			Tolerances: Decimals .xx ± 0.020 .xxx ± 0.005	Model No.	
			Material:	MC40S2804MC	
LTR	Descriptions	Date		Rev: 1	Date: 11/30/05 Pg. 1 of 1

SPECIFICATIONS

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INPUT SPECIFICATIONS

Input Voltage Range..... 24 to 32Vdc
 Nominal Input Voltage..... 28Vdc
 Under Voltage Lock-Out..... 23Vdc, typ.
 Shut-Down Input Current 2.0mA, typ.
 Short Circuit Input Current..... 40mA, typ.
 Input Filter Low E.S.R. Capacitors
 Enable Reference to -Vin
 On Control..... ≥ +2.4Vdc or Open Circuit
 Off control..... ≤ 0.8Vdc
 Reverse Voltage Protection..... Internal Shunt Diode
 (External Input Fuse Recommended)

OUTPUT SPECIFICATIONS

Main Constant Current Output :
 Voltage..... 4.0V to 6.0V, max.
 Current 0 to 40A, max.
 Start-Up Current Ramp 2.3A/Sec., typ.
 Regulation (25A to 40A Iout) ±0.2%, max.
 Current Adjustment (I-Trim)* 22A to 42A, max
 Noise 0.6A rms, typ.
 Temperature Coefficient..... ±0.03%/°C, max.
 Over-Current Protection..... 45A, typ.
 Short Circuit Protection Hiccup Mode, Indefinite

Current Monitor, IM(+) to IM(-) :

Transfer Function 0.64mV/A
 Accuracy ±1.0%, typ.

Auxilliary Voltage Output :

Voltage..... 5V±1.0%, max.
 Current 0 to 1.2A, max.
 Over-Voltage Protection..... 5.9V, max.
 Temperature Coefficient..... ±0.02%/°C, max.

GENERAL SPECIFICATIONS

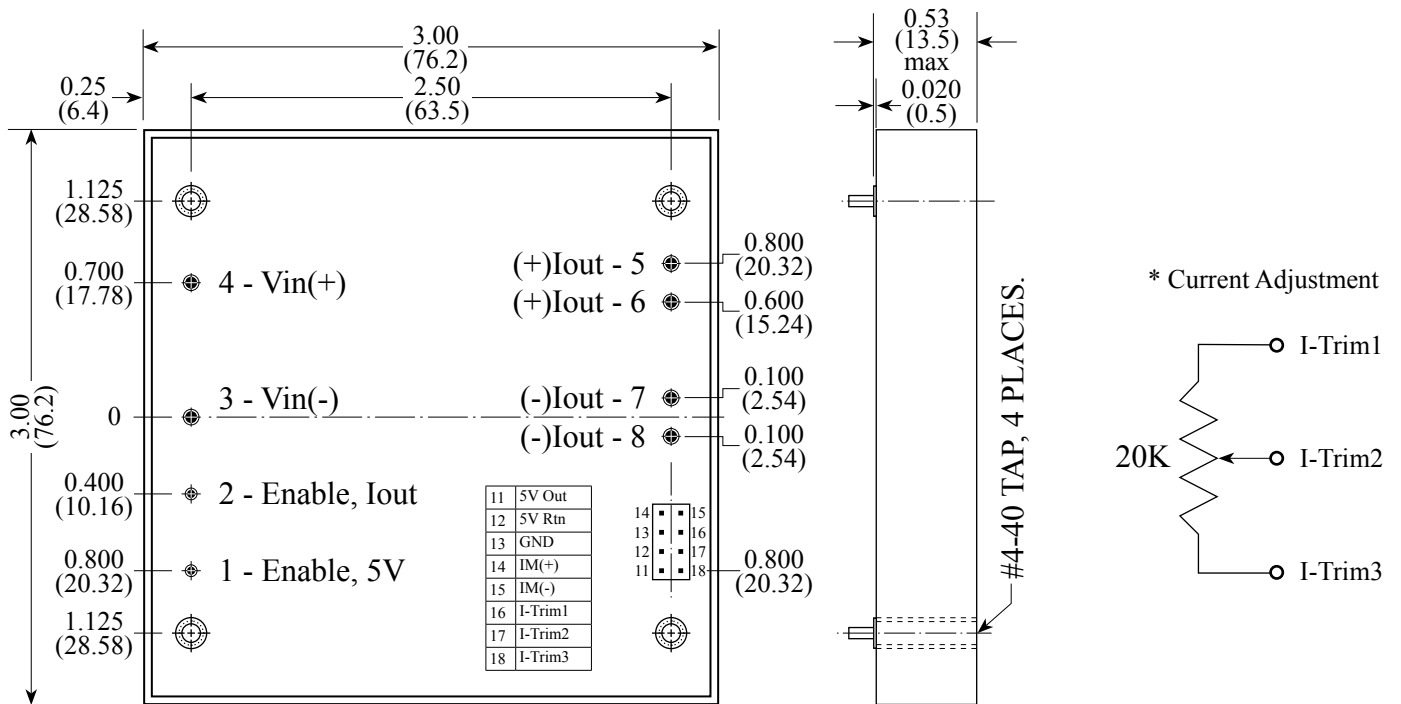
Efficiency, Full Load @ 28Vin 90%, min.
 Isolation Voltage, Input to Output..... 1500Vdc, min.
 Switching Frequency 300KHz, typ.

