BXB150 Series Single output

 Total Power:
 150 W

 Input Voltage:
 18 - 36 Vdc

 36 - 75 Vdc

 # of Outputs:
 Single



Electrical Specifications

	Output		
	Voltage adjustability:		60% to 110%
	Setpoint accuracy:		±1.0%
	Line regulation	Low line to high line	±0.5%
	Load regulation	Full load to min. load	±0.10%
	Minimum load		0 %
	Overshoot	At turn on and turn-off	None
	Undershoot		None
	Ripple and noise 5 Hz - 20 MHz (see note 1)	3.3 V and 5 V	75 mV pk-pk,
		12V and 15 V	20 mV rms 100 mV pk-pk, 30 mV rms
	Temperature coefficient		±0.01% / °C
	Transient response (see note 2)		±2.0% max. deviation 170 μsrecovery to within ±1.0%
	Remote sense		0.5 Vdc transmission line drop compensation



CSA C22.2 No. 950





Special Features

- Industry standard footprint MTBF >1.4 million hours (Bellcore 332)
- Input voltage to ETS300-132-2
- Adjustable output voltage
- No minimum load required
- Separate case ground pin
- 2:1 input range for battery powered applications
- Undervoltage lockout (UVLO)
- UL, VDE and CSA safety approvals
- Available RoHS compliant
- 2 year warranty

z year warranty

Embedded Power for Business-Critical Continuity

Input					
Input voltage range	24 Vin nominal	18 - 36 Vdc			
	48 Vin nominal	36 - 75 Vdc			
Input current	No load	130 mA max.			
	Remote OFF	20 mA max.			
Input current (max.)	24 Vin	9.0 A max. @ lo max.			
(See note 4)	48 Vin	and Vin = 0 to 75 V 6.5 A max. @ lo max. and Vin = 0 to 75 V			
Input reflected ripple	(See note 6)	5 mA pk-pk			
Active low remote ON/OFF Logic compatiblity ON OFF	(See note 7)	Open collector ref to -input 1.2 Vdc max. Open circuit			
Undervoltage lockout:	24 Vin: power-up 24 Vin: power-down 48 Vin: power-up 48 Vin: power-down	17 V 16.3 V 34 V 32.5 V			
Startup time (see note 8)	Power-up Remote ON/OFF	20 ms 20 ms			
EMC Charateristics					
Conducted emissions (see note 3)	Bellcore 1089 FCC part 15 EN55022, CISPR22	Level A Level A Level A			
General Specifications					
Efficiency		See table			
Isolation voltage	Input/case	1500 Vdc			
	Input/output	1500 Vdc			
	Output/case	1500 Vdc			
Switching frequency	Fixed	500 kHz typ.			
Approvals and standards (see note 5)		VDE0805, EN60950, IEC950 UL1950, CSa c22.2 No. 950			
Case material	Aluminum baseplate with plastic case				
Weight		110 g (3.88 oz)			
MTBF	Bellcore 332 MIL-HDBK-217F @ 40 °C, 100% FL	1,400,000 hours 580,000 hours min.			

Environmental Specifications

Thermal performance	Operating case temp.	-40 °C to +100 °C	Telecom Specifications
Altitude	Non-operating Operating Non-operating	-55 °C to +125 °C 10,000 feet max. 40,000 feet max.	Central office interface A
Vibration	5 - 500 Hz	2.4 G rms (approx.)	
Protection			
Short-circuit	Continu		
Overvoltage			
Undervoltage			
Thermal	110 °C basepl		
J	110 °C basepl		

com Specifications ral office ETS300-132-2 face A

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Ordering Information									
Output Power	Input	· OVP · Current Current	Efficiency	Regulation Efficiency		Model Number			
(Max.)	Voltage		Voltage			(Тур.)	Line	Load	Model Number
100 W	18 - 36 Vdc	4.3 Vdc	3.3 V	0 A	30 A	77%	±0.05%	±0.1%	BXB150-24S3V3FLTJ
100 W	36 - 75 Vdc	4.3 Vdc	3.3 V	0 A	30 A	79%	±0.05%	±0.1%	BXB150-48S3V3FLTJ
150 W	36 - 75 Vdc	6.5 Vdc	5 V	0 A	30 A	84%	±0.05%	±0.1%	BXB150-48S05FLTJ
150 W	36 - 75 Vdc	14.5 Vdc	12 V	0 A	12.5 A	84%	±0.05%	±0.1%	BXB150-48S12FLTJ
150 W	36 - 75 Vdc	17.5 Vdc	15 V	0 A	10 A	88%	±0.05%	±0.1%	BXB150-48S15FLTJ

Notes

- 1 Measured with 10 µF tantalum capacitor and 1 µF ceramic capacitor across output.
- di/dt = 0.1 A/1 µs, Vin = 48 Vdc, Tc = 25 °C, load change = 0.5 lo max. to 0.75 lo 2 max. and 0.75 lo max. to 0.5 lo max.
- Units should be characterised within systems. External components required. 3 Input fusing is recommended based on surge current and maximum input 4 current.
- This product is only for inclusion by professional installers within other 5 equipment and must not be operated as a stand alone product.
- 6
- Simulated source impedance of 12 μ H. 12 μ H inductor in series with +Vin. Active high remote ON/OFF option is available (standard product is active low), 7 designate with the suffix 'FHT' e.g. **BXB150-48S05FHTJ**. Consult factory for further details and options.
- 8 Start-up into resistive load.
- The 'J' suffix indicates that these parts are Pb-free (RoHS 6/6) compliant. 9 TSE RoHS 5/6 (non Pb-free) compliant versions may be available on special request, please contact your local sales representative for details.
- 10 NOTICE: Some models do not support all options. Please contact your local sales representative or use the on-line model number search tool at http://www.powerconversion.com to find a suitable alternative.

External Output Trimming	Pin connections			
Output can be externally trimmed	Pin Number	Function		
by using the method shown.	1	+Vin		
, 3	2	Remote ON/OFF		
° ∢	3	Case		
	4	-Vin		
	5	-Vout		
7 SRT1 OR	6	-Sense		
	7	Trim		
	8	+Sense		
6	9	+Vout		

Mechanical Drawing



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Americas

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5810 Van Allen Way Carlsbad, CA 92008 USA Telephone: +1 (760) 930 4600 Facsimile: +1 (760) 930 0698

Europe (UK)

Waterfront Business Park Merry Hill, Dudley West Midlands, DY5 1LX United Kingdom Telephone: +44 (0) 1384 842 211 Facsimile: +44 (0) 1384 843 355

Asia (HK)

14/F, Lu Plaza 2 Wing Yip Street Kwun Tong, Kowloon Hong Kong Telephone: +852 2176 3333 Facsimile: +852 2176 3888

For global contact, visit:

www.powerconversion.com

techsupport.embeddedpower @emerson.com

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