

4 SELECTOR GUIDE

The following products are recommended for use in any new circuitry designs.

General Purpose Rectifiers

→ Peak Repetitive Reverse Voltage

	Package	100V	400V	600V	1000V
1.0A	DO-15	1S1885	1S1887	1S1888	1S1830
	DO-41	S5277B	S5277G	S5277J	S5277N
	DO-41S	S5566B	S5566G	S5566J	S5566N
	DO-41SS	S5688B	S5688G	S5688J	S5688N
	I-FLAT	U1BC44	U1GC44	U1JC44	
1.2A	DO-15	1S1885A	1S1887A	1S1888A	
1.5A	DO-15L	1R5BZ41	1R5GZ41	1R5JZ41	1R5NZ41
3.0A	DO-201AD	3BZ41	3GZ41	3JZ41	3NZ41

Fast Recovery Diodes

→ Peak Repetitive Voltage

	Package	Reverse Recovery Time	100V	400V	600V	1000V	1500V	1700V	1800V	
0.2A	DO-41S	4 μ s				TFR3N	TFR3T			
0.3A	DO-41SS	4 μ s				TFR4N	TFR4T			
0.5V	DO-15	1.5 μ s	S5295B	S5295G	S5295J					
	DO-41SS		TVR5B	TVR5G	TVR5J					
	DO-41	2 μ s	TVR1B	TVR1G	TVR1J					
	I-FLAT	4 μ s		U05GH44	U05JH44	U05NH44	U05TH44			
	DO-41	4 μ s				TFR2N	TFR2T			
	DO-41	10 μ s				TFR1N	TFR1T			
DO-41	20 μ s		TVR2B	TVR2G	TVR2J					
0.7A	DO-15	6 μ s							1S1832	
1.0A	DO-15	1.5 μ s		1S1834	1S1835					
	DO-41SS	0.4 μ s				1NH42				
	DO-41S					1NH41				
1.2A	DO-15L	20 μ s			TVR4J	TVR4N				
1.5A	DO-15L	0.4 μ s				1R5NH41				
3.0A	DO-201AD	1.5 μ s	3BH41	3GH41	3JH41	3NH41	3TH41			
5.0A	TO-220(N)IS							5THZ47		
	TO-3P(H)IS							5THZ52	5VHZ52	
	TO-220(N)IS		0.6 μ s					5TUZ47		
	TO-3P(H)IS						5TUZ52			

Bridges

→ Peak Repetitive Reverse Voltage

Average Rectified Current ←	Package	100V	400V	600V	1200V
	0.5A	MINI DIP		*05GU4B48	
H-FLAT			*U05GU4B48		
MINI DIP		05B4B48	05G4B48	05J4B48	
H-FLAT		U05B4B48	U05G4B48	U05J4B48	
1.0A	SIP	1B4B41	1G4B41	1J4B41	
	DIP	1B4B42	1G4B42	1J4B42	1Q4B42
	H-FLAT-L	U1B4B42	U1G4B42	U1J4B42	U1Q4B42
1.5A	Round Type	1B4B1	1G4B1	1J4B1	
2.0A	Box Type	2B4B41	2G4B41	2J4B41	
3.0A	Box Type	3B4B41	3G4B41	3J4B41	
4.0A	Box Type	4B4B41	4G4B41	4J4B41	
6.0A	Box Type	6B4B41	6G4B41	6J4B41	
10A	Box Type	10B4B41	10G4B41	10J4B41	
15A	Box Type	15B4B42	15G4B42	15J4B42	
25A	Box Type	25B4B42	25G4B42	25J4B42	

*Low VF Type (available for telephones)

Super Fast Recovery Rectifiers (S-FRD)

→ Peak Repetitive Reverse Voltage

Average Forward Current ←	Package	Reverse Recovery Time	400V	600V	1000V
	0.5A	I-FLAT	100ns		
DO-41SS		100ns			05NU42
DO-41S		100ns			05NU41
0.8A	DO-41	100ns	0R8GU41		
1.0A	I-FLAT	100ns	U1GU44	U1JU44	
	DO-41SS	100ns	1GU42	1JU42	
	DO-41S	100ns		1JU41	
	DO-15	100ns			1NU41
1.5A	DO-15L	100ns	1R5GU41	1R5JU41	1R5NU41
2.0A	DO-201AD	100ns			2NU41
3.0A	DO-201AD	100ns	3GU41	3JU41	
5.0A	*TO-220(N)IS	100ns	5GUZ47	5JUZ47	

