

200W



# DC-DC Converters

*Isolated single, dual & triple output*

- <1W to 300W+

*Point-of-Load*

- 1A to 30A



# *Powering Innovation*

## About Murata Power Solutions

We are the #1 supplier of board mount power and among the top suppliers of overall power electronics. From 0.25W isolated converters to 2100W front-end power supplies, along with filtering and isolation solutions, our current offering exceeds 3,500 standard models developed in our design and manufacturing centers located in the US, Canada, England, Japan and China.

Murata's worldwide network of Technical Sales Managers, FAEs, Customer Support and industry-leading Distributors, reliably support the power requirements of local and global manufacturers of telecommunications equipment, data management systems, industrial controls, transportation electronics, energy systems, and more.

## Our DC-DC Converters

This catalog provides specifications for our entire offering of:

### Point-of-Load Converters

- DOSA compatible designs
- OKAMI, the new breed of DC/DCs

### Isolated DC to DC Converter Products

- Single, dual, triple and quad output
- Power from 0.25 to 340 Watts; Currents from 0.02 to 80 Amps

### Bricks

- DOSA compliant 1/32 to full size
- 1 x 1" and 2 x 2" encapsulated

To sum it all up for you, Murata Power Solutions delivers:

- Innovation and reliability
- The largest variety of industry-standard DC/DCs
- Modified-standards and custom design expertise

Your preferred power partner . . . delivering innovative solutions you can rely on . . . again and again.



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## How to use this databook

Products are listed according to output voltage.

**1** **Find** your **output voltage** from the product data tables.

- or -

**2** **Refer** to **Quick Selection Guides** for  
• **Output power** (isolated)  
• **Output current** (PoLs)



**3** **Choose** the ideal product series for your application.



**Visit murata-ps.com**  
for data sheets and complete specifications.

### PoL Converters



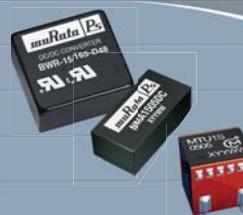
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### Isolated Single



05

### Isolated Dual/Bipolar



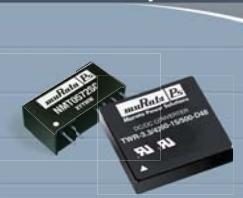
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### Isolated Dual/Asymmetric



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### Isolated Triple



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### VRM Processor Support



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# Point-of-Load

## Non-Isolated DC DC Converter Series

**Murata Power Solutions offers more non-isolated, point-of-load (PoL) DC/DCs, in standard packages and pinouts, than any other company.**

Our PoL output voltages range from 0.75 to 6V at current levels from 2 to 50A. Input voltages are centered around traditional 3, 5 and 12V levels, with some devices operating

from 7.5 to 40V. Standard packages include SMT and SIP models.

The newest Okami SMT and SIP models offer user programmable outputs (0.6-15.5V) while operating from wide-range inputs (2.4-5.5V, 2.9-14V, 4.5-14V, 6-14V, 8.3-14V, 9-32V, 16-40V, or 19-40V). For many applications, they can be genuine "one-size-fits-all" solutions.



PoLs may be powered from AC to DC converters and DC to DC regulators, among other design options. Also, many designers find them a quick, cost-effective solution when isolation is not required and in-house designs are too expensive and time consuming.

### User programmable output voltages

Part Number*	Output Characteristics			Input Voltage			Efficiency	Package				Package Dimensions					Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
	Rated Output Current	Rated Output Voltage	Total Output Power	Nom.	Min.	Max.		SMT	TH	DIP	SIP	Inches		mm					
								L	W	H	L	L		W		H			
OKL-T/1-W12x-C	1A	0.9-5.5V	5W	12V	2.9V	14V	90%	●				0.49	0.18	0.49	12.4	4.57	12.4	OKL-T/1-W12	
OKR-T/1.5-W12-C	1.5A	0.591-6V	7.5W	12V	4.5V	14V	93%				●	0.41	0.24	0.40	10.4	6.1	10.16	OKR-T/1.5-W12	
OKL-T/3-W5x-C	3A	0.6-3.63V	9.9W	5V	2.4V	5.5V	95%	●				0.48	0.24	0.48	12.2	6.2	12.2	OKL-T/3-W5	
OKL-T/3-W12x-C		0.591-5.5V	15W	12V	4.5V	14V	93%	●				0.48	0.24	0.48	12.2	6.2	12.2	OKL-T/3-W12	
OKL-T/6-W5x-C	6A	0.6-3.3V	19.8W	5V	2.4V	5.5V	94%	●				0.48	0.28	0.48	12.2	7.2	12.2	OKL-T/6-W5	
OKL-T/6-W12x-C		0.591-5.5V	30W		4.5V			●				0.48	0.28	0.48	12.2	7.2	12.2	OKL-T/6-W12	
OKX-T/3-D12-C	3A				12V						●	0.40	0.09	0.28	10.16	22.9	7.2	OKX-T/3-D12	
OKY-T/3-D12x-C					8.3V						●	0.47	0.082	0.28	11.9	20.8	7.0	OKY-T/3, T/5-D12	
OKX-T/5-D12-C	5A				14V						●	0.40	0.09	0.28	10.16	22.9	7.2	OKX-T/5-D12	
OKY-T/5-D12x-C											●	0.47	0.082	0.28	11.9	20.8	7.0	OKY-T/3, T/5-D12	
OKX-T/3-W5-C	3A				9.9W						●	0.40	0.09	0.28	10.16	22.9	7.2	OKX-T/3-W5	
OKY-T/3-W5x-C					5V	2.4V	5.5V				●	0.47	0.082	0.28	11.9	20.8	7.0	OKY-T/3, T/5-W5	
OKX-T/5-W5-C	5A				16.5W						●	0.40	0.09	0.28	10.16	22.9	7.2	OKX-T/5-W5	
OKY-T/5-W5x-C											●	0.47	0.082	0.28	11.9	20.8	7.0	OKY-T/3, T/5-W5	
OKY-T/10-D12x-C	10A				50W						●	0.53	0.33	1.3	33	8.4	33	OKY-T/10, T/16-D12	
OKY-T/16-D12x-C	16A				80W						●	0.53	0.33	1.3	33	8.4	33		
OKY-T/10-W5x-C	10A				33W						●	1.3	0.33	0.53	13.5	8.3	13.5	OKY-T/10, T/16-W5	
OKY-T/16-W5x-C	16A				52.8W						●	1.3	0.33	0.53	13.5	8.3	13.5		
LSM2-T/30-D12R-C	30A	0.7525-3.63V	0.8-5V	125W		6V					●	0.53	0.36	1.3	33	9.1	33	LSM2-T/30-D12	
OKX-T/10-D12x-C	10A				80W						●	0.5	0.37	2	50.8	9.4	50.8	OKX-T/10, T/16-D12	
OKX-T/16-D12x-C	16A										●	0.5	0.37	2	50.8	9.4	50.8		
OKX-T/10-W5x-C	10A				33W						●	2	0.5	0.37	9.4	12.7	9.4	OKX-T/10, T/16-W5	
OKX-T/16-W5x-C	16A				52.8W						●	2	0.5	0.37	9.4	12.7	9.4		
OKR-T/3-W12-C	3A				33W						●	0.65	0.22	0.41	10.4	5.6	10.4	OKR-T/3-W12	
OKR-T/6-W12-C	6A				52.8W						●	0.65	0.3	0.41	10.4	7.6	10.4	OKR-T/6-W12	
OKR-T/10-W12-C	10A										●	0.65	0.3	0.41	10.4	7.6	10.4	OKR-T/10-W12	
OKI-T/3-W32x-C		0.7525-4.5V	13.5W		9V	32	89%	●				0.82	0.34	0.47	11.9	8.5	11.9	OKI-T/3-W32	
OKI-T/3-W40x-C	3A	0.7525-5.5V	15W		16V	40V	88%	●				0.82	0.34	0.47	11.9	8.5	11.9	OKI-T/3-W40	
OKI-T/36W-W40x-C		5.021-15.5V	36W		19V	95%	●					0.82	0.34	0.47	11.9	8.6	11.9	OKI-T/36W-W40	

\*x = N (negative) or P (positive) polarity

### OKI-78SR Series fixed output voltages

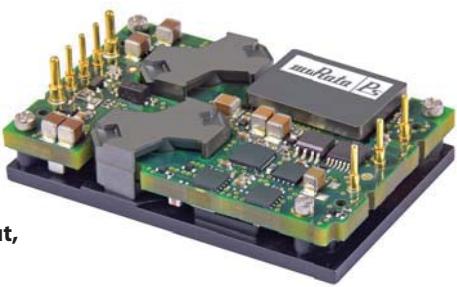
OKI-78SR3.3/1.5-W36-C	1.5A	3.3V	4.95W	24V	7V	36V	86%	●	0.65	0.3	0.41	16.5	7.62	10.4	OKI-78SR
								●	0.65	0.3	0.41	16.5	7.62	10.4	
OKI-78SR3.3/1.5-W36H-C							91%	●	0.65	0.3	0.41	16.5	7.62	10.4	
OKI-78SR5/1.5-W36-C		5V	7.5W				91%	●	0.65	0.3	0.41	16.5	7.62	10.4	
OKI-78SR5/1.5-W36H-C							91%	●	0.65	0.3	0.41	16.5	7.62	10.4	

# Single Output Isolated DC to DC Converter Series

**Power from 0.25 to 300 Watts; currents from 0.02 to 80 Amps; voltages from 1.2 to 96 Volts;  
inputs from 3 to 75 Volts ... Murata Power Solutions offers the broadest line of single-output,  
isolated DC/DC converters in the entire power industry ... without a doubt.**

Our low-power encapsulated products (mini SIPs, DIPs and SMDs) are among the smallest available. Many use contemporary ceramic-substrates and copper-lead-frame technologies to achieve their small size.

At the other extreme, our high-power 1/32, 1/16, 1/8, 1/4, and 1/2 bricks are open-frame assemblies using multi-layer, heavy-copper pc boards and planar magnetics. Their high efficiencies enable full-power operation to high ambient temperatures, and optional baseplates deliver the best thermal performance in the industry.



If you can't find the DC/DC power solution you need in the tables below, contact us, and we'll develop one for you.



## Quick Selection Guide Listed by output power

		Output Voltages																				
		Series																				
		3.3V	5V	6V	9V	12V	15V	24V														
<b>&lt;1W</b>	LME	●	●	●	●	●	●	●														
	NMF	●	●	●	●	●	●	●														
	MEE1	●	●	●	●	●	●	●														
	MER1	●	●	●	●	●	●	●														
	MEV1	●	●	●	●	●	●	●														
	MTE1	●	●	●	●	●	●	●														
	MTU1	●	●	●	●	●	●	●														
	NKE	●	●	●	●	●	●	●														
	NME	●	●	●	●	●	●	●														
	NMJ	●	●	●	●	●	●	●														
<b>1-2W</b>	NMR	●	●	●	●	●	●	●														
	NMV	●	●	●	●	●	●	●														
	NTE	●	●	●	●	●	●	●														
	NTF	●	●	●	●	●	●	●														
	PWR13XXC	●	●	●	●	●	●	●														
	LP02U	●	●	●	●	●	●	●														
	NDL	●	●	●	●	●	●	●														
	MEJ2	●	●	●	●	●	●	●														
	NMG	●	●	●	●	●	●	●														
	NMK	●	●	●	●	●	●	●														
<b>2-3W</b>	NML	●	●	●	●	●	●	●														
	UST 3W	●	●	●	●	●	●	●														
	MEE3	●	●	●	●	●	●	●														
	MEV3	●	●	●	●	●	●	●														
	NDTS	●	●	●	●	●	●	●														
	NDY	●	●	●	●	●	●	●														
	UWR 3W	●	●	●	●	●	●	●														
	HB04UC	●	●	●	●	●	●	●														
	5W	●	●	●	●	●	●	●														
	UWR 5W	●	●	●	●	●	●	●														
<b>3-4W</b>	UEI 50-60W	●	●	●	●	●	●	●														
	UHE 12-30W	●	●	●	●	●	●	●														
	UWR 14-20W	●	●	●	●	●	●	●														
	UWR 15W	●	●	●	●	●	●	●														
	NPH10	●	●	●	●	●	●	●														
	UWR 26-40W	●	●	●	●	●	●	●														
	UEI15	●	●	●	●	●	●	●														
	UWR 14-20W	●	●	●	●	●	●	●														
	UWR 14-20W	●	●	●	●	●	●	●														
	UEI25	●	●	●	●	●	●	●														
<b>5-50W</b>	UHE 12-30W	●	●	●	●	●	●	●														
	UWR 14-20W	●	●	●	●	●	●	●														
	UWR 26-40W	●	●	●	●	●	●	●														
	UWR 26-40W	●	●	●	●	●	●	●														
	UEI30	●	●	●	●	●	●	●														
	ULS-30W	●	●	●	●	●	●	●														
	ULT	●	●	●	●	●	●	●														
	UWR 26-40W	●	●	●	●	●	●	●														
	UCE	●	●	●	●	●	●	●														
	UCQ	●	●	●	●	●	●	●														
<b>100-120W</b>	UEE	●	●	●	●	●	●	●														
	ULQ	●	●	●	●	●	●	●														
	UWS	●	●	●	●	●	●	●														
	UWR 14-20W	●	●	●	●	●	●	●														
	UEI 50-60W	●	●	●	●	●	●	●														
	UEI 12-30W	●	●	●	●	●	●	●														
	UEI 12-30W	●	●	●	●	●	●	●														
	UEI 12-30W	●	●	●	●	●	●	●														
	UEI 12-30W	●	●	●	●	●	●	●														
	UEI 12-30W	●	●	●	●	●	●	●														
<b>240-300W</b>	EMH	●	●	●	●	●	●	●														
	HPQ 165W	●	●	●	●	●	●	●														
	HPQ 182.6W	●	●	●	●	●	●	●														
	PAQ	●	●	●	●	●	●	●														
	RBE	●	●	●	●	●	●	●														

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information							
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				SM				Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H	L	W	H			
<b>1.2V</b>	<b>30A</b>	<b>36W</b>	48V	36V	75V	2.25kV	83%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-1.2/30-D48N-C	UCQ		
<b>1.5V</b>	20A	<b>30W</b>	48V	36V	75V	2.25kV	87%			●			●			2.3	0.9	0.37	58.4	22.9	9.4	UCE-1.5/20-D48N-C	UCE		
	25A	<b>37.5W</b>	48V	36V	75V	2.25kV	83%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-1.5/25-D48N-C	UCQ		
	40A	<b>60W</b>	48V	36V	75V	2.25kV	86%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-1.5/40-D48N-C	UCQ		
			24V	18V	36V	2kV	88%			●			●			2.3	1.45	0.42	58.4	36.8	10.7	UVQ-1.5/40-D24P-C	UVQ		
<b>1.8V</b>	30A	<b>54W</b>	48V	36V	75V	2.25kV	88%			●			●			2.3	0.9	0.37	58.4	22.9	9.4	UCE-1.8/30-D48N-C	UCE		
							86%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-1.8/30-D48N-C	UCQ		
<b>2.5V</b>	20A	<b>50W</b>	48V	36V	75V	2.25kV	88%			●			●			2.3	0.9	0.37	58.4	22.9	9.4	UCE-2.5/20-D48	UCE		
	30A	<b>75W</b>	48V	36V	75V	2.25kV	87%			●			●			2.3	0.9	0.41	58.4	22.9	10.4	ULE-2.5/20-D48N-C	ULE		
	35A	<b>87.5W</b>	24V	18V	36V	2kV	88%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-2.5/30-D48N-C	UCQ		
	40A	<b>100W</b>	24V	18V	36V	2.25kV	84%			●			●			2.3	1.45	0.4	58.4	36.8	10.2	UCQ-2.5/40-D24P-C	UCQ		
			48V	36V	75V	2.25kV	91%			●			●			2.3	1.45	0.42	58.4	36.8	10.7	UVQ-2.5/40-D48N-C	UVQ		
<b>3.3V</b>	0.3A	<b>1W</b>	3.3V	2.97V	3.63V	1kV	76%						●		0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0303DC	MEE1			
													●		0.24	0.45	0.39	6	11.5	10	MEE1S0303SC				
								78%					●		0.5	0.43	0.27	12.7	11	7.05	MTE1S0303MC	MTE1			
								73%					●		0.30	0.5	0.26	7.7	12.7	6.6	NTE0303MC	NTE			
								3kV	75%				●	●	0.39	0.45	0.21	9.8	11.5	5.4	NKE0303DC	NKE			
													●	●	0.24	0.45	0.29	6	11.5	7.5	NKE0303SC				
								5.2kV	66%				●	●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ0303SAC	NMJ			
								1kV	76%				●		0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0503DC	MEE1			
													●	●	0.24	0.45	0.39	6	11.5	10	MEE1S0503SC				
								5V	4.5V	5.5V	5.2kV	75%	79%			0.5	0.43	0.27	12.7	11	7.05	MTE1S0503MC	MTE1		
										●	●		0.39	0.45	0.21	9.8	11.5	5.4	NKE0503DC	NKE					
										●	●		0.24	0.45	0.29	6	11.5	7.5	NKE0503SC						
										●	●		0.39	0.77	0.49	9.8	19.5	12.5	NMJ0503SAC	NMJ					
										●	●		0.30	0.5	0.26	7.7	12.7	6.6	NTE0503MC	NTE					
	0.606A	<b>2W</b>	3.3V	2.97	3.63		70%						●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0303SC	MEJ2			
			5V	4.5V	5.5V								●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0503SC				
			12	10.8V	13.2V								●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1203SC				
<b>0.9A</b>	<b>3W</b>	<b>5V</b>	5V	4.5V	9V	1kV	63%						●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS0503C	NDTS			
			12V	9V	18V	1kV	71%						●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS1203C				
			24V	18V	36V	1kV	71%						●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS2403C	NDY			
			48V	36V	72V	1kV	71%						●	●	0.58	1.27	0.28	14.7	32.3	7	NDY2403C	NDTS			
			12V	9V	36V	1.5kV	78%						●	●	1.26	0.79	0.39	32	20	10	NCS6151203C	NCS6			
<b>1.52A</b>	<b>6W</b>	<b>48V</b>	48V	18V	75V	1.5kV	76%						●	●	1.26	0.79	0.39	32	20	10	NCS64803C				
			24V	18V	36V	1.5kV	79%						●	●	0.98	1.26	0.39	25	32	10	NPH10S2403EIC	NPH10S			
			48V	36V	75V	1.5kV	80%						●	●	0.98	1.26	0.39	25	32	10	NPH10S4803EIC				
			5V	4.7V	7.5V	1.5kV	77%						●		2	2	0.45	50.8	50.8	11.4	UWR14-20W				
			12V	10V	18V	1.5kV	86%						●		2	1	0.49	50.8	25.4	12.5	UWR-3.3/4250-D12A-C				
<b>4.25A</b>	<b>14W</b>	<b>48V</b>	24V	18V	36V	1.5kV	87%						●		2	1	0.49	50.8	25.4	12.5	UWR-3.3/4250-D24A-C	UWR15WA			
			48V	36V	75V	1.5kV	87%						●		2	1	0.49	50.8	25.4	12.5	UWR-3.3/4250-D48A-C				
			24V	18V	36V	1.5kV	81%						●	●	1	2	0.39	25	50	10	NPH15S2403EIC	NPH15S			
			48V	36V	75V	1.5kV	83%						●	●	1	2	0.39	25	50	10	NPH15S4803EIC				
			24V	18V	36V	1.5kV	87.5%						●		1.1	0.96	0.36	27.9	24.4	9.1	UEI15-033-Q12P-C	UEI 15W			
<b>4.85A</b>	<b>16W</b>	<b>48V</b>	24V	9V	36V	1.5kV	79%						●		2	2	0.45	50.8	50.8	11.4	UWR-3.3/4850-D12-C	UWR14-20W			
			48V	18V	75V	1.5kV	80%						●		2	2	0.45	50.8	50.8	11.4	UWR-3.3/4850-D48-C				
<b>5A</b>	<b>16.5W</b>	<b>48V</b>	18V	75V	1.5kV	88%						●		1.1	0.96	0.36	27.9	24.4	9.1	UEI15-033-Q48NR-C	UEI15W				

