

3.0 WATT 2:1WIDE INPUT RANGE DC/DC POWER MODULES

With Remote On/Off Option (Rectangle Package)

FEATURES

- ① 3.0 Watt Isolated Output
- ② 2:1 Wide Input Range
- ③ High Conversion Efficiency
- ④ Continuous Short Circuit Protection
- ⑤ Remote ON/OFF Option

GENERAL SPECIFICATIONS

- Efficiency Per Table
- Switching Frequency 100KHz Min.
- Isolation Voltage: 500 Vdc Min.
- Operating Temperature -25 to +75°C
Derate Linearly to no load @ 100°C max.
- Case Material:
500Vdc.....Non-Conductive Black Plastic
1.5kVdc & 3kVdc.....Black coated copper
with non-conductive base
- EMI/RFI.....Conductive EMI Meet
EN55022 Class B

INPUT SPECIFICATIONS

- Voltage12, 24, 48 Vdc
- Voltage Range9-18, 18-36 & 36-72Vdc
- Input Filter Pi Type

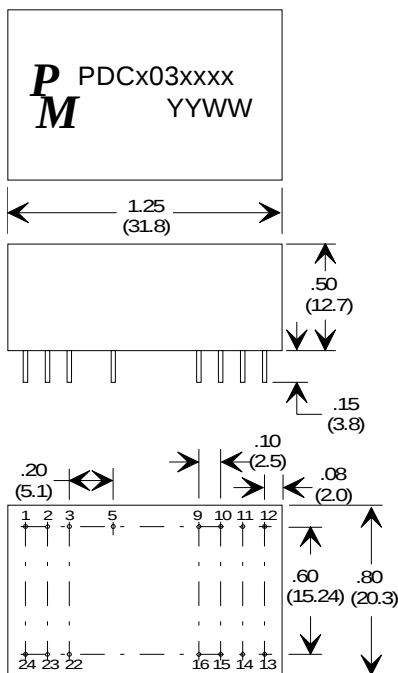
OUTPUT SPECIFICATIONS

- Voltage Per Table
- Initial Voltage Accuracy ±2% Max
- Voltage Stability ±0.05% max
- Ripple & Noise 100/150mV p-p
- Load Regulation (10 to 100% Load)
Single Output Units: ±0.5%
Dual Output Units: ±1.0%
- Line Regulation ±0.5% typ.
- Temp Coefficient ±0.05% /°C
- Short Circuit Protection Continuous

PACKAGE

PIN ASSIGNMENTS

PHYSICAL DIMENSIONS DIMENSIONS IN inches (mm)



REMOTE ON/OFF CONTROL

Logic	CMOS or Open Collector TTL
Ec-On	>+5.5VDC or Open Circuit
Ec-Off	<1.8VDC
Shutdown Idle Current	10mA
Input Resistance	100 Ohm
Control Common	Referenced to Input Minus

500VDC			1500VDC & 3000VDC		
PIN #	SINGLE OUTPUT	DUAL OUTPUTS	PIN #	SINGLE OUTPUT	DUAL OUTPUTS
1	+ INPUT	+INPUT	1	NP	NP
2	NC	- OUTPUT	2	- INPUT	- INPUT
3	NC	COMMON	3	- INPUT	- INPUT
5	NP	NP	5	NP	R.ON/OFF
9	NP	NP	9	NC	COMMON
10	- OUTPUT	COMMON	10	NC	NC
11	+ OUTPUT	+ OUTPUT	11	NC	- OUTPUT
12	- INPUT	- INPUT	12	NP	NP
13	- INPUT	- INPUT	13	NP	NP
14	+ OUTPUT	+ OUTPUT	14	+ OUTPUT	+ OUTPUT
15	- OUTPUT	COMON	15	NC	NC
16	NP	NP	16	- OUTPUT	COMMON
22	NC	COMMON	22	+ INPUT	+ INPUT
23	NC	- OUTPUT	23	+ INPUT	+ INPUT
24	+ INPUT	+ INPUT	24	NP	NP



3.0 WATT 2:1WIDE INPUT RANGE DC/DC POWER MODULES

With Remote On/Off Option (Rectangle Package)

ELECTRICAL SPECIFICATIONS AT 25°C - OPERATING TEMPERATURE RANGE -25°C TO +75°C

PART NUMBER (NOTE #1)	Previous Premier Magnetic Part # (NOTE #2)	INPUT VOLTAGE		OUTPUT VOLTAGE (Vdc)	OUTPUT CURRENT (mAdc)	INPUT CURRENT		TYPICAL EFFICIENCY
		NOMINAL	RANGE			NO LOAD mA	FULL LOAD mA	
PDCS03021	B5AS1203NX	12	9-18	3.3	600	7.5	226	73 %
PDCS03022	B5AS1205NX	12	9-18	5	600	7.5	340	73 %
PDCS03023	B5AS1212NX	12	9-18	12	250	7.5	320	78 %
PDCS03024	B5AS1215NX	12	9-18	15	200	7.5	330	76 %
PDCD03022	B5AD1205NX	12	9-18	±5	±300	12	340	73 %
PDCD03023	B5AD1212NX	12	9-18	±12	±125	12	330	76 %
PDCD03024	B5AD1215NX	12	9-18	±15	±100	12	330	75 %
PDCS03025	B5AS2403NX	24	18-36	3.3	600	5	113	73 %
PDCS03026	B5AS2405NX	24	18-36	5	600	5	168	74 %
PDCS03027	B5AS2412NX	24	18-36	12	250	5	156	80 %
PDCS03028	B5AS2415NX	24	18-36	15	200	5	156	80 %
PDCD03026	B5AD2405NX	24	18-36	±5	±300	7.5	168	74 %
PDCD03027	B5AD2412NX	24	18-36	±12	±125	7.5	156	80 %
PDCD03028	B5AD2415NX	24	18-36	±15	±100	7.5	160	80 %
PDCS03029	B5AS4803NX	48	36-72	3.3	600	3	55	76 %
PDCS03030	B5AS4805NX	48	36-72	5	600	2	82	76 %
PDCS03031	B5AS4812NX	48	36-72	12	250	2	82	77 %
PDCS03032	B5AS4815NX	48	36-72	15	200	2	82	77 %
PDCD03030	B5AD4805NX	48	36-72	±5	±300	3	82	76 %
PDCD03031	B5AD4812NX	48	36-72	±12	±125	3	82	76 %
PDCD03032	B5AD4815NX	48	36-72	±15	±100	3	82	76 %

NOTE #1:

PDCx030xx_ : BLANK FOR STANDARD PART WITH ISOLATION = 500VDC

PDCx030xxK : ADD "K" FOR PART WITH ISOLATION = 1500VDC

PDCx030xxQ : ADD "Q" FOR PART WITH ISOLATION = 3000VDC

PDCx030xxR : ADD "R" FOR PART WITH ISOLATION = 3000VDC AND REMOTE ON/OFF

NOTE #2: (FOR PREVIOUS PREMIER MAGNETICS PART #)

B5AXXXXXNX : FOR STANDARD PART WITH ISOLATION = 500VDC

B5AXXXXXNM : FOR PART WITH ISOLATION = 1500VDC

B5AXXXXXNT : FOR PART WITH ISOLATION = 3000VDC

B5AXXXXXYT : FOR PART WITH ISOLATION = 3000VDC AND REMOTE ON/OFF