PAQ65D48

SPECIFICATIONS

PA566-01-01A

	Items / Model			2518		3318		3325		5033	
				Vo1	Vo2	Vo1	Vo2	Vo1	Vo2	Vo1	Vo2
1	Nominal Output Voltage		V	2.5	1.8	3.3	1.8	3.3	2.5	5.0	3.3
2	Minimum Output Current		A	0							
3	Maximum Output Current		A	15	17	15	17	15	17	13	16
4	Maximum Output Current Combination		A	Io1+Io2 = 18							
5	Maximum Output Power Combination	(*1)	W	Po1+Po2 = 37.5		Po1+Po2 = 49.5		Po1+Po2 = 49.5		Po1+Po2 = 65	
6	Efficiency (Typ)	(*2)	%	86.0		86.0		87.0		90.0	
7	Input Voltage Range		V	36 ~ 76 VDC							
8	Input Current (Typ)	(*2)	A	0.82		0.97		1.10		1.36	
9	Output Voltage Accuracy	(*2)	%	± 2							
10	Output Voltage Trim Range	(*3)	%	±10							
11	Maximum Output Ripple & Noise	(*4)	mV	75	75	100	75	100	75	100	100
12	Maximum Line Regulation	(*5)	mV	±6.6	±6.6	±6.6	±6.6	±6.6	±6.6	±10	±6.6
13	Maximum Load Regulation	(*6)	mV	±16.5	±16.5	±16.5	±16.5	±16.5	±16.5	±25	±16.5
14	Over Current Protection (OCP); (Io1+Io2)	(*7,*8,*10)	%	105 ~ 160							
				Current limiting with inverter shutdown (Option available : Refer to option table)							
15	Over Voltage Protection (OVP)	(*7,*8)	%	120 ~ 140							
				Inverter shutdown (Option available : Refer to option table)							
16	Remote On / Off Control	(*8)	-	Negative logic (Option available : Refer to option table)							
17	Parallel Operation		-	----------							
18	Series Operation		-	----------							
19	Operating Temperature		°C	-40°C ~ +85°C							
20	Operating Humidity		%RH	5 ~ 95 (No dewdrop)							
21	Storage Temperature		°C	-40°C ~ +100°C							
22	Storage Humidity		%RH	5 ~ 95 (No dewdrop)							
23	Cooling	(*8,*9)	-	Convection cooling / forced air cooling with derating							
24	Temperature Coefficient		%/°C	0.02							
25	Withstand Voltage		-	Input - Output : 1.5kVDC for 1 min.							
26	Isolation Resistance		-	More than 100Mohm at 25°C and 70 %RH, Input - Output : 500 VDC							
27	Vibration		-	At no operating, 10 ~ 55Hz (Sweep for 1 min.) Amplitude 0.825mm constant (Maximum 49.0 m/s^2) X,Y,Z 1 hour each							
28	Shock		m/s^2	196.1 m/s^2 (In package)							
29	Weight (Typ)		g	40							
30	Size (W x H x D)		mm	36.8 x 8.9 x 57.9 (Refer to outline drawing)							

Notes :

*1 : Maximum allowable combination output power for both channel; also maximum output current for each channel and combination output current for both channel should not exceeded.

*2 : At 48 VDC, ambient temperature = +25°C and air velocity = 2m/S; 5033: Io1 = Io2 = 7.5A; 3325, 3318, 2518: Io1 = Io2 = 8.5A.

*3 : Additional external components have to be connected; Both outputs are trim independantly; Refer to application notes.

*4 : Measured at Ta = 25°C, Vin = 48VDC and with external components connected; refer to basical connection drawing. For all temperature range, please refer to the application notes.

*5 : 36 ~ 76 VDC with respect to nominal input line 48V; constant load; ambient temperature = +25°C.

*6 : No load ~ full load with respect to 50% of maximun load; other output: no load; constant input voltage; ambient temperature =+25°C.