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions				Further Information				
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches		mm		Part Number	Datasheet	
1/32	1/16	1/8	1/4	1/2				L	W	H	L	W	H	L	W	H	Note: Root part numbers may be shown. Please refer to datasheets for available options.	Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		

5V	0.05A	0.25W	3.3V	2.97V	3.63V	1kV	70%				●	●	0.24	0.45	0.39	6	11.5	10	LME0305SC	LME
			5V	4.5V	5.5V	1kV	70%				●	●	0.39	0.45	0.27	9.8	11.5	6.8	LME0505DC	
			12V	10.8V	13.2V	1kV	70%				●	●	0.24	0.45	0.39	6	11.5	10	LME0505SC	
			12V	11.4V	12.6V	1kV	50%				●	●	0.39	0.45	0.27	9.8	11.5	6.8	LME1205DC	
0.1A	0.1A	0.5W	5V	4.75V	5.25V	1kV	50%				●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMF0505DC	NMF
			12V	11.4V	12.6V	1kV	50%				●	●	0.24	0.77	0.39	6	19.5	10	NMF0505SC	
			12V	22.8V	25.2V	1kV	50%				●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMF1205DC	
			24V	22.8V	25.2V	1kV	50%				●	●	0.24	0.77	0.39	6	19.5	10	NMF2405DC	

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information						
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches			mm			Part Number <small>Note: Root part numbers may be shown. Please refer to datasheets for available options.</small>	Datasheet <small>Available at www.murata-ps.com</small>			
								1/32	1/16	1/8	1/4	1/2		L	W	H	L	W	H					
5V	0.2A	1W	3.3V	2.97V	3.63V	1kV	79%						●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0305DC	MEE1			
													●	0.24	0.45	0.39	6	11.5	10	MEE1S0305SC				
								82%					●	0.5	0.43	0.27	12.7	11	7.05	MTE1S0305MC	MTE1			
								81%					●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1S0305MC	MTU1			
								78%					●	0.30	0.5	0.26	7.7	12.7	6.6	NTE0305MC	NTE			
			5V	4.5V	5.5V	1kV	80%						●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0505DC	MEE1			
												●	0.24	0.45	0.39	6	11.5	10	MEE1S0505SC					
								84%					●	0.24	0.77	0.39	6	19.5	10	MER1S0505SC	MER1			
								82%					●	0.5	0.43	0.27	12.7	11	7.05	MTE1S0505MC	MTE1			
								83%					●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1S0505MC	MTU1			
							12V	10.8V	13.2V	3kV	84%					●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S0505DC	MEV1
													●	0.24	0.77	0.39	6	19.5	10	MEV1S0505SC				
										69%			●	0.39	0.45	0.21	9.8	11.5	5.4	NKE0505DC	NKE			
										78%			●	0.39	0.45	0.21	9.8	11.5	5.4	NKE0505DEC				
										1kV	69%		●	0.39	0.45	0.27	9.8	11.5	6.8	NME0505DC	NME			
										5.2kV	68%		●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ1205SAC	NMJ			
										1kV	69%		●	0.24	0.77	0.39	6	19.5	10	NMR100C	NMR			
										3kV	68%		●	0.39	0.77	0.39	6	19.5	10	NMV1205DAC	NMV			
										1kV	68%		●	0.24	0.77	0.39	6	19.5	10	NMV1205SAC				
										68%		●	0.30	0.5	0.26	7.7	12.7	6.6	NTE0505MC	NTE				
										77%		●	0.30	0.5	0.26	7.7	12.7	6.6	NTE0505MEC					
			15V	13.5V	16.5V	1kV	73%						●	0.70	0.5	0.13	17.8	12.7	3.3	NTFS1205MC	NTF			
								●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1205DC	MEE1								
								●	0.24	0.45	0.39	6	11.5	10	MEE1S1205SC									
								●	0.5	0.43	0.27	12.7	11	7.05	MTE1S1205MC	MTE1								
								●	0.24	0.77	0.39	6	19.5	10	MER1S1205SC	MER1								
							3kV	84%					●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S1205DC	MEV1			
									●	0.24	0.77	0.39	6	19.5	10	MEV1S1205SC								
									●	0.39	0.45	0.21	9.8	11.5	5.4	NKE1205DC	NKE							
									●	0.39	0.45	0.21	9.8	11.5	7.5	NKE1205SC								
									●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1S1205MC	MTU1							
									●	0.24	0.45	0.39	6	11.5	10	NME1205DC	NME							
									●	0.39	0.45	0.39	6	11.5	10	NME1205SC								
									●	0.39	0.77	0.39	6	19.5	10	NMJ1205SAC	NMJ							
									●	0.24	0.77	0.39	6	19.5	10	NMR106C	NMR							
									●	0.39	0.77	0.27	9.8	19.5	6.8	NMV1205DAC	NMV							
									●	0.24	0.77	0.39	6	19.5	10	NMV1205SAC								
			24V	18	36	1kV	70%						●	0.70	0.5	0.13	17.8	12.7	3.3	NTFS2405MC	NTF			
								●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S2405DC	MEE1								
								●	0.24	0.45	0.39	6	11.5	10	MEE1S2405SC									
								●	0.24	0.77	0.39	6	19.5	10	MER1S2405SC	MER1								
								●	0.5	0.43	0.27	12.7	11	7.05	MTE1S2405MC	MTE1								

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information			
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H		
<b>5V</b>	<b>0.2A</b>	<b>1W</b>	24V	21.6V	26.4V	3kV	84%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S2405DC	MEV1	
												● ●	0.24	0.77	0.39	6	19.5	10	MEV1S2405SC		
						1kV	70%					● ●	0.39	0.45	0.27	9.8	11.5	6.8	NME2405DC	NME2	
												● ●	0.24	0.45	0.39	6	11.5	10	NME2405SC		
		<b>0.3A</b>	<b>1.5W</b>	48V	43.2V	52.8V	1kV	79.5%					● ●	0.24	0.77	0.39	6	19.5	10	NMR118C	NMR
													● ●	0.24	0.77	0.39	6	19.5	10	MER1S4805SC	
		<b>0.4A</b>	<b>2W</b>	3.3V	2.97	3.63	3kV	74%					● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0305SC	MEJ2
													● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL0505SC	
	<b>0.4A</b>	<b>2W</b>	12V	10.8V	13.2V	5V	4.5V	5.5V	9V	66%			● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL0505SC	NDL
													● ●	0.30	0.77	0.4	7.5	19.5	10	NMG0505SC	NMG
													● ●	0.30	0.55	0.39	7.5	14	10	NML0505SC	NML
													● ●	0.30	0.77	0.4	7.5	19.5	10	NMK0505SAC	NMK
						9V	18V	1kV	73%	73%			● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0505SC	MEJ2
													● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL1205SC	
						12V	10.8V	13.2V	1kV	81%			● ●	0.30	0.77	0.4	7.5	19.5	10	NMG1205SC	NMG
													● ●	0.30	0.55	0.39	7.5	14	10	NML1205SC	NML
						12V	10.8V	13.2V	3kV	80%			● ●	0.30	0.77	0.4	7.5	19.5	10	NMK1205SAC	NMK
													● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1205SC	MEJ2
	<b>0.5A</b>	<b>2.5W</b>	24V	18V	36V	5V	4.5V	5.5V	9V	73%			● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL2405SC	NDL
													● ●	0.30	0.77	0.4	7.5	19.5	10	NMG2405SC	NMG
													● ●	0.30	0.55	0.39	7.5	14	10	NML2405SC	NML
													● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S2405SC	MEJ2
						12V	10.8V	13.2V	3kV	76%			● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1205SC	
													● ●	0.30	0.77	0.4	7.5	19.5	10	NMK1205SAC	NMK
						12V	10.8V	13.2V	3kV	80%			● ●	0.30	0.77	0.4	7.5	19.5	10	MEJ2S1205SC	MEJ2
													● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S2405SC	
		<b>0.6A</b>	<b>3W</b>	48V	18V	5V	4.5V	5.5V	9V	73%			● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL4805SC	NDL
													● ●	0.30	0.77	0.4	7.5	19.5	10	NMG4805SC	NMG
													● ●	0.30	0.55	0.39	7.5	14	10	NML4805SC	NML
													● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S4805SC	MEJ2
						12V	10.8V	13.2V	3kV	83%			● ●	0.56	0.32	0.4	14.15	8.15	10.15	MEE3S0505SC	MEE3
													● ●	0.4	0.77	0.3	10.2	19.7	7.7	MEV3S0505SC	
						12V	10.8V	13.2V	3kV	83%			● ●	0.58	1.27	0.28	14.7	32.3	7	NDTS0505C	NDTS
													● ●	0.58	1.27	0.28	14.7	32.3	7	NDY0505C	NDY
		<b>0.8A</b>	<b>4W</b>	24V	18V	5V	4.5V	5.5V	9V	73%			● ●	0.58	1.27	0.28	14.7	32.3	7	NDTS1205C	NDTS
													● ●	0.58	1.27	0.28	14.7	32.3	7	NDY1205C	NDY
													● ●	0.58	1.27	0.28	14.7	32.3	7	NDTS4805C	NDTS
													● ●	0.58	1.27	0.28	14.7	32.3	7	NDY4805C	NDY
						12V	10.8V	13.2V	3kV	80%			● ●	2	1	0.4	50.8	25.4	10.2	HB04U05S05QC	HB04UC
													● ●	2	1	0.4	50.8	25.4	10.2	HB04U12S05QC	
	<b>1A</b>	<b>5W</b>	48V	36V	24V	18V	36V	1kV	78%	78%			● ●	1	1	0.45	25.4	25.4	11.4	UWR-5/1000-D24-C	UWR-5W
													● ●	1	1	0.45	25.4	25.4	11.4	UWR-5/1000-D48-C	
													● ●	1.26	0.79	0.39	32	20	10	NCS6S1205C	NCS6
													● ●	1.26	0.79	0.39	32	20	10	NDS6S2405C	NDS6
						24V	18V	36V	1kV	82%			● ●	1.26	0.79	0.39	32	20	10	NCS6S4805C	NCS6
													● ●	1.26	0.79	0.39	32	20	10	NCS6S1800D48-C	UWR 6-10W
	<b>1.2A</b>	<b>6W</b>	48V	36V	24V	18V	36V	1kV	78%	78%			● ●	2	1	0.45	25.4	25.4	11.4	UWR-5/1600-D5-C	UWR 6-10W
													● ●	2	1	0.45	25.4	25.4	11.4	UWR-5/1800-D48-C	
													● ●	1.26	0.79	0.39	32	20	10		

