



CHB75W SERIES

49.5 TO 75 WATT 4:1 INPUT RANGE

DC-DC CONVERTERS

SINGLE OUTPUT



FEATURES

- * 49.5-75W Isolated Output
- * Efficiency to 85%
- * 300KHz Switching Frequency
- * 4 : 1 Wide Input Range
- * Regulated Outputs
- * Continuous Short Circuit Protection
- * Five-Sided Metal Case
- * Half-Brick size meet industrial standard
- * CE Mark Meets 2006/95/EC, 93/68/EEC, and 89/336/EEC
- * Safety Meets UL60950-1, EN60950-1, and IEC60950-1
- * UL60950-1 and EN60950-1 Approval



MODEL NUMBER	INPUT VOLTAGE	OUTPUT VOLTAGE	OUTPUT CURRENT		INPUT CURRENT		% EFF.	Capacitor Load max.
			MIN.	MAX.	NO LOAD	FULL LOAD		
CHB75W-24S33	9-36 VDC	3.3VDC	0mA	15 A	50mA	2611mA	79	15000uF
CHB75W-24S05	9-36 VDC	5.0VDC	0mA	15 A	50mA	3811mA	82	15000uF
CHB75W-24S12	9-36 VDC	12 VDC	0mA	6.25 A	50mA	3765mA	83	6250uF
CHB75W-24S15	9-36 VDC	15 VDC	0mA	5 A	50mA	3720mA	84	5000uF
CHB75W-24S24	9-36 VDC	24 VDC	0mA	3.12 A	50mA	3720mA	84	3120uF
CHB75W-24S48	9-36 VDC	48 VDC	0mA	1.56 A	50mA	3811mA	82	1560uF
CHB75W-48S33	18-75VDC	3.3VDC	0mA	15 A	50mA	1289mA	80	15000uF
CHB75W-48S05	18-75VDC	5.0VDC	0mA	15 A	50mA	1883mA	83	15000uF
CHB75W-48S12	18-75VDC	12 VDC	0mA	6.25 A	50mA	1860mA	84	6250uF
CHB75W-48S15	18-75VDC	15 VDC	0mA	5 A	50mA	1838mA	85	5000uF
CHB75W-48S24	18-75VDC	24 VDC	0mA	3.12 A	50mA	1835mA	85	3120uF
CHB75W-48S48	18-75VDC	48 VDC	0mA	1.56 A	50mA	1860mA	84	1560uF

NOTE: 1. Nominal Input Voltage 24, 48VDC

SPECIFICATIONS

All Specifications Typical At Nominal Line, Full Load, and 25°C Unless Otherwise Noted

INPUT SPECIFICATIONS:

Input Voltage Range	24V	9-36V
	48V	18-75V
Input Surge Voltage (100ms max.)	24V	50Vdc max.
	48V	100Vdc max.
Under voltage lockout	24Vin power up	8.8V
	24Vin power down	8.0V
	48Vin power up	17V
	48Vin power down	16V

Positive Logic Remote ON/OFF (see note 3 & 4)

Input Filter PI Type

OUTPUT SPECIFICATIONS:

Voltage Accuracy:	±1.0% max.
Transient Response:25% Step Load Change	<500u sec.
External Trim Adj. Range	±10%
Ripple & Noise, 20MHz BW(see note 5)	
3.3V & 5V	40mV RMS, max.
	100mV pk-pk, max.
12V & 15V	60mV RMS, max.
	150mV pk-pk, max.
24V	100mV RMS, max.
	240mV pk-pk, max.
48V	200mV RMS, max.
	480mV pk-pk, max.

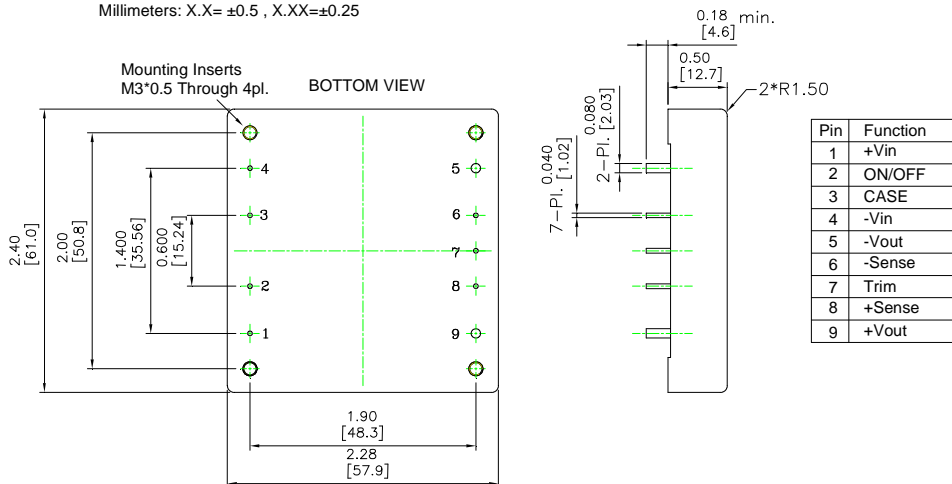
Temperature Coefficient	±0.03%/°C
Short Circuit Protection	Continuous
Line Regulation (see note 1)	±0.2% max.
Load Regulation (see note 2)	±0.2% max.
Over Voltage Protection trip Range ,% Vo nom.	115-140%
Current Limit	110% ~160% Nominal Output
Start up time	5ms Typ.

CASE HB

All Dimensions In Inches(mm)

Tolerances Inches: X.XX= ±0.02 , X.XXX= ±0.010

Millimeters: X.X= ±0.5 , X.XX=±0.25



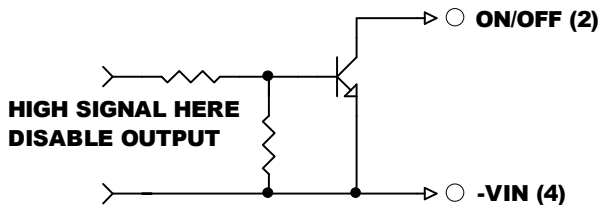
GENERAL SPECIFICATIONS:

Efficiency	See Table
Isolation Voltage	Input/Output 1500VDC min.
	Input/Case 1500VDC min.
	Output/Case 1500VDC min.
Isolation Resistance	10 ⁷ ohm min.
Isolation Capacitance	1000pF Typ.
Switching Frequency	300KHz, Typ.
Operating Case Temperature	-40°C to 100°C
Storage Temperature	-55°C to +105°C
Thermal Shutdown, Case Temp.	100°C Typ.
Humidity	95% RH max. Non condensing
MTBF	MIL-STD-217F, GB, 25°C, Full Load 1000khrs Typ.
Dimensions	2.28x2.40x0.50 inches (57.9x61.0x12.7 mm)
Case Material	Aluminum
Weight	94g

NOTE :

- Measured From High Line to Low Line
- Measured From Full Load to Zero Load
- Logic Compatibility Open Collector ref to -Input
 Module ON Open Circuit
 Module OFF < 0.8Vdc
- Suffix "N" to the Model Number with Negative Logic Remote ON/OFF
 Module ON < 0.8Vdc
 Module OFF Open Circuit
- Output Ripple and Noise measured with 10uF tantalum and 1uF Ceramic capacitor across output. (48V: 1uF Ceramic cap. only)
- Suffix "-C" to the Model Number with Clear Mounting Insert (3.2mm DIA.)
- Require a 47uF Aluminum capacitor connected between +Vout and -Vout

REMOTE ON/OFF CONTROL



EXTERNAL OUTPUT TRIM