*7 : CNT reset or manual reset. Auto-restart option available.

*8 : Refer to application notes.

*9 : Refer to PA566-01-03_ & PA566-01-04_ for output derating curve.

*10 : Percentage is with respect to maximum combination current which is 18A.

Option Table :

Option :	On/Off Logic	OVP / OCP
Standard	Negative	Shut-down
/ P	Positive	Shut-down
/ V	Negative	Auto-restart
/ PV	Positive	Auto-restart

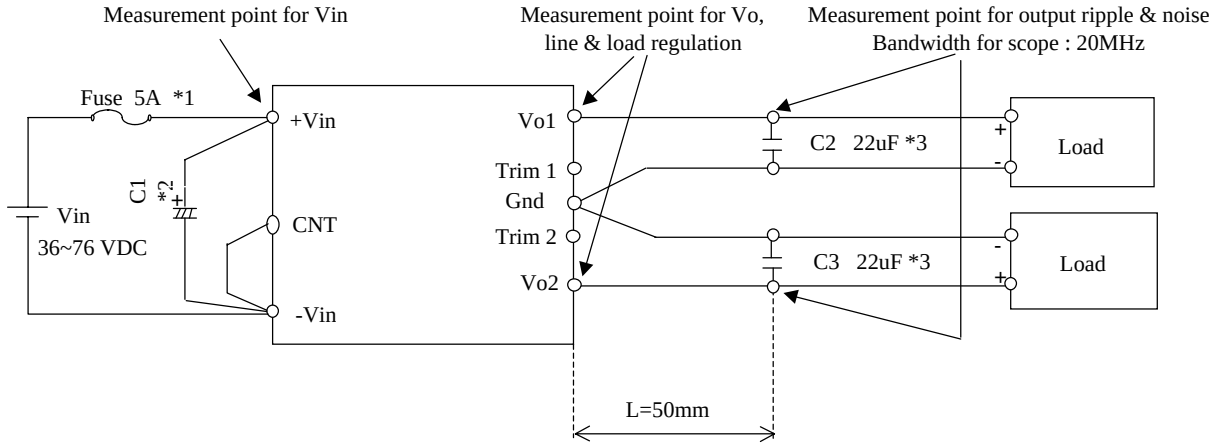
Example :
PAQ65D48-3325/PV; Represent positive logic, OVP/OCP Auto-restart

PAQ65D48

Basical Connection

PA566-01-02A

Ex. Negative logic basic connection



Notes

*1 : Use external fuse (fast blow type)for each unit.

*2 : Recommended input capacitor C1
-20 °C ~ +85°C : 33uF electrolytic type capacitor.
-40 °C ~ +85°C : 33uF ceramic capacitor or equivalent such as 5 parallel 6.8 uF ceramic type capacitor.