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions				Further Information					
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches		mm		Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2		L	W	H					
<b>5V</b>	2A	10W	12V	9V	18V	1.5kV	81%				●			2	1	0.45	50.8	25.4	11.4	UWR-5/2000-D12A-C	UWR 6-10W
			24V	18V	36V	1.5kV	85%				●			2	1	0.45	50.8	25.4	11.4	UWR-5/2000-D24E-C	
			48V	36V	72V	1.5kV	84%				●			2	1	0.45	50.8	25.4	11.4	UWR-5/2000-D48E-C	UWR 6-10W
	3A	15W	5V	4.7V	7.5V	1.5kV	79%				●			2	2	0.45	50.8	50.8	11.4	UWR-5/3000-D5-C	UWR 14-20W
			12V	10V	18V	1.5kV	85%				●			2	1	0.49	50.8	25.4	12.5	UWR-5/3000-D12A-C	UWR 15W
			24V	9V	36V	1.5kV	87%				●			1.1	0.96	0.36	27.9	24.4	9.1	UEI15-050-Q12P-C	UEI 15W
			24V	18V	36V	1.5kV	84%				●	●	0.98	1.97	0.39	25	50	10	NPH15S2405EIC	NPH15S	
										●	●	0.98	1.97	0.39	25	50	10	NPH15S2405IC			
							88%				●			2	1	0.49	50.8	25.4	12.5	UWR-5/3000-D24A-C	UWR 15W
	3A	15W	18V	75V	2.25kV	86%				●			1.1	0.96	0.36	27.9	24.4	9.1	UEI15-050-Q48N-C	UEI15W	
				48V	75V	1.5kV	85%			●	●	0.98	1.97	0.39	25	50	10	NPH15S4805EIC	NPH15S		
										●	●	0.98	1.97	0.39	25	50	10	NPH15S4805IC			
	4A	20W	12V	9V	36V	1.5kV	82%			●			2	2	0.45	50.8	50.8	11.4	UWR-5/4000-D12-C	UWR 14-20W	
			48V	18V	75V	1.5kV	84%			●			2	2	0.45	50.8	50.8	11.4	UWR-5/4000-D48-C	UWR 14-20W	
	5A	25W	24V	18V	36V	1.5kV	84%			●	●	1.38	1.97	0.39	35	50	10	NPH25S2405EIC	NPH25S		
	5A	25W	24V	9V	36V	1.5kV	87.5%			●			2	1.6	0.4	50.8	40.6	10.2	UHE-5/5000-Q12-C	UHE12-30W	
			18V	75V	1.5kV	90%				●			2	1.6	0.4	50.8	40.6	10.2	UHE-5/5000-Q48-C		
			48V	75V	1.5kV	89%	●			●	●	0.92	0.75	0.35	23.4	19.1	8.9	ULT-5/5-D48	ULT		
			36V	75V	2.25kV	91%				●			1.1	0.32	0.96	27.9	8.13	24.4	UEI25-050-D48	UEI25	
	6A	30W	24V	9V	36V	1.5kV	91.5%			●			2	1.6	0.4	50.8	40.6	10.2	UHE-5/6000-Q12-C	UHE12-30W	
			24V	36V	75V	1.5kV	89.5%			●			1.92	0.35	0.92	48.8	8.9	23.4	UEI30-050-Q12P-C	UEI30	
			36V	75V	1.5kV	91.5%				●			2	1.6	0.4	50.8	40.6	10.2	UHE-5/6000-D48-C	UHE12-30W	
			48V	18V	75V	1.5kV	91.5%			●			1.92	0.35	0.92	48.8	8.9	23.4	UEI30-050-Q48N-C	UEI30	
7A	35W	12V	10V	18V	1.5kV	89.5%			●			2	2	0.45	50.8	50.8	11.4	UWR-5/7-D12A-C	UWR26-40W		
8A	40W	24V	18V	36V	1.5kV	90%			●			2	2	0.45	50.8	50.8	11.4	UWR-5/8-D24A-C	UWR26-40W		
		48V	36V	75V	1.5kV	90%			●			2	2	0.45	50.8	50.8	11.4	UWR-5/8-D48A-C	UWR26-40W		
10A	50W	12V	9V	18V	2kV	89%	●		●	●		2.3	0.9	0.41	58.4	22.9	10.4	ULE-5/10-D12P-C	ULE20A		
		24V	9V	36V	1.5kV	90%			●			1.95	1.55	0.375	49.5	39.4	9.5	UEI-5/10-Q12PR-C	UEI50/60		
		18V	75V	2.25kV	91%	●						0.91	1.31	0.36	23.1	33.27	9.14	UWS-5/10-Q48	UWS		
		48V	75V	2.25kV	90.5%	●			●		●	2.3	0.9	0.37	58.4	22.9	9.4	UCE-5/10-D48	UCE		
		36V	75V	2.25kV		89%			●	●	●	2.4	2.3	0.4	61	58.4	10.2	UCH-5/10-D48N-C	UCH		
12A	60W	24V	18V	36V	2kV	90%	●		●	●		2.3	0.9	0.41	58.4	22.9	10.4	ULE-5/12-D24P-C	ULE20A		
		48V	18V	75V	2.25kV	91%			●			1.95	1.55	0.375	49.5	39.4	9.5	UEI-5/12-Q48NR-C	UEI50/60		
		48V	36V	75V	2.25kV	90%			●	●		2.3	0.9	0.41	58.4	22.9	10.4	UHE-5/12-D48C	UHE12-30W		
									●			1.3	0.4	0.9	33.02	10.16	22.86	ULS-5/12-D48N-C	ULS		
15A	75W	12V	9V	36V	2.25kV	91%	●		●	●		2.3	0.38	0.9	58.4	9.7	22.9	UWE-5/15-Q12P-C	UWE		
		24V	18V	36V	2kV		●		●	●		2.3	1.45	0.38	58.4	36.8	9.5	ULQ-5/15-D24P-C	ULQ-15A		
		18V	75V	2.25kV	90%	●			●			2.3	0.38	0.9	58.4	9.7	22.9	UWE-5/15-Q48N-C	UWE		
		36V	75V	2.25kV	91%				●	●	●	2.3	1.45	0.38	58.4	36.8	9.5	ULQ-5/15-D48N-C	ULQ-15A		
17A	85W	12V	9V	36V	2kV	90.5%	●		●	●		2.22	1.45	0.43	56.4	36.8	10.9	UQQ-5/17-Q12P-C	UQQ7-15A		
20A	100W	24V	18V	36V	2.25kV	91.5%	●		●	●		2.3	1.45	0.4	58.4	36.8	10.2	UCQ-5/20-D24P-C	UCQ		
		36V				90.5%			●	●		2.4	2.3	0.4	61	58.4	10.2	UCH-5/20-D24P-C	UCH		
		18V				91%			●	●		2.22	1.45	0.43	56.4	36.8	10.9	UQQ-5/20-Q48N-C	UQQ7-15A		
		48V				89%			●			2.3	0.9	0.39	58.4	22.9	9.9	UWE-5/20-Q48-C	UWE-100-120W		
						92.5%			●			2.3	0.9	0.37	58.4	22.9	9.4	UCE-5/20-D48	UCE		
						91%			●			1.3	0.9	0.4	33	22.9	10.2	ULS-5/20-D48	ULS-100W		
						89%			●			2.3	1.45	0.42	58.4	36.8	10.7	UVQ-5/20-D48N-C	UVQ		
						87%			*			4.38	0.81	6.52	111	20.3	165.5	UCR100-050-T72-C	UCR100		
30A	150W	48V	36V	75V		91%			●	●		2.4	2.3	0.4	61	58.4	10.2	UCH-5/30-D48N-C	UCH		
40A	200W					91%			●	●		2.4	2.3	0.4	61	58.4	10.2	HPH-5/40-D48N-C	HPH		
<b>5.2V</b>	<b>8W</b>	5V	4.7V	7.25V	1.5kV	76%			●			2	1	0.45	50.8	25.4	11.4	UWR-5.2/1500-D5A-C	UWR 6-10W		
	<b>16W</b>	5V	4.7V	7.5V	1.5kV	80%			●			2	2	0.45	50.8	50.8	11.4	UWR-5.2/3000-D5A-C	UWR 14-20W		

\*Cassette module for 19-inch rack mounting.

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information			
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H		
<b>6V</b>	<b>0.167A</b>	<b>1W</b>	5V	4.5V	5.5V	1kV	84%			●			0.5	0.43	0.27	12.7	11	7.05	MTE1S0506MC	MTE1	
							72%			●			0.30	0.5	0.26	7.7	12.7	6.6	NTE0506MC	NTE	
<b>8.3V</b>	<b>22A</b>	<b>182.6W</b>	48V	36V	75V	2.25kV	92.5%			●			2.3	0.4	1.45	58.4	10.2	36.8	HPQ-8.3/22-D48	HPQ	
<b>9V</b>	<b>0.028A</b>	<b>0.25W</b>	5V	4.5V	5.5V	1kV	75%			●	●		0.39	0.45	0.27	9.8	11.5	6.8	LME0509DC	LME	
			12V	10.8V	13.2V	1kV	75%			●	●		0.24	0.45	0.39	6	11.5	10	LME0509SC		
		<b>0.1A</b>	<b>0.9W</b>	24V	22.8V	25.2V	1kV	62%			●	●		0.39	0.77	0.27	9.8	19.5	6.8	NMF2409DC	NMF
										●	●		0.24	0.77	0.39	6	19.5	10	NMF2409SC		
	<b>0.111A</b>	<b>1W</b>	3.3V	2.97V	3.63V	1kV	79%			●			0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0309DC	MEE1	
							85%			●			0.24	0.45	0.39	6	11.5	10	MEE1S0309SC		
							77%			●			0.30	0.5	0.26	7.7	12.7	6.6	NTE0309MC		
							75%			●	●		0.39	0.45	0.21	9.8	11.5	5.4	NKE0309DC		
		5V	4.5V	5.5V	3kV	1kV	80%			●			0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0509DC	MEE1	
							87%			●	●		0.24	0.45	0.39	6	11.5	10	MEE1S0509SC		
							85%			●			0.5	0.43	0.27	12.7	11	7.05	MTE1S0509MC		
							86%			●			0.323	0.331	0.335	8.2	8.4	8.5	MTU1S0509MC		
		12V	10.8V	13.2V	3kV	1kV	86.5%			●	●		0.39	0.77	0.27	9.8	19.5	6.8	MEV1S0509DC	MEV1	
							75%			●	●		0.24	0.45	0.29	6	19.5	10	MEV1S0509SC		
							77%			●	●		0.39	0.45	0.27	9.8	11.5	6.8	NME0509DC		
							72%			●	●		0.39	0.77	0.49	9.8	19.5	12.5	NMJ0509SAC		
					1kV	3kV	75%			●	●		0.39	0.77	0.27	9.8	19.5	6.8	NMV0509DAC	NMV	
							87%			●	●		0.24	0.77	0.39	6	19.5	10	NMV0509SAC		
							78%			●	●		0.39	0.45	0.21	9.8	11.5	7.5	NKE1209DC		
							86%			●			0.24	0.45	0.29	6	11.5	10	NKE1209SC		
	<b>15V</b>	13.5V	16.5V	1kV	3kV	1kV	87%			●	●		0.323	0.331	0.335	8.2	8.4	8.5	MTU1S1209MC	MTU1	
							74%			●	●		0.39	0.45	0.27	9.8	11.5	6.8	NME1209DC		
							73%			●	●		0.39	0.77	0.49	9.8	19.5	12.5	NMJ1209SAC		
							74%			●	●		0.24	0.45	0.39	6	11.5	10	NME1209SC		
		24V	21.6V	26.4V	1kV	3kV	73%			●	●		0.39	0.77	0.27	9.8	19.5	6.8	NMV1209DAC	NMV	
							77%			●			0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1509DC		
							86.5%			●	●		0.24	0.45	0.39	6	11.5	10	MEE1S1509SC		
							86%			●			0.5	0.43	0.27	12.7	11	7.05	MER1S1509MC		

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information				
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				SM	TH	DIP	SIP	Inches			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2				L	W	H				
<b>9V</b>	0.111A	1W	24V	21.6V	26.4V	3kV	86.5%	●	●			0.39	0.77	0.27	9.8	19.5	6.8	MEV1S2409DC	MEV1			
								●	●	0.24	0.77	0.39	6	19.5	10	MEV1S2409SC						
						1kV	75%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	NME2409DC	NME2					
								●	●	0.24	0.45	0.39	6	11.5	10	NME2409SC						
	0.22A	2W	48V	43.2V	52.8V	1kV	83%	●	●	0.24	0.77	0.39	6	19.5	10	MER1S4809SC	MER1					
								●	●	0.24	0.77	0.39	6	19.5	10	MEV1S4809SC	MEV1					
						3kV	82%	●	●	0.24	0.77	0.39	6	19.5	10	NDL0509SC	NDL					
			5V	4.5V	5.5V			●	●	0.36	0.86	0.44	9.2	21.8	11.1	NMG0509SC	NMG					
								●	●	0.30	0.77	0.4	7.5	19.5	10	NML0509SC	NML					
								●	●	0.30	0.77	0.4	7.5	19.5	10	NMK0509SAC	NMK					
	0.22A	2W	12V	9V	18V	1kV	79%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	MEJ2S0509SC	MEJ2					
								●	●	0.30	0.77	0.4	7.5	19.5	10	NDL1209SC	NDL					
								●	●	0.30	0.55	0.39	7.5	14	10	NMG1209SC	NMG					
			12V	10.8V	13.2V	1kV	84%	●	●	0.30	0.77	0.4	7.5	19.5	10	NML1209SC	NML					
								●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1209SAC	NMK					
								●	●	0.30	0.77	0.4	7.5	19.5	10	MEJ2S1209SC	MEJ2					
	0.22A	2W	15V	13.5V	16.5V	3kV	86%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1509SAC	NMK					
								●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1509SC	MEJ2					
			24V	18V	36V	1kV	81%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL2409SC	NDL					
			24V	21.6V	26.4V	3kV	87%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK2409SAC	NMK					
	0.25A	2.25W	48V	36V	72V	1kV	80%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL4809SC	NDL					
			5V	4.75V	5.25V	0.5kV	80%	●	●	1.29	0.53	0.38	32.6	13.3	9.5	LP02U05S09KC	LP02U					
			12V	11.4V	12.6V	0.5kV	77%	●	●	1.29	0.53	0.38	32.6	13.3	9.5	LP02U12S09KC						
			0.333A	3W	5V	5.5V	1kV	●	●	0.56	0.32	0.4	14.15	8.15	10.15	MEE3S0509SC	MEE3					
								●	●	0.4	0.77	0.3	10.2	19.7	7.7	MEV3S0509SC	MEV3					
						9V	1kV	72%	●	●	0.58	1.27	0.28	14.7	32.3	7	NDY0509C	NDY				
	0.333A	3W	12V	10.8	13.2	9V	18V	1kV	78%	●	●	0.58	1.27	0.28	14.7	32.3	7	NDY1209C	NDY			
								1kV	88%	●	●	0.56	0.32	0.4	14.15	8.15	10.15	MEE3S1209SC	MEE3			
						3kV	87.5%	●	●	0.4	0.77	0.3	10.2	19.7	7.7	MEV3S1209SC	MEV3					
			24V	18V	36V	1kV	78%	●	●	0.58	1.27	0.28	14.7	32.3	7	NDY2409C	NDY					
			48V	36V	72V	1kV	80%	●	●	0.58	1.27	0.28	14.7	32.3	7	NDY4809C						
			0.021A	0.25W	5V	4.5V	5.5V	1kV	75%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	LME0512DC	LME			
										●	●	0.24	0.45	0.39	6	11.5	10	LME0512SC				
			0.083A	1W	3.3V	2.97V	3.63V	1kV	81%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0312DC	MEE1			
										●	●	0.24	0.45	0.39	6	11.5	10	MEE1S0312SC	MTE1			
										●	●	0.5	0.43	0.27	12.7	11	7.05	MTE1S0312MC	NTE			
										●	●	0.30	0.5	0.26	7.7	12.7	6.6	NTE0312MC	NTF			
						4V	6V	1kV	67%	●	●	0.70	0.5	0.13	17.8	12.7	3.3	NTFS0512MC	MEE1			
										●	●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0512DC	MEE1			
										●	●	0.24	0.45	0.39	6	11.5	10	MEE1S0512SC	MER1			
										●	●	0.24	0.77	0.39	6	19.5	10	MER1S0512MC	MTE1			
			0.083A	1W	5V	4.5V	5.5V	1kV	87%	●	●	0.39	0.45	0.27	9.8	19.5	6.8	MEV1S0512DC	MEV1			
										●	●	0.24	0.77	0.39	6	19.5	10	MEV1S0512SC	NME			
										●	●	0.5	0.43	0.27	12.7	11	7.05	MTE1S0512MC	NME			
						3kV	77%	1kV	87%	●	●	0.39	0.45	0.21	9.8	11.5	5.4	NKE0512DC	NKE			
										●	●	0.24	0.45	0.29	6	11.5	7.5	NKE0512SC				
										●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV0512DAC	NMV			
			5.2kV	71%	1kV	77%	1kV	77%	1kV	●	●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ0512SAC	NMJ			
										●	●	0.24	0.77	0.39	6	19.5	10	NMR101C	NMR			
										●	●	0.30	0.5	0.26	7.7	12.7	6.6	NTE0512MC	NTE			

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information			
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16	1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H		
0.083A	1W	12V	5V	4.75V	5.25V	1kV	62%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	NMF0512DC	NMF	
			9V	15V	1kV	66%					● ●	0.24	0.77	0.39	6	19.5	10	NMF0512SC			
			10.8V	13.2V	1kV	82%					● ●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1212MC	NTF		
						88.5%					● ●	0.24	0.45	0.39	6	11.5	10	MEE1S1212SC	MEE1		
						88%					● ●	0.5	0.43	0.27	12.7	11	7.05	MTE1S1212MC	MTE1		
						88%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S1212DC	MEV1		
						88%					● ●	0.24	0.77	0.39	6	19.5	10	MEV1S1212SC	MTU1		
			11.4V	12.6V	1kV	62%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	NMF1212DC	NMF		
						62%					● ●	0.24	0.77	0.39	6	19.5	10	NMF1212SC			
		12V	10.8V	13.2V	3kV	79%					● ●	0.39	0.45	0.21	9.8	11.5	5.4	NKE1212DC	NKE		
						77%					● ●	0.24	0.45	0.29	6	11.5	7.5	NKE1212SC			
						5.2kV	73%				● ●	0.39	0.77	0.49	9.8	19.5	12.5	NMV1212DAC	NMV		
		12V	10.8V	13.2V	1kV	76%					● ●	0.24	0.77	0.39	6	19.5	10	NMR107C	NMR		
						74%					●	0.30	0.5	0.26	7.7	12.7	6.6	NTE1212MC	NTE		
		15V	13.5V	16.5V	1kV	78%					●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1512DC	MEE1		
						87.5%					●	0.24	0.45	0.39	6	11.5	10	MEE1S1512SC			
						87%					●	0.5	0.43	0.27	12.7	11	7.05	MTE1S1512MC	MTE1		
					3kV	87.5%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S1512DC	MEV1		
						75%					● ●	0.24	0.77	0.39	6	19.5	10	MEV1S1512SC			
					1kV	76%					● ●	0.24	0.77	0.39	6	19.5	10	NMR113C	NMR		
		24V	21.6V	26.4V	1kV	68%					●	0.70	0.5	0.13	17.8	12.7	3.3	NTFS2412MC	NTF		
						79%					●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S2412DC	MEE1		
						87.5%					●	0.24	0.45	0.39	6	11.5	10	MEE1S2412SC			
						87%					●	0.5	0.43	0.27	12.7	11	7.05	MTE1S2412MC	MTE1		
					3kV	87.5%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S2412DC	MEV1		
						80%					● ●	0.39	0.45	0.39	6	11.5	10	MEV1S2412SC			
					1kV	78%					● ●	0.24	0.45	0.39	6	11.5	10	NME2412DC	NME2		
						78%					● ●	0.24	0.45	0.39	6	19.5	10	NMR119C	NMR		
			22.8V	25.2V	1kV	62%					● ●	0.39	0.77	0.27	9.8	19.5	6.8	NMF2412DC	NMF		
			48V	43.2V	52.8V	1kV	82.5%				● ●	0.24	0.77	0.39	6	19.5	10	NMF2412SC			
0.167A	2W	5V	4.5V	5.5V	8kV	75%					● ●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1301AC	PWR13XXC		
			12V	10.8V	13.2V	8kV	75%				● ●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1307AC			
			9V	1kV	71%						● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL0512SC	NDL		
			5V	4.5V	5.5V	1kV	85%				● ●	0.30	0.77	0.4	7.5	19.5	10	NMG0512SC	NMG		
						1kV	84%				● ●	0.30	0.55	0.39	7.5	14	10	NML0512SC	NML		
		12V	9V	18V	1kV	83%					● ●	0.30	0.77	0.4	7.5	19.5	10	NMK0512SAC	NMK		
						77%					● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0512SC	MEJ2		
						80%					● ●	0.36	0.86	0.44	9.2	21.8	11.1	NDL1212SC	NDL		
						85%					● ●	0.30	0.77	0.4	7.5	19.5	10	NMG1212SC	NMG		
						85%					● ●	0.30	0.55	0.39	7.5	14	10	NML1212SC	NML		
		15V	13.5V	16.5V	5.2kV	80%					● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1212SC	MEJ2		
						87%					● ●	0.30	0.77	0.4	7.5	19.5	10	NMK1212SAC	NMK		
						79%					● ●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1512SC	MEJ2		