*Center Lead Cut

Fast Recovery Rectifiers (V-FRD)

→ Peak Repetitive Reverse Voltage

Average Forward Current ←			→ Peak Repetitive Reverse Voltage		
	Package	Reverse Recovery Time	400V	600V	1000V
0.5A	DO-41SS	200ns			05NH46
	DO-41S	200ns			05NH45
1.0A	DO-41SS	200ns	1GH46	1JH46	
	DO-41S	200ns	1GH45	1JH45	
1.5A	DO-15L	200ns	1R5GH45	1R5JH45	1R5NH45
2.0A	DO-201AD	200ns			2NH45
3.0A	DO-201AD	200ns	3GH45	3JH45	

High-Efficiency Diodes (HED)

→ Peak Repetitive Reverse Voltage

Average Forward Current ←			→ Peak Repetitive Reverse Voltage				
	Package	Reverse Recovery Time	200V	300V	400V	600V	
Single Type	1.0A	PW-MINI	60ns	U1DL49			
		DO-41S	35ns	1DL41A			
		DO-41SS	35ns	1DL42A			
		IPLAT	35ns	U1DL44A			
	1.5A	DO-15L	35ns	1R5DL41A			
3.0A	DO-201AD	35ns	3DL41A				
5.0A	#TO-220(N)IS	35ns	5DLZ47A		5GLZ47A	5JLZ47*	
Center Tap Type (Cathode Common)	5.0A	TO-220AB	35ns	5DL2C41A			
		TO-220FL	35ns	5DL2C48A	5FL2C48A		
		TO-220(N)IS	35ns	5DL2CZ47A	5FL2CZ47A	5GL2CZ47A	5JL2CZ47*
		TO-220SM	35ns	U5DL2C48A	U5FL2C48A		
	10A	TO-220AB	35ns	10DL2C41A			
		TO-220FL	35ns	10DL2C48A	10FL2C48A		
		TO-220(N)IS	35ns	10DL2CZ47A	10FL2CZ47A	10GL2CZ47A	10JL2CZ47*
		TO-220SM	35ns	U10DL2C48A	U10FL2C48A		
	16A	TO-3P(N)	35ns	16DL2C41A	16FL2C41A		
		TO-220(N)IS	35ns	16DL2CZ47A	16FL2CZ47A		
	20A	TO-3P(N)	35ns	20DL2C41A	20FL2C41A	20GL2C41A	20JL2C41*
		TO-3P(N)IS	35ns	20DL2CZ51A	20FL2CZ51A		
		TO-220FL	35ns	20DL2C48A	20FL2C48A		
		TO-220(N)IS	35ns	20DL2CZ47A	20FL2CZ47A		
		TO-220SM	35ns	U20DL2C48A	U20FL2C48A		
	30A	TO-3P(N)	50ns				30JL2C41*

* $t_{rr} \leq 50ns$, # Center Lead Cutted

Schottky Barrier Diodes

→ Peak Repetitive Reverse Voltage



		Package	40V	60V	90V	
Average Rectified Current ← Average Forward Current ←	Single Type	1.0A	PW-MINI	U1GWJ49		
			DO-41S	1GWJ42		
			DO-41SS	1GWJ43		
			I-FLAT	U1GWJ44		
	2.0A	DO-15L	2GWJ42			
3.0A	DO-201AD	3GWJ42				
5.0A	# TO-220(N)IS	5GWJZ47				
Average Rectified Current ← Average Forward Current ←	Center Tap Type (Cathode Common)	1.0A	PW-MINI	U1GWJ2C49		
			2.0A	PW-MOLD	2GWJ2C42	
		U2GWJ2C42				
		3.0A	PW-MOLD	3GWJ2C42		
				U3GWJ2C42		
		5.0A	TO-220FL	5GWJ2C48C		
			TO-220(N)IS	5GWJ2CZ47C	5JWJ2CZ47	5MWJ2C47
			TO-220SM	U5GWJ2C48C		
		10A	TO-220FL	10GWJ2C48C		
			TO-220(N)IS	10GWJ2CZ47C	10JWJ2CZ47	10MWJ2CZ47
			TO-220SM	U10GWJ2C48C		
		20A	TO-220(N)IS	* 20GWJ2CZ47C		
			TO-220FL	* 20GWJ2C48C		
			TO-220SM	* U20GWJ2C48C		
			30A	TO-3P(N)	30GWJ2C42C	
TO-220(N)IS	30GWJ2CZ47C					
TO-220FL	30GWJ2C48C					
TO-220SM	U30GWJ2C48C					