*3 : 22uF Ceramic capacitor

PAQ65D48

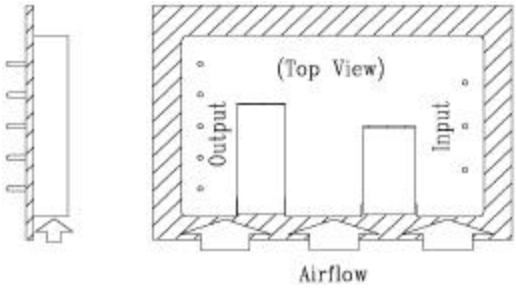
Output Derating Curve

PA566-01-03B

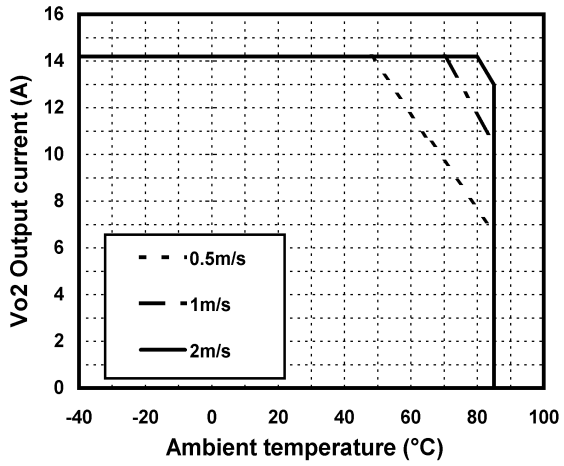
Condition

i) Vin = 48V
ii) Io1 : PAQ65D48 -5033 = 3.6A (fixed)
Io1 : Other models = 30% Rated Current (fixed)
iii) Derating is done by reducing Io2 current

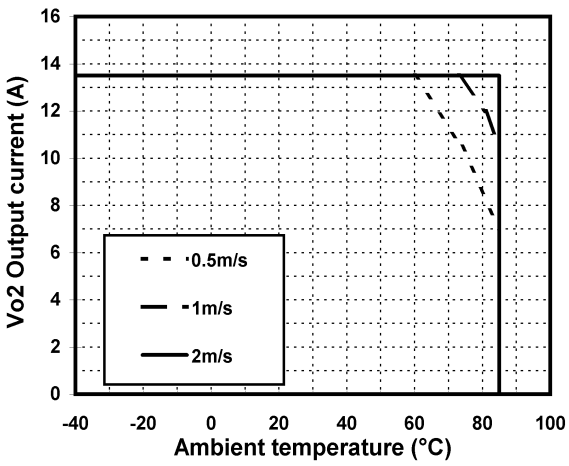
Mounting And Air Direction



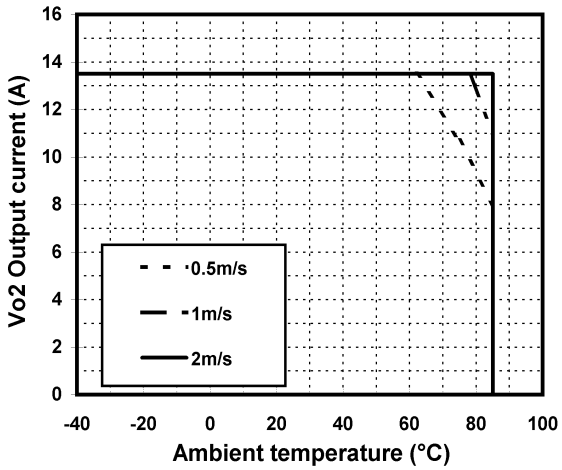
PAQ65D48-5033 Output current derating curve
5V=3.6A(fixed), 3.3V=14.2A(variable)



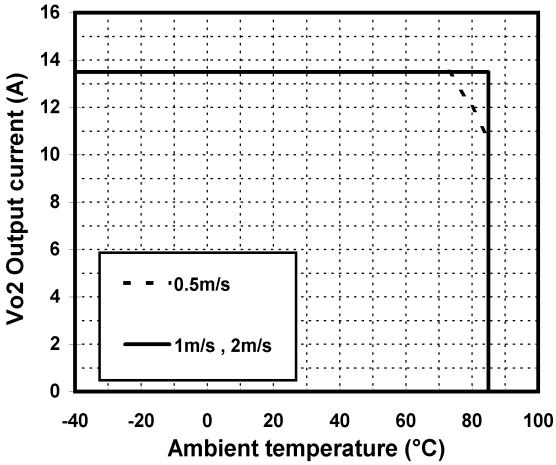
PAQ65D48-3325 Output current derating curve
3.3V=4.5A(fixed), 2.5V=13.5A(variable)



PAQ65D48-3318 Output current derating curve
3.3V=4.5A(fixed), 1.8V=13.5A(variable)



PAQ65D48-2518 Output current derating curve
2.5V=4.5A(fixed), 1.8V=13.5A(variable)