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information					
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/32	1/16					L	W	H	L	W	H				
12V	0.167A	2W	24V	18V	36V	1kV	83%			●	●	0.36	0.86	0.44	9.2	21.8	11.1		NDL2412SC	NDL			
			24V	21.6V	26.4V	3kV	88%			●	●	0.30	0.77	0.4	7.5	19.5	10		NMK2412SAC	NMK			
			48V	36V	72V	1kV	81%			●	●	0.36	0.86	0.44	9.2	21.8	11.1		NDL4812SC	NDL			
	0.25A	3W	5V	1kV	86%					●	●	0.56	0.32	0.4	14.15	8.15	10.15		MEE3S0512SC	MEE3			
					3kV	85.5%				●	●	0.4	0.77	0.3	10.2	19.7	7.7		MEV3S0512SC	MEV3			
				9V	1kV	76%				●	●	0.58	1.27	0.28	14.7	32.3	7		NDTS0512C	NDTS			
						71%				●	●	0.58	1.27	0.28	14.7	32.3	7		NDY0512C	NDY			
						75%				●		1.25	0.8	0.45	31.8	20.3	11.4		UST-12/250-D5-C	UST-3W			
						72%				●		1.25	0.8	0.45	31.8	20.3	11.4		UWR-12/250-D5-C	UWR 3W			
			10.8V	13.2V	1kV	88%				●	●	0.56	0.32	0.4	14.15	8.15	10.15		MEE3S1212SC	MEE3			
					3kV	88%				●	●	0.4	0.77	0.3	10.2	19.7	7.7		MEV3S1212SC	MEV3			
			12V	9V	18V	1kV	75%			●	●	0.58	1.27	0.28	14.7	32.3	7		NDTS1212C	NDTS			
						78%				●	●	0.58	1.27	0.28	14.7	32.3	7		NDY1212C	NDY			
					9V	18V	74%			●		1.25	0.8	0.45	31.8	20.3	11.4		UST-12/250-D12-C	UST-3W			
						18V	36V	1kV	80%		●	●	0.58	1.27	0.28	14.7	32.3	7		NDTS2412C	NDTS		
	0.25A	3W	48V	36V	72V	1kV	80%			●	●	0.58	1.27	0.28	14.7	32.3	7		NDTS4812C	NDTS			
						81%				●	●	0.58	1.27	0.28	14.7	32.3	7		NDY4812C	NDY			
			18V	72V	1kV	77%				●		1.25	0.8	0.45	31.8	20.3	11.4		UST-12/250-D48-C	UST-3W			
	0.33A	4W	12V	10.8V	13.2V	8kV	87%			●	●	2	1	0.4	50.8	25.4	10.2		HB04U12S12QC	HB04UC			
			15V	13.5V	16.5V	3kV	87%			●		2	3	0.4	50.8	25.4	10.2		HB04U15S12QC				
	0.42A	5W	24V	18V	36V	1kV	82%			●		1	1	0.45	25.4	25.4	11.4		UWR-12/420-D24-C	UWR 5W			
			48V	36V	72V	1kV	82%			●		1	1	0.45	25.4	25.4	11.4		UWR-12/420-D48-C				
	0.5A	6W	12V	9V	36V	1.5kV	84%			●	●	1.26	0.79	0.39	32	20	10		NCS651212C	NCS6			
			24V	18V	36V	1.5kV	87%			●	●	1.26	0.79	0.39	32	20	10		NDS652412C	NDS6			
			48V	18V	75V	1.5kV	84%			●	●	1.26	0.79	0.39	32	20	10		NCS654812C	NCS6			
	0.75A	9W	5V	4.7V	7.25V	1.5kV	82%			●		2	1	0.45	50.8	25.4	11.4		UWR-12/665-D5A-C	UWR 6-10W			
			48V	18V	75V	1.5kV	82.5%			●		2	1	0.45	50.8	25.4	11.4		UWR-12/750-D48A-C				
	0.83A	10W	12V	9V	18V	1.5kV	84%			●		2	1	0.45	50.8	25.4	11.4		UWR-12/830-D12A-C	NPH10S			
			24V	18V	36V	1.5kV	86%			●	●	0.98	1.26	0.39	25	32	10		NPH10S2412EIC				
	1.25A	15W	5V	4.7V	7.5V	1.5kV	82%			●		2	2	0.45	50.8	50.8	11.4		NPH15S2412EIC	UWR 14-20W			
			12V	10V	18V	1.5kV	85%			●		2	1	0.49	50.8	25.4	12.5		UWR-12/1250-D12A-C	UWR 15W			
	1.25A	15W	24V	18V	36V	1.5kV	86%			●	●	0.98	1.97	0.39	25	50	10		NPH15S2412IC	NPH15S			
						87%				●	●	2	1	0.49	50.8	25.4	12.5		UWR-12/1250-D24A-C	UWR 15W			
						87%				●		2	1	0.49	50.8	25.4	12.5		UWR-12/1250-D48A-C				
			48V	36V	75V	1.5kV	88%			●	●	0.98	1.97	0.39	25	50	10		NPH15S4812EIC	NPH15S			
						88%				●	●	0.98	1.97	0.39	25	50	10		NPH15S4812IC	NPH15S			
			N/A	16V	160V	4kV	78%			●	●	2	2	0.79	50.8	50.8	20		RUW15SL12C	RUW15			
						77%				●	●	2	2	0.79	50.8	50.8	20		RUW15SL12HC				
	1.3A	15.6W	24V	9V	36V	2.25kV	84.5%			●		0.96	0.32	1.1	24.4	8.1	27.9		UEI15-120-Q12	UEI15			
			48V	18V	75V	2.25kV	85%			●		0.96	0.32	1.1	24.4	8.1	27.9		UEI15-120-Q48				
	1.66A	20W	24V	9V	36V	1.5kV	82.5%			●		2	2	0.45	50.8	50.8	11.4		UWR-12/1650-D12A-C	UWR 14-20W			
			48V	18V	75V	1.5kV	85%			●		2	2	0.45	50.8	50.8	11.4		UWR-12/1650-D48A-C				
	2.10A	25W	24V	18V	36V	1.5kV	86%			●	●	1.38	1.97	0.39	35	50	10		NPH25S2412EIC	NPH25S			
			48V	36V	75V	2.25kV	87.5%			●		1.38	1.97	0.39	35	50	10		NPH25S2412IC				
	2.5A	30W	12V	9V	18V		89%			●		2	1.6	0.4	50.8	40.6	10.2		UHE-12/2500-D12-C	UHE 12-30W			
			9V	36V	1.5kV	87.5%				●		2	1.6	0.4	50.8	40.6	10.2		UHE-12/2500-Q12-C				
			24V			90%				●		2	1.6	0.4	50.8	40.6	10.2		UHE-12/2500-D24-C				
			9V	36V	2.25kV	89%				●		1.92	0.35	0.92	48.8	8.9	23.4		UEI30-120-Q12P-C	UEI30			
			18V	75V	1.5kV	90.5%				●		2	1.6	0.4	50.8	40.6	10.2		UHE-12/2500-Q48-C	UHE 12-30W			
			36V			92%				●		2	1.6	0.4	50.8	40.6	10.2		UHE-12/2500-D48-C				
			18V	75V	2.25kV	89%				●		1.92	0.35	0.92	48.8	8.9	23.4		UEI30-120-Q48N-C	UEI30			
	2.5A	30W	48V	36V	75V	1.5kV	91%	●		●		0.92	0.75	0.35	23.4	19.1	8.9		ULT-12/2.5-D48	ULT			
						2.25kV	87.7%	●				0.9	1.3	0.36	22.9	33.02	9.14		ULS-12/2.5-D48	ULS-30W			

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## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information						
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks				SM	TH	DIP	SIP	Inches			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>				
								1/32	1/16	1/8	1/4	1/2				L	W	H						
12V	4.2A	50.4W	24V	9V	36V	2.25kV	89.5%						●				1.95	1.55	0.375	49.5	39.4	9.5	UEI-12/4.2-Q12P-C	UEI-50/60
				18V		2kV	91%						●				2.3	0.9	0.41	58.4	22.9	10.4	ULE-12/4.2-D24P-C	ULE 20A
				48V	36V	75V	2.25kV	92%					●				2.3	0.9	0.37	58.4	22.9	9.4	UCE-12/4.2-D48N-C	UCE
			4.5A	54W	48V	18V	75V	2.25kV	91%				●				2.3	0.9	0.41	58.4	22.9	10.4	ULE-12/4.2-D48N-C	ULE 20A
				5A	60W	48V	18V	75V	2.25kV	89.8%			●				1.95	1.55	0.375	49.5	39.4	9.5	UEI-12/5-Q48N-C	UEI-50/60
			6A	72W	12V	9V	36V		91.5%				●				1.3	0.4	0.9	33.02	10.16	22.86	ULS-12/5-D48N-C	ULS
				48V	18V	75V	2.25kV		91%				●				2.3	0.38	0.9	58.4	9.7	22.9	UWE-12/6-Q48N-C	UWE
			8A	96W	12V	9V	36V	2kV	89%				●				2.22	1.45	0.43	56.4	36.8	10.9	UQQ-12/8-Q12P-C	UQQ7-15A
				24V	18V	36V		90.5%				●				2.3	1.45	0.38	58.4	36.8	9.5	ULQ-12/8-D24P-C	ULQ-15A	
			8A	96W	24V	18V	36V	2kV	90%				●				2.3	1.45	0.42	58.4	36.8	10.7	UVQ-12/8-D24P-C	UVQ
				48V	18V	75V	2.25kV	88.5%					●				2.22	1.45	0.43	56.4	36.8	10.9	UQQ-12/8-Q48N-C	UQQ7-15A
			8.3A	99.6W	48V	36V	75V	2.25kV	90%				●				2.3	0.9	0.37	58.4	22.9	9.4	UCE-12/8.3-D48N-C	UCE
				99.6W	48V	36V	75V	2.25kV	91%				●				2.3	1.45	0.4	58.4	36.8	10.2	UCQ-12/8.3-D48N-C	UCQ
				99.6W	48V	36V	75V	2.25kV	92%				●				1.3	0.9	0.4	33	22.9	10.2	ULS-12/8.3-D48	ULS-100W
			10A	120W	48V	18V	75V	2.25kV	91.5%				●				2.3	0.9	0.39	58.4	22.9	9.9	UWE-12/10-Q48-C	UWE-100-120W
				120W	48V	36V	75V	2.25kV	90%				●				2.3	0.9	0.4	58.4	22.9	10.2	UCE-12/10-D48	UCE
				10A	120W	48V	36V	75V	2.25kV	93%			●				2.3	1.45	0.38	58.4	36.8	9.5	ULQ-12/10-D48N-C	ULQ-15A
			12.5A	150W	48V	36V	75V	2.25kV	92.5%				●				2.4	2.3	0.4	61	58.4	10.2	UCH-12/12.5-D48N-C	UCH
				150W	48V	36V		92%				●				2.3	1.45	0.46	58.4	36.8	11.7	UWQ-12/17-Q48	UWQ	
				150W	48V	36V		94.5%				●				2.3	0.9	0.4	58.4	22.9	10.2	RBE-12/20-D48	RBE	
			20A	204W	48V	36V	75V	2.25kV	93.5%				●				2.3	1.45	0.44	58.4	36.8	11.2	HPQ-12/25-D48	HPQ
				204W	48V	36V		93.5%				●				2.4	2.3	0.4	61	58.4	10.2	HPH-12/30-D48N-C	HPH	
				204W	48V	36V		96%				●				2.3	1.45	0.5	58.4	36.8	12.7	RBQ-12/33-D48	RBQ	
15V	0.016A	0.25W	5V	4.5V	5.5V	1kV	75%						●	●			0.39	0.45	0.27	9.8	11.5	6.8	LME0515DC	LME
				12V	10.8V	13.2V	1kV	75%					●	●			0.24	0.45	0.39	6	11.48	10	LME0515SC	
	0.067A	1W	3.3V	2.97V	3.63V	1kV	82%						●				0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0315DC	MEE1
				3.3V	2.97V	3.63V							●				0.24	0.45	0.39	6	11.5	10	MEE1S0315SC	
				3.3V	2.97V	3.63V							●				0.5	0.43	0.27	12.7	11	7.05	MTE1S0315MC	
			4.5V	4V	6V	1kV	63%						●				0.30	0.5	0.26	7.7	12.7	6.6	NTE0315MC	NTE
				4.5V	4V	6V	1kV	63%					●				0.70	0.5	0.13	17.8	12.7	3.3	NTFS0515MC	
				4.5V	4V	6V	1kV	63%					●				0.39	0.45	0.27	9.8	11.5	6.8	MEE1S0515DC	
			5V	4.5V	5.5V	1kV	83%						●				0.24	0.45	0.39	6	11.5	10	MEE1S0515SC	MEE1
				5V	4.5V	5.5V	83%						●				0.24	0.45	0.39	6	19.5	10	MER1S0515SC	
				5V	4.5V	5.5V	83%						●				0.5	0.43	0.27	12.7	11	7.05	MTE1S0515MC	
			4.5V	4.75V	5.25V	1kV	87.5%						●				0.323	0.331	0.335	8.2	8.4	8.5	MTU1S0515MC	MTU1
				4.5V	4.75V	5.25V	87.5%						●				0.39	0.45	0.28	9.8	11.5	6.8	NME0515DC	
				4.5V	4.75V	5.25V	87.5%						●				0.24	0.45	0.39	6	11.48	10	NME0515SC	
			4.5V	4.75V	5.25V	1kV	78%						●				0.39	0.45	0.21	9.8	11.5	5.4	NKE0515DC	NKE
				4.5V	4.75V	5.25V	78%						●				0.236	0.45	0.29	6	11.48	7.5	NKE0515SC	
				4.5V	4.75V	5.25V	78%						●				0.39	0.77	0.26	9.8	19.5	6.8	NMV0515DAC	
			5.2kV	4.75V	5.25V	1kV	78%						●				0.24	0.77	0.39	6	19.5	10	NMV0515SAC	NMV
				5.2kV	4.75V	5.25V	78%						●				0.39	0.77	0.49	9.8	19.5	12.5	NMJ0515SAC	
				5.2kV	4.75V	5.25V	78%						●				0.24	0.77	0.39	6	19.5	10	NMF0515DC	
			12V	4.75V	5.25V	1kV	62%						●				0.70	0.5	0.13	17.8	12.7	3.3	NTFS1215MC	NTF
				12V	4.75V	5.25V	62%						●				0.24	0.77	0.39	6	19.5	10	NMF0515SC	

\*Cassette module for 19-inch rack mounting.

## Single Output Isolated

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information					
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches			mm			Part Number <small>Note: Root part numbers may be shown. Please refer to datasheets for available options.</small>	Datasheet <small>Available at www.murata-ps.com</small>		
								1/32	1/16	1/8	1/4	1/2		L	W	H	L	W	H				
0.067A	1W	15V	12V	10.8V	13.2V	1kV	81%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1215DC	MEE1						
								●	●	0.24	0.45	0.39	6	11.5	10	MEE1S1215SC							
								88%	●	●	0.24	0.77	0.39	6	19.5	10	MER1S1215SC	MER1					
								88%	●	●	0.5	0.43	0.27	12.7	11	7.05	MTE1S1215MC						
								88%	●	●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1S1215MC	MTU1					
								75%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	NME1215DC						
								75%	●	●	0.24	0.45	0.39	6	11.5	10	NME1215SC	NME					
								76%	●	●	0.24	0.77	0.39	6	19.5	10	NMR108C						
								75%	●	●	0.30	0.5	0.26	7.7	12.7	6.6	NTE1215MC	NTE					
								88%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S1215DC						
								81%	●	●	0.24	0.77	0.39	6	19.5	10	MEV1S1215SC	MEV1					
								81%	●	●	0.39	0.45	0.21	9.8	11.5	5.4	NKE1215DC						
								81%	●	●	0.24	0.45	0.29	6	11.48	7.46	NKE1215SC	NKE					
								77%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV1215DAC						
								77%	●	●	0.24	0.77	0.39	6	19.5	10	NMV1215SAC	NMV					
								5.2kV	74%	●	●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ1215SAC					
								11.4V	12.6V	1kV	62%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMF1215DC	NMF		
								11.4V	12.6V	1kV	62%	●	●	0.24	0.77	0.39	6	19.5	10	NMF1215SC			
								83%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S1515DC	MEE1					
								89%	●	●	0.24	0.45	0.39	6	11.5	10	MEE1S1515SC						
								88%	●	●	0.5	0.43	0.27	12.7	11	7.05	MTE1S1515MC	MTE1					
								75%	●	●	0.24	0.45	0.39	6	11.48	10	NME1515SC						
								76%	●	●	0.24	0.77	0.39	6	19.5	10	NMR114C	NMR					
								89%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEV1S1515DC	MEV1					
								89%	●	●	0.24	0.77	0.39	6	19.5	10	MEV1S1515SC						
								77%	●	●	0.24	0.77	0.39	6	19.5	10	NMV1515SAC	NMV					
								18V	36V	1kV	67%	●	●	0.70	0.5	0.13	17.8	12.7	3.3	NTFS2415MC			
								78%	●	●	0.39	0.45	0.27	9.8	11.5	6.8	MEE1S2415DC	MEE1					
								87.5%	●	●	0.24	0.45	0.39	6	11.5	10	MEE1S2415SC						
								88%	●	●	0.5	0.43	0.27	12.7	11	7.05	MER1S2415SC	MER1					
								88%	●	●	0.39	0.77	0.27	9.8	11.5	6.8	NME2415DC						
								80%	●	●	0.24	0.45	0.39	6	11.5	10	NME2415SC	NME2					
								84%	●	●	0.39	0.77	0.27	9.8	11.5	6.8	NMR120C						
								83%	●	●	0.24	0.77	0.39	6	19.5	10	MEV1S2415DC	MEV1					
								22.8V	25.2V	1kV	62%	●	●	0.39	0.77	0.26	9.8	19.5	6.8	NMF2415DC			
								48V	43.2V	52.8V	1kV	83%	●	●	0.24	0.77	0.39	6	19.5	10	MER1S4815SC	MER1	
								3kV	82.5%	●	●	0.24	0.77	0.39	6	19.5	10	MEV1S4815SC					
	0.134A	2W	12V	10.8V	13.2V	8kV	75%	9V	1kV	73%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL0515SC	NDL			
								5V	4.5V	5.5V	●	●	0.30	0.77	0.4	7.5	19.5	10	NMG0515SC				
								1kV	85%	●	●	0.30	0.55	0.39	7.5	14	10	NML0515SC	NML				
								3kV	85%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK0515SAC					
								5.2kV	79%	●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S0515SC	MEJ2				
								9V	18V	1kV	81%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL1215SC			
								1kV	85%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMG1215SC	NMG				
								1kV	85%	●	●	0.295	0.55	0.39	7.5	14	10	NML1215SC					
								3kV	84%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1215SAC	NMK				
								5.2kV	80%	●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1215SC					
	2W	15V	13.5V	16.5V	3kV	88%	88%	3kV	88%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1515SAC	NMK				
								5.2kV	78%	●	●	0.77	0.39	0.5	19.65	9.95	12.65	MEJ2S1515SC					
								24V	18V	36V	1kV	83%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL2415SC	NDL	
								24V	21.6V	26.4V	3kV	88%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK2415SAC		
								48V	36V	72V	1kV	82%	●	●	0.36	0.86	0.44	9.2	21.8	11.1	NDL4815SC	NDL	