Center Lead Cutted

* Under development

Modules

→ Peak Repetitive Reverse Voltage

		400V	800V	1200V	1600V	Connection	
Average Rectified Current ← (3-Phase Output)	Rectifier Module	20A	20L6P45				
		30A	30L6P45		* 30U6P45		
		50A	50G6P43	50L6P43	50Q6P43		50U6P43
		70A	75G6P43	75L6P43	75Q6P43		75U6P43
		100A	100G6P43	100L6P43	100Q6P43		100U6P43
		160A	110G2G43	110L2G43	110Q2G43	110U2G43	
		240A	160G2G43	160L2G43	160Q2G43	160U2G43	

* Under development.

Power Zener Diode

→ Allowable Power Dissipation

Standard Zener Voltage Value ←	P (W)	I.0W				1.5W	3.0W
	Package	DO-15	DO-41SS		I-FLAT(SMD)	DO-15L	DO-201AD
V _Z							
6.2V	1Z6.2						
6.8V	1Z6.8, 1Z6.8A	1ZB6.8					
7.5V	1Z7.5, 1Z7.5A	1ZB7.5					
8.2V	1Z8.2, 1Z8.2A	1ZB8.2					
9.1V	1Z9.1, 1Z9.1A	1ZB9.1					
10V	1Z10, 1Z10A	1ZB10					
11V	1Z11, 1Z11A	1ZB11					
12V	1Z12, 1Z12A	1ZB12	1ZC12	1ZC12A	U1ZB12	2Z12	3Z12
13V	1Z13, 1Z13A	1ZB13	1ZC13	1ZC13A	U1ZB13	2Z13	3Z13
15V	1Z15, 1Z15A	1ZB25	1ZC15	1ZC15A	U1ZB15	2Z15	3Z15
16V	1Z16, 1Z16A	1ZB16	1ZC16	1ZC16A	U1ZB16	2Z16, 2Z16A	3Z16
18V	1Z18, 1Z18A	1ZB18	1ZC18	1ZC18A	U1ZB18	2Z18, 2Z18A	3Z18
20V	1Z20, 1Z20A	1ZB20	1ZC20	1ZC20A	U1ZB20	2Z20	3Z20
22V	1Z22, 1Z22A	1ZB22	1ZC22	1ZC22A	U1ZB22	2Z22	3Z22
24V	1Z24, 1Z24A	1ZB24	1ZC24	1ZC24A	U1ZB24	2Z24	3Z24
27V	1Z27, 1Z27A	1ZB27	1ZC27	1ZC27A	U1ZB27	2Z27, 2Z27A	3Z27
30V	1Z30, 1Z30A	1ZB30	1ZC30	1ZC30A	U1ZB30	2Z30	3Z30
33V	1Z33	1ZB33	1ZC33	1ZC33A	U1ZB33	2Z33	3Z33
36V	1Z36	1ZB36	1ZC36	1ZC36A	U1ZB36	2Z36	3Z36
39V			1ZC39	1ZC39A			
43V	1Z43	1ZB43	1ZC43	1ZC43A	U1ZB43		
47V	1Z47	1ZB47	1ZC47	1ZC47A	U1ZB47	2Z47	3Z47
51V	1Z51	1ZB51	1ZC51	1ZC51A	U1ZB51	2Z51	3Z51
56V			1ZC56	1ZC56A			
62V			1ZC62	1ZC62A			
68V	1Z68	1ZB68	1ZC68	1ZC68A	U1ZB68		3Z68
75V	1Z75	1ZB75	1ZC75	1ZC75A	U1ZB75		3Z75
82V	1Z82	1ZB82	1ZC82	1ZC82A	U1ZB82		3Z82
91V			1ZC91	1ZC91A			
100V	1Z100	1ZB100	1ZC100	1ZC100A	U1ZB100		3Z100
110V	1Z110	1ZB110	1ZC110	1ZC110A	U1ZB110		3Z110
120V			1ZC120	1ZC120A			
150V	1Z150	1ZB150			U1ZB150		3Z150
180V	1Z180	1ZB180			U1ZB180		3Z180
200V		1ZB200			U1ZB200		3Z200
220V		1ZB220			U1ZB220		3Z220
240V		1ZB240			U1ZB240		3Z240
270V		1ZB270			U1ZB270		3Z270
300V		1ZB300			U1ZB300		3Z300
330V	1Z330	1ZB330			U1ZB330		3Z330
390V	1Z390	1ZB390			U1ZB390		3Z390