PAQ65D48

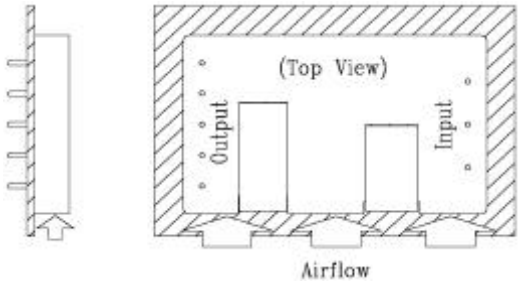
Output Derating Curve

PA566-01-04B

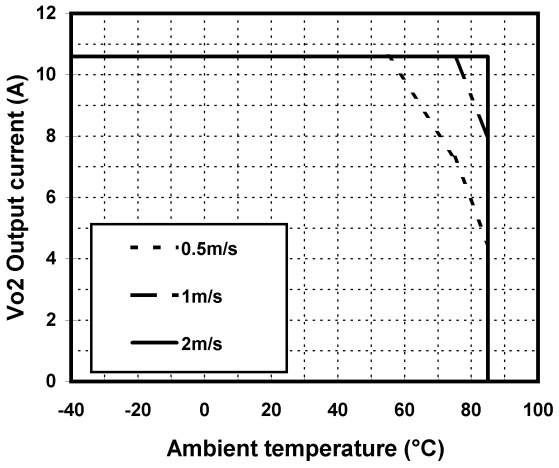
Condition

i) Vin = 48V
ii) Io1 : PAQ65D48 -5033 = 6A (fixed)
Io1 : Other models = 50% Rated Current (fixed)
iii) Derating is done by reducing Io2 current

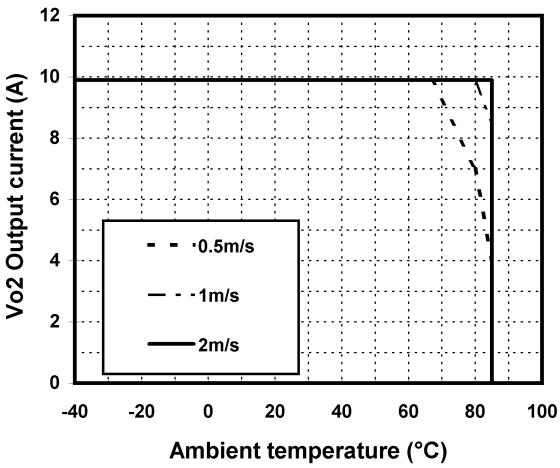
Mounting And Air Direction



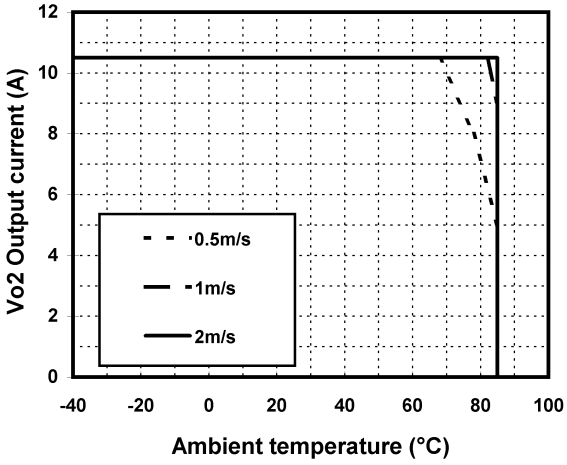
PAQ65D48-5033 Output current derating curve
5V=6A(fixed), 3.3V=10.6A(variable)



PAQ65D48-3325 Output current derating curve
3.3V=7.5A(fixed), 2.5V=9.9A(variable)



PAQ65D48-3318 Output current derating curve
3.3V=7.5A(fixed), 1.8V=10.5A(variable)



PAQ65D48-2518 Output current derating curve
2.5V=7.5A(fixed), 1.8V=10.5A(variable)