## Single Output Isolated

Output Characteristics			Input Voltage		Isolation	Efficiency	Package Style				Package Dimensions						Further Information							
Rated Output Voltage	Rated Output Current	Total Output Power	Nom.	Min.			Bricks				SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
							1/32	1/16	1/8	1/4					L	W	H	L	W	H				
0.2A	3W	5V	4.5	5.5	1kV	88%					●	●	0.56	0.32	0.4	14.15	8.15	10.15	MEE3S0515SC	MEE3				
					3kV	87.5%					●	●	0.24	0.77	0.39	6	19.5	10	MEV3S0515SC	MEV3				
					9V	77%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS0515C	NDTS				
				1kV	73%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDY0515C	NDY					
					75%					●		1.25	0.8	0.45	31.8	20.2	11.4	UST-15/200-D5-C	UST-3W					
					12V	76%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS1215C	NDTS				
				1kV	79%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDY1215C	NDY					
					75%					●		1.25	0.8	0.45	31.8	20.3	11.4	UST-15/200-D12-C	UST-3W					
					10.8V	89%					●	●	0.56	0.32	0.4	14.15	8.15	10.15	MEE3S1215SC	MEE3				
		24V	18V	36V	3kV	89%					●	●	0.24	0.77	0.39	6	19.5	10	MEV3S1215SC	MEV3				
					1kV	84%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS2415C	NDTS				
					82%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDY2415C	NDY					
		48V	36V	72V	1kV	80%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDTS4815C	NDTS				
					81%					●	●	0.58	1.27	0.28	14.7	32.3	7	NDY4815C	NDY					
					48V	72V	1kV	77%			●		1.25	0.8	0.45	31.8	20.3	11.4	UST-15/200-D48-C	UST-3W				
0.267A	4W	5V	4.5V	5.5V	8kV	80%					●	●	2	1	0.4	50.8	25.4	10.2	HB04U05S15QC	HB04UC				
		12V	10.8V	13.2V	8kV	87%					●	●	2	1	0.4	50.8	25.4	10.2	HB04U12S15QC					
		15V	13.5V	16.5V	8kV	87%					●	●	2	1	0.4	50.8	25.4	10.2	HB04U15S15QC					
0.33A	5W	24V	18V	36V	1kV	83%					●		1	1	0.45	25.4	25.4	11.4	UWR-15/335-D24-C	UWR 5W				
		48V	36V	72V	1kV	83%					●		1	1	0.45	25.4	25.4	11.4	UWR-15/335-D48-C					
0.4A	6W	24V	18V	36V	1.5kV	87%					●	●	1.26	0.79	0.39	32	20	10	NDS6S2415C	NDS6				
		5V	4.7V	7.25V	1.5kV	77%					●		2	1	0.45	50.8	25.4	11.4	UWR-15/530-D5A-C	UWR 6-10W				
0.6A	9W	48V	18V	75V	1.5kV	84%					●		2	1	0.45	50.8	25.4	11.4	UWR-15/600-D48A-C					
		12V	9V	18V	1.5kV	85%					●		2	1	0.45	50.8	25.4	11.4	UWR-15/665-D12A-C	UWR 6-10W				
0.67A	10W	24V	18V	36V	1.5kV	86%					●	●	0.98	1.26	0.39	25	32	10	NPH10S2415EIC	NPH10S				
		48V	36V	75V	1.5kV	86%					●	●	0.98	1.26	0.39	25	32	10	NPH10S2415IC					
1A	15W	5V	4.7V	7.5V	1.5kV	82%					●		2	2	0.45	50.8	50.8	11.4	UWR-15/1000-D5A-C	UWR 14-20W				
		12V	10V	18V	1.5kV	85%					●		2	1	0.49	50.8	25.4	12.5	UWR-15/1000-D12A-C	UWR 15W				
		24V	18V	36V	1.5kV	87%					●	●	0.98	1.97	0.39	25	50	10	NPH15S2415EIC	NPH15S				
		24V	18V	36V	1.5kV	87%					●	●	0.98	1.97	0.39	25	50	10	NPH15S2415IC					
		48V	36V	75V	1.5kV	89%					●	●	0.98	1.97	0.39	25	50	10	NPH15S4815EIC	NPH15S				
		48V	36V	75V	1.5kV	87%					●		2	1	0.49	50.8	25.4	12.5	UWR-15/1000-D48A-C					
		48V	36V	75V	1.5kV	87%					●		2	1	0.49	50.8	25.4	12.5	UWR-15/1000-D48A-C	UWR 15W				
1.1A	16.5W	24V	9V	36V	2.25kV	85%					●		1.1	0.96	0.36	27.9	24.4	9.1	UEI15-150-Q12	UEI 15W				
		48V	18V	75V	2.25kV	85.3%					●		1.1	0.96	0.36	27.9	24.4	9.1	UEI15-150-Q48					
1.3A	20W	24V	9V	36V	1.5kV	85%					●		2	2	0.45	50.8	50.8	11.4	UWR-15/1300-D12A-C	UWR 14-20W				
		48V	18V	75V	1.5kV	86%					●		2	2	0.45	50.8	50.8	11.4	UWR-15/1300-D48A-C					
1.7A	25W	24V	18V	36V	1.5kV	87%					●	●	1.38	1.97	0.39	35	50	10	NPH25S2415EIC	NPH25S				
		24V	18V	36V	1.5kV	87%					●	●	1.38	1.97	0.39	35	50	10	NPH25S2415IC					
2A	30W	12V	9V	18V	1.5kV	89%					●		2	1.6	0.4	50.8	40.6	10.2	UHE-15/2000-D12-C	UHE 12-30W				
		24V	9V	36V	1.5kV	92%					●		2	1.6	0.4	50.8	40.6	10.2	UHE-15/2000-Q12P-C					
		18V	36V	1.5kV	90%					●		1.92	0.35	0.92	48.8	8.9	23.4	UEI30-150-Q12P-C	UEI30					
		18V	75V	1.5kV	90.5%					●		2	1.6	0.4	50.8	40.6	10.2	UHE-15/2000-D24-C	UHE 12-30W					
		48V	22.5V	75V	2.25kV	89.5%					●		1.92	0.35	0.92	48.8	8.9	23.4	UEI30-150-Q48N-C					
		36V	75V	1.5kV	92%					●		2	1.6	0.4	50.8	40.6	10.2	UHE-15/2000-D48-C	UHE 12-30W					
		22.5V	75V	2.25kV	89%		●				●		0.9	1.3	0.36	22.9	33.02	9.14	ULS-15/2-D48					
3.3A	49.5W	24V	9V	36V	2.25kV	90%					●		1.95	1.55	0.375	49.5	39.4	9.5	UEI-15/3.3-Q12P-C	UEI-50/60				
		48V	18V	75V	2.25kV	89.3%					●		1.95	1.55	0.375	49.5	39.4	9.5	UEI-15/4-Q48N-C					
		12V	9V	36	2.25kV	91.5%	●		●		●		2.3	0.38	0.9	58.4	9.7	22.9	UWE-15/5-Q12P-C	UWE				
6.7A	100.5W	48V	36V	75V	2.25kV	92%					●		2.4	2.3	0.4	61	58.4	10.2	UCH-15/6.7-D48N-C	UCH				
		48V	18V	36V	2kV	90.5%					●		2.3	1.45	0.4	58.4	36.8	10.2	UCQ-15/6.7-D48N-C	UCQ				
7A	105W	12V	9V	36	2.25kV	94%					●	●	2.22	1.45	0.43	56.4	36.8	10.9	UQQ-15/7-Q12P-C	UVQ				
		24V	18V	36V	2kV	93%					●	●	2.3	1.45	0.42	58.4	36.8	10.7	UVQ-15/7-D24P-C					
		48V	36V	75V	2.25kV	94%					●	●	2.3	1.45	0.42	58.4	36.8	10.7	UVQ-15/7-D48N-C					
18V	5.6A	100.8W	24V	18V	36V	2kV	90%				●	●	2.3	1.45	0.42	58.4	36.8	10.7	UVQ-18/5.6-D24P-C	UVQ				
	6A	108W	48V	36V	75V	2.25kV	93%				●	●	2.3	1.45	0.42	58.4	36.8	10.7	UVQ-18/6-D48N-C					

# Dual Output

## Bipolar Isolated DC-DC Converters

For analog/linear and other applications requiring bipolar/symmetric rail voltages, Murata Power Solutions' isolated duals generate  $\pm 3.3V$ ,  $\pm 5V$ ,  $\pm 12V$  or  $\pm 15V$  outputs from a single input voltage. Not surprisingly, our offering is the industry's broadest.

We offer bipolar duals with output power ranges from 0.75 to 20 Watts, input voltage ranges from 3 to 75 Volts, and package styles from sub-miniature SIPs, DIPs and SMDs to traditional 2" x 2" (51 x 51mm) through-hole devices. Isolation voltages run as high as 8,000Vdc. When relevant, all products offer



UL/EN safety certifications, CE marks, and EMI/EMC testing.

If your available voltage is anywhere between 3.3 and 75 Volts and your need is  $\pm 3.3V$ ,  $\pm 5V$ ,  $\pm 12V$  or  $\pm 15V$  at moderate power levels – in a small area – we've got your solution.

### Quick Selection Guide Listed by output power

	Vout	Series					
	$\pm 3.3V$	$\pm 5V$	$\pm 9V$	$\pm 12V$	$\pm 15V$	$\pm 24V$	
1W	● ● ● ● ●	MEA1					
	● ● ● ● ●	MTU1					
	● ● ● ● ●	NKA					
	● ● ● ● ●	NMA					
	● ● ● ● ●	NMJ					
	● ● ● ● ●	NMV					
	● ● ● ● ●	NTA					
1.5W	● ● ● ● ●	PWR13XXC					
	● ● ● ● ●	PWR1726AC					

	Vout	Series					
	$\pm 3.3V$	$\pm 5V$	$\pm 9V$	$\pm 12V$	$\pm 15V$	$\pm 24V$	
2W	● ● ● ● ●	MEJ2					
	● ● ● ● ●	NMH					
	● ● ● ● ●	NMK					
	● ● ● ● ●	NMS					
	● ● ● ● ●	NTH					
3W	● ● ● ● ●	BST 3W					
	● ● ● ● ●	BWR 3W					
	● ● ● ● ●	NDH					
	● ● ● ● ●	NDTD					
	● ● ● ● ●	PWR70C					
4W	● ● ● ●	HB04UC					
5W	● ● ● ●	BWR 5W					
	● ● ● ●	PWR1546AC					

	Vout	Series					
	$\pm 3.3V$	$\pm 5V$	$\pm 9V$	$\pm 12V$	$\pm 15V$	$\pm 24V$	
6W	● ● ● ● ●	NCS6					
	● ● ● ● ●	NDS6					
7W	● ● ● ● ●	BWR 7-10W					
8W	● ● ● ● ●	BWR 7-10W					
15W	● ● ● ● ●	BEI					
	● ● ● ● ●	BWR 15-17W					
17W	● ● ● ● ●	BWR 15-20W					
	● ● ● ● ●	BWR 15-17W					
	● ● ● ● ●	BWR 15-20W					

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style			Package Dimensions						Further Information			
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max..			Bricks			Inches			mm			Part Number <small>Note: Root part numbers may be shown. Please refer to datasheets for available options.</small>	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H			
<b><math>\pm 3.3V</math></b>	<b><math>\pm 0.152A</math></b>	<b>1W</b>	3.3V	2.97V	3.63V	3kV	74%				● ●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0303DC	NKA	
			1kV	75%							● ●	0.23	0.65	0.3	6.0	16.6	7.6	NKA0303SC		
			5V	4.5V	5.5V	3kV	77%				● ●	0.39	0.77	0.21	9.8	19.5	5.4	NTA0303MC		
			1kV	77%							● ●	0.23	0.65	0.3	6	16.6	7.6	NKA0503DC	NKA	
			12	10.8V	13.2V	5.2kV	75%				● ●	0.3	0.6	0.26	7.7	15.2	6.6	NTA0503SC		
	<b><math>\pm .303A</math></b>	<b>2W</b>	5V	4.5V	5.5V	5.2kV	71%				● ●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D0503SC	MEJ2	
			12	10.8V	13.2V	5.2kV	75%				● ●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1203SC		
			5V	4.5V	9V	1kV	67%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD0503C		
			12V	9V	18V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD1203C		
			24V	18V	36V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD2403C		
<b><math>\pm 5V</math></b>	<b><math>\pm 0.1A</math></b>	<b>1W</b>	3.3V	2.97V	3.63V	1kV	83%				●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1D0305MC	MTU1	
			78%								●	0.30	0.60	0.26	7.7	15.2	6.6	NTA0305MC		
			3kV	79%							● ●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0305DC		
	<b><math>\pm 0.454A</math></b>	<b>3W</b>	48V	36V	75V	1kV	72%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD4803C	NDTD	
			12	9V	18V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD1203C		
			24V	18V	36V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD2403C		
			48V	36V	75V	1kV	72%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD4803C		
			12	9V	18V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD1203C		
			24V	18V	36V	1kV	73%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD2403C		