ENVIRONMENTAL SPECIFICATIONS

Thermal Impedance, Free Convection..... 10°C/Watt Diss.
 Operating Case Temperature Range -40°C to +100°C
 Storage Temperature Range -55°C to +125°C
 Humidity, Non-Condensing 20-95% R.H.
 Over Temperature Shut-Down..... +105°C, typ.
 Over Temperature Recovery +95°C, typ.

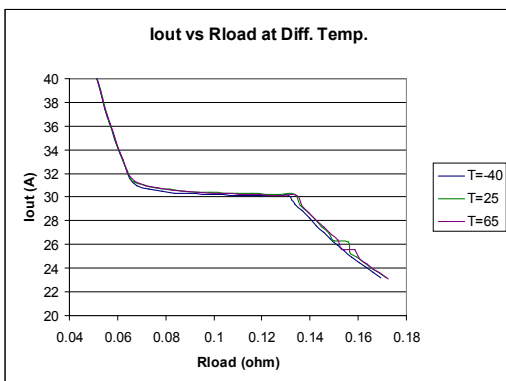
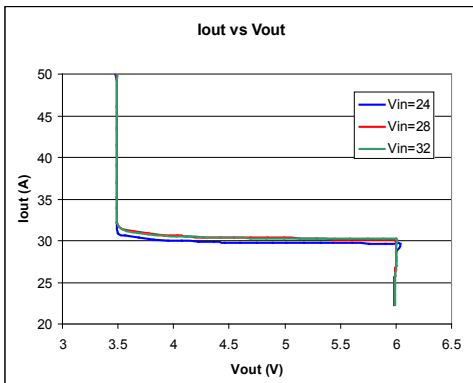
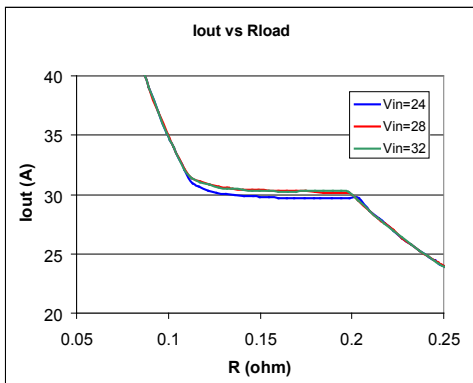
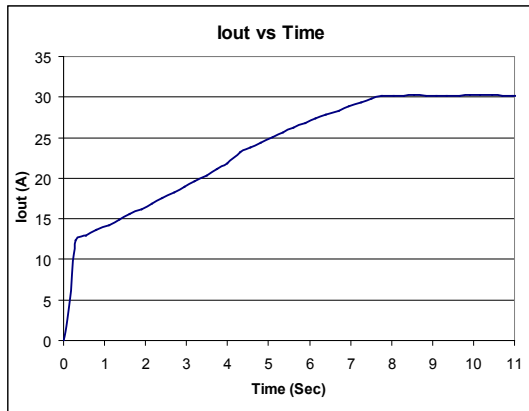
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Dimensions See Drawing
 Weight..... 165 g.(5.8 Oz.)



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			Material:	Model No. MC40S2806MC	
LTR	Descriptions	Date		Rev: 1	Date: 11/30/05 Pg. 1 of 2

Current Setting @ 30A



Current Setting @ 40A