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style			Package Dimensions						Further Information					
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks			SM	TH	DIP	SIP	Inches			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>			
								1/8	1/4	1/2					L	W	H					
<b>±5V</b>	<b>±0.1A</b>	<b>1W</b>	5V	4.5V	5.5V	1kV	85%				●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D0505DC	MEA1		
							84%				●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D0505SC			
						3kV	70%				●	●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1D0505MC	MTU1		
							80%				●	●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0505DC			
							70%				●	●	0.23	0.65	0.30	6.0	16.6	7.6	NKA0505DEC			
							80%				●	●	0.23	0.65	0.30	6.0	16.6	7.6	NKA0505SEC			
							1kV	69%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMA0505DC	NMA		
							5.2kV	60%			●	●	0.24	0.77	0.39	6.0	19.5	10.0	NMA0505SC			
							3kV	71.5%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV0505DC	NMV		
							1kV	69%			●	●	0.30	0.60	0.26	7.7	15.2	6.6	NTA0505MC			
							1kV	80%			●	●	0.30	0.60	0.26	7.7	15.2	6.6	NTA0505MEC			
							3kV	71%			●	●	0.30	0.60	0.26	7.7	15.2	6.6	NTV0505MC	NTV		
						12V	1kV	85%			●	●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1D1205MC	MTU1		
							1kV	84.5%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1205DC			
							1kV	85%			●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D1205SC	MEA1		
							3kV	74%			●	●	0.39	0.77	0.21	9.8	19.5	5.4	NKA1205DC			
							1kV	69%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMA1205DC	NMA		
							5.2kV	60%			●	●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ1205SC			
							3kV	71%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV1205DC	NMV		
							1kV	69%			●	●	0.30	0.60	0.26	7.7	15.2	6.6	NTA1205MC			
							3kV	73%			●	●	0.30	0.60	0.26	7.7	15.2	6.6	NTV1205MC	NTV		
							1kV	84%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1505DC	MEA1		
							1kV	71%			●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D1505SC			
						15V	3kV	69			●	●	0.24	0.77	0.39	6.0	19.5	10.0	NMV1505SC	NMV		
							24V	21.6V	26.4V	1kV	84.5		●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D2405DC	
							48V	43.2V	52.8V	1kV	80%		●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D4805SC	MEA1
<b>±0.15A</b>	<b>1.5W</b>	<b>2W</b>	5V	4.5V	5.5V	5V	5V	4.5V	5.5V	8kV	75%		●	●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1303AC	PWR13XXC
							12V	10.8V	13.2V	8kV	75%		●	●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1309AC	
							1kV	80%			●	●	0.39	0.77	0.30	9.8	19.5	7.7	NMH0505DC	NMH		
							1kV	80%			●	●	0.30	0.77	0.40	7.5	19.5	10.0	NMH0505SC			
							3kV	83%			●	●	0.50	0.70	0.21	12.7	17.8	6.0	NTH0505MC	NTH		
							5.2kV	76%			●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D0505SC			
							6kV	74%			●	●	0.58	1.28	0.37	14.7	32.6	9.4	NMS0505C	NMS		
							1kV	80%			●	●	0.39	0.77	0.30	9.8	19.5	7.7	NMH1205DC	NMH		
							1kV	80%			●	●	0.30	0.77	0.40	7.5	19.5	10.0	NMH1205SC			
							3kV	84%			●	●	0.50	0.70	0.21	12.7	17.8	6.0	NTH1205MC	NTH		
							5.2kV	79%			●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1205SC			
							6kV	78%			●	●	0.58	1.28	0.37	14.7	32.6	9.4	NMS1205C	NMS		
							15V	13.5V	16.5V	3kV	84%		●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1505SC	
							5.2kV	78%			●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1505SC	MEJ2		
						24V	21.6V	26.4V	1kV	81%		●	●	0.39	0.77	0.30	9.8	19.5	7.7	NMH2405DC	NMH	
							3kV	84%			●	●	0.30	0.77	0.40	7.5	19.5	10.0	NMH2405SC			
							48V	43V	52.8V	1kV	82%		●	●	0.39	0.77	0.303	9.8	19.5	7.7	NMH4805DC	NMH
							43.2V	43.2V	52.8V	1kV	82%		●	●	0.3	0.77	0.4	7.5	19.5	10.0	NMH4805SC	

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information					
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/8	1/4	1/2	L	W	H	L	W	H							
<b>+5V</b>	<b>±0.25A</b>	<b>2.5W</b>	12V	9V	18V	1kV	78%				●	1.25	0.8	0.45	31.8	20.3	11.4	BST-5/250-D12-C	BST-3W				
			48V	18V	72V	1kV	77%				● ●	1.25	0.8	0.45	31.8	20.3	11.4	BWR-5/250-D12-C	BWR 3W				
		<b>3W</b>	12V	9V	18V	1kV	76%				●	1.25	0.8	0.45	31.8	20.3	11.4	BST-5/250-D48-C	BST-3W				
			48V	36V	75V	1kV	77%				● ●	1.25	0.8	0.45	31.8	20.3	11.4	BWR-5/250-D48-C	BWR 3W				
	<b>±0.4A</b>	<b>4W</b>	12V	10.8V	13.2V	8kV	88%				● ●	2	1	0.40	50.8	25.4	10.2	HB04U12D05QC	HB04UC				
			24V	18V	36V	1kV	78%				●	1	1	0.45	25.4	25.4	11.4	BWR-5/500-D24-C	BWR-5W				
	<b>±0.5A</b>	<b>5W</b>	48V	36V	72V	1kV	78%				●	1	1	0.45	25.4	25.4	11.4	BWR-5/500-D48-C					
			12V	9V	36V	1.5kV	82%				● ●	1.26	0.79	0.39	32	20	10	NCS6D1205C	NCS6				
	<b>±0.6A</b>	<b>6W</b>	24V	18V	36V	1.5kV	83%				● ●	1.26	0.79	0.39	32	20	10	NDS6D2405C	NDS6				
			48V	18V	75V	1.5kV	80%				● ●	1.26	0.79	0.39	32	20	10	NCS6D4805C	NCS6				
	<b>±0.7A</b>	<b>7W</b>	5V	4.7V	7.25V	1.5kV	79%				●	2	1	0.38	50.8	25.4	9.5	BWR-5/700-D5A-C	BWR7-10W A-Series				
			48V	18V	75V	1.5kV	81%				●	2	1	0.38	50.8	25.4	9.5	BWR-5/700-D48A-C					
	<b>±0.9A</b>	<b>9W</b>	12V	9V	18V	1.5kV	82%				●	2	1	0.38	50.8	25.4	9.5	BWR-5/900-D12A-C	BWR7-10W A-Series				
			5V	4.7V	7.5V	1.5kV	80%				●	2	2	0.45	50.8	50.8	11.4	BWR-5/1500-D5A-C	BWR15-20W A-Series				
	<b>±1.5A</b>	<b>15W</b>	12V	10V	18V	1.5kV	81%				●	2	1	0.47	50.8	25.4	11.8	BWR-5/1500-D12A-C	BWR15-17W A-Series				
			24V	9V	36V	2.25kV	84%				●	1.1	0.35	0.96	27.9	8.9	24.4	BEI15-050-Q12	BEI15-Series				
			18V	36V	1.5kV	83%				●	2	1	0.47	50.8	25.4	11.8	BWR-5/1500-D24A-C	BWR15-17W A-Series					
			48V	18V	75V	2.25kV	83.5%				●	1.1	0.35	0.96	27.9	8.9	24.4	BEI15-050-Q48	BEI15-Series				
			36V	75V	1.5kV	83%				●	2	1	0.47	50.8	25.4	11.8	BWR-5/1500-D48A-C	BWR15-17W A-Series					
			12V	9V	36V	1.5kV	83%				●	2	2	0.45	50.8	50.8	11.4	BWR-5/1700-D12A-C	BWR15-20W A-Series				
			48V	18V	75V	1.5kV	83%				●	2	2	0.45	50.8	50.8	11.4	BWR-5/1700-D48A-C					

<b>±9V</b>	<b>±0.055A</b>	<b>1W</b>	3.3V	2.97V	3.63V	3kV	75%				● ●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0309DC	NKA
											●	0.23	0.65	0.3	6	16.6	7.6	NKA0309SC	
											●	0.3	0.6	0.26	7.7	15.2	6.6	NTA0309MC	NTA
							1kV	86.7			● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D0509DC	MEA1
							86.5				● ●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D0509SC	
						3kV	76%				● ●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0509DC	NKA
						1kV	75%				● ●	0.24	0.77	0.39	6	19.5	10	NMA0509DC	NMA
						5.2kV	65%				● ●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ0509SC	NMJ
						3kV	76%				● ●	0.24	0.77	0.39	6	19.5	10	NMV0509DC	NMV
						1kV	75%				●	0.3	0.6	0.26	7.7	15.2	6.6	NTA0509MC	
	<b>±0.056A</b>	<b>2W</b>	3kV	2.97V	3.63V	3kV	77%				●	0.3	0.6	0.26	7.7	15.2	6.6	NTV0509MC	NTV
						1kV	86.5				● ●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1209DC	MEA1
						3kV	79%				● ●	0.39	0.77	0.21	9.8	19.5	5.4	NKA1209DC	
						1kV	74%				● ●	0.39	0.77	0.39	6	19.5	10.0	NKA1209SC	NKA
						5.2kV	65%				● ●	0.39	0.77	0.49	9.8	19.5	12.5	NMJ1209SC	NMJ
	<b>±0.111</b>	<b>2W</b>	5	4.5	5.5	1kV	86%				●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1D0509MC	MTU1
			12	10.8	13.2	1kV	87%				●	0.323	0.331	0.335	8.2	8.4	8.5	MTU1D1209MC	MTU1
			5V	4.5V	5.5V	5.2kV	79%				●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D0509SC	MEJ2
			12	10.8V	13.2V	5.2kV	81%				●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1209SC	
			15V	13.5V	16.5V	5.2kV	80%				●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1509SC	MEJ2

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information						
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks			SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/8	1/4	1/2					L	W	H	L	W	H				
<b>±0.055A</b>	<b>1W</b>	<b>12V</b>	<b>10.8V</b>	<b>13.2V</b>	3kV	74%				●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV1209DC	<b>NMV</b>					
					3kV	74%				●	●	0.24	0.77	0.39	6	19.5	10	NMV1209SC						
					1kV	74%			●		●	0.3	0.6	0.26	7.7	15.2	6.6	NTA1209MC						
					3kV	79%			●		●	0.3	0.6	0.26	7.7	15.2	6.6	NTV1209MC						
					15V	13.5V	16.5V	1kV	87%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1509DC	<b>MEA1</b>			
					24V	21.6V	26.4V	1kV	87%			●	●	0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1509SC				
					48V	43.2V	52.8V	1kV	87.5%			●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D2409DC				
												●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D2409SC	<b>MEA1</b>			
												●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH0509DC	<b>NMH</b>			
<b>±0.111A</b>	<b>2W</b>	<b>5V</b>	<b>4.5V</b>	<b>5.5V</b>	1kV	81%				●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH0509SC	<b>NMH</b>					
					3kV	86%				●	●	0.30	0.77	0.4	7.5	19.5	10	NMK0509SC	<b>NMK</b>					
					6kV	76%				●	●	0.58	1.28	0.37	14.7	32.6	9.4	NMS0509C	<b>NMS</b>					
					1kV	81%			●		●	0.5	0.7	0.21	12.7	17.8	6.0	NTH0509MC	<b>NTH</b>					
					12V	10.8V	13.2V	1kV	83%			●	●	0.39	0.77	0.30	9.8	19.5	7.7	NMH1209DC	<b>NMH</b>			
					1kV	83%			●		●	0.3	0.77	0.4	7.5	19.5	10	NMH1209SC	<b>NMH</b>					
					3kV	87%			●		●	0.30	0.77	0.4	7.5	19.5	10	NMK1209SC	<b>NMK</b>					
					6kV	81%			●		●	0.58	1.28	0.37	14.7	32.6	9.4	NMS1209C	<b>NMS</b>					
					1kV	83%			●		●	0.5	0.7	0.21	12.7	17.8	6.0	NTH1209MC	<b>NTH</b>					
					15V	13.5V	16.5V	3kV	86%			●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1509SC	<b>NMK</b>			
					24V	21.6V	26.4V	1kV	85%			●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH2409DC	<b>NMH</b>			
					3kV	87%			●		●	0.3	0.77	0.4	7.5	19.5	10	NMH2409SC	<b>NMH</b>					
					48V	43.2V	52.8V	1kV	82%			●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH4809DC	<b>NMH</b>			
<b>±0.042A</b>	<b>1W</b>	<b>3.3V</b>	<b>2.97V</b>	<b>3.63V</b>	3kV	78%				●	●	0.39	0.77	0.21	9.8	19.5	5.4	NKA0312DC	<b>NKA</b>					
					1kV	77%			●		●	0.23	0.65	0.3	6	16.6	7.6	NKA0312SC	<b>NKA</b>					
												0.3	0.6	0.26	7.7	15.2	6.6	NTA0312MC	<b>NTA</b>					
												0.39	0.77	0.27	9.8	19.5	6.8	MEA1D0512DC	<b>MEA1</b>					
												0.24	0.77	0.39	6.0	19.5	10.0	MEA1D0512SC	<b>MEA1</b>					
												0.323	0.331	0.335	8.2	8.4	8.5	MTU1D0512MC	<b>MTU1</b>					
												0.39	0.77	0.21	9.8	19.5	5.4	NKA0512DC	<b>NKA</b>					
												0.23	0.65	0.3	6	16.6	7.6	NKA0512SC	<b>NKA</b>					
												0.39	0.77	0.27	9.8	19.5	6.8	NMA0512DC	<b>NMA</b>					
												0.24	0.77	0.39	6	19.5	10	NMA0512SC	<b>NMA</b>					
												0.39	0.77	0.49	9.8	19.5	12.5	NMJ0512SC	<b>NMJ</b>					
												0.39	0.77	0.27	9.8	19.5	6.8	NMV0512DC	<b>NMV</b>					
												0.24	0.77	0.39	6	19.5	10	NTA0512MC	<b>NTA</b>					
												0.3	0.6	0.26	7.7	15.2	6.6	NTV0512MC	<b>NTV</b>					
												0.3	0.6	0.26	7.7	15.2	6.6	MEA1D1212DC	<b>MEA1</b>					
												0.24	0.77	0.39	6.0	19.5	10.0	MEA1D1212SC	<b>MEA1</b>					
												0.323	0.331	0.335	8.2	8.4	8.5	MTU1D1212MC	<b>MTU1</b>					
												0.39	0.77	0.21	9.8	19.5	5.4	NKA1212DC	<b>NKA</b>					
												0.23	0.65	0.30	6	16.6	7.6	NKA1212SC	<b>NKA</b>					
												0.39	0.77	0.27	9.8	19.5	6.8	NMA1212DC	<b>NMA</b>					
												0.39	0.77	0.27	9.8	19.5	10.0	NMA1212SC	<b>NMA</b>					
												0.3	0.6	0.26	7.7	15.2	6.6	NTA1212MC	<b>NTA</b>					
												0.3	0.6	0.26	7.7	15.2	6.6	NTV1212MC	<b>NTV</b>					
												0.39	0.77	0.27	9.8	19.5	6.8	MEA1D1512DC	<b>MEA1</b>					
												0.24	0.77	0.39	6.0	19.5	10.0	MEA1D1512SC	<b>MEA1</b>					

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information					
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks		SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/8	1/4					L	W	H	L	W	H				
<b>+12V</b>	<b>±0.042A</b>	<b>1W</b>	15V	13.5V	16.5V	1kV	78%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMA1512DC	NMA						
				3kV	75%		75%	●	●	0.24	0.77	0.39	6	19.5	10	NMA1512DC							
			24V	21.6V	26.4V	1kV	87%	●	●	0.39	0.77	0.27	9.8	19.5	6.8	NMV1512SC	NMV						
			48V	43.2V	52.8V	1kV	83%	●	●	0.24	0.77	0.39	6.0	19.5	10.0	MEA1D2412DC	MEA1						
			5V	4.5V	5.5V	8kV	75%	●	●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1304AC	PWR13XXC						
	<b>±0.063A</b>	<b>1.5W</b>	12V	10.8V	13.2V	8kV	75%	●	●	1.27	0.81	0.4	32.3	20.5	10.2	PWR1310AC							
			5V	4.5V	5.5V	1kV	82%	●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH0512DC	NMH						
							87%	●	●	0.3	0.77	0.4	7.5	19.5	10	NMH0512SC							
						6kV	77%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK0512SC	NMK						
						1kV	82%	●	●	0.58	1.28	0.37	14.7	32.6	9.4	NMS0512C	NMS						
<b>-12V</b>	<b>±0.083A</b>	<b>2W</b>	12V	10.8V	13.2V	1kV	84%	●	●	0.5	0.7	0.21	12.7	17.8	6.0	NTH0512MC	NTH						
							84%	●	●	0.39	0.77	0.30	9.8	19.5	7.7	NMH1212DC	NMH						
						3kV	87%	●	●	0.3	0.77	0.4	7.5	19.5	10	NMH1212SC	NMH						
						6kV	82%	●	●	0.58	1.28	0.37	14.7	32.6	9.4	NMS1212C	NMS						
						1kV	84%	●	●	0.5	0.7	0.21	12.7	17.8	6.0	NTH1212MC	NTH						
			15V	13.5V	16.5V	3kV	88%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK1512SC	NMK						
			24V	21.6V	26.4V	1kV	86%	●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH2412DC	NMH						
			24V	21.6V	26.4V	3kV	89%	●	●	0.30	0.77	0.4	7.5	19.5	10	NMK2412SC	NMK						
			48V	43.2V	52.8V	1kV	85%	●	●	0.39	0.77	0.3	9.8	19.5	7.7	NMH4812DC	NMH						
			5V	4.5V	9V	1kV	73%	●	●	1.25	0.8	0.45	31.8	20.3	11.4	BST-12/105-D5-C	BST-3W						
<b>-12V</b>	<b>±0.11A</b>	<b>3W</b>				72%	●	●	1.25	0.8	0.45	31.8	20.3	11.4	BWR-12/105-D5-C	BWR 3W							
		5V	4.5V	9V	1kV	76%	●	●	0.58	1.27	0.27	14.7	32.3	7	NDTD0512C	NDTD							
		12V	9V	18V	1kV	76%	●	●	1.25	0.8	0.45	31.8	20.3	11.4	BST-12/125-D12-C	BST-3W							
						75%	●	●	0.58	1.27	0.27	14.7	32.3	7	BWR-12/125-D12-C	BWR 3W							
		24V	18V	36V	1kV	81%	●	●	0.36	1.02	0.49	9.3	26	12.5	NDH2412SC	NDH							
		48V	18V	72V	1kV	82%	●	●	0.58	1.27	0.27	14.7	32.3	7	NDTD2412C	NDTD							
						77%	●	●	1.25	0.8	0.45	31.8	20.3	11.4	BST-12/125-D48-C	BST-3W							
						80%	●	●	1.25	0.8	0.45	31.8	20.3	11.4	BWR-12/125-D48-C	BWR 3W							
					36V	75V	1kV	80%	●	●	0.58	1.27	0.27	14.7	32.3	7	NDTD4812C	NDTD					
<b>-12V</b>	<b>±0.167A</b>	<b>4W</b>	15V	13.5V	16.5V	8kV	88%	●	●	2	1	0.4	50.8	25.4	10	HB04U15D12QC	HB04UC						
			24V	18V	36V	1kV	82%	●	●	1	1	0.4	25.4	25.4	11.4	BWR-12/210-D24-C	BWR-5W						
							82%	●	●	1	1	0.4	25.4	25.4	11.4	BWR-12/210-D48-C							
	<b>±0.21A</b>	<b>5W</b>	12V	9V	18V	1.5kV	86%	●	●	1.26	0.79	0.39	32	20	10	NCS6D1212C	NCS6						
							87%	●	●	1.26	0.79	0.39	32	20	10	NDS6D2412C	NDS6						
			48V	18V	75V	1.5kV	84%	●	●	1.26	0.79	0.39	32	20	10	NCS6D4812C	NCS6						
<b>-12V</b>	<b>±0.34A</b>	<b>8W</b>	5V	4.7V	7.25V	1.5kV	78%	●	●	2	1	0.4	50.8	25.4	9.5	BWR-12/335-D5A-C	BWR 7-10W A-Series						
			12V	9V	18V	1.5kV	84%	●	●	2	1	0.4	50.8	25.4	9.5	BWR-12/415-D12A-C							
							84%	●	●	2	1	0.4	50.8	25.4	9.5	BWR-12/415-D48A-C							
			24V	18V	36V	1.5kV	81%	●	●	2	2	0.45	50.8	50.8	11.4	BEI15-120-Q12	BEI15-Series						
			48V	18V	75V	1.5kV	85.5%	●	●	1.1	0.35	0.96	27.9	8.9	24.4	BEI15-120-Q48							
							85.5%	●	●	1.1	0.35	0.96	27.9	8.9	24.4	BWR-12/625-D5A-C	BWR 15-20W A-Series						
	<b>±0.625A</b>	<b>15W</b>	12V	10V	18V	1.5kV	83.5%	●	●	2	1	0.47	50.8	25.4	11.8	BWR-12/725-D12A-C	BWR 15-17W A-Series						
			24V	18V	36V	1.5kV	85%	●	●	2	1	0.47	50.8	25.4	11.8	BWR-12/725-D24A-C							
							86%	●	●	2	1	0.47	50.8	25.4	11.8	BWR-12/725-D48A-C							
<b>-12V</b>	<b>±0.73A</b>	<b>17W</b>	48V	36V	75V	1.5kV	86%	●	●	2	2	0.45	50.8	50.8	11.4	BWR-12/830-D12A-C	BWR 15-20W A-Series						
			12V	10V	18V	1.5kV	83.5%	●	●	2	1	0.47	50.8	50.8	11.4	BWR-12/830-D48A-C							
							85%	●	●	2	2	0.45	50.8	50.8	11.4	BWR-12/830-D12A-C	BWR 15-20W A-Series						
			24V	18V	36V	1.5kV	83%	●	●	2	2	0.45	50.8	50.8	11.4	BWR-12/830-D48A-C	BWR 15-20W A-Series						
	<b>±0.84A</b>	<b>20W</b>	48V	18V	75V	1.5kV	83%	●	●	2	2	0.45	50.8	50.8	11.4	MEJ2D0512SC	MEJ2						
			5V	4.5V	5.5V	5.2kV	80%	●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1212SC							
							81%	●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1512SC							
			15V	13.5V	16.5V	5.2kV	80%	●	●	0.5	0.77	0.39	12.7	19.7	10.0	MEJ2D1512SC							

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style			Package Dimensions						Further Information																																																																																																																																																																																																																														
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks			SM	TH	DIP	SIP	Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>																																																																																																																																																																																																																									
								1/8	1/4	1/2					L	W	H	L	W	H																																																																																																																																																																																																																											
<b>±15V</b>	<b>±0.033A</b>	<b>1W</b>	<b>3.3V</b>	<b>2.97V</b>	<b>3.63V</b>	<b>3kV</b>	<b>79%</b>	<b>1kV</b>	<b>77%</b>	<b>87.5%</b>	<b>1kV</b>	<b>87%</b>	<b>88%</b>	<b>3kV</b>	<b>79%</b>	<b>1kV</b>	<b>78%</b>	<b>5.2kV</b>	<b>65%</b>	<b>3kV</b>	<b>79%</b>	<b>1kV</b>	<b>78%</b>	<b>3kV</b>	<b>80%</b>	<b>5V</b>	<b>4.5V</b>	<b>5.5V</b>	<b>12V</b>	<b>10.8V</b>	<b>13.2V</b>	<b>1kV</b>	<b>88%</b>	<b>1kV</b>	<b>88%</b>	<b>88%</b>	<b>3kV</b>	<b>82%</b>	<b>1kV</b>	<b>76%</b>	<b>5.2kV</b>	<b>65%</b>	<b>3kV</b>	<b>76%</b>	<b>1kV</b>	<b>76%</b>	<b>3kV</b>	<b>82%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>89.5%</b>	<b>1kV</b>	<b>89.5%</b>	<b>80%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>24V</b>	<b>21.6V</b>	<b>26.4V</b>	<b>48V</b>	<b>43.2V</b>	<b>52.8V</b>	<b>1kV</b>	<b>83.5</b>	<b>5V</b>	<b>4.5V</b>	<b>5.5V</b>	<b>8kV</b>	<b>75%</b>	<b>12V</b>	<b>10.8V</b>	<b>13.2V</b>	<b>1kV</b>	<b>75%</b>	<b>12V</b>	<b>10.8V</b>	<b>13.2V</b>	<b>1kV</b>	<b>84%</b>	<b>1kV</b>	<b>84%</b>	<b>3kV</b>	<b>87%</b>	<b>5.2kV</b>	<b>79%</b>	<b>6kV</b>	<b>78%</b>	<b>1kV</b>	<b>84%</b>	<b>1kV</b>	<b>84%</b>	<b>3kV</b>	<b>87%</b>	<b>5.2kV</b>	<b>82%</b>	<b>6kV</b>	<b>82%</b>	<b>1kV</b>	<b>84%</b>	<b>3kV</b>	<b>88%</b>	<b>1kV</b>	<b>86%</b>	<b>24V</b>	<b>21.6V</b>	<b>26.4V</b>	<b>48V</b>	<b>43.2V</b>	<b>52.8V</b>	<b>1kV</b>	<b>85%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>85%</b>	<b>3.3V</b>	<b>2.97V</b>	<b>3.63V</b>	<b>5V</b>	<b>4.5V</b>	<b>5.5V</b>	<b>12V</b>	<b>10.8V</b>	<b>13.2V</b>	<b>1kV</b>	<b>87.5%</b>	<b>1kV</b>	<b>87%</b>	<b>3kV</b>	<b>88%</b>	<b>1kV</b>	<b>78%</b>	<b>5.2kV</b>	<b>65%</b>	<b>3kV</b>	<b>79%</b>	<b>1kV</b>	<b>78%</b>	<b>3kV</b>	<b>80%</b>	<b>1kV</b>	<b>88%</b>	<b>1kV</b>	<b>88%</b>	<b>3kV</b>	<b>82%</b>	<b>1kV</b>	<b>76%</b>	<b>3kV</b>	<b>76%</b>	<b>1kV</b>	<b>76%</b>	<b>3kV</b>	<b>82%</b>	<b>1kV</b>	<b>82%</b>	<b>3kV</b>	<b>82%</b>	<b>1kV</b>	<b>89.5%</b>	<b>1kV</b>	<b>89.5%</b>	<b>3kV</b>	<b>80%</b>	<b>1kV</b>	<b>77%</b>	<b>24V</b>	<b>21.6V</b>	<b>26.4V</b>	<b>48V</b>	<b>43.2V</b>	<b>52.8V</b>	<b>1kV</b>	<b>83.5</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>88%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>88.5%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>88.5%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>83.5</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>83.5</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b>	<b>77%</b>	<b>15V</b>	<b>13.5V</b>	<b>16.5V</b>	<b>1kV</b> </

## Dual Output Bipolar

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style			Package Dimensions						Further Information			
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks			Inches			mm			Part Number Note: Root part numbers may be shown. Please refer to datasheets for available options.	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>		
								1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H			
<b>+15V</b>	<b>±0.1A</b>	<b>3W</b>	5V	4.5V	9V	1kV	74%				●	1.25	0.80	0.45	31.8	20.3	11.4	BST-15/85-D5-C	BST-3W	
			12V	9V	18V		72%				● ●	1.25	0.80	0.45	31.8	20.3	11.4	BWR-15/85-D5-C	BWR-3W	
			15V	10V	18V	1kV	75%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD0515C	NDTD	
			18V	18V	36V		76%				● ●	1.25	0.80	0.45	31.8	20.3	11.4	BST-15/100-D12-C	BST-3W	
			48V	18V	72V	1kV	75%				● ●	1.25	0.80	0.45	31.8	20.3	11.4	BWR-15/100-D12-C	BWR-3W	
			36V	18V	75V		78%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD1215C	NDTD	
			12V	10.8V	13.2V	8kV	66%				● ●	1.13	1.13	0.41	28.6	28.6	10.7	PWR70C	PWR70C	
			15V	13.5V	16.5V		88%				● ●	0.36	1.02	0.49	9.3	26.0	12.5	NDH2415SC	NDH	
			24V	18V	36V	1kV	83%				● ●	0.58	1.27	0.27	14.7	32.3	7.0	NDTD2415C	NDTD	
			48V	36V	72V		82%				● ●	1.25	0.80	0.45	31.8	20.3	11.4	BWR-15/100-D48-C	BWR-3W	
			12V	9V	36V	1.5kV	87%				● ●	1.26	0.79	0.39	32	20	10	NCS6D1215C	NCS6	
			24V	18V	36V		87.5%				● ●	1.26	0.79	0.39	32	20	10	NDS6D2415C	NDS6	
			48V	18V	75V	1.5kV	84%				● ●	1.26	0.79	0.39	32	20	10	NCS6D4815C	NCS6	
			5V	4.7V	7.25V		79%				● ●	2.00	1.00	0.38	50.8	25.4	9.5	BWR-15/275-D5A-C	BWR 7-10W A-Series	
<b>±0.33A</b>	<b>10W</b>	<b>12W</b>	12V	9V	18V	1.5kV	84%				● ●	2.00	1.00	0.38	50.8	25.4	9.5	BWR-15/330-D12A-C		
			48V	18V	75V		84%				● ●	2.00	1.00	0.38	50.8	25.4	9.5	BWR-15/330-D48A-C		
<b>±0.50A</b>	<b>15W</b>	<b>22.5kW</b>	5V	4.7V	7.5V	1.5kV	82%				● ●	2.00	2.00	0.45	50.8	50.8	11.4	BWR-15/500-D5A-C	BWR 15-20W A-Series	
			24V	9V	36V		84%				● ●	1.1	0.35	0.96	27.9	8.9	24.4	BEI15-150-Q12	BEI15-Series	
			48V	18V	75V		86%				● ●	1.1	0.35	0.96	27.9	8.9	24.4	BEI15-150-Q48		
<b>±0.58A</b>	<b>17W</b>	<b>22.5kW</b>	12V	10V	18V	1.5kV	84%				● ●	2.00	1.00	0.47	50.8	25.4	11.8	BWR-15/575-D12A-C	BWR 15-17W A-Series	
			24V	18V	36V		86%				● ●	2.00	1.00	0.47	50.8	25.4	11.8	BWR-15/575-D24A-C		
			48V	36V	75V		87%				● ●	2.00	1.00	0.47	50.8	25.4	11.8	BWR-15/575-D48A-C		
<b>±0.67A</b>	<b>20W</b>	<b>22.5kW</b>	12V	9V	36V	1.5kV	83%				● ●	2.00	2.00	0.45	50.8	50.8	11.4	BWR-15/670-D12A-C	BWR 15-20W A-Series	
			48V	18V	75V		84%				● ●	2.00	2.00	0.45	50.8	50.8	11.4	BWR-15/670-D48A-C		

# Dual Output

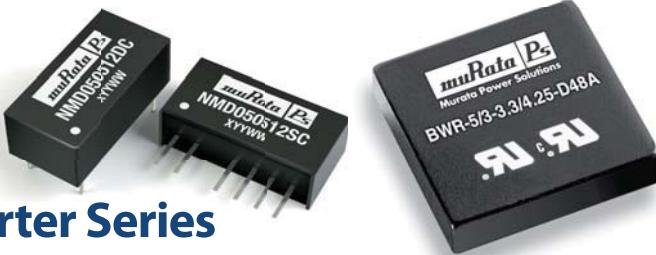
## Asymmetric Isolated DC DC Converter Series

**When your application requires multiple positive voltages and you can't easily derive one from the other using a non-isolated PoL, consider an asymmetric dual.**

Asymmetric duals are isolated, 2-output DC/DC converters that typically provide two low voltages such as 3.3V and 1.8V. As

such, they are ideal for driving the core and I/O logic of complex PLDs or ASICs. On DSL line cards, they can power both the DSP and the line drivers. In evolving process-control systems, they can power older 5V logic and newer 3.3V micros.

Asymmetric duals provide the real estate



and cost savings of a single package with one set of input circuitry (stand-up caps, filters, etc.). On the output side, many duals feature 2-loop designs that effectively deliver two independently regulated converters in a single package . . . with a standard pinout and internationally recognized safety approvals.

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information		
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks				Inches		mm		Part Number <small>Note: Root part numbers may be shown. Please refer to datasheets for available options.</small>	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>			
								1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H			

<b>5/3.3V</b>	<b>2.65/3A</b>	<b>15W</b>	12V	10V	18V	1.5kV	86%			●					2.00	1.00	0.52	50.8	25.4	13.2	DSM-5/2.65-3.3/3-D12-C	DSM-15W
			24V	18V	36V	1.5kV	86%			●					2.00	1.00	0.52	50.8	25.4	13.2	DSM-5/2.65-3.3/3-D24-C	
			48V	36V	75V	1.5kV	86%			●					2.00	1.00	0.52	50.8	25.4	13.2	DSM-5/2.65-3.3/3-D48-C	
	<b>3/4.25A</b>	<b>30W</b>	12V	10V	18V	1.5kV	85%			●					2.00	2.00	0.48	50.8	50.8	12.2	BWR-5/3-3.3/4.25-D12A-C	BWR-5/3.3 30W
			24V	18V	36V	1.5kV	88%			●					2.00	2.00	0.48	50.8	50.8	12.2	BWR-5/3-3.3/4.25-D24A-C	
			48V	36V	75V	1.5kV	88%			●					2.00	2.00	0.48	50.8	50.8	12.2	BWR-5/3-3.3/4.25-D48A-C	
	<b>6/7A</b>	<b>33W</b>	12V	10V	18V	1.5kV	86%			●					2.00	2.00	0.45	50.8	50.8	11.4	BWR-5/6-3.3/7-D12-C	BWR-5/3.3 33W
			24V	18V	36V	1.5kV	88%			●					2.00	2.00	0.45	50.8	50.8	11.4	BWR-5/6-3.3/7-D24-C	
			48V	36V	75V	1.5kV	88%			●					2.00	2.00	0.45	50.8	50.8	11.4	BWR-5/6-3.3/7-D48-C	
<b>5/5V</b>	<b>0.1/0.1A</b>	<b>1W</b>	5V	4.5V	5.5V	1.0kV	70%			●	●				0.39	0.77	0.27	9.8	19.5	6.8	NMD050505DC	NMD
										●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD050505SC	
<b>5/9V</b>	<b>0.1/0.056A</b>	<b>1W</b>	5V	4.5V	5.5V	1.0kV	80%			●	●				0.39	0.77	0.27	9.8	19.5	6.8	NMD050509DC	NMD
			12V	10.8V	13.2V	1.0kV	80%			●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD050509SC	
<b>5/12V</b>	<b>0.1/0.042A</b>	<b>1W</b>	5V	4.5V	5.5V	1.0kV	80%			●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD050512SC	NMD
			12V	10.8V	13.2V	1.0kV	80%			●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD120512SC	
<b>5/15V</b>	<b>0.1/0.034A</b>	<b>1W</b>	5V	4.5V	5.5V	1.0kV	80%			●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD050515SC	NMD
			12V	10.8V	13.2V	1.0kV	80%			●	●				0.24	0.77	0.39	6.0	19.5	10.0	NMD120515DC	

# Triple Output

## Isolated DC to DC Converters

If your challenge is to power an entire mixed-signal, analog/digital system partition from a single dc source voltage, Murata Power Solutions' high-quality, triple-output DC DC converters can provide your total solution.

Operating from inputs as low as 4.7V or as high as 75V, each of these full-featured power

converters offers a 3.3V or 5V primary output (with current as high as 30 Amps) and either  $\pm 12V$  or  $\pm 15V$  auxiliary outputs (with currents as high as  $\pm 4.2$  Amps).

Our versatile offering includes: the industry's smallest triples (1 x 2 inches, 25 x 50mm) at 8-22W power levels; slightly larger, wide-input (9-36V and 18-75V) devices at



20-30 Watt levels; and traditional 1/2-bricks at 100 Watts. One unique product offers 24, 48 and 72V outputs.

Before you specify two or three DC/DC converters to accomplish your task, see if a single 3-output device from Murata Power Solutions does the job.

Output Characteristics			Input Voltage			Isolation	Efficiency	Package Style				Package Dimensions						Further Information					
Rated Output Voltages	Rated Output Currents	Total Output Power	Nom.	Min.	Max.			Bricks				SIP				Inches			mm				
								1/8	1/4	1/2	SM	TH	DIP	SIP	L	W	H	L	W	H	Part Number <small>Note: Root part numbers may be shown. Please refer to datasheets for available options.</small>	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>	
<b>5/<math>\pm 12V</math></b>	<b>1/<math>\pm 0.13A</math></b>	<b>8W</b>	5V	4.7V	7V	1.5kV	76%				•			2	1	0.38	50.8	25.4	9.5	TWR-5/1000-12/125-D5A-C	TWR8-11W		
	<b>1/<math>\pm 0.21A</math></b>	<b>8W</b>	12V	9V	18V	1.5kV	82%				•			2	1	0.38	50.8	25.4	9.5	TWR-5/1000-12/210-D12A-C			
			24V	18V	36V	1.5kV	84%				•			2	1	0.38	50.8	25.4	9.5	TWR-5/1000-12/210-D24A-C			
			48V	36V	72V	1.5kV	85%				•			2	1	0.38	50.8	25.4	9.5	TWR-5/1000-12/210-D48A-C			
	<b>1.2/<math>\pm 0.25A</math></b>	<b>12W</b>	48V	18V	72V	1.5kV	81%				•			2	2	0.45	50.8	50.8	11.4	TWR-5/1200-12/250-D48A-C	TWR12-15W		
	<b>1.5/<math>\pm 0.25A</math></b>	<b>14W</b>	48V	18V	72V	1.5kV	79%				•			2	2	0.45	50.8	50.8	11.4	TWR-5/1500-12/250-D48A-C			
<b>5/<math>\pm 15V</math></b>	<b>3/<math>\pm 0.5A</math></b>	<b>20W</b>	24V	9V	36V	1.5kV	82%				•			2	2	0.45	50.8	50.8	11.4	TWR-5/3000-12/500-D12A-C	TWR 20W A-Series		
			48V	18V	75V	1.5kV	83%				•			2	2	0.45	50.8	50.8	11.4	TWR-5/3000-12/500-D48A-C			
<b>24/48/72V</b>	<b>42/21/14mA</b>	<b>3W</b>	5V	4.5V	5.5V	1.0kV	85%				•	•	0.30	0.86	0.44	7.5	21.8	11.1	NMT0572SC	NMT			
			12V	10.8V	13.2V	1.0kV	85%				•	•	0.30	0.86	0.44	7.5	21.8	11.1	NMT1272SC				

# VRM Processor Support

**Powering next generation 32-Bit and 64-Bit processors is becoming more demanding, requiring lower output voltages, higher currents, and higher di/dts.**

Our VRM products are designed to meet and exceed the performance demanded

by the next generation processors and are available in a variety of packages for an optimal fit in systems <1U to 2U with innovative open-frame designs that allow for better thermal management in today's system environments.



Output Characteristics				Input Voltage			Efficiency	Package Style										Further Information			
VRM Spec	Thermal Design Current	Max. Output Current	Output Voltage Range (VDC)	Nom.	Min.	Max.		Card Edge	Thru Hole	Height				L	W	H	W	H	Part Number	Datasheet Available at <a href="http://www.murata-ps.com">www.murata-ps.com</a>	
										<1U	1U	1.5U	2U								
<b>Intel® 11.1</b>	<b>80A</b>	<b>70A</b>	0.5-1.6	12	11.04	12.6	87%	●		●				3.66	0.75	0.78	92.96	19.05	19.81	VR111B080CA-C	VR111 Series
	<b>150A</b>	<b>130A</b>	0.5-1.6	12	11.04	12.6	87%	●	●	●	●		3.80	0.87	1.18	96.52	22.10	29.97	VR111B150CU-C		
								●				●	●	3.80	1.00	1.86	96.52	25.40	47.24	VR111B150CL-C	
								●					●	3.80	0.87	2.50	96.52	22.10	63.50	VR111B150CS-C	
<b>Intel® 11.0</b>	<b>80A</b>	<b>70A</b>	0.8375-1.6	12	11.04	12.6	88%	●		●				3.66	0.75	0.78	92.96	19.05	19.81	VR110B080CA-1C	VR110 Series
	<b>150A</b>	<b>130A</b>	0.8375-1.6	12	11.04	12.6	84%	●	●	●	●		3.80	0.475	1.18	96.52	12.07	29.97	VR110B080CU-1C		
								●				●	●	3.80	0.87	1.18	96.52	22.10	29.97	VR110B150CU-1C	
								●				●	●	3.80	1.00	1.86	96.52	25.40	47.24	VR110B150CL-1C	
	<b>80A</b>	<b>70A</b>	0.81875 -1.6	12	11.04	12.6	87%	●	●	●	●		3.80	0.46	1.19	96.49	11.70	30.15	VR11EB080CU-1C	VR11C & VR11E Series	
								●	●	●	●		3.80	0.46	1.19	96.49	11.70	30.15	VR11CB080CE-1C		
	<b>150A</b>	<b>130A</b>	0.81875 -1.6	12	11.04	12.6	85%	●	●	●	●		3.80	0.92	1.19	96.49	23.20	30.15	VR11CB150CU-1C		
								●	●	●	●		3.80	.085	2.41	96.49	21.50	61.15	VR11CB150CS-1C		
<b>Intel® 10.1/10.2</b>	<b>150A</b>	<b>130A</b>	0.8375-1.6	12	11.04	12.6	85%	●	●	●	●		3.80	0.87	1.18	96.52	22.10	29.97	VR102B150CU-3C	VR102 Series	
								●	●	●	●		3.80	0.87	2.50	96.52	22.10	63.50	VR102B150CS-2C		

# A design-in guide featuring our more popular series

If you need product now, or within shorter lead times, the Selector Guides on the next two pages contain popular models most likely to be found in inventory at our authorized Distributors. With over 3,500 standard part numbers to choose from, there is a chance that our product data book and online search tools may lead you to a model with an availability that is not quite in line with your scheduling requirements. In that case, refer to the following selector tables for a model that could meet your immediate requirements.

## AC/DC Front End

We also offer Custom AC/DC options. Contact us for details.

Series	Description	Power Ratings	Input	Output 1	Output 2	Efficiency	Features
D1U4CS	1U height 4" width	2200W	90-264 VAC	12VDC	3.3VDC 5VDC	93.0%	PFC, Active Current-Share, Hot-Plug, I <sup>C</sup> Bus, EMI Class A
D1U4CS-D	1U height 4" width	2100W	40-72 VDC	54VDC	5VDC	93.0%	PFC, Droop Current-Share, Hot-Plug, I <sup>C</sup> Bus, EMI Class A
D1U4	1U height 4" width	1600W 1200W	90-264 VAC	12VDC	3.3VDC 5VDC	90.6%	PFC, Active Current-Share, Hot-Plug, I <sup>C</sup> Bus, EMI Class A
D1U	1U height 4.75" width	2000W 1600W 1200W	90-264 VAC	12VDC 48VDC	3.3VDC 5VDC 12VDC	90.6%	PFC, Active Current-Share, Hot-Plug, I <sup>C</sup> Bus, EMI Class A
D1U-H	1U height 5.5" width	2800W	170-264 VAC	-52VDC	12VDC	91.6%	PFC, Active Current-Share, Hot-Plug, I <sup>C</sup> Bus, EMI Class A
MVAB120	1U height 2" x 4" footprint	120W @ 250LFM 75W Convection Cooling	90-264 VAC	12VDC 24VDC 48VDC		88% 90% 91%	PFC, Compliance To WW Safety & Emc Standards



## Isolated DC/DC



See opposite page.

Miniature Industrial  
Package (Low Power)



Industrial Package



## PoL

Output Current	5Vin		12Vin		24Vin
	SMT	SIP	SMT	SIP	SMT
1A-1.5A			OKL	OKR	
3A	OKY OKL/OKL2	OKX	OKL OKY	OKR OKX	OKI
5A	OKY	OKX	OKY	OKX	
6A	OKL/OKL2		OKL/OKL2	OKR	
10A	OKY/OKY2	OKX/OKX2	OKY/OKY2	OKR OKX/OKX2	
16A	OKY/OKY2	OKX/OKX2	OKY/OKY2	OKX/OKX2	



## Processor Power

Murata Power Solutions offers a range of processor power modules that support both Intel and AMD devices.

- Intel support for VRM 9.1, VRM 10.1/10.2, VRM 11.0 and VRM 11.1
- AMD support for K8 processors

## Isolated DC/DC

	Package	Series	Input Voltages								Isolation (kVdc)	Output Voltages						Power (Watts)	
			Nominal				Range					Single			Dual				
			(±10%)		2:1		4:1		9-36V		18-75V		9V			12V			
Miniature Industrial Package (Low Power)	SIP4/DIP8	• Encapsulated Open Frame	3.3V	5V	9V	12V	15V	24V	48V	4.5-9V	9-18V	18-36V	36-75V	1	1.2-15V	±3.3V	25		
		• LME	•	•	•									1	1.2-2.5V	±5V			
		• NKE	•	•	•									1	3.3V	±9V			
	SIP7	• NME	•	•	•									1	5V	±12V			
		• NMJ	•	•	•									5.2	•	•	•		
		• NMR	•	•	•	•	•							1	•	•	•		
	SIP7/DIP14	• MER1	•	•	•	•	•	•						1	•	•	•		
		• NMV	•	•	•									3	•	•	•		
		• MEV1	•	•	•	•	•							3	•	•	•		
	SMD	• MEA1	•	•	•	•	•	•						1	•	•	•		
		• NKA	•	•	•									1	•	•	•		
		• NMA	•	•	•	•								1	•	•	•		
		• MTU	•	•	•									1	•	•	•		
		• NTA	•	•	•									1	•	•	•		
		• NTE	•	•	•									1	•	•	•		
		• NTV	•	•										3	•	•	•		
		• NTF						*	*	*				1	•	•	•		
		DIP24	• PWR13	•	•	•								8	•	•	•		
	SIP4	• NML	•	•	•									1	•	•	•		
Industrial Package	SIP7	• MEJ2	•	•	•	•								5.2	•	•	•		
		• NMG	•	•	•									1	•	•	•		
		• NMK	•	•	•	•								3	•	•	•		
	SIP7/DIP14	• NMH	•	•	•									1	•	•	•		
	SIP8	• NDL					*	*	*					1	•	•	•		
	DIP24	• NMS	•	•	•									6	•	•	•		
	SMD	• NTH	•	•	•									1	•	•	•		
	SIP4	• MEE3	•	•	•									•	•	•	•		
	SIP7	• MEV3	•	•										3	•	•	•		
	SIP9	• NDH												1	•	•	•		
Industrial Package	DIP24	• UST				*	*	*			*	1		•	•	•	•		
		• BST				*	*			*	1			•	•	•	•		
		• UWR				*	*			*	1.5			•	•	•	•		
		• NDY, NDTS				*	*	*		*	1			•	•	•	•		
		• NDTD				*	*	*		*	1			•	•	•	•		
		• NDS6				*	*			*	1.5			•	•	•	•		
		• NCS6				*	*			*	1.5			•	•	•	•		
		1"x1"	• UEI15						*	*	2.25			•	•	•	•	15	
		• UEI25							*	*	2.25			•	•	•	•	25	
		• BEI15							*	*	2.25			•	•	•	•	15	
Brick Style	1"x1.25"	• NPH10						*	*	*	1.5		*	*	*	*	*	10	
		• HB04U						*	*	*	8		•	•	•	•	•	4	
		• UWR, BWR, TWR						*	*	*	1		•	•	•	•	•	6-22	
	1"x2"	• NPH15						*	*	*	1.5		*	*	*	*	*	15	
		• UEI30						*	*	*	2.25		•	•	•	•	•	30	
		• UEI-50/60						*	*	*	2.25		•	•	•	•	•	50-60	
	2"x2"	• UHE						*	*	*	1.5		•	•	•	•	•	30	
		• UWR, BWR, TWR						*	*	*	1.5		•	•	•	•	•	* * 14-40	
		1/32	• ULT					*	*	*	1.5		3.3, 5, 12V					24.75-30	
Brick Style	1/16	• ULS-30						*	*	*	2.25		3.3, 12, 15V					26.5-30	
		• ULS-60						*	*	*	2.25		3.3, 5, 12V					60-66	
		• UWS						*	*	*	2.25		3.3, 5, 12V					49.5-54	
	1/8	• RBE						*	*	*	2.25		12V					234	
		• UCE						*	*	*	2.25		1.5, 1.8, 2.5, 3.3, 5, 12V					30-120	
		• ULE						*	*	*	2.25		1.5, 1.8, 2.5, 3.3, 5, 12, 24, 48V					30-72	
	1/4	• UEE						*	*	*	2.25		3.3V					50-99	
		• UWE						*	*	*	1.5		3.3, 5, 12, 15, 24V					66-120	
		• HPQ						*	*	*	2.25		3.3, 8.3, 12V					165-300	
Brick Style	1/2	• UCQ						*	*	*	2.25		1.2-15V					36-132	
		• UQQ						*	*	*	2.25		3.3-24V					82-105	
		• ULQ						*	*	*	2.25		3.3, 5, 12V					22.5-120	
	1/2	• UVQ						*	*	*	2.25		1.5, 2.5, 3.3, 5, 12, 15, 18, 24, 48V					60-120	
		• UWQ						*	*	*	2.25		12V					204	
		• EMH						*	*	*	2.25		54V					162	
	1/2	• HPH						*	*	*	2.25		3.3V 5, 12V					120-360	
		• UCH						*	*	*	2.25		1.8, 2.5, 3.3, 5, 12, 15V					33-150	

\*Does not exactly match voltage/voltage range shown - please see datasheet for precise specifications.

## Your Online Resource for Power

For the very latest product information including comprehensive data sheets, application notes, and where to buy, visit us online now.



### Navigation and Search Tools

- Parametric searching
- Compare up to 5 models
- Sort results



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- Search for parts in stock with our distributors.
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### Product Videos

- Our design engineers discuss various topics in power.



### New Product Announcements

- All the very latest products from Murata Power Solutions
- Opt to receive via E-mail or RSS Feed

The screenshot shows the Murata Power Solutions website. At the top, there's a navigation bar with links for Home, Products, Support, Contact, About, and a search bar. Below the navigation is a banner with the text "Powering Innovation" and images of electronic components. To the right, there's a sidebar with links for DC/DC Converters, AC/DC Power Supplies, Magnetic Products, Digital Panel Meters, and Additional Murata Products. A "New Products" section is also visible. The main content area includes sections for "Search inventory/where to buy" (with a part number search bar), "Video / Tutorials" (with a video thumbnail for "Selecting Isolated Brick DC/DC Converters"), and "Company News" (with a newsletter sign-up form). Social media links for Facebook, Twitter, YouTube, and LinkedIn are located at the bottom right of the page.



### Facebook.com

- Like us on Facebook



### Twitter.com

- If you're into power, you should follow us!
- You can find us at [twitter.com/murataps](http://twitter.com/murataps)



### YouTube.com

- Visit us at [youtube.com/user/murataps](http://youtube.com/user/murataps)

# AC/DC Power Supplies

We can develop AC/DC power supplies to meet almost every possible application requirement in terms of power, performance, efficiency, communications, protection, size, approvals compliance and cooling requirements.



## • Front Ends for Distributed Power Architectures

AC to 12Vdc or 48Vdc ultra compact front end supplies for distributed power architectures with active power factor correction plus industry leading efficiency & density



## • Open Frame

High-efficiency, single output solutions in 1U chassis, 75W to 400W



## • Custom Solutions

Custom product solutions from 100W to 5kW

[murata-ps.com/acdc](http://murata-ps.com/acdc)

# Digital Panel Meters

From standard, off-the-shelf products to application specific designs, our DATEL digital panel meters are a versatile and cost-effective solution for a number of applications.



## • Multifunction AC Power Meters

Displays Volts, Amps, Watts, and Power Factor or Hertz. Built-in 10A, 32A or 100A CTs.



## • 2-Wire Meters

Power your measuring instrument with the signal you're measuring! Measure the voltage at a standard USA-style wall outlet simply by "plugging in" an AC line monitor.



## • AC Ammeters

Directly measure AC currents from 0-2A to 0-100A



## • DC Ammeters

Include built-in shunts, reverse-polarity protection, and connections for all supply and load wiring

[murata-ps.com/dpm](http://murata-ps.com/dpm)

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1 Safety Critical Component means any component whose failure to perform could cause the failure of, or affect the operation of a Life Support Device.

2 Life Support Device means any device, system or ancillary equipment intended for implant into the body or used in relation to supporting or sustaining life.

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# Magnetics

Two essential elements of the vast majority of power electronics applications are filtering and isolation. Whether you need to reduce noise or protect vital components, Murata Power Solutions can offer a wide range of products to suit your requirements.



## • Inductors & Transformers

Highly advanced and optimized inductor and transformer solutions with the emphasis on miniaturization, reliability, and ease of handling.



- Inductors
- Common-mode chokes
- Pulse transformers
- Current sense transformers
- Agency approved transformers
- Databus isolators
- Custom designs



[murata-ps.com/magnetics](http://murata-ps.com/magnetics)

# Data Acquisition

Since 1970, DATEL Data Acquisition products have been recognized for their innovation and reliability in meeting the requirements of the most demanding of applications in the Imaging, Medical, Scientific and High-Rel industries. In addition to custom designs, we offer a comprehensive range of standard products, including:



- Sampling A-to-D Converters
- Data Acquisition Systems
- Image Processors
- Sample-Holds



[datel.com](http://datel.com)

